

TOTAL SA  
Form 20-F  
April 20, 2005

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SECURITIES AND EXCHANGE COMMISSION  
WASHINGTON, D.C. 20549

Form 20-F

(Mark One)

- ☐ REGISTRATION STATEMENT PURSUANT TO SECTION 12(b) OR 12(g)  
OF THE SECURITIES EXCHANGE ACT OF 1934  
OR
- ☒ ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d)  
OF THE SECURITIES EXCHANGE ACT OF 1934  
For the fiscal year ended December 31, 2004  
OR
- ☐ TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d)  
OF THE SECURITIES EXCHANGE ACT OF 1934  
**For the transition period from            to**  
**Commission file number: 1-10888**

**TOTAL S.A.**

*(Exact name of Registrant as specified in its charter)*

**N/A**

*(Translation of registrant's name into English)*

**Republic of France**

*(Jurisdiction of incorporation or organization)*

**TOTAL S.A.**

**2, place de la Coupole  
La Défense 6  
92400 Courbevoie  
France**

*(Address of principal executive offices)*

Securities registered or to be registered pursuant to Section 12(b) of the Act.

**Title of each class**

**Name of each exchange on which registered**

Shares  
American Depositary Shares

New York Stock Exchange\*  
New York Stock Exchange

\* Not for trading, but only in connection with the registration of American Depositary Shares, pursuant to the requirements of the Securities and Exchange Commission.

Securities registered or to be registered pursuant to Section 12(g) of the Act.

**None**

Securities for which there is a reporting obligation pursuant to Section 15(d) of the Act.

**None**

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Indicate the number of outstanding shares of each of the issuer's classes of capital or common stock as of the close of the period covered by the annual report.

635,015,108 Shares, nominal value 10.00 each, as of December 31, 2004

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes ☒ No ☐.

Indicate by check mark which financial statement item the registrant has elected to follow. Item 17 ☐ Item 18 ☒

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**Basis of Presentation**

In general, financial information included in this Annual Report is presented according to French GAAP and accordingly reflects the pooling of interest method for the acquisition of Elf Aquitaine beginning with fiscal year 2000, as well as for the acquisition of PetroFina in 1999 (Article 215 of Rule 99-02 of the French Accounting Rule Committee).

**Statements Regarding Competitive Position**

Statements made in Item 4. Information on the Company referring to TOTAL's competitive position are based on the Company's belief, and in some cases rely on a range of sources, including investment analysts' reports, independent market studies and TOTAL's internal assessments of market share based on publicly available information about the financial results and performance of market participants.

**Additional Information**

This Annual Report on Form 20-F reports information primarily regarding TOTAL's business and operations and financial information relating to the fiscal year ended December 31, 2004. For more recent updates regarding TOTAL, you may read and copy any reports, statements or other information TOTAL files with the Securities and Exchange Commission. All of TOTAL's Securities and Exchange Commission filings made after December 31, 2001 are available to the public at the Securities and Exchange Commission web site at <http://www.sec.gov> and from certain commercial document retrieval services. Our website at <http://www.total.com> includes information about our businesses and also includes recent press releases and other publications of TOTAL, including some of our filings with the Securities and Exchange Commission made prior to December 31, 2001. See also Item 10. Additional Information Documents on Display.

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**CERTAIN TERMS**

Unless the context indicates otherwise, the following terms have the meanings shown below:

<b>acreage</b>	The total area, expressed in acres, over which TOTAL has interests in exploration or production. Net acreage is TOTAL's interest, expressed in acres, in the relevant exploration or production area.
<b>ADRs</b>	American Depositary Receipts evidencing ADSs.
<b>ADSs</b>	American Depositary Shares representing the Shares.
<b>barrels</b>	Barrels of crude oil, including condensate and natural gas liquids.
<b>Company</b>	TOTAL S.A. and its subsidiaries and affiliates. The terms TOTAL, Company and Group are used interchangeably.
<b>condensate</b>	Light hydrocarbon substances produced with natural gas which condense into liquid at normal temperatures and pressures associated with surface production equipment.
<b>crude oil</b>	Crude oil, including condensate and natural gas liquids.
<b>Group</b>	TOTAL S.A. and its subsidiaries and affiliates. The terms TOTAL, Company and Group are used interchangeably.
<b>LNG</b>	Liquefied natural gas.
<b>LPG</b>	Liquefied petroleum gas.
<b>proved reserves</b>	Proved oil and gas reserves are the estimated quantities of crude oil, natural gas and natural gas liquids that geological and engineering data demonstrate with reasonable certainty to be recoverable in future years from known reservoirs under existing economic and operating conditions, i.e., prices and costs as of the date the estimate is made. Prices include consideration of changes in existing prices provided only by contractual arrangements, but not of escalations based upon future conditions. The full definition of proved reserves which we are required to follow in presenting such information in our financial results and elsewhere in reports we file with the Securities and Exchange Commission is found in Rule 4-10 of Regulation S-X under the U.S. Securities Act of 1933, as amended.
<b>proved developed reserves</b>	Proved developed oil and gas reserves are reserves that can be expected to be recovered through existing wells with existing equipment and operating methods. Additional oil and gas expected to be obtained through the application of fluid injection or other improved recovery techniques for supplementing natural forces and mechanisms of primary recovery are included as proved developed reserves only after testing by a pilot project or after the operation of an installed program has confirmed through production response that increased recovery will be achieved. The full definition of proved developed reserves which we are required to follow in presenting such information in our financial results and elsewhere in reports we file with the Securities and Exchange Commission is found in Rule 4-10 of Regulation S-X under the U.S. Securities Act of

1933, as amended.

**proved undeveloped  
reserves**

Proved undeveloped oil and gas reserves are reserves that are expected to be recovered from new wells on undrilled acreage, or from existing wells where a relatively major expenditure is required for recompletion, but does

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not include reserves attributable to any acreage for which an application of fluid injection or other improved recovery technique is contemplated, unless such techniques have been proved effective by actual tests in the area and in the same reservoir. Reserves on undrilled acreage are limited to those drilling units offsetting productive units that are reasonably certain of production when drilled. Proved reserves for other undrilled units can be claimed only where it can be demonstrated with certainty that there is continuity of production from the existing productive formation. The full definition of proved undeveloped reserves which we are required to follow in presenting such information in our financial results and elsewhere in reports we file with the Securities and Exchange Commission is found in Rule 4-10 of Regulation S-X under the U.S. Securities Act of 1933, as amended.

<b>TOTAL</b>	TOTAL S.A. and its subsidiaries and affiliates. We use such term interchangeably with Company and Group . When we refer to the parent holding company alone, we use the term TOTAL S.A. .
<b>trains</b>	Facilities for converting, liquefying, storing and off-loading natural gas.
<b>TRCV</b>	An aggregate margin for topping, reforming, cracking, visbreaking in Western Europe developed and used internally by TOTAL s management as an indicator of refining margins.



**Table of Contents****ABBREVIATIONS**

b	barrel	k	thousand
cf	cubic feet	M	million
boe	barrel of oil equivalent	B	billion
t	metric ton	W	watt
cm	cubic meter	TWh	terawatt-hour
/y	per year	Wp	watt peak
/d	per day	ppm	parts per million

**CONVERSION TABLE**

1 acre	= 0.405 hectares	
1 b	= 42 U.S. gallons	
1 boe	= 1 b of crude oil	= 5,483 cf of gas in 2002 5,460 cf of gas in 2003 and 5,497 cf of gas in 2004(1)
1 b/d of crude oil	= approximately 50 t/y of crude oil	
1 Bcm/y	= approximately 0.1 Bcf/d	
1 cubic meter	= 35.3147 cf	
1 kilometer	= approximately 0.62 miles	
1 ton	= 1 t	= 1,000 kilograms (approximately 2,205 pounds)
1 ton of crude oil	= 1 t of crude oil	= approximately 7.5b of crude oil (assuming a specific gravity of 37 API)
1 t of LNG	= approximately 8.9 boe	= approximately 48 mcf of gas
1 Mt/y LNG		= approximately 133 Mcf/d

(1) Natural gas is converted to barrels of oil equivalent using a ratio of cubic feet of natural gas per one barrel. This ratio is based on the actual average equivalent energy content of the Company's natural gas reserves during the applicable periods, and is subject to change. The tabular conversion rate is applicable to the Company's natural gas reserves on a group-wide basis.

**Cautionary Statement Concerning Forward-Looking Statements**

TOTAL has made certain forward-looking statements in this document and in the documents referred to in, or incorporated by reference into, this Annual Report. Such statements are subject to risks and uncertainties. These statements are based on the beliefs and assumptions of the management of TOTAL and on the information currently available to such management. Forward-looking statements include information concerning forecasts, projections, anticipated synergies, and other information concerning possible or assumed future results of TOTAL, and may be preceded by, followed by, or otherwise include the words "believes", "expects", "anticipates", "intends", "plans", "targets", "estimates" or similar expressions.

Forward-looking statements are not assurances of results or values. They involve risks, uncertainties and assumptions. TOTAL's future results and share value may differ materially from those expressed in these forward-looking statements. Many of the factors that will determine these results and values are beyond TOTAL's ability to control or predict. Except for its ongoing obligations to disclose material information as required by applicable securities laws, TOTAL does not have any intention or obligation to update forward-looking statements after the distribution of this document, even if new information, future events or other circumstances have made them incorrect or misleading.

You should understand that various factors, certain of which are discussed elsewhere in this document and in the documents referred to in, or incorporated by reference into, this document, could affect the future results of

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TOTAL and could cause results to differ materially from those expressed in such forward-looking statements, including:

material adverse changes in general economic conditions or in the markets served by TOTAL, including changes in the prices of oil, natural gas, refined products, petrochemical products and other chemicals,

changes in currency exchange rates and currency devaluations,

the success of the economic efficiency of oil and natural gas exploration, development and production programs, including without limitation, those that are not controlled and/or operated by TOTAL,

uncertainties about estimates of changes in proven and potential reserves and the capabilities of production facilities,

uncertainties about the ability to control unit costs in exploration, production, refining and marketing (including refining margins) and chemicals,

changes in the current capital expenditure plans of TOTAL,

the ability of TOTAL to realize anticipated cost savings, synergies and operating efficiencies,

the financial resources of competitors,

changes in laws and regulations, including environmental laws and industrial safety regulations,

the quality of future opportunities that may be presented to or pursued by TOTAL,

the ability to generate cash flows or obtain financing to fund growth and the cost of such financing,

the ability to obtain governmental or regulatory approvals,

the ability to respond to challenges in international markets, including political or economic conditions, including international armed conflict, and trade and regulatory matters,

the ability to complete and integrate appropriate acquisitions, strategic alliances and joint ventures,

changes in the political environment that adversely affect exploration, production licenses and contractual rights or impose minimum drilling obligations, price controls, nationalization or expropriation, and regulation of refining and marketing, chemicals and power generating activities,

the possibility that other unpredictable events such as labor disputes or industrial accidents will adversely affect the business of TOTAL, and

the risk that TOTAL will inadequately hedge the price of crude oil or finished products.

For additional factors, you should read the information set forth under Item 3. Risk Factors , Item 4. Information on the Company Other Matters , Item 5. Operating and Financial Review and Prospects and Item 11. Quantitative and Qualitative Disclosures about Market Risk .

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**ITEM 1. IDENTITY OF DIRECTORS, SENIOR MANAGEMENT AND ADVISERS**

Not applicable

**ITEM 2. OFFER STATISTICS AND EXPECTED TIMETABLE**

Not applicable

**ITEM 3. KEY INFORMATION**

**SELECTED FINANCIAL DATA**

The following table presents selected consolidated financial data for TOTAL for the five-year period ended December 31, 2004. The historical financial statements of TOTAL for this period, from which the financial data presented below for such period are derived, have been audited by Ernst & Young Audit and KPMG S.A., independent public accountants and the Company's auditors. All such data should be read in conjunction with the Consolidated Financial Statements and the Notes thereto included elsewhere herein.

The presentation of financial information is made on the following basis: Pursuant to Article 215 of Rule 99-02 of the French Accounting Rule Committee, the 1999 Total/ PetroFina and the 2000 TotalFina/ Elf Aquitaine combinations have been treated as a pooling of interests under French generally accepted accounting principles ( French GAAP ). Under generally accepted accounting principles applicable in the United States ( U.S. GAAP ), both combinations are treated as purchases.

In 2003, TOTAL adopted Statement of Financial Accounting Standards No. 143, Accounting for Asset Retirement Obligations , as mentioned in Note 1 paragraph L of the Notes to the Consolidated Financial Statements.

The Company acquired the remaining shares of PetroFina in the first quarter of 2002 leading to a decrease in minority interests in that quarter (PetroFina was 99.6% owned as of December 31, 2000 and 2001).

Table of Contents**SELECTED CONSOLIDATED FINANCIAL DATA**

**2004(1)      2004      2003      2002      2001      2000**

**(in millions, except per share data)**

**INCOME STATEMENT  
DATA****Amounts in accordance  
with French GAAP**

Sales	\$ 165,645	122,700	104,652	102,540	105,318	114,557
Operating Income	21,682	16,061	12,770	10,126	12,777	14,213
Net income	12,976	9,612	7,025	5,941	7,658	6,904
Earnings per Share(2)	21.07	15.61	11.06	8.92	11.05	9.76

**Amounts in accordance  
with****U.S. GAAP(3)**

Sales(4)	\$ 135,649	100,481	85,585	84,883	105,318(7)	114,557(7)
Net income(4)	9,748	7,221	6,103	6,264	5,271	5,638
Basic earnings per Share	16.13	11.95	9.81	9.60	7.73	8.07
Diluted earnings per Share	16.07	11.90	9.77	9.53	7.68	8.00

**CASH FLOW  
STATEMENT  
DATA(5)****Amounts in accordance  
with French GAAP**

Cash flows provided by operating activities	\$ 19,479	14,429	12,487	11,006	12,303	13,389
Investments(6)	11,702	8,668	7,728	8,657	10,566	8,339

**Amounts in accordance  
with****U.S. GAAP(3)**

Cash flows provided by operating activities	\$ 18,974	14,055	12,144	10,574	11,782	12,935
Investments(6)	11,197	8,294	7,385	8,225	10,045	7,885

**BALANCE SHEET  
DATA****Amounts in accordance  
with French GAAP**

Total assets	\$ 113,617	84,161	79,963	85,329	88,600	85,174
Long-term debt	13,141	9,734	9,783	10,157	11,165	11,509
Minority interests	849	629	664	724	898	755
Shareholders' equity	42,201	31,260	30,406	32,146	33,932	32,401

**Amounts in accordance  
with****U.S. GAAP(3)**

Total assets	\$ 165,020	122,237	120,151	124,873	128,596	129,234
Long-term debt	15,039	11,140	10,883	9,533	10,860	11,509
Minority interests	871	645	666	731	782	684

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Shareholders equity	87,896	65,108	66,527	69,096	71,260	73,355
<b>DIVIDENDS</b>						
Dividend per share	\$ 7.29	5.40	4.70	4.10	3.80	3.30

- (1) Translated solely for convenience into dollars at the Noon Buying Rate on December 31, 2004 of \$1.35 per 1.00.
- (2) Earnings per Share were computed based on the fully-diluted weighted average number of Shares of 615,881,456 in 2004, 635,126,885 in 2003, 666,067,982 in 2002, 693,180,285 in 2001 and 707,121,871 in 2000.
- (3) For information concerning the differences between French GAAP and U.S. GAAP, see Note 3 of the Notes to the Consolidated Financial Statements included elsewhere herein.
- (4) Results of PetroFina and of Elf Aquitaine have been included under full consolidation.
- (5) See Consolidated Statement of Cash Flows included in the Consolidated Financial Statements included elsewhere herein.
- (6) Consists of capital expenditures, exploration costs, subsidiaries acquired and licenses granted.
- (7) Sales under U.S. GAAP not restated for EITF 02-3 adjustments, see Note 3 paragraph J of the Notes to the Consolidated Financial Statements included elsewhere herein.

**Table of Contents****EXCHANGE RATE INFORMATION**

For information regarding the effects of currency fluctuations on TOTAL's results, see Item 5. Operating and Financial Review and Prospects.

Most currency amounts in this Annual Report on Form 20-F are expressed in euros ( euros or ) or in U.S. dollars ( dollars or \$ ). For the convenience of the reader, this Annual Report on Form 20-F presents certain translations into dollars of certain euro amounts. Unless otherwise stated, the translation of euros to dollars has been made at the noon buying rate in New York City for cable transfers in euros as certified for customs purposes by The Federal Reserve Bank of New York (the Noon Buying Rate ) for December 31, 2004, of \$1.35 per 1.00 (or 0.74 per \$1.00).

The following tables set out the average dollar/euro exchange rate for the years indicated, based on the Noon Buying Rate expressed in dollars per 1.00. Such rates are not used by TOTAL in preparation of its Consolidated Financial Statements included elsewhere herein. No representation is made that the euro could have been converted into dollars at the rates shown or at any other rates for such periods or at such dates.

**DOLLAR/ EURO EXCHANGE RATES**

<b>Year</b>	<b>Average Rate(1)</b>
2000	\$ 0.92
2001	0.89
2002	0.95
2003	1.13
2004	1.25

(1) The average of the Noon Buying Rate expressed in dollars per euro on the last business day of each full month during the relevant year.

The table below shows the high and low dollar/euro exchange rates for the previous six months based on the Noon Buying Rate expressed in dollars per euro.

**DOLLAR/ EURO EXCHANGE RATES**

<b>Period</b>	<b>High</b>	<b>Low</b>
October 2004	1.28	1.23
November 2004	1.33	1.27
December 2004	1.36	1.32
January 2005	1.35	1.30
February 2005	1.33	1.28
March 2005	1.35	1.29

The Noon Buying Rate on April 18, 2005 for the dollar against the euro was \$1.30 per 1.00.

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### **RISK FACTORS**

The Group and its businesses are subject to various risks relating to changing competitive, economic, political, legal, social, industry, business and financial conditions. These conditions are described below and discussed in greater detail elsewhere, along with the Company's approaches to managing certain of these risks, in this Annual Report, particularly under the headings Item 4. Information on the Company Business Overview Other Matters , Item 5. Operating and Financial Review and Prospects and Item 11. Quantitative and Qualitative Disclosures about Market Risk .

#### **Industry and Company Risks**

***A substantial or extended decline in oil or natural gas prices would have a material adverse effect on our results of operations.***

Prices for oil and natural gas historically have fluctuated widely due to many factors over which we have no control. These factors include:

global and regional economic and political developments in resource-producing regions, particularly in the Middle East;

global and regional supply and demand;

the ability of the Organization of Petroleum Exporting Countries (OPEC) and other producing nations to influence global production levels and prices;

prices of alternative fuels which affect our realized prices under our long-term gas sales contracts;

governmental regulations and actions;

global economic conditions;

cost and availability of new technology; and

weather conditions.

Substantial or extended declines in oil and natural gas prices would adversely affect our results of operations by reducing our profits. For the year 2005, we estimate that a decrease of \$1 per barrel in the price of Brent crude would have the effect of reducing our annual net income by approximately 0.2 B . Lower oil and natural gas prices over prolonged periods may also reduce the economic viability of projects planned or in development, causing us to cancel or postpone capital expansion projects, and may reduce liquidity, thereby potentially decreasing our ability to finance capital expenditures. If we are unable to follow through with capital expansion projects, our opportunities for future revenue and profitability growth would be reduced, which could materially impact our financial condition.

***We face foreign exchange risks that could adversely affect our results of operations.***

Our business faces foreign exchange risks because a large percentage of our revenues and cash receipts are denominated in U.S. dollars, the international currency of petroleum sales, while a significant portion of our operating expenses and income taxes accrue in euro and other currencies. Movements between the U.S. dollar and euro or other currencies may adversely affect our business by negatively impacting our booked revenues and income. For the year 2005, we estimate that a decrease in the dollar/euro exchange rate of \$0.10 per 1.00 would have, without the use of hedging techniques, a corresponding negative effect on our annual net income of approximately 0.6 B .

***Our long-term profitability depends on cost effective discovery and development of new reserves; if we are unsuccessful, our results of operations and financial condition will be materially and adversely affected.***

A significant portion of our revenues and the majority of our operating income are derived from the sale of crude oil and natural gas which we extract from underground reserves discovered and developed as part of our Upstream business. In order for this business to continue to be profitable, we continuously need to replace





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depleted reserves with new proved reserves. Furthermore, we need to accomplish such replacement in a manner that allows subsequent production to be economically viable. However, our ability to discover or acquire and develop new reserves successfully is uncertain and can be negatively affected by a number of factors, including:

unexpected drilling conditions, including pressure or irregularities in geological formations;

equipment failures or accidents;

our inability to develop new technologies that permit access to previously inaccessible fields;

adverse weather conditions;

compliance with unanticipated governmental requirements;

shortages or delays in the availability or delivery of appropriate equipment;

industrial action; and

problems with legal title.

Any of these factors could lead to cost overruns and impair our ability to make discoveries or complete a development project, or to make production economical. If we fail to discover and develop new reserves cost-effectively on a consistent basis, our results of operations, including profits, and our financial condition would be materially and adversely affected.

***Our crude oil and natural gas reserve data are only estimates, and subsequent downward adjustments are possible. If actual production from such reserves is lower than current estimates indicate, our results of operations and financial condition will be negatively impacted.***

Our proved reserves figures are estimates reflecting applicable reporting regulations. Proved reserves are estimated using geological and engineering data to determine with reasonable certainty whether the crude oil or natural gas in known reservoirs is recoverable under existing economic and operating conditions. This process involves making subjective judgments. Consequently, measures of reserves are not precise and are subject to revision. They may be negatively impacted by a variety of factors which could cause such estimates to be adjusted downward in the future, or cause our actual production to be lower than our currently reported proved reserves indicate. The main factors which may cause our proved reserves estimates to be adjusted downward, or actual production to be lower than the amounts implied by our currently reported proved reserves, include:

a decline in the price of oil or gas, making reserves no longer economically viable to exploit and therefore not classifiable as proved;

an increase in the price of oil or gas, which may reduce the reserves that we are entitled to under production sharing and buy-back contracts;

changes in tax rules and other government regulations that make reserves no longer economically viable to exploit;

the quality and quantity of our geological, technical and economic data, which may prove to be inaccurate;

the actual production performance of our reservoirs; and

engineering judgments.

Many of the factors, assumptions and variables involved in estimating reserves are beyond our control and may prove to be incorrect over time. Results of drilling, testing and production after the date of the estimates may require substantial downward revisions in our reserve data. Any downward adjustment would indicate lower future production amounts and may adversely affect our results of operations, including profits as well as our financial condition.

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***We have significant production and reserves located in politically, economically and socially unstable areas, where the likelihood of material disruption of our operations is relatively high.***

A significant portion of our oil and gas production occurs in unstable regions around the world, most significantly Africa, but also the Middle East, Asia and South America. Approximately 31%, 16%, 9% and 8%, respectively, of our 2004 production came from these four regions. In recent years, a number of the countries in these regions have experienced varying degrees of one or more of the following: economic instability, political volatility, civil war, violent conflict and social unrest. In Africa, certain of the countries in which we have production has recently suffered from some of these conditions. The Middle East in general has recently suffered increased political volatility in connection with violent conflict and social unrest. A number of countries in South America where we have production and other facilities, including Argentina and Venezuela, have suffered from economic instability and social unrest and related problems. In the Far East, Indonesia has suffered the majority of these conditions. Any of these conditions alone or in combination could disrupt our operations in any of these regions, causing substantial declines in production. Furthermore, in addition to current production, we are also exploring for and developing new reserves in other regions of the world that are historically characterized by political, social and economic instability, such as the Caspian Sea region where we have a number of large projects currently underway. The occurrence and magnitude of incidents related to economic, social and political instability are unpredictable. It is possible that they could have a material adverse impact on our production and operations in the future.

***We are subject to stringent environmental, health and safety laws in numerous jurisdictions around the world and may incur material costs to comply with these laws and regulations.***

We incur, and expect to continue to incur, substantial capital and operating expenditures to comply with increasingly complex laws and regulations covering the protection of the natural environment and the promotion of worker health and safety, including:

costs to prevent, control, eliminate or reduce certain types of air and water emissions,

remedial measures related to environmental contamination or accidents at various sites, including those owned by third parties,

compensation of persons claiming damages caused by our activities or accidents, and

costs in connection with the dismantling of drilling platforms.

If our established financial reserves prove not to be adequate, environmental costs could have a material effect on our results of operations and our financial position. Furthermore, in the countries where we operate or expect to operate in the near future, new laws and regulations, the imposition of tougher license requirements, increasingly strict enforcement or new interpretations of existing laws and regulations or the discovery of previously unknown contamination may also cause us to incur material costs resulting from actions taken to comply with such laws and regulations, including:

modifying operations,

installing pollution control equipment,

implementing additional safety measures, and

performing site clean-ups.

As a further result of any new laws and regulations or other factors, we may also have to curtail or cease certain operations, which could diminish our productivity and materially and adversely impact our results of operations, including profits.

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***Our operations throughout the developing world are subject to intervention by various governments, which could have an adverse effect on our results of operations.***

We have significant exploration and production, and in some cases refining, marketing or chemicals operations, in developing countries whose governmental and regulatory framework is subject to unexpected change and where the enforcement of contractual rights is uncertain. In addition, our exploration and production activity in such countries is often done in conjunction with state-owned entities, for example as part of a joint venture, where the state has a significant degree of control. Potential intervention by governments in such countries can take a wide variety of forms, including:

the award or denial of exploration and production interests;

the imposition of specific drilling obligations;

price and/or production quota controls;

nationalization or expropriation of our assets;

cancellation of our license or contract rights;

increases in taxes and royalties;

the establishment of production and export limits;

the renegotiation of contracts;

payment delays; and

currency exchange restrictions or currency devaluation.

Imposition of any of these factors by a host government in a developing country where we have substantial operations, including exploration, could cause us to incur material costs or cause our production to decrease, potentially having a material adverse effect on our results of operations, including profits.

***Our activities in Iran could lead to sanctions under relevant U.S. legislation.***

In 2001, the U.S. legislation implementing sanctions against Iran and Libya, referred to as ILSA, was extended until August 2006. In April 2004, the President of the United States terminated the application of ILSA with respect to Libya. ILSA authorizes the President of the United States to impose sanctions (from a list that includes denial of financing by the U.S. export-import bank and limitations on the amount of loans or credits available from U.S. financial institutions) against persons found by the President to have knowingly made investments in Iran of \$20 million or more in any twelve-month period. In May 1998 the U.S. government waived the application of sanctions for TOTAL's investment in the South Pars gas field in Iran. This waiver, which has not been modified since it was granted, does not address TOTAL's other activities in Iran, although TOTAL has not been notified of any related sanctions. At the end of 1996, the Council of the European Union adopted Council Regulation No. 2271/96 which prohibits TOTAL from complying with any requirement or prohibition based on or resulting directly or indirectly from certain enumerated legislation, including ILSA. It also prohibits TOTAL from extending its waiver for South Pars to other activities. In each of the years since the passage of ILSA, TOTAL has made investments in Iran (excluding South Pars) in excess of \$20 million, sometimes substantially exceeding this figure. In 2004, TOTAL's average daily production in Iran amounted to 26 kboe/d, approximately 1.0% of its average daily worldwide production. TOTAL expects to continue to invest amounts significantly in excess of \$20 million per year in Iran in the foreseeable future. TOTAL cannot predict interpretations of or the implementation policy of the U.S. government under ILSA with respect to its current or future activities in Iran. It is possible that the United States may determine

that these or other activities will constitute activity prohibited by ILSA and will subject TOTAL to sanctions. TOTAL does not believe that enforcement of ILSA, including the imposition of the maximum sanctions under the current law and regulations, would have a material negative effect on its results of operations or financial condition.

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**ITEM 4. INFORMATION ON THE COMPANY**

**HISTORY AND DEVELOPMENT OF THE COMPANY**

TOTAL, a French *société anonyme* incorporated on March 28, 1924, together with its subsidiaries and affiliates, is the fourth largest publicly-traded integrated oil and gas company in the world, based on market capitalization, with operations in more than 130 countries. TOTAL engages in all aspects of the petroleum industry, including upstream operations (oil and gas exploration, development and production, LNG) and downstream operations (refining, marketing and the trading and shipping of crude oil and petroleum products). TOTAL also produces base petrochemicals, polymers, chlorochemicals, intermediates, performance polymers and specialty chemicals for industrial and consumer use. In addition, TOTAL has interests in coal mining and in the cogeneration and electricity sectors.

The Company began its upstream operations in the Middle East in 1924. Since that time, the Company has grown and expanded its operations worldwide. Most notably, in early 1999 the Company acquired control of PetroFina S.A. ( PetroFina or Fina ) and in early 2000, the Company acquired control of Elf Aquitaine S.A. ( Elf Aquitaine or Elf ). The Company currently owns 99.5% of Elf Aquitaine shares and, since early 2002, 100% of PetroFina shares. The Group, which operated under the name TotalFina from June 1999 to March 2000, and then under the name TotalFinaElf, since May 2003, operates once again under the name TOTAL.

The Company's strategy is to develop its Upstream activities throughout the world, including reinforcing its position as one of the global leaders in the natural gas and LNG markets; to consolidate its position in the Downstream segment in Europe, while developing its interests in rapidly growing markets (such as the Mediterranean Basin, Africa and Asia); and to rationalize and develop its Chemicals segment by giving priority to improving profitability and creating a new decentralized pole encompassing the chlorochemicals, intermediates and performance polymers activities, thereby allowing the Group to focus its Chemicals activities on petrochemicals (base chemicals and polymers) and specialty chemicals. This new entity, Arkema, was created on October 1, 2004, and is expected to become a stand alone entity.

The Company's principal address is 2, place de la Coupole, La Défense 6, 92400 Courbevoie, France; its telephone number is 33.1.47.44.45.46 and its website address is [www.total.com](http://www.total.com).

**Basics of Presentation of Financial Information**

In general, financial information included in this Annual Report is presented according to French GAAP and accordingly reflects the pooling of interest method for the acquisition of Elf Aquitaine beginning with fiscal year 2000, as well as for the acquisition of PetroFina in 1999 (Article 215 of Rule 99-02).

**BUSINESS OVERVIEW**

TOTAL's worldwide operations are conducted through three business segments:

Upstream,

Downstream, and

Chemicals.

The Upstream segment includes exploration, development and production activities, as well as TOTAL's natural gas transportation, storage and trading, power generation, LNG, LPG and coal operations. The Downstream segment sells substantially all of the crude oil produced by TOTAL, purchases most of the crude oil required to supply TOTAL's refineries, operates refineries and markets petroleum products worldwide through both retail and non-retail activities, and conducts TOTAL's bulk crude oil trading. The Chemicals segment includes the Base Chemicals & Polymers sector, which is linked to TOTAL's refining activities, the Intermediates & Performance Polymers sector, as well as the Specialties sector, which includes rubber processing, resins, adhesives and electroplating activities.

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The table below gives information on the geographic breakdown of TOTAL's activities and is taken from Note 5 of the Notes to the Consolidated Financial Statements included in this Annual Report.

	<b>France</b>	<b>Rest of Europe</b>	<b>North America</b>	<b>Africa</b>	<b>Far East and rest of the world</b>	<b>Total</b>
<b>(in millions of euros)</b>						
<b>YEAR ENDED DECEMBER 31, 2004</b>						
Total sales (excluding sales to other segments)	23,427	41,853	17,984	5,527	33,909	122,700
Intangible assets and property, plant, and equipment, net	5,322	14,069	3,264	7,441	8,234	38,330
Total expenditures	1,989	1,998	755	2,004	1,922	8,668
<b>YEAR ENDED DECEMBER 31, 2003</b>						
Total sales (excluding sales to other segments)	20,739	36,682	13,968	4,352	28,911	104,652
Intangible assets and property, plant, and equipment, net	4,987	14,288	3,676	7,108	8,244	38,303
Total expenditures	1,160	1,645	580	2,012	2,331	7,728
<b>YEAR ENDED DECEMBER 31, 2002</b>						
Total sales (excluding sales to other segments)	20,649	35,531	12,013	4,240	30,107	102,540
Intangible assets and property, plant, and equipment, net	4,815	16,317	4,447	7,416	8,349	41,344
Total expenditures	1,251	2,118	921	2,086	2,281	8,657

**UPSTREAM****Overview of Upstream Activities**

TOTAL's Upstream segment conducts all of the Company's exploration and production, also known as E&P, activities. In 2004, this segment conducted exploration and production activities in 44 countries and produced hydrocarbons in 27 countries. (See Presentation of Production Activities by Geographic Area below.)

The Upstream segment also includes the Company's Gas & Power activities and the management of the Company's interests in LNG and LPG processing plants. With the Upstream segment's Gas & Power business activities, the Group can conduct its natural gas activities along the entire value chain, both in the more traditional E&P field development and production activities and in newer businesses such as gas liquefaction, transportation, marketing, trading and power generation.

The table below presents non-Group segment sales and operating income (adjusted for special items) for TOTAL's Upstream segment for the last three years.

**UPSTREAM SEGMENT FINANCIAL DATA(1)****For the Year Ended December 31,**

<b>2004</b>	<b>2003</b>	<b>2002</b>
-------------	-------------	-------------



	<b>(in millions of euros)</b>		
Total segment sales (excluding sales to other segments)	21,995	18,704	16,225
Operating income (adjusted for special items)	12,820	10,476	9,309

(1) See Notes 4 of the Notes to the Consolidated Financial Statements included in this Annual Report for more detailed information on the Upstream segment together with a breakdown of special items.

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### **Exploration & Production**

#### ***Exploration and development***

TOTAL evaluates exploration opportunities based on a variety of geological, technical, political and economic factors (including taxes and concession terms), as well as on projected oil and gas prices. Discoveries and extensions of existing discoveries accounted for approximately 70% of the 2,774 Mboe added to the Upstream segment's proved reserves during the three-year period ended December 31, 2004 (before deducting production and sales of reserves in place and adding any acquisitions of reserves in place during this period).

TOTAL continued to follow an active exploration program in 2004, with exploration expenditures of consolidated subsidiaries amounting to 651 M (including unproved property acquisition costs). The principal exploration expenditures were made in the United States, Nigeria, Angola, the United Kingdom, Libya, Algeria, Congo, Kazakhstan, Norway, Bolivia, the Netherlands, Colombia and Indonesia.

The development expenditures of the Group's consolidated Exploration & Production subsidiaries amounted to 4.1 B in 2004. The principal development projects for 2004 were carried out in Norway, Angola, Nigeria, Indonesia, Kazakhstan, the United Kingdom, Qatar, Azerbaijan, the United States, Gabon, Congo, Libya, Trinidad & Tobago, Venezuela and Iran.

#### ***Reserves***

The definitions used for proved, proved developed and proved undeveloped oil and gas reserves are in accordance with the applicable U.S. Securities & Exchange Commission regulation, Rule 4-10 of Regulation S-X. Proved reserves are estimated using geological and engineering data to determine with reasonable certainty whether the crude oil or natural gas in known reservoirs is recoverable under existing economic and operating conditions.

This process involves making subjective judgments. Consequently, measures of reserves are not precise and are subject to revision.

The estimation of proved reserves is controlled by the Group through established validation guidelines. Reserves evaluations are established annually by senior level geoscience and engineering professionals (assisted by a central reserves group with significant technical experience) including reviews with and validation by senior management.

Significant features of the reserves estimation process include:

- internal peer reviews of technical evaluations also to ensure that the SEC definitions and guidance are followed, and

- a requirement that management make significant funding commitments toward the development of the reserves prior to booking.

TOTAL's oil and gas reserves are reviewed annually to take into account, among other things, production levels, field reassessments, the addition of new reserves from discoveries and acquisitions, dispositions of reserves and other economic factors. Unless otherwise indicated, references to TOTAL's proved reserves, proved developed reserves, proved undeveloped reserves and production reflect the entire Group's consolidated share of such reserves or production. TOTAL's worldwide proved reserves include the proved reserves of its consolidated subsidiaries as well as its proportionate share of the proved reserves of equity affiliates and of two companies accounted for by the cost method. For further information concerning changes in TOTAL's proved reserves at December 31, 2004, 2003, and 2002, see Supplemental Oil and Gas Information (Unaudited), included elsewhere herein.

Proved reserves are the estimated quantities of TOTAL's entitlement under concession contracts, production sharing agreements or buy-back agreements. These estimated quantities may vary depending on oil and gas prices. An increase in the year-end price has the effect of reducing proved reserves associated with production sharing or buy-back agreements (which represent approximately 30% of TOTAL's reserves). Under such contracts, TOTAL is entitled to receive a portion of the production, calculated so that its sale covers expenses

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incurred by the Company. With higher oil prices, the level of entitlement necessary to cover the same amount of expenses is lower. This reduction is partially offset by an extension of the duration over which fields can be produced economically. However, the increase in reserves due to extensions is smaller than the decrease in reserves under production sharing agreements. For this reason, a higher year-end price translates into a decrease in TOTAL's reserves.

As of December 31, 2004, TOTAL's combined proved reserves of crude oil and natural gas were 11,148 Mboe (of which 51% were proved developed reserves and 49% proved undeveloped reserves). Liquids represented approximately 63% of these reserves and natural gas the remaining 37%. These reserves are located in Europe (Norway, United Kingdom, the Netherlands, Italy and France), Africa (Nigeria, Angola, Congo, Gabon, Algeria, Libya and Cameroon), Asia-Pacific (Indonesia, Myanmar, Thailand and Brunei), North America (United States and Canada), the Middle East (United Arab Emirates, Qatar, Oman, Iran, Syria and Yemen), South America (Venezuela, Argentina, Bolivia, Trinidad & Tobago, and Colombia), and CIS (Kazakhstan, Azerbaijan and Russia).

Rule 4-10 of Regulation S-X requires the use of the year-end price, as well as existing operating conditions, to determine reserve quantities. Reserves at year-end 2004 have been determined based on the Brent price on December 31, 2004 (\$40.47/b).

The table below sets forth the amount of TOTAL's worldwide proved reserves as of the dates indicated (including both developed and undeveloped reserves).

**TOTAL's PROVED RESERVES(1)**

	<b>Liquids (Mb)</b>	<b>Natural Gas (Bcf)</b>	<b>Combined (Mboe)</b>
<b>December 31, 2002</b>	7,231	21,575	11,203
Percent change from December 31, 2001	3.9%	-1.6%	2.0%
<b>December 31, 2003</b>	7,323	22,267	11,401
Percent change from December 31, 2002	1.3%	3.2%	1.8%
<b>December 31, 2004</b>	7,003	22,785	11,148
Percent change from December 31, 2003	-4.3%	2.3%	-2.2%

(1) Includes TOTAL's proportionate share of the proved reserves of equity affiliates and of two companies accounted for by the cost method. See Supplemental Oil and Gas Information (Unaudited), included elsewhere in this report.

**Production**

TOTAL's average daily production of liquids and natural gas was 2,585 kboe/d in 2004, up 1.8% from 2,539 kboe/d in 2003. Liquids accounted for approximately 66% and natural gas accounted for approximately 34% of TOTAL's combined liquids and natural gas production in 2004 on an oil equivalent basis.

The table below sets forth by geographic area TOTAL's average daily production of crude oil and natural gas for each of the last three years.

**PRODUCTION BY GEOGRAPHIC AREA**

	<b>2004</b>			<b>2003</b>			<b>2002</b>		
	<b>Liquids</b>	<b>Natural Gas</b>	<b>Total</b>	<b>Liquids</b>	<b>Natural Gas</b>	<b>Total</b>	<b>Liquids</b>	<b>Natural Gas</b>	<b>Total</b>
<b>Consolidated affiliates</b>	<b>(kb/d)</b>	<b>(Mcf/d)</b>	<b>kboe/d</b>	<b>(kb/d)</b>	<b>(Mcf/d)</b>	<b>kboe/d</b>	<b>(kb/d)</b>	<b>(Mcf/d)</b>	<b>kboe/d</b>
<b>Europe</b>	<b>424</b>	<b>2,218</b>	<b>832</b>	<b>460</b>	<b>2,286</b>	<b>880</b>	<b>464</b>	<b>2,230</b>	<b>873</b>

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France	9	143	35	10	153	38	11	176	43
Italy							1		1
Netherlands	1	330	59	1	324	58	1	351	62
Norway	263	775	406	276	703	405	280	651	400
United Kingdom	151	970	332	173	1,106	379	171	1,052	367

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Consolidated affiliates	2004			2003			2002		
	Liquids (kb/d)	Natural Gas (Mcf/d)	Total kboe/d	Liquids (kb/d)	Natural Gas (Mcf/d)	Total kboe/d	Liquids (kb/d)	Natural Gas (Mcf/d)	Total kboe/d
<b>Africa</b>	<b>693</b>	<b>440</b>	<b>776</b>	<b>612</b>	<b>404</b>	<b>689</b>	<b>589</b>	<b>374</b>	<b>661</b>
Algeria	42	160	72	48	194	85	52	205	92
Angola	159	27	164	156		156	158		158
Cameroon	13		13	14		14	15		15
Congo	87	21	90	91		91	103		103
Gabon	99	27	104	104	9	105	100	8	101
Libya	62		62	42		42	36		36
Nigeria	231	205	271	157	201	196	125	161	156
<b>North America</b>	<b>16</b>	<b>241</b>	<b>61</b>	<b>4</b>	<b>294</b>	<b>59</b>	<b>5</b>	<b>214</b>	<b>45</b>
United States	16	241	61	4	294	59	5	214	45
<b>Middle East</b>	<b>110</b>	<b>39</b>	<b>117</b>	<b>140</b>	<b>37</b>	<b>146</b>	<b>152</b>	<b>62</b>	<b>163</b>
Iran	26		26	50		50	38		38
Qatar	31	1	31	29	1	29	34	4	35
Syria	30	32	36	34	36	40	54	58	64
U.A.E	16	6	17	19		19	18		18
Yemen	7		7	8		8	8		8
<b>Asia-Pacific</b>	<b>31</b>	<b>1,224</b>	<b>245</b>	<b>25</b>	<b>1,156</b>	<b>232</b>	<b>23</b>	<b>1,122</b>	<b>220</b>
Brunei	3	58	14	2	61	14	1	52	11
Indonesia	22	854	177	18	791	168	17	731	154
Myanmar		110	14		132	16		150	18
Thailand	6	202	40	5	172	34	5	189	37
<b>South America</b>	<b>128</b>	<b>474</b>	<b>213</b>	<b>130</b>	<b>363</b>	<b>196</b>	<b>116</b>	<b>297</b>	<b>170</b>
Argentina	11	325	70	12	284	64	14	249	59
Bolivia	3	82	18	2	51	11		24	5
Colombia	24	32	30	32	28	37	39	24	43
Venezuela	90	35	95	84		84	63		63
<b>CIS</b>	<b>9</b>		<b>9</b>	<b>8</b>		<b>8</b>	<b>5</b>		<b>5</b>
Russia	9		9	8		8	5		5
	<b>1,411</b>	<b>4,636</b>	<b>2,253</b>	<b>1,379</b>	<b>4,540</b>	<b>2,210</b>	<b>1,354</b>	<b>4,299</b>	<b>2,137</b>

**Total consolidated production****Equity and non-consolidated affiliates**

Africa	37	4	37	34		34	10		10
Middle East	247	254	295	248	246	295	225	233	269

**Total equity and non-consolidated affiliates**

<b>284</b>	<b>258</b>	<b>332</b>	<b>282</b>	<b>246</b>	<b>329</b>	<b>235</b>	<b>233</b>	<b>279</b>
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**Worldwide production**

<b>1,695</b>	<b>4,894</b>	<b>2,585</b>	<b>1,661</b>	<b>4,786</b>	<b>2,539</b>	<b>1,589</b>	<b>4,532</b>	<b>2,416</b>
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Consistent with industry practice, TOTAL often holds a percentage interest in its acreage rather than a 100% stake, with the balance being held by joint venture partners (which may include other oil companies, state oil companies or government entities). TOTAL frequently acts as operator (the party responsible for technical production) on acreage in which it holds an interest. See Presentation of Production Activities by Geographic Area below for a description of TOTAL's principal producing fields.

Substantially all of the crude oil production from TOTAL's E&P activities is sold to its Downstream segment which in turn uses a portion in downstream operations and markets a portion of the production to customers throughout the world. See Downstream Trading-Shipping.

The majority of TOTAL's natural gas production is sold under long-term contracts. However, its North American production is sold on a spot basis as is part of its production from the United Kingdom, Norway and Argentina. The long-term contracts under which TOTAL sells its natural gas and LNG production usually provide for a price related to, among other factors, average crude oil and other petroleum product prices as well as, in some cases, a cost of living index. Although the price of natural gas and LNG tends to fluctuate in line with crude oil prices, there is a delay before changes in crude oil prices are reflected in long-term natural gas prices. Because

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of the relationship between the contract price of natural gas and crude oil prices, contract prices are not generally affected by short-term market fluctuations in the spot price of natural gas.

***Presentation of Production Activities by Geographic Area***

The table below sets forth by geographic area TOTAL's principal producing fields, the year in which TOTAL's activities commenced, the type of production and whether TOTAL is operator of the field.

**MAIN PRODUCING FIELDS AT DECEMBER 31, 2004**

		Year of entry into the country	Main Group-operated	Main non-Group-operated	Liquids (L) or Gas (G)
			producing fields	producing fields	
			(Group share %) <sup>(1)</sup>	(Group share %)	
Europe	France	1939	Lacq (100.00%)		L, G
	Netherlands	1964	F15a (32.47%)		G
			J3a (30.00%)		G
			K1a (40.10%)		G
			K4a (50.00%)		G
			K4b/ K5a (26.06%)		G
			K5b (25.00%)		G
			K6/ L7 (56.16%)		G
			L4a (55.66%)		G
				Markham unitized field (14.75%)	G
	Norway	1965	Frigg (37.79%) <sup>(2)</sup>		G
			Skirne (40.00%)		L, G
				Aasgard (7.65%)	L, G
				Ekofisk (39.90%)	L, G
				Eldfisk (39.90%)	L, G
				Embla (39.90%)	L, G
				Glitne (21.80%)	L
				Heimdal (26.33%)	G
				Hod (25.00%)	L
				Huldra (24.33%)	L, G
				Kvitebjorn (5.00%)	L, G
				Mikkel (7.65%)	L, G
				Oseberg (10.00%)	L, G
				Sleipner East (10.00%)	L, G
				Sleipner West/Alpha North (9.41%)	L, G
				Snorre (5.95%)	L
				Statfjord East (2.80%)	L
				Sygna (2.52%)	L
				Tor (48.20%)	L, G
			Tordis (5.60%)	L	
			Troll (3.69%)	L, G	

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Tune (10.00%)	L
Vale (24.24%)	L, G
Valhall (15.72%)	L
Vigdis (5.60%)	L
Visund (7.70%)	L, G



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		Year of entry into the country	Main Group-operated	Main non-Group-operated	Liquids (L) or Gas (G)
			producing fields	producing fields	
			(Group share %) <sup>(1)</sup>	(Group share %)	
Africa	United Kingdom	1962	Alwyn North, Dunbar, Ellon, Grant, Nuggets (100.00%)		L, G
			Elgin-Franklin (EFOG 46.17%) <sup>(3)</sup>		L, G
			Frigg (39.18%) <sup>(2)</sup>		G
			Otter (54.30%)		L
				Alba (12.65%)	L
				Armada (12.53%)	G
				Bruce (43.25%)	L, G
				Caledonia (12.65%)	L
				ETAP (Mungo, Monan) (12.43%)	L, G
				Keith (25.00%)	L, G
				Markham unitized field (7.35%)	G
				Nelson (11.53%)	L
				SW Seymour (25.00%)	L
	Algeria	1952		Hamra (100.00%)	L
				Ourhoud (18.00%) <sup>(4)</sup>	L
				RKF (45.28%) <sup>(4)</sup>	L
				Tin Fouye Tabankort (35.00%)	L, G
	Angola	1953	Blocks 3-80 (37.50%), 3-85 and 3-91 (50.00%)		L
			Girassol, Jasmim (Block 17) (40.00%)		L
				Block 2-85 (27.50%)	L
				Cabinda (Block 0) (10.00%)	L
				Kuito (Block 14) (20.00%)	L
	Cameroon	1951	Ekoundou (25.50%)		L
			Kombo (25.50%)		L
	Congo	1928		Mokoko (10.00%)	L
			Nkossa (51.00%)		L
			Sendji (55.25%)		L
		Tchendo (65.00%)		L	

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		Tchibeli (65.00%)	L
		Tchibouela (65.00%)	L
		Yanga (55.25%)	L
		Loango (50.00%)	L
		Zatchi (35.00%)	L
Gabon	1928	Anguille (100.00%)	L
		Atora (40.00%)	L
		Avocette (57.50%)	L
		Baudroie Nord (100.00%)	L
		Gonelle (100.00%)	L
		Rabi Kounga (47.50%)	L

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			<b>Main Group-operated</b>	<b>Main non-Group-operated</b>	<b>Liquids (L)</b>
		<b>Year of entry into the country</b>	<b>producing fields</b>	<b>producing fields</b>	<b>or Gas (G)</b>
			<b>(Group share %)<sup>(1)</sup></b>	<b>(Group share %)</b>	
<b>North America</b>	Libya	1959	Al Jurf (37.50%)		L
			Mabruk (75.00%)		L
				El Sharara (7.50%)	L
	Nigeria	1962	OML 57 (40.00%)		L
			OML 58 (40.00%)		L, G
			OML 99		L
			Amenam-Kpono (30.40%)		
			OML 100 (40.00%)		L
			OML 102 (40.00%)		L
				Shell Petroleum Development Company fields (SPDC 10.00%)	L, G
	United States	1964	Aconcagua (50.00%)		G
			Bethany (94.86%)		G
			Blue (75.00%)		G
			Maben (54.07%)		G
			MacAllen-Pharr (93.90%)		G
<b>Middle East</b>			Matterhorn (100.00%)		L, G
			Slick Ranch (91.37%)		G
			Virgo (64.00%)		G
				Camden Hills (16.67%)	G
				MacAllen-Ranch (20.02%)	G
	Canada	2000		Surmont (43.50%)	L
	Abu Dhabi	1939	Abu Al Bu Khoosh (75.00%)		L
				Abu Dhabi offshore (13.33%) <sup>(5)</sup>	L
				Abu Dhabi onshore (9.50%) <sup>(6)</sup>	L
	Dubai	1954		Dubai offshore (27.50%) <sup>(7)</sup>	L
	Iran	1954	Dorood (55.00%) <sup>(8)</sup>		L
					L, G

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			South Pars 2 & 3 (40.00%) <sup>(9)</sup>	
			Balal (46.75%) <sup>(10)</sup>	L
			Sirri A & E (60.00%) (11)	L
Oman	1937		Various fields onshore (4.00%) <sup>(12)</sup>	L
Qatar	1938	Al Khalij (100.00%)		L
			North Field (20.00%)	L, G
Syria	1988	Jafra/ Qahar (100.00%) <sup>(13)</sup>		L
			Deir Ez Zor (50.00%)	L, G
Yemen	1987	Kharir/ Atuf (28.57%)		L
			Jannah permit (Block 5) (15.00%)	L

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			<b>Main Group-operated producing fields (Group share %)<sup>(1)</sup></b>	<b>Main non-Group-operated producing fields (Group share %)</b>	<b>Liquids (L) or Gas (G)</b>
<b>Asia-Pacific</b>					
	Brunei	1987	Maharaja Lela Jamalulalam (37.50%)		L, G
	Indonesia	1968	Bekapai (50.00%) Handil (50.00%) Peciko (50.00%) Tambora/ Tunu (50.00%)		L, G L, G L, G L, G
				Nilam (9.29%) Nilam (10.58%) Badak (1.05%)	G L L, G
	Myanmar	1992	Yadana (31.24%)		G
	Thailand	1990		Bongkot (33.33%)	L, G
<b>South America</b>					
	Argentina	1978	Aguada Pichana (27.27%) Argo (37.50%) Canadon Alfa (37.50%) Hidra (37.50%) San Roque (24.71%)		L, G L L L L, G
	Bolivia	1995		San Alberto (15.00%) San Antonio (15.00%) Cupiagua (19.00%) Cusiana (19.00%)	L, G L, G L L, G
	Colombia	1973			
	Venezuela	1981	Jusepin (55.00%)		L
				Zuata (Sincor) (47.00%) Yucal Placer (69.50%)	L G
<b>CIS</b>					
	Russia	1989	Kharyaga (50.00%)		L

(1) The Group's interest in the local entity is approximately 100% in all cases except TOTAL Gabon (57.9%), TOTAL E&P Cameroun (75.8%), and certain entities in the UK, Algeria, Abu Dhabi, Iran and Oman (see notes 3 through 12 below).

(2) Frigg's production terminated on October 26, 2004.

- (3) TOTAL has a 35.8% indirect interest in Elgin Franklin via its participation in EFOG.
- (4) TOTAL has an indirect 18.0% interest in the Ourhoud field and a 45.3% indirect interest in the RKF field via its participation in CEPSA (equity affiliate).
- (5) Via ADMA (equity affiliate), TOTAL has a 13.3% interest and participates in the operating company, Abu Dhabi Marine Operating Company.
- (6) Via ADPC (equity affiliate), TOTAL has a 9.5% interest and participates in the operating company, Abu Dhabi Company for Onshore Oil Operation.
- (7) TOTAL has a 25.0% indirect interest via Dubai Marine Areas (equity affiliate) plus a 2.5% direct interest via Total E&P Dubai.
- (8) TOTAL is the operator of the development of Dorood field with a 55.0% interest in the foreign consortium.
- (9) Following the completion of the development phase, NIOC has taken over the operation of the field. The Group has a 40.0% interest in the foreign consortium.
- (10) TOTAL has transferred operatorship to NIOC for the Balal field. The Group has a 46.8% interest in the foreign consortium.
- (11) TOTAL has transferred operatorship to NIOC for the Sirri A & E fields. The Group has a 60.0% interest in the foreign consortium.
- (12) Via POHOL (equity affiliate), TOTAL has a 4.0% interest in the operator, Petroleum Development Oman LLC. TOTAL also has a 5.54% interest in the Oman LNG facility.
- (13) Operated by DEZPC which is 50.0% owned by TOTAL and 50.0% owned by SPC.

**Table of Contents*****Principal Activities*****Europe**

TOTAL's average production in Europe was 832 kboe/d in 2004, down 5% compared to 880 kboe/d in 2003, representing 32% of the Group's 2004 production.

*France.* TOTAL's principal natural gas fields are located mainly in the southwest of France, principally at Lacq-Meillon (TOTAL 100%), although there are several smaller natural gas and oil fields in the same region and in the Paris basin. Their average production was 35 kboe/d in 2004, compared to 38 kboe/d in 2003.

The Lacq 2005 project, which is focused on reinforcing industrial safety standards and optimizing operational processes at the Lacq Plant, is continuing and is scheduled for completion in 2005.

*Italy.* Development works on the Tempa Rossa field located in the Gorgoglione concession (TOTAL-operated 50%) are planned to start in 2005, after an agreement in principle was reached with the Basilicata regional authorities and approved early in 2005 by the regional council.

*The Netherlands.* TOTAL is the second largest natural gas operator in the Netherlands with an average production of 59 kboe/d in 2004, an increase of approximately 2% compared to 2003. An exploration well (Luttelgeest-1 onshore) and several development wells (F15-A5, K1-A4, Zuidwal-A10) were drilled in 2004. The development of the L4G structure was approved in October 2004, with the start-up of production scheduled for the end of 2005. The sale of certain onshore assets (including the Zuidwal and Leeuwarden licenses) was completed in 2004 in order to further rationalize the Group's portfolio.

*Norway.* In Norway, the country with the largest contribution to the Group's oil and gas production, production in 2004 remained at the 2003 average level of 406 kboe/d, of which 176 kboe/d originated from the Ekofisk area (TOTAL 39.9%), even with the impact of a planned triennial shutdown in the area in 2004.

Oil production at the Valhall North Flank field (TOTAL 15.7%) started in January 2004.

The Skirne (TOTAL-operated 40.0%), Kvitebjørn (TOTAL 5.0%) and Sleipner Alpha North (TOTAL 9.4%) natural gas and condensate fields started production in March, September and October 2004, respectively. Production at the J structure at the Oseberg South field (TOTAL 10.0%) is scheduled to begin in 2005. The development of the Visund natural gas field (TOTAL 7.7%), which was approved in 2002, as well as that of the Oseberg West Flank field (TOTAL 10.0%) and of the Ekofisk Area Growth project (TOTAL 39.9%), each of which was approved in 2003, is continuing. For all three projects, production is expected to begin in 2005.

The high-pressure-high-temperature Kristin field (TOTAL 6.0%, after an interest swap agreement with Statoil) in the Haltenbanken region is under development. The offshore development for the Snøhvit natural gas field (TOTAL 18.4%) and the construction of the LNG plant in northern Norway are underway.

Production at the Frigg field (TOTAL-operated 77.0%), which began in 1977, came to an end on October 26, 2004. The field produced a total of 192 Bcm of natural gas over its lifetime, corresponding to a recovery factor of 78%. The multi-year plan to dismantle the facilities was approved by the relevant authorities in 2003 and is now underway.

*United Kingdom.* TOTAL's average production was 332 kboe/d in 2004, down compared to 379 kboe/d in 2003, primarily due to significant planned shutdowns in the summer of 2004 and, to a lesser extent, the decline of certain fields.

In 2004, TOTAL drilled two exploration/appraisal wells with positive results, Laggan 206/1a-4 (TOTAL-operated 50.0%) and Alwyn Statfjord 3/9a-N49 (TOTAL 100%).

TOTAL also participated in the exploration and appraisal of the Maria Structure in Block 16/29a (TOTAL 28.9%), with positive results obtained on the Maria Horst and Maria Terrace wells.

During the 22nd round of permit allocation, the British authorities awarded permits on three zones of the UK continental shelf to TOTAL as operator: in the West of Shetlands near Laggan, in the Northern North Sea adjacent to the Alwyn area, and in the southern gas basin near the Dutch border.

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The development of the satellites of Elgin (Glenelg, TOTAL-operated 49.5%) and Franklin (West Franklin, TOTAL-operated 46.2%) was approved and is scheduled to be completed in 2005. These satellite fields will be developed through highly deviated wells drilled from the existing Elgin-Franklin wellhead platforms. Phase III of the Dunbar (TOTAL 100%) development was approved, as was the development of the Forvie North structure, which will be a sub-sea tie-back to the Alwyn North installation (TOTAL 100%).

During the summer, the planned shutdowns of the Alwyn, Dunbar and St. Fergus installations (TOTAL 100%, 45 days) and of the Bruce installation (TOTAL 43.2%, 56 days), occurred. During these shutdowns, the by-pass of the Frigg TP1 and MCP01 concrete platforms by the FUKA gas pipeline was completed, as was the installation, on the Bruce platform, of processing modules for the Rhum field and of additional compression modules for natural gas. A significant maintenance program was also implemented on each of these sites.

Production from the second phase of development on the Alba site (Alba Extreme South, TOTAL 12.65%) started mid-October 2004.

**Africa**

TOTAL's average production in Africa (including its share through equity affiliates) was 813 kboe/d in 2004, up 12% from 723 kboe/d in 2003, representing 31% of the Group's production in 2004. TOTAL's exploration and production activities are principally in the countries bordering the Gulf of Guinea and in North Africa.

*Algeria.* TOTAL's average production (including its share through equity affiliates) was 105 kboe/d in 2004 compared to 115 kboe/d in 2003. This production comes from the Hamra (TOTAL 100%) and Tin Fouye Tabankort (TFT) (TOTAL 35%) fields, as well as through the Group's 45.3% interest in Cepsa, which is involved in the RKF and Ourhoud fields. The Ourhoud field's (Cepsa 39.8%) average production was at its plateau rate of 223 kb/d in 2004. The average production for the RKF field (Cepsa 100%) was 20.5 kb/d in 2004. The TFT field produced an average of 684 Mcf/d of natural gas in 2004. In November 2004, TOTAL was awarded an 80% stake in the Bechar exploration permit, northwest of Timimoun. Also in 2004, appraisal work continued on the Irharen natural gas field located on the Timimoun license, awarded to TOTAL in 2002. The Rhourde El Sid license was relinquished in 2004 after drilling two negative exploration wells.

*Angola.* TOTAL's average production (including its share through equity affiliates) in 2004 reached 168 kboe/d, coming primarily from Block 17 (TOTAL-operated 40.0%) and Block 0 (TOTAL 10.0%).

The production of the Girassol and Jasmim fields in the deep offshore Block 17 (TOTAL-operated 40.0%) was noteworthy, with an annual average of 243 kb/d (in 100%) compared to 215 kb/d in 2003. The development of the Dalia field progressed as expected, with production expected to begin in the second half of 2006 and ultimately reaching a plateau of 225 kb/d. The Rosa development project was approved in August 2004 and production is scheduled to begin in 2007. Production for this project will be by tie-back to the Girassol floating production, storage and offloading (FPSO) vessel, anchored around 15 kilometers away. As a result, when the Rosa field begins production, this will increase the production plateau of the Girassol FPSO, which will be modified to increase its capacity to approximately 250 kb/d, and extend the period of production. In addition, appraisal work on the discoveries made on the eastern portion of the Block 17 license (Upper Miocene) continued in 2004.

The production licenses for Block 0 (TOTAL 10.0%) were extended until 2030. The production from Sanha Bombocco on Block 0 started in December 2004. The exploration license for Block 14 (TOTAL 20.0%) was extended for three years. In ultra-deep offshore, the Cola and Canela wells drilled on Block 32 (TOTAL-operated, 30.0%) and the Venus and Palas wells drilled on Block 31 (TOTAL 5.0%) confirmed the potential of these deep offshore areas.

TOTAL and its partners have also continued their analysis of, and discussions with the Angolan authorities regarding, the Angola LNG project (TOTAL 13.6%) with a view to commercializing the natural gas resources in Angola.



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The Angolan government has decided not to renew the Block 3/80 contract, which came to an end. However, a government decree has extended the existing licenses until June 2005 in order to prepare for the transfer of operating responsibilities.

*Cameroon.* TOTAL's average production in 2004 was 13 kboe/d compared to 14 kboe/d in 2003.

TOTAL E&P Cameroun, 75.8% of which is owned by the Group, 20% by the Cameroon national oil company, Société Nationale d'Hydrocarbures (SNH), and 4.2% by minority shareholders, operates 65% of the overall production of the country and owns interests in the majority of the operating concessions granted by the Republic of Cameroon.

*Congo.* TOTAL's average production in 2004 remained at the 2003 level of 90 kboe/d. The Group owns interests, ranging from 25.5% to 100%, in exploration and production offshore licenses, including in its principal producing fields, Nkossa (TOTAL-operated 51.0%) and Tchibouela (TOTAL-operated 65.0%).

The initial period of the MTPS (Mer Très Profonde Sud) exploration permit, which was to end in 2004, has been extended to May 2006. The Pegase exploration well on this permit has confirmed the potential of this ultra-deep offshore zone. TOTAL holds a 35.5% interest in a joint development area through its affiliates TOTAL E&P Congo and TOTAL E&P Angola. This joint development area encompasses the southern portion of the former Haute Mer permit (Congo) and the northern portion of Block 14 (Angola). In 2003, TOTAL was awarded the Haute Mer C exploration permit (TOTAL 100%). The related production sharing contract was approved in 2004.

On the Moho-Bilondo permit (TOTAL-operated 51.0%), an appraisal well drilled in 2004 gave further support to the development project.

*Gabon.* TOTAL's average production in 2004 was 104 kboe/d, compared to 105 kboe/d in 2003. TOTAL Gabon operates 27 concessions and exploration and production licenses. The principal producing fields are Rabi-Kounga (TOTAL 47.5%), Anguille (TOTAL 100%), Gonelle (TOTAL 100%), Baudroie Nord (TOTAL-operated 50.0%), Atora (TOTAL-operated 40.0%) and Avocette (TOTAL-operated 57.5%).

TOTAL Gabon's shares, which are listed on Euronext Paris, are held by TOTAL (57.9%), the Republic of Gabon (25%) and the public (17.1%).

In 2004, TOTAL Gabon signed an exploration and production sharing contract for a new license designated Aloumbe, with a focus on natural gas exploration. If natural gas were discovered, it would initially be used to enhance oil recovery on existing fields, although eventually it could be used to satisfy part of the country's future power generation requirements.

*Libya.* TOTAL's average production in 2004 was 62 kboe/d, up 48% compared to 42 kboe/d in 2003, coming mainly from the Mabruk (TOTAL-operated 75%) and El Sharara (TOTAL 7.5%) onshore fields and the Al Jurf offshore field (TOTAL-operated 37.5%). In 2004, the Al Jurf field reached its production plateau of 40 kboe/d. In 2004, the decision was made to launch a complementary development project on the Mabruk field which is designed to increase production at this field from 16 kboe/d to 30 kboe/d within the next two years. In addition, the development of several structures on Block NC186 (TOTAL 24%), which were discovered during past exploration, is underway. Structures A and D are in production, structure B is expected to begin production in 2005, and structures G and H are being appraised.

*Morocco.* After seismic studies, TOTAL relinquished the Dakhla Offshore block in November 2004.

*Mauritania.* In 2004, TOTAL carried out a geological survey of the Taoudeni basin within the framework of a preliminary survey contract signed with the Mauritanian government in 2003. As a result of these studies, in January 2005 TOTAL signed two production sharing contracts with the Mauritanian government for onshore Blocks Ta7 and Ta8.

*Nigeria.* TOTAL's average production was 271 kboe/d in 2004, up 38% compared to 196 kboe/d in 2003. TOTAL-operated fields, which include those operated in association with the Nigerian National Petroleum Corporation (NNPC 60.0%, TOTAL 40.0%) as well as the Amenam field (TOTAL 30.4%), accounted for around 60% of TOTAL's Nigerian production in 2004, compared to 40% in 2003. The production of the Amenam

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offshore field reached its plateau of 125 kb/d during the summer of 2004. The remainder of TOTAL's production comes from various concessions operated by the SPDC joint-venture (TOTAL 10.0%).

TOTAL's successful appraisal of the Usan discovery on the OPL 222 area (TOTAL-operated 20%) in 2003 was followed by the discovery of an extension to the Usan West field in 2004 (through the Usan 5 and Usan 6 wells). Development studies for the Usan field are underway.

The exploration and appraisal campaign on deep offshore Block OPL 246 (which includes the Akpo field) (TOTAL-operated 24.0%) has continued with the discovery of Preowei and the successful appraisal (Egina 2 well) of the Egina discovery. The bidding process for the construction of the Akpo field development project is also underway.

TOTAL is also a partner (12.5%), under a production sharing contract, for the deep offshore OML 118 permit on which the Bonga field is currently being developed. The start of production for this project has been postponed to 2005. In addition, TOTAL owns a 15.0% interest in Nigeria LNG Company, which operates three natural gas liquefaction trains. In 2004, gross production was 10.1 Mt of LNG, 4.2 Mb of condensates and 0.28 Mt of LPG. The construction of the fourth and fifth LNG trains is continuing, with these trains scheduled to be operational in 2005. In July 2004 the decision was made to construct a sixth train, which is scheduled to be operational in 2008.

*Sudan.* At the end of 2004, TOTAL (operator 32.5%) updated its production sharing agreement for Block B (118,000 square kilometers in southeastern Sudan). Operations may resume when security conditions improve.

### **North America**

TOTAL's average production in North America was 61 kboe/d in 2004, up 3% from 59 kboe/d in 2003, representing 2% of the Group's production in 2004.

*Canada.* TOTAL has been participating in an oil sands pilot project since 1999 on the Surmont permit (TOTAL 43.5%) in Athabasca, Alberta, to test steam assisted gravity drainage technology to produce bitumen from oil sands. In December 2003, the partners approved the first development phase, with production scheduled to begin in 2006 with a production plateau of 27 kb/d (in 100%). Engineering and construction activities are progressing according to schedule. In December 2004, TOTAL acquired 100% of the OSL 874 permit located about 40 kilometers west of Surmont.

In July 2004 TOTAL also acquired a 40% interest in three exploration permits located in the Akue area in northeastern British Columbia.

*United States.* TOTAL's average production in the United States was 61 kboe/d in 2004, compared to 59 kboe/d in 2003. Offshore production at the Matterhorn (TOTAL 100%), Aconcagua (TOTAL-operated 50.0%), Virgo (TOTAL-operated 64.0%) and Camden Hills (TOTAL 16.7%) fields was affected by Hurricane Ivan in mid-September 2004, losing an average of 10 kboe/d on an annual basis. Production at these fields was still suspended at the end of 2004, and has resumed progressively between January and April 2005. In exploration, three wells drilled in 2004 were negative (Caribou East in Alaska, Sardinia and Sequoia in the Gulf of Mexico). Also during 2004, TOTAL acquired an interest in 16 offshore blocks in the Gulf of Mexico, bringing its total number of offshore blocks in the Gulf of Mexico to 147, and continued rationalizing its portfolio, divesting 17 blocks in Alaska and some of its Gulf of Mexico properties.

*Mexico.* TOTAL is carrying out studies in cooperation with PEMEX under a technical cooperation agreement signed in December 2003.

### **Middle East**

TOTAL's average production in the Middle East (including its share through equity affiliates) was 412 kboe/d in 2004, down 7% from 441 kboe/d in 2003, representing 16% of the Group's 2004 production.

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*Iran.* TOTAL has four buy-back contracts in Iran, with an average production of 26 kb/d in 2004 compared to 50 kb/d in 2003, due mainly to the impact of higher crude prices on buy-back contracts.

The Sirri A&E fields (TOTAL 60.0% interest in foreign consortium) are now operated by the state-owned National Iranian Oil Company (NIOC).

Production at the offshore South Pars phase 2 and 3 gas and condensate fields (TOTAL 40.0% interest in foreign consortium) continued at an average rate of over 2 Bcf/d and 90 kb/d of condensates. Following the completion of the development phase, NIOC has taken over the operation of the field.

The development of the Balal offshore oil field (TOTAL 46.8% interest in foreign consortium) has been completed and the facilities have been transferred to NIOC. The level of production, at 40 kb/d, is in line with expectations.

The development of the Dorood field (TOTAL-operated 55.0% interest in foreign consortium) is nearing completion and TOTAL is preparing for the start-up of the onshore facilities. The production of the first phase was steady at 14 kb/d in 2004.

In 2004, TOTAL signed several agreements with its partners creating a framework for the Pars LNG liquefied natural gas project and its principal commercial terms. In particular, these agreements set out the relationship between the Pars LNG plant, which will carry out liquefaction activities, and Block 11 of South Pars (SP11) (TOTAL 60%), which will supply the LNG plant (TOTAL 30%). The project anticipates creating two liquefaction trains, each with an initial capacity of 5 Mt/y of LNG. The Iranian authorities have given the preliminary approvals which will allow engineering studies for both the construction of the LNG plant and the development of Block 11 of South Pars to begin as early as 2005.

*Kuwait.* In August 2004, TOTAL renewed its technical service contract with Kuwait Oil Company (KOC). Under this agreement, TOTAL provides technical assistance and support for KOC's upstream operations.

TOTAL has a 20% share in a foreign consortium organized to participate in the bidding process for production activities at oil fields situated in northern Kuwait.

*Oman.* TOTAL owns a 4.0% interest in Petroleum Development Oman (PDO), the operator of Block 6. In 2004, TOTAL's average production from this Block was 26 kboe/d, slightly lower than the average of 28 kboe/d in 2003. New concession agreements were signed in 2004 for a 40-year period beginning on January 1, 2005.

The Oman LNG liquefaction plant (TOTAL 5.54%) produced 6.9 Mt of LNG in 2004, which was principally marketed through long-term contracts in Korea and Japan, supplemented by short-term contracts and spot sales. In 2003, a newly created company, Qalhat LNG, began construction of a third liquefaction train with a planned capacity of 3.6 Mt/y, scheduled to enter into operation in 2006. Oman LNG has a 36.8% interest in Qalhat LNG, corresponding to an effective interest of 2.04% for TOTAL.

A 2D seismic survey to better assess the hydrocarbon potential of exploration Block 34 (TOTAL 100%) is scheduled to take place in 2005.

*Qatar.* TOTAL (including its share through equity affiliates) produced an average of 57 kboe/d in Qatar in 2004, compared to 54 kboe/d in 2003. TOTAL holds a 20.0% interest in the upstream operations of Qatargas, which produces natural gas and condensates from one block of the offshore North Field, and a 10.0% interest in the Qatargas LNG liquefaction facilities. The three LNG trains at this facility produced 9.1 Mt in 2004, compared to 8.2 Mt in 2003. A debottlenecking project is being implemented to increase plant capacity to 9.7 Mt/y by mid-2005.

In December 2001, an agreement was signed with Qatar Petroleum, the Qatari national company, to sell 2,000 Mcf/d of Qatari gas produced by the Dolphin Project (TOTAL 24.5%) for 25 years starting in 2006. The gas will be produced from the North Field in Qatar and transported to the United Arab Emirates through a 380 kilometer gas pipeline. In December 2003, the Qatari authorities approved the final development plan for the Dolphin Project. The related construction contracts were awarded in 2004.

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The third phase of the Al Khalij (TOTAL 100%) development was completed in September 2004. As a result of the Al Khalij North development project, production from the field should progressively increase by 20 kb/d, with, eventually, a new peak production of 50 kb/d.

In February 2005, TOTAL, Qatar Petroleum and ExxonMobil signed heads of agreement for TOTAL's acquisition of a 16.7% interest in Train II of Qatargas 2 and for TOTAL to purchase LNG from the Qatargas 2 project in Qatar. Qatargas 2 is an integrated project for the construction of two new LNG trains, each with a capacity of 7.8 Mt/y, which is scheduled to begin operation near the end of 2008. TOTAL's acquisition of the interest in Train II is subject to the approval of the relevant authorities.

*Saudi Arabia.* TOTAL (30.0%) is a partner in a joint venture with Saudi Aramco, the Saudi national company, for natural gas exploration in a 200,000 square kilometer area in southern Rub Al-Khali. The first five-year period of exploration work began in January 2004. A 137,800 square kilometer gravimetric survey was performed in 2004. A seismic program on the same permit was also launched in 2004.

*Syria.* In 2004, TOTAL's average production was 36 kboe/d, coming principally from the Jafra and Qahar fields on the Deir Ez Zor permit (TOTAL 100%, operated by DEZPC which is 50% owned by TOTAL). The Deir Ez Zor natural gas and condensates re-treatment plant (TOTAL 50.0%), which entered into operation at the end of 2001 under a contract that ends in December 2005, collects, processes and transports approximately 175 Mcf/d of natural gas associated with production under the Deir Ez Zor area permits. This plant has put an end to associated gas flaring and contributed to reducing greenhouse gas emissions in the region.

*United Arab Emirates.* TOTAL's activities in the Emirates are located in Abu Dhabi and Dubai. TOTAL's average production in 2004 remained at the 2003 level of 246 kboe/d. In Abu Dhabi, TOTAL holds a 75% interest in ABK (TOTAL-operated) which operates the Abu Al Bu Khoosh field. TOTAL is also a 9.5% shareholder in Abu Dhabi Company for Onshore Oil Operations (ADCO), which operates the Asab, Bab, Bu Hasa, Sahil and Shah onshore fields, as well as a 13.3% shareholder in Abu Dhabi Marine (ADMA), which operates the Umm Shaif and Zakum offshore fields.

TOTAL also has a 15% interest in Abu Dhabi Gas Industries (GASCO), which produces butane, propane and condensates from the natural gas associated with production at onshore fields, as well as a 5.0% interest in Abu Dhabi Gas Liquefaction Company (ADGAS), which produces LNG, LPG and condensates from offshore natural gas fields (both associated and non-associated natural gas). In addition, TOTAL has a 30% interest in Ruwais Fertilizer Industries (FERTIL), which manufactures ammonia and urea from methane produced by the Abu Dhabi National Oil Company (ADNOC). In Dubai, TOTAL holds 27.5% interests in the Fateh, Falah and Rashid fields through the combination of its 25% interest in Dubai Marine Areas Limited (DUMA) and its 2.5% direct interest held by TOTAL E&P Dubai. TOTAL is a shareholder (24.5%) in Dolphin Energy Limited, which will market the natural gas produced by the Dolphin Project in Qatar in the United Arab Emirates. Natural gas sales contracts for the project were signed in October 2003 and the final development plan was approved by the Qatari authorities in December 2003. The related construction contracts were awarded and work on the project began early in 2004.

*Yemen.* In 2004, TOTAL's production from East Shabwah (TOTAL-operated 28.6%) averaged 4 kb/d. The drilling campaign in 2004 has revealed additional oil reserves in the lower reservoir which are under evaluation. TOTAL produced an average of 3 kb/d on the Jannah permit (TOTAL 15.0%) in 2004.

Yemen LNG (TOTAL-operated 42.9%) signed three heads of agreement in February 2005 for the sale of between 5.8 and 6.5 Mt of LNG over a 20-year period. Yemen LNG plans to construct two LNG trains with a combined capacity of 6.7 Mt/y.

**Asia-Pacific**

TOTAL's average production in the Asia-Pacific region was 245 kboe/d in 2004, up 6% from 232 kboe/d in 2003, representing 9% of the Group's 2004 production.

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*Australia.* After negotiations in 2004, TOTAL signed two agreements at the beginning of 2005 to participate in the exploration of two blocks located offshore northwestern Australia. Exploration on each of these blocks is planned for 2005.

*Brunei.* On Block B (TOTAL-operated 37.5%), located offshore Brunei Darussalam, production from the Maharaja Lela Jamalulalam field averaged 14 kboe/d in 2004, unchanged from 2003. TOTAL pursued its exploration activities in Block B with a 3D seismic program carried out at the end of 2004. A preliminary study for a project to install an onshore compression unit was carried out in 2004. TOTAL is also the operator, with a 60.0% share, of the deep offshore Block J. While the production sharing agreement was signed in March 2003, exploration work on Block J (5,000 square kilometers) remains suspended due to a border dispute with Malaysia.

*Indonesia.* TOTAL's average production reached 177 kboe/d in 2004 compared to 168 kboe/d in 2003. On December 24, 2004, TOTAL set a record for operated production of 2,837 Mcf/d of natural gas produced, while the average natural gas production over 2004 was 2,400 Mcf/d. TOTAL's operations in Indonesia are principally on the Mahakam permit (TOTAL-operated 50.0%), which includes several fields, notably Peciko and Tunu which are the largest natural gas fields in the East Kalimantan area. TOTAL's natural gas production is delivered to PT Badak, the Indonesian company which operates the Bontang LNG plant, the largest LNG plant in the world. This LNG is sold under long-term contracts with customers in Japan, Korea and Taiwan, primarily for use in power plants. The total capacity of the eight liquefaction trains at the Bontang plant is 22 Mt/y. In 2004, 69% of the gas supplied to Bontang came from TOTAL-operated production on the Mahakam permit.

The development of the Peciko field is continuing, with the completion of Phase 3 (a third onshore treatment installation started up in January 2004) and the continuation of Phase 4 (two additional platforms entered into operation in 2004). The installation of onshore compression facilities began in early 2005. On the nearby Tunu field, Phase 9 of the development is nearing completion (three out of the five planned platforms completed in 2004), while Phase 10 (construction of four platforms) was also launched in 2004. The Tambora extension project (construction of three platforms) was launched in 2004, as well as Phase 1 of the new Sisi-Nubi offshore development, which includes three wellhead platforms, one intermediate treatment platform and the associated subsea lines. Natural gas production from Sisi-Nubi is scheduled to begin in 2007 through the use of existing onshore processing facilities.

TOTAL also holds a 50% share in the Saliki exploration block, which is adjacent to the Mahakam permit.

In addition, TOTAL acquired a 39.9% interest in the North Bali permit in 2004. The exploration well drilled in early 2005 was dry.

*Malaysia.* TOTAL acquired a 42.5% interest in the deep offshore Block SKF in 2001. The block is being evaluated after the drilling of an exploration well in 2004.

*Myanmar.* Natural gas deliveries from the Yadana field (TOTAL-operated 31.2%), located on Blocks M5 and M6, to the Thai national company, PTT, which are destined for power plants in Thailand, increased to 620 Mcf/d in 2004. TOTAL also supplied 35 Mcf/d of natural gas to the domestic market. In 2004, TOTAL's average production was 14 kboe/d.

*Pakistan.* TOTAL operates, with a 40.0% share, two deep offshore (1,700-3,400 meters of water) exploration blocks of 7,500 square kilometers each in the Oman Sea. The exploration well drilled in 2004 was dry.

*Thailand.* In 2004, the average production from the Bongkot field (TOTAL 33.3%) reached 40 kboe/d, compared to 34k boe/d in 2003. Long-term contracts provide for the sale of all natural gas production from the Bongkot field to the Thai national company, PTT. This natural gas is then sold to various local clients. The field's condensates production is also sold to PTT. Phase 3C of the development of this field is underway. This project includes one wellhead platform (already in production), a desulfuration platform scheduled to begin operation in the second half of 2005, modifications on two existing platforms (completed) and the installation of additional subsea lines.

**Table of Contents****South America**

TOTAL's average production in South America was 213 kboe/d in 2004, up 9% from its 2003 level of 196 kboe/d, representing approximately 8% of the Group's production in 2004.

*Argentina.* TOTAL's average production in 2004 was 70 kboe/d, above the 64 kboe/d averaged in 2003. On the San Roque field (TOTAL-operated 24.7%), the medium-pressure compression project is progressing towards its start-up scheduled for mid-2006. On the Aguada Pichana field (TOTAL-operated 27.3%), the low-pressure compression project is expected to be launched in the first half of 2005. Both projects are intended to maintain natural gas production at their plateau rate on these fields.

In 2004, the development of the Carina-Aries fields (offshore Tierra del Fuego, TOTAL-operated 37.5%) continued, with the construction of onshore and offshore infrastructure, including two unmanned platforms approximately 80 kilometers offshore. Drilling of production wells for Carina began at the end of 2004 and production is scheduled to begin in the second quarter of 2005.

After the drilling of the Geminis well (offshore Tierra del Fuego), which was dry, the CAA-35 exploration license was relinquished in December 2004.

TOTAL has also entered into two new exploration blocks in the Neuquen basin, Ranquil Norte (TOTAL 50.0%) and Banduria (TOTAL 27.3%).

*Barbados.* In accordance with the operator's proposal, TOTAL (45%) relinquished the offshore Barbados exploration permit.

*Bolivia.* TOTAL holds six permits in Bolivia. These include two production permits, San Alberto and San Antonio (TOTAL 15.0% each), as well as four exploration permits, Blocks XX West (TOTAL-operated 41.0%), Aquio and Ipati (TOTAL-operated 80.0% each), and Rio Hondo (TOTAL 50.0%). The Bereti exploration permit (TOTAL 100%) was relinquished in 2004. A successful exploration well, Incahuasi X1, was drilled on the Ipati block in 2004.

The San Alberto and San Antonio fields began production in 2001 and 2003, respectively. In 2004, TOTAL's average share of production from the San Alberto and San Antonio permits was 18 kboe/d, compared to 11 kboe/d in 2003. As in 2003, the quantities taken by Petrobras did not match the entire contractual quantities it had committed to take in 2004 under the "take or pay" contract between Bolivia and Brazil. A partial settlement was reached in 2004 regarding the balance accumulated at the end of 2003 and discussions are underway to come to a solution regarding the remaining quantities.

TOTAL is also a shareholder of Transierra (TOTAL 11.0%) which operates the Gasyrg pipeline which has been in service since 2003.

*Brazil.* TOTAL has kept the Curio license (TOTAL-operated 35.0%) on Block BC2 and Block BMC-14.

*Colombia.* TOTAL's average production from the Cusiana and Cupiagua oil fields (TOTAL 19.0%) was 30 kboe/d in 2004, compared to 37 kboe/d in 2003. An exploration well is currently being drilled on the Tangara license (TOTAL 55.0%).

*Trinidad and Tobago.* The Grand Angostura development, launched in March 2003 in the shallow offshore Block 2c (TOTAL 30.0%), was practically complete at the end of 2004 and first oil was produced in January 2005. In the third round of permit attributions, TOTAL (50%) was selected to negotiate with the authorities the conditions for entering into two deep offshore blocks, 23a and 23b.

*Venezuela.* TOTAL's average production for 2004 reached 95 kboe/d compared to 84 kboe/d in 2003. In 2004 Sincor (TOTAL 47.0%) produced on average 173 kb/d of extra heavy oil (8.5° API, EHO) despite the first major planned shutdown of Sincor, for a period of 49 days beginning in October 2004. This major operation (over three million man-hours) met its objectives according to schedule and without incident. It will improve the reliability of the installations and raise the average treatment capacity of the upgrader above 200 kb/d.

On the Jusepin oil field (TOTAL-operated 55.0%), oil production reached an average of 31 kb/d in 2004.

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Production from the first development phase of Yucal Placer (TOTAL 69.5%) started in 2004 with an average rate of 75 Mcf/d during the period from May to December. The installation of a unit for carbon dioxide removal near the end of 2004 should lead to a substantial increase in the production plateau in 2005. Natural gas from this field is sold to PDVSA Gas (a wholly-owned subsidiary of the Venezuelan national company PDVSA) within the framework of a long-term agreement signed in 2004.

In January 2005, TOTAL acquired a 49.0% interest in Block 4 of Plataforma Deltana, an offshore natural gas region.

### **Commonwealth of Independent States (CIS)**

TOTAL's average production in the Commonwealth of Independent States (CIS) was 9 kboe/d in 2004, compared with 8 kboe/d in 2003, representing 0.3% of the Group's production in 2004.

*Azerbaijan.* After the launch of Phase 1 of the development of the Shah Deniz (TOTAL 10.0%) gas field in 2003, the first three development wells were drilled in 2004 and the main elements of the TPG 500 platform were transported to Azerbaijan to be assembled at local yards.

The South Caucasus Pipeline Company (SCPC) (TOTAL 10.0%) continued laying the gas pipeline from Baku to the Turkish border that will transport natural gas from the Shah Deniz field. This pipeline uses the same route as the Baku-Tbilissi-Ceyhan (BTC) oil pipeline in Azerbaijan and Georgia.

Construction of the BTC oil pipeline, which began in August 2002, is now at an advanced stage of completion. This pipeline, owned by the BTC Company (TOTAL 5.0%), will link Baku to the Mediterranean Sea.

*Kazakhstan.* In the North Caspian Sea permit, the Kazakh authorities approved the Kashagan field development plan in February 2004. This approval allowed the launch of the first steps of the development program, which will be implemented in phases. Production is expected to begin in 2008 with an initial level of 75 kb/d gradually building to 450 kb/d (in 100%). Infrastructure construction and engineering work intensified and most of the main contracts for fabrication and construction of the offshore and onshore installations have been awarded. The development drilling campaign was also launched in 2004. The size of the Kashagan field may eventually allow production to be increased to over 1 Mb/d (in 100%).

In the other areas of the permit, the exploration drilling campaign came to an end with a positive result on the Kairan structure. The appraisal programs submitted to the Kazakh authorities for the Kairan and Aktote structures were approved in April 2004. The first appraisal well drilled on the Aktote structure has confirmed and given additional information about this discovery. The appraisal of the Kalamkas discovery continued in 2004 with the preparation of a drilling campaign scheduled for 2005.

Following the pre-emption process associated with the sale of the BG Group's stake in the North Caspian Sea Permit, TOTAL has signed an agreement to sell a 1.85% interest to KazMyunayGas, the national oil company of the Republic of Kazakhstan. When this sale is completed, TOTAL will have an 18.5% interest in the permit.

*Russia.* TOTAL's average production was 9 kboe/d in 2004. Phase two of the development of the Kharyaga field (TOTAL-operated 50%) is practically completed. The contractual dispute between the Russian Federation and TOTAL concerning the production sharing contract is being discussed by the parties.

On the Shatsky block in the Black Sea, the first technical results led the Group to withdraw from the license. Technical evaluations with Rosneft on the Tuapse area are underway.

In 2004, the Group entered into negotiations to acquire 25% of Novatek, the country's second largest gas producer. This project has been under review by the Russian competition authorities since September 2004.

**Table of Contents*****Crude Oil and Natural Gas Pipelines***

The table below sets forth TOTAL's ownership interests in crude oil and natural gas pipelines as of December 31, 2004.

<b>Pipeline(s)</b>	<b>Origin</b>	<b>Destination</b>	<b>% interest</b>	<b>TOTAL operator</b>	<b>Liquids</b>	<b>Gas</b>
<b>FRANCE(1)</b>						
CFM	Network Center West		45.00			X
GSO	Network South West		70.00	X		X
<b>ITALY</b>						
SGM	Larino	Collefero	12.00			X
<b>NETHERLANDS</b>						
Nogat pipeline	F15A	Den Helder	23.19			X
Oldelamer pipeline	Oldelamer	Garijp Terminal	42.25			X
West Gas Transport	K13A-K4K5	Den Helder	4.66			X
WGT Extension	Markham	K13-K4K5	23.00			X
Zuidwal pipeline	Zuidwal	Harlingen Terminal	42.20			X
<b>NORWAY</b>						
Frostpipe (inhibited)	Lille-Frigg, Froy	Oseberg	36.25		X	
Gassled(2)			9.04			X
Heimdal to Brae		Brae	16.76		X	
Condensate line	Heimdal					
Kvitebjorn pipeline	Kvitebjorn	Mongstad	5.00		X	
Norpipe Oil	Ekofisk treatment center	Teeside (United Kingdom)	34.93		X	
Oseberg Transport System	Oseberg, Brage and Veslefrikk	Sture	8.65		X	
Sleipner East		Karsto	10.00		X	
Condensate Pipe	Sleipner East					
Troll Oil Pipeline I and II	Troll B and C	Vestprocess at Mongstad Refinery	3.70		X	
<b>UNITED KINGDOM</b>						
Bruce Liquid Export Line	Bruce	Forties (Unity)	43.25		X	
Central Area		Teesside	0.57			X
Transmission System (CATS)	Cats Riser Platform					
Central Graben Liquid Export Line (LEP)	Elgin Franklin	ETAP	46.17	X	X	
Frigg System: UK line	Frigg UK, Alwyn North, Bruce, and others	St. Fergus (Scotland)	100.00	X		X
Interconnector		Zeebrugge (Belgium)	10.00			X
	Bacton	Bacton	25.73			X



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Shearwater Elgin Area Line (SEAL)	Elgin Franklin, Shearwater				
<b>GABON</b>					
Rabi Pipe	Rabi	Cap Lopez Terminal	100.00	X	X
<b>UNITED STATES</b>					
Canyon Express	Aconcagua	Williams Platform	25.80	X	X

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Pipeline(s)	Origin	Destination	% interest	TOTAL		
				operator	Liquids	Gas
SOUTH AMERICA						
Argentina						
Gas Andes	Neuquen Basin	Santiago (Chile)	56.50	X		X
TGN	Network (North Argentina)		19.21	X		X
TGM	TGN	Uruguyana (Brazil)	32.68	X		X
Bolivia						
Transierra	Yacuiba	Rio Grande	11.00			X
TBG	Bolivia-Brazil border	Porto Alegre via Sao Paulo	9.67			X
TSB (project)	TGM (Uruguay)	TBG (Porto Alegre)	25.00			X
Colombia						
Ocensa	Cusiana, Cupiagua	Covenas Terminal	15.20		X	
Oleoducto de Alta Magdalena		Vasconia	1.00		X	
Oleoducto de Colombia	Magdalena media Vasconia	Covenas	9.50		X	
ASIA						
Yadana		Ban-I Tong (Thai border)	31.20	X		X
	Yadana (Myanmar)					
REST OF THE WORLD						
BTC (project)	Baku (Azerbaijan)	Ceylan (Turkey)	5.00		X	
SCP (project)	Bakou (Azerbaijan)	Erzurum (Turkey)	10.00			X
Dolphin (project)	Ras Laffan (Qatar)	Taweelah (U.A.E.)	24.50			X

(1) See page 28 for a description of the unwinding of certain agreements with Gaz de France

(2) Gassled: unitization of Norwegian gas pipelines through a new joint-venture in which TOTAL has an interest of 9.038%. In addition to the direct share in Gassled, TOTAL has a 14.4% interest in the joint-stock company Norsea Gas AS, which holds 3.018% in Gassled.

**Gas & Power**

TOTAL's Gas & Power sector encompasses marketing and trading of natural gas, liquefied natural gas (LNG) and power, trading of liquefied petroleum gas (LPG), natural gas transportation and storage, as well as LNG re-gasification. It also includes power generation from combined cycle gas plants and renewable energies, and production and sale of coal. Over the past five years, TOTAL has developed a global presence in this sector.

**Natural Gas**

TOTAL's strategy is to develop its natural gas activities downstream from production in order to optimize, or in some cases open, access for its present and future gas production and reserves to traditional as well as newly deregulated gas markets.

The majority of TOTAL's natural gas production is sold under long-term contracts. However, most of its North American production and part of its UK, Norwegian and Argentine production is sold on a spot basis. The long-term

contracts under which TOTAL sells its natural gas production usually provide for a price related to, among other factors, average crude oil and other petroleum product prices, as well as, in some cases, a cost of living index. Although the price of natural gas tends to fluctuate in line with crude oil prices, there tends to be a delay before changes in crude oil prices are reflected in long-term natural gas prices. Because of the relationship between the contract price of natural gas and crude oil prices, contract prices are not generally affected by short-term market fluctuations in the spot price of natural gas.

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In general, natural gas markets worldwide are being deregulated and opened to increasing competition, allowing suppliers to access a broader range of customers more freely. In addition, markets are adopting new trading systems that are more flexible than traditional long-term contracts. In this context, TOTAL's strategy has been to develop its trading, marketing and logistics activities in order to offer its natural gas production to new customers, particularly in the industrial and commercial markets, who are looking for more supply flexibility.

*Europe.* TOTAL has been active in the downstream sector of the gas chain for 60 years. Natural gas transportation, marketing and storage were initially developed to facilitate the Group's domestic production in France. Today, TOTAL's objective is to become a top-tier supplier of gas to industrial and commercial customers in Europe.

In France, in January 2005, TOTAL and Gaz de France implemented the provisions of agreements signed in October 2004 to unwind their previous agreements and to separate the cross-shareholdings that connected the two companies in their jointly-owned transmission and supply subsidiaries, GAZ DU SUD-OUEST (GSO) and COMPAGNIE FRANCAISE DU METHANE (CFM). Pursuant to the agreements, TOTAL has taken control of GSO's transportation and supply activities and a portion of CFM's marketing activities.

These agreements reflect TOTAL's commitment to adapt to the structural changes in the French natural gas market which has been open to competition for industrial and non-residential customers since July 1, 2004. This deregulation along with the agreements with Gaz de France have given TOTAL complete independence to market its production and reserves to French customers. As from January 2005, the Group's transmission and storage activities in southwest France have been consolidated under a wholly-owned subsidiary, TOTAL INFRASTRUCTURE GAZ FRANCE (TIGF), which operates a transportation network of 4,900 kilometers of pipelines and two storage units with a combined capacity of 85 Bcf, approximately 22% of the total natural gas storage capacity in France<sup>(1)</sup>. TIGF is subject to various regulations, including those for determining transportation tariffs. French law provides that natural gas transportation activities are regulated by an Energy Regulation Commission, which proposes prices which then must be approved by the Ministry of Economy, Finance and Industry. The Second European Directive on Gas has also been transposed into French law and provides for third party access to gas storage facilities through a process of transparent, non-discriminatory negotiations.

In 2004, in addition to its sales through GSO and CFM, TOTAL sold 35 Bcf of natural gas to authorized French customers through its subsidiary TOTAL GAS & POWER NORTH EUROPE. Beginning in January 2005, a new subsidiary, TOTAL ENERGIE GAZ (TEGAZ), assumed the Group's natural gas marketing activities in France. These activities marketed approximately 260 Bcf of natural gas in 2004.

In the United Kingdom, TOTAL GAS & POWER LTD sells gas and power to the industrial and commercial markets and also owns a 10% stake in INTERCONNECTOR UK LTD., a gas pipeline connecting Bacton in the United Kingdom to Zeebrugge in Belgium with a capacity of 700 Bcf/y. In 2004, TOTAL GAS & POWER LTD marketed 190 Bcf of natural gas to industrial and commercial customers. Electricity sales in 2004 amounted to 1.3 TWh.

In Spain, TOTAL has marketed gas in the industrial and commercial sectors since 2001 through its participation in CEPSA GAS COMERCIALIZADORA. In 2004, CEPSA GAS COMERCIALIZADORA sold 35 Bcf of natural gas. TOTAL and CEPSA each own a 35% stake in the company while the Algerian national company, Sonatrach, owns the remaining 30%. The Group also has a 12% direct interest in the Medgas project while CEPSA has a 20% interest. This gas pipeline is intended to directly connect Algeria and Spain and is expected to enter into operation in 2009.

*The Americas.* In the United States, TOTAL sold approximately 530 Bcf of natural gas in 2004, supplied by its own production and external sources.

In South America, TOTAL owns interests in natural gas transportation companies in Argentina, Chile and Brazil. TOTAL's interests include 19.2% of TRANSPORTADORA DE GAS DEL NORTE (TGN), which operates a gas transportation network covering the northern half of Argentina, 56.5% of the companies that own the GasAndes pipeline connecting the TGN network to the Santiago, Chile, region, 32.7% of TRANS-

(1) Natural Gas Information 2004



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PORTADORA DE GAS DEL MERCOSUR (TGM), which operates a pipeline connecting the TGN network to the Brazilian border, 9.7% of the company TRANSPORTADORA BRASILEIRA GAZODUCTO BOLIVIA-BRASIL (TBG), which owns the Brazilian section of the Bolivia-Brazil pipeline and 25% of TRANSPORTADORA SUL BRASILEIRA DE GAS (TSB), a company which is developing a pipeline project to connect the TGM pipeline and the Bolivia-Brazil pipeline. These different assets represent a total integrated network of approximately 9,000 kilometers serving the Argentine, Chilean and Brazilian markets from gas producing basins in Bolivia and Argentina, where the Group owns substantial reserves.

The actions taken by the Argentine government after the 2001 economic crisis resulted in an impairment of the assets of TOTAL's Argentine subsidiaries. In 2004, in a difficult context for Argentina's energy sector, TOTAL continued its efforts to preserve the value of these gas transportation and electricity generation assets. The arbitration procedure begun in 2003 before the International Centre for Settlement of Investment Disputes (ICSID) against the Argentine government under the mutual investment protection treaty between Argentina and France is continuing. This arbitration also concerns power generation activities of TOTAL in Argentina conducted through its subsidiaries CENTRAL PUERTO SA and HYDRONEUQUEN SA (see Electricity and cogeneration).

*Asia.* TOTAL sells natural gas transported through pipelines in Indonesia, Thailand and Myanmar and LNG in Japan, Korea and Taiwan from its LNG production in Indonesia and the Middle East. The Group is also examining the commercial possibilities for developing new LNG outlets in emerging markets, notably in China and India.

In DiMethyl Ether (DME, a new environmentally-friendly fuel obtained by converting natural gas into carbon monoxide and hydrogen and then chemically transforming this synthetic gas into DME), TOTAL has a 3% stake in DME-Development and a 6% stake in DME-International alongside nine Japanese companies. In 2004, TOTAL pursued this project with the first tests undertaken on a 100 tons per day pilot DME plant. More than 7.9 kt of DME have been produced in Kushiro on Hokkaido Island. These encouraging results should lead to the finalization of the technical process for this new technology by DME-Development and, in 2005, the start of a feasibility study by DME-International for the construction of commercial production units in Qatar.

***Liquefied Natural Gas (LNG)***

The liquefied natural gas (LNG) related activities of the Gas & Power sector include the shipping of LNG from liquefaction plants to re-gasification facilities as well as LNG storage and marketing.

TOTAL has entered into agreements to obtain long-term access to LNG re-gasification capacity on the three continents which are the largest consumers of natural gas, North America (United States and Mexico), Europe (France) and Asia (India). These agreements are intended to provide TOTAL with an outlet for its existing natural gas liquefaction projects and also to allow TOTAL to develop new natural gas liquefaction projects, especially in the Middle East.

*Europe.* TOTAL has entered into a partnership agreement with Gaz de France to provide TOTAL with a re-gasification capacity of 1.6 Mt/y in the Fos Cavaou terminal project in southern France. This terminal is currently under construction and should start its operation in 2007. It will have an initial capacity of 6.2 Mt/y. TOTAL has committed to purchase 0.7 Mt/y of LNG from the gas liquefaction plant of the Snøhvit field (TOTAL 18.4%) in Norway.

*North America.* TOTAL signed an agreement in November 2004 to reserve re-gasification capacity of 7.5 Mt/y for 20 years at the Sabine Pass LNG terminal to be built in Louisiana, beginning when the terminal enters into operation, which is anticipated for 2009. The FERC (Federal Energy Regulation Committee) approved the terminal on December 15, 2004. TOTAL anticipates, in particular, that it will use this capacity to process LNG from its projects in the Middle East and in West Africa. TOTAL also acquired a 25% stake in the re-gasification terminal in Altamira in eastern Mexico in 2003. This terminal, which will have a capacity to re-gasify 5Mt/y of LNG, is scheduled to begin operation in 2006.

*Asia.* In March 2004, TOTAL signed an agreement to acquire a 26% share in the Hazira re-gasification terminal in India on the west coast of the Gujarat state and the same share in the marketing company SHG which

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will sell the re-gasified LNG. TOTAL has agreed to provide 26% of the LNG that SHG will market. This terminal is scheduled to begin production in 2005 with an initial capacity of 2.5 Mt/y.

*Middle East.* In Qatar, negotiations undertaken in 2004 resulted in the signature of heads of agreement in February 2005 providing for TOTAL's acquisition of a 16.7% interest in Train II of Qatargas 2, which has a capacity of 7.8 Mt/y. The heads of agreement also provides that TOTAL will purchase up to 5.2 Mt/y of LNG from Qatargas 2 over a 25-year period, which for the most part will be marketed in France, the United Kingdom and the United States. TOTAL's acquisition of the interest in Train II is subject to the approval of the relevant authorities.

In Yemen, TOTAL GAS & POWER LTD signed heads of agreement with Yemen LNG in February 2005 under which the Group will acquire 2 Mt/y of LNG over a 20-year period beginning in 2009. This LNG will be marketed in the United States. Yemen LNG, which is operated by TOTAL, plans to construct two LNG trains with a combined capacity of 6.7 Mt/y.

*Africa.* As a result of the decision taken by NIGERIA LNG LTD (in which TOTAL has a 15% interest) in July 2004 to launch a sixth liquefaction train at its Bonny liquefaction plant, TOTAL, through its wholly-owned subsidiary TOTAL GAS & POWER LTD., will be able to increase its LNG purchases from the plant by 0.9 Mt/y in addition to the 0.2 Mt/y to be purchased from the number four and five trains at the Bonny plant.

***Liquefied Petroleum Gas (LPG)***

In 2004, TOTAL traded or sold 4.8 Mt of LPG (butane and propane) around the world; approximately 0.9 Mt in the Middle East and Asia, 1 Mt in Europe through coastal trading on small vessels and 2.9 Mt in the Atlantic and Mediterranean areas on large vessels. Approximately half of these quantities originated from the Company's production from either fields or refineries. In 2004, this LPG trading involved six full-time charter vessels and approximately 90 spot charters and represented about 10% of worldwide seaborne LPG trade<sup>(2)</sup>.

In November 2003, TOTAL started construction on the joint project with Hindustan Petroleum (HPCL) to build an underground LPG storage unit on the east coast of India in the state of Andhra Pradesh. TOTAL has a 50% stake in this project which is planned to have a storage capacity of 60 kt and an offtake capacity of 1.2 Mt a year. The commercial start-up of the project is expected to occur in 2007.

***Electricity and cogeneration***

TOTAL is participating in a number of natural gas-fired electricity generation projects in Europe, South America, Asia and the Middle East as part of its strategy of pursuing opportunities at all levels of the gas value chain. TOTAL currently operates facilities with the capacity to generate more than 5,000 MW of electricity.

TOTAL also participates in several projects for cogeneration, which is the process whereby steam produced by heat from gas turbines used to generate electricity is then used for industrial purposes, such as refining petrochemicals or water desalination. This process can have an energy efficiency from 60% up to 85%.

In June 2004, the Group started up a gas-fired power plant at its refinery in Normandy in France. The Group owns and operates this plant, which has a 250 MW power generation capacity combined with a 380 T/h steam production capacity which are used to improve the energy efficiency and environmental impact of the refinery.

Since May 2003, the Group has been involved in the production of electricity in the United Arab Emirates through its participation in the Taweelah A1 cogeneration plant. TOTAL has a 20% share in GULF TOTAL TRACTEBEL POWER CY, the company that owns and operates this plant. The plant combines electric power generation, with a total capacity of 1,430 MW, and water desalination, with a capacity of 385,000 cubic meters per day, and is one of the largest gas-fired cogeneration plants in the world<sup>(3)</sup>, representing approximately one quarter of the Emirate of Abu Dhabi's power generation and water desalination capacities.

(2) World Trade Potens&Partners Yearbook

(3) Cogeneration and On-Site Power Production, Volume 4, Number 4, July – August 2003.

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In Thailand, TOTAL owns a 28% stake in the EPEC company which has been producing electricity since March 2003 at the Bang Bo combined cycle gas power plant, which has a capacity of 350 MW.

In Argentina, TOTAL owns 63.9% of CENTRAL PUERTO SA and 70% of HIDRONEUQUEN SA. CENTRAL PUERTO SA owns and operates gas-fired power stations in Buenos Aires and in Neuquén, with a total capacity of 2,165 MW. Through its stake in HIDRONEUQUEN SA, TOTAL owns 41.3% of Piedra del Aguila (HPDA), a 1,400 MW hydroelectric dam located in Neuquén.

In Great Britain, TOTAL holds a 40% share in HUMBER POWER LTD. which owns a 1,260 MW capacity gas-fired combined cycle power station located on the Humber estuary. In 2004, the Group provided 40% of the natural gas used by the plant (24 Bcf) and sold 3.7 TWh of electricity.

### ***Coal***

TOTAL sold approximately 11.3 Mt of coal worldwide in 2004. Of this amount, 6.2 Mt was South African steam coal, of which approximately 80% was sold to European utility companies. Approximately 4.1 Mt of this South African coal came from the Group's production and the remaining 1.8 Mt came from TOTAL's role as exclusive marketing agent for its partner Tavistock/Xstrata in its 50/50 TOTAL-Tavistock joint-venture in the ATC mines. The remaining quantities were purchased locally. The coal was exported through the port of Richards Bay, the largest coal terminal in the world, 5.7% of which is owned by TOTAL through its wholly-owned South African subsidiary, TOTAL COAL SOUTH AFRICA. The joint venture for the ATC mines is currently the subject of an arbitration brought by Tavistock/ Xstrata against TOTAL COAL SOUTH AFRICA concerning the marketing of production. Under the South African Black Economic Empowerment law, in February 2004 TOTAL released a 25% share of the Dorstfontein mine to Mmakau Mining. This agreement is a significant step in the opening of the Group's coal activities to historically disadvantaged investors in South Africa. Similar agreements regarding the other mines operated by the Group in South Africa (ATC and Forzando) will be put into place in the future.

In addition to the coal produced and supplied by its South African operations, TOTAL is developing its coal trading business with a total of 2.5 Mt of coal sold in Asia and 0.5 Mt sold in Europe in 2004.

In France, TOTAL, through its subsidiary CDF Energie, is the leading distributor of steam coal to the industrial sector<sup>(4)</sup> (paper, cement, food, residential heating, etc.) with 2004 sales of 2.2 Mt of coal, supplied by a combination of its own South African production and purchases from diverse suppliers outside of the Group.

### ***Renewable energy***

TOTAL has been active in the renewable energy sector since 1983, starting with its photovoltaic activities, and intends to continue developing renewable energy as part of its sustainable development policy and in order to contribute to preparing the world energy supply for the future. Currently, the major developments for implementing this policy are in its solar-photovoltaic and wind power activities.

*Solar-photovoltaic Power.* TOTAL ENERGIE, a company of which TOTAL owned 35% as of December 31, 2004, specializes in the creation, marketing and exploitation of solar-photovoltaic power systems. TOTAL ENERGIE's sales increased by about 50% to 110 M€ in 2004, corresponding to an effective capacity of 25 MWp, and its main commercial markets are in network connections in Europe (mainly in Germany) and decentralized rural electrification and telecommunication systems in the French Overseas Territories. TOTAL ENERGIE owns a solar panel manufacturing plant in South Africa. In 2004, TOTAL ENERGIE began construction of a solar panel manufacturing plant in Toulouse, with the start up of production anticipated during the first half of 2006. This unit is designed to have an initial annual production capacity of 15 MWp, enough to equip the roofs of 7,500 homes.

PHOTOVOLTECH, a company of which TOTAL owns 42.5%, is specialized in producing photovoltaic cells. Following encouraging results in 2004, its first full year of operation, with sales of approximately 15 M€ ,

(4) Atic Services



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and taking into account the developing market, PHOTVOLTECH has decided to increase its production capacity from 13 MWp/y to 80 MWp/y by the end of 2006, with a partial increase in capacity scheduled to be put into service in 2005.

TOTAL has responded to invitations for bids launched by public authorities to develop decentralized rural electrification projects in developing countries such as Mali, Morocco and South Africa. In South Africa, administrative issues and safety problems have slowed down the project to equip 15,000 homes. Almost 4,000 homes had been equipped at the end of 2004. In Morocco, TEMASOL, 32.2% of which is owned by TOTAL and 35.6% by TOTAL ENERGIE, continued its development of the project it was awarded in May 2002 to equip 16,000 homes. At the end of 2004, 10,000 of these homes had been equipped. In 2004, TEMASOL was also awarded a project to equip 37,000 homes and submitted a bid for another project, the results of which should be announced in 2005.

*Wind Power.* TOTAL's first 12 MW capacity wind farm in Mardyck, France, which began operation in November 2003, had a first full year of production in line with expectations, producing approximately 27.5 GWh of electricity in 2004. This installation serves as a pilot program to compare different technologies on the same site in order to prepare for possible larger scale offshore or onshore projects in the future.

TOTAL also submitted a bid for a project organized by the French government to be located offshore Dunkirk. Results of the bidding process for this project are expected in the first half of 2005. If TOTAL's bid is accepted, implementation of the project would likely be delayed for some years, during which time the necessary authorizations would be obtained in an extensive consultation process. TOTAL is studying other projects in France, the UK and Spain with the possibility of submitting bids in response to calls for offers in these countries.

**DOWNSTREAM**

The Downstream segment conducts TOTAL's refining, marketing, trading and shipping activities.

The table below sets forth sales and operating income (adjusted for special items) for Total's Downstream segment for each of the last three years.

**DOWNSTREAM SEGMENT FINANCIAL DATA(1)**

	<b>For the Year Ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
	<b>(in millions of euros)</b>		
Total segment sales (excluding sales to other segments)	80,640	68,658	66,984
Operating income (adjusted for special items)	3,217	1,970	909

(1) See Note 4 of the Notes to the Consolidated Financial Statements included in this Annual Report for more detailed information on the Downstream segment together with a breakdown of special items.

**Refining & Marketing**

In 2004, TOTAL's worldwide refining capacity was 2,692 kb/d and its average refined products sales were 3,771 kb/d (including trading and equity affiliates). TOTAL is the largest refiner-marketer in Europe based on refining capacity and refined product sales. TOTAL operates a network of 16,857 retail stations worldwide, of which approximately 50% are owned by the Group. TOTAL's refineries also allow the Group to produce a broad range of high value-added specialty products, such as lubricants, LPG, jet fuel, petrochemical feedstock, special fluids, bitumens and paraffins.

In 2004, refining margins increased as fuel price in the Atlantic basin were subject to upward price pressure. This positive effect was slightly offset by the weaker dollar relative to the euro and a slight decrease in marketing margins due to higher prices for supplies that were only partially passed on in the prices paid by customers. In this overall favorable context, the Downstream segment benefited from a high capacity utilization rate at its refineries while completing the upgrade of its sites to meet the specifications for very low sulfur content fuels



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(50ppm) that came into effect in Europe on January 1, 2005, and while continuing to prepare to meet the even higher requirements (10ppm) that come into effect in Europe in January 2009.

The Downstream segment pursued both the growth of its activities and the implementation of productivity programs that resulted in a recurring contribution of approximately 150 M to operating income in 2004. This performance illustrates the execution of TOTAL's strategy to consolidate and develop its marketing positions, adapt and optimize its refining operations, and apply strict capital discipline.

### **Refining**

TOTAL holds interests in 28 refineries (including 13 that it operates), located in Europe, the United States, the French West Indies, Africa and China. TOTAL is the leading refiner-marketer in Europe on the basis of refining capacity and sales.

#### ***Geographic description of activities***

TOTAL's activities in Western Europe (including the Group's 45.3% interest in the Spanish company Cepsa) account for more than 80% of its refined product sales as well as of its refining capacity. TOTAL operates 12 refineries in Western Europe. Six are located in France, one in Belgium, one in Germany, one in Italy, one in the Netherlands and two in the United Kingdom. TOTAL also has minority interests in another German refinery (Schwedt) and in a seventh French refinery (Reichstett). In addition, the Company participates in four refineries in Spain through its 45.3% interest in Cepsa.

TOTAL is further integrating its refining and base petrochemicals activities in order to capture synergies, notably from increased product exchanges and reduced capital expenditures, estimated to amount to approximately 100 M in 2004, most notably from the integration of the La Mède and Lavéra sites, which is underway. TOTAL is continuing to actively pursue a practice of exchanging and implementing best practices among and at its refineries and is also continuing to implement its refining-hub management concept (based on platforms that are designed to optimize supply, regional coverage and site specifications) in Europe.

During 2004, a relatively low number of TOTAL's refineries were affected by shutdowns. These shutdowns allowed TOTAL to adapt the refining units to meet new European requirements for low sulfur content fuels. TOTAL is progressively making further upgrades to its European refineries to prepare for regulations that will require refineries to produce 10 ppm sulfur content fuel by the beginning of 2009.

In 2004, TOTAL also started the construction of a distillate hydro-cracker at the Normandy refinery in France. This unit, which is planned to enter into operation in 2006, is expected to respond to the growing European demand for light distillates, in particular diesel and jet fuel, and to reduce its production of heavy fuel oil. The unit will also produce high quality bases for lubricants and specialty fluids as well as naphta. The project represents an investment of approximately 500 M over the period from 2003 to 2006, and also includes the construction of a hydrogen production unit.

In the United States, TOTAL operates the Port Arthur, Texas refinery on the Gulf of Mexico, which has a capacity of 176 kb/d. This refinery benefits from the increasing integration of refining and petrochemical operations.

Outside of the 12 principal refineries that TOTAL operates in Western Europe and its refinery in the United States, TOTAL has interests in 15 other refineries. The aggregate capacity of the Group's interests in these refineries is 413 kb/d.

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The table below sets forth TOTAL's share of the daily crude oil refining capacity of its refineries.

**CRUDE OIL REFINING CAPACITY**

	<b>December 31, 2004</b>
	<b>(kb/d)(1)</b>
<b>Refineries operated by the Company</b>	
Normandy (France)	328
Provence (France)	155
Flandres (France)	160
Donges (France)	231
Feyzin (France)	119
Grandpuits (France)	99
Antwerp (Belgium)	352
Leuna (Germany)	227
Rome (Italy)(2)	52
Immingham (UK)	223
Milford Haven (UK)(3)	73
Vlissingen (Netherlands)(4)	84
Port Arthur (U.S.)	176
<b>Sub-total</b>	<b>2,279</b>
Other refineries in which the Company has an interest(5)	413
<b>Total</b>	<b>2,692</b>

(1) In the case of refineries that are not wholly owned by TOTAL, the indicated capacity represents TOTAL's proportionate share of the total refining capacity of the refinery.

(2) TOTAL interest 57.5%.

(3) TOTAL interest 70%.

(4) TOTAL interest 55%.

(5) 15 refineries in which TOTAL has interests ranging from 16.7% to 55.6% (seven in Africa, four in Spain, one in France, one in Germany, one in Martinique and one in China).

**Description of activities by product category**

The table below sets forth by product category TOTAL's net share of the quantity produced at TOTAL's refineries (including those in which it has a minority interest) for the years indicated.

**PRODUCTION LEVELS**

<b>2004</b>	<b>2003</b>	<b>2002</b>
<b>(kb/d except for %)</b>		

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Motor gasoline	580	584	570
Avgas and jet fuel	188	177	179
Kerosene and diesel fuel	712	724	629
Fuel oils and heating oils	552	535	513
Other products	419	419	416
<b>Total(1)</b>	<b>2,451</b>	<b>2,439</b>	<b>2,307</b>
Utilization rate	93%	92%	88%

(1) Includes net share of Cepsa in which the Group has a 45.3% interest.

*Specialties.* TOTAL produces a wide range of refined petroleum products at its refineries and other facilities. In 2004, TOTAL increased both its production and volumes sold of specialty products (jet fuel, butane

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and propane, lubricants and greases, paraffins and waxes, bitumens and special fluids). TOTAL is among the major participants in the European specialty products market. Worldwide, TOTAL markets lubricants in over 150 countries and distributes aviation fuel at 550 airports. TOTAL is the second largest LPG marketer in France (on the basis of volumes sold), and its LPG business has expanded beyond the traditional core European market into Asia and South America.

*Renewable Energy and Alternative Fuels.* TOTAL plays an active part in the promotion of renewable energies and alternative fuels, and has continued its research and testing programs for fuel cell technologies and hydrogen fuels. In this area, TOTAL continues to work under cooperation agreements with Renault, Renault Trucks, Valeo and Delphi for automotive applications and with Electrabel and Idatech for stationary applications. TOTAL has installed a LPG fuel cell system, which generates heat and electricity, in its Roeulx station in Belgium. It has also teamed up with Berlin BVG, the largest public transport company in Germany, to open a hydrogen center of excellence and the first hydrogen fueling station in Germany, which operates under the TOTAL brand. The hydrogen distribution capacity of this station was increased in early 2004, and it has been supplying an experimental bus since mid-2004. TOTAL is also an active participant in the Hydrogen Technology Platform Program launched by the European Commission at the end of 2003, which aims at promoting the development of this new technology across Europe.

In 2004, TOTAL began a research and development program devoted to making biomass and BtL (Biomass to Liquids, process of transforming biomass into biofuels) technologies commercially viable. TOTAL also strengthened its position as a major participant among oil companies active in biofuels in Europe by continuing to operate three ETBE (ethyl-tertio-butyl-ether) units, one each in Feyzin, Dunkerque and Le Havre, with a combined total capacity of 194 kt and which account for 97% of French production of biofuels. In the bio-diesel market, TOTAL incorporates vegetable-oil-methyl-esters (VOME) in diesel fuels produced at six French refineries.

**Marketing**

TOTAL markets refined products primarily in Europe and Africa.

The table below sets forth by geographic area TOTAL's average daily volumes of refined petroleum products sold for the years indicated.

**SALES OF REFINED PRODUCTS(1)**

	<b>2004</b>	<b>2003</b>	<b>2002</b>
	<b>kb/d</b>		
France	882	917	854
Rest of Europe(1)	1,505	1,509	1,477
United States	257	237	159
Africa	245	232	213
Rest of World	129	87	92
<b>Total excluding Trading</b>	<b>3,018</b>	<b>2,982</b>	<b>2,795</b>
Trading (Balancing and Export Sales)	753	670	585
<b>Total including Trading</b>	<b>3,771</b>	<b>3,652</b>	<b>3,380</b>

(1) Includes net share in Cepsa, in which the Group has a 45.3% interest.

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The table below sets forth by geographic area the number of retail stations in the TOTAL network as at the end of the period indicated.

**RETAIL STATIONS**

	2004	2003	2002
France(1)	5,626	5,917	6,172
Rest of Europe (excluding Cepsa)	5,003	5,196	5,526
Cepsa(2)	1,697	1,710	1,603
Africa	3,249	3,324	3,383
Rest of World	1,282	1,137	1,071
<b>Total</b>	<b>16,857</b>	<b>17,284</b>	<b>17,755</b>

(1) Revised after integrating third-party networks. Retail stations under the TOTAL and Elf brands, and, in 2004, approximately 2,000 retail stations under the Elan brand.

(2) Includes all the retail stations within Cepsa's network, in which the Group has a 45.3% interest.

**Europe**

In 2004, the Group completed the implementation of its network unification strategy under the TOTAL brand. Coupled with the new corporate identity program, which should provide higher visibility for the TOTAL brand, this strategy is aimed at increasing customer loyalty.

In France, the TOTAL-branded network provides extensive national coverage and offers a broad range of quality retail station services and a diverse selection of other products, such as the Bonjour convenience shops, while benefiting from customer loyalty programs. In 2004, TOTAL and Casino Caf  teria signed a franchise agreement for the opening of cafeterias on the French motorway network. This agreement illustrates TOTAL's intention to combine the experience and know-how of its teams with quality partners to upgrade the services it provides at its motorway retail stations.

Elf-branded retail stations, with an updated design, offer quality fuels at prices that are particularly competitive, as well as basic services. At the end of 2004, the TOTAL-branded network consisted of 3,000 retail stations in France, while the Elf-branded network included nearly 300 retail stations.

TOTAL also markets fuels at nearly 2,000 Elan-branded retail stations located in rural areas, as well as at 420 AS24-branded retail stations dedicated to professional transporters.

In 2004, TOTAL continued to implement its strategy for strengthening its position in areas where it has a significant market share. For example, in 2004 TOTAL completed a swap agreement signed with Shell concerning the acquisition of Shell-DEA retail stations in Germany in exchange for retail stations in France, the Czech Republic and Hungary. In Italy, TOTAL strengthened its position by obtaining seven new motorway concessions through a bidding process. In Spain, TOTAL is active through its 45.3% participation in Cepsa. In the United Kingdom, TOTAL launched a major restructuring program in 2003 which has improved the performance of TOTAL's network by rationalizing the network's portfolio, renovating high-throughput sites and developing non-fuel sales.

In 2004, customer loyalty strengthened due to TOTAL's continued efforts to improve the quality of the services it provides. TOTAL continued to develop its fuel card programs, notably with the announcement that it will launch a new AS24/ Renault Truck card in 2005 for professional transporters in Europe. This offer, which will be marketed by AS24, is designed to provide access to a larger network of sites while facilitating fleet management by combining the advantages of the AS24 and Eurotraffic cards. This partnership between Renault Trucks and TOTAL illustrates TOTAL's intention to continue to develop innovative and economical solutions by anticipating customer needs. In

addition, the Eurotrafic card network is being extended into Central and Eastern European countries (Hungary, the Czech Republic and Poland), as Eurotrafic cards are now accepted at AS24



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retail stations in these regions. TOTAL has one of the most popular fuel cards in Europe with more than three million card holders.

In 2004, TOTAL began developing a program, to be implemented in 2005, for the distribution of a special additive (urea) for heavyweight vehicles. This product is used to destroy nitrogen oxide in truck exhaust systems in order to meet current and future environmental standards (Euro IV and Euro V).

### ***Africa***

In 2004, TOTAL consolidated its position as one of the leading marketers on the African continent with a market share of 11% and a presence in more than 40 countries. In 2004, TOTAL sold approximately 12 Mt of refined products.

TOTAL also undertook development and rationalization programs aimed at reducing its exposure to market risks and consolidating the profitability of its Downstream activities. TOTAL was also involved in programs to improve safety, both at its sites and related to the transportation of its products.

### ***Asia***

In 2004, TOTAL continued to expand its network in the Philippines and Pakistan, with 89 retail stations at the end of 2004. TOTAL also strengthened its position in China by signing a joint-venture project with Sinochem which envisions the creation of a network of 200 retail stations in Beijing and in the north of China. TOTAL and Sinochem are also partners in the WEPEC refinery in Dalian (TOTAL 22.4%), where processing capacity was increased from 8 to 10 Mt in 2004 and construction of a 1.5 Mt/y distillate hydro-cracker has been approved by the Board of WEPEC and the relevant authorities.

In specialty products, TOTAL strengthened its position in the lubricants sector, notably with its local partner ISU in Korea, as a result of the agreements it concluded in 2003, and also in Indonesia and China. In 2004, TOTAL signed a technical and operational cooperation agreement with Idemitsu, a Japanese company. In the LPG sector, TOTAL consolidated its positions in India, China, Vietnam, Cambodia and Bangladesh. TOTAL also developed its specialty fluids activities in 2004, notably in drilling fluids, which are partly linked with Upstream activities in the area.

### ***Rest of the World***

In 2004, two new subsidiaries were created in the Caribbean: TOTAL Jamaica, which has 22 retail stations and an 8.5% network market share and TOTAL Puerto Rico, which has 101 retail stations and a 5% network market share. These new subsidiaries complement TOTAL's existing activities in Haiti, the French West Indies, Cuba and Costa Rica.

In the eastern Mediterranean rim, TOTAL is continuing to develop its marketing, lubricants and LPG activities, notably in Turkey, where in 2003 TOTAL merged its two wholly-owned distribution subsidiaries, TOTAL Oil Turkiye and Tüpgas.

### ***Trading-Shipping***

The Trading-Shipping sector sells and markets the Group's crude oil production, provides a supply of crude oil for the Group's refineries, imports and exports the appropriate petroleum products for the Group's refineries to be able to adjust their production to the needs of local markets, charters suitable ships for these activities and undertakes trading on various derivatives markets.

Although Trading-Shipping's main focus is serving the Group, its know-how and expertise also allow Trading-Shipping to extend the scope of its activities beyond meeting the strict needs of the Group.

### ***Trading***

TOTAL is one of the world's major traders of crude oil and refined products on the basis of volumes traded.

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The table below sets forth selected information with respect to TOTAL's worldwide sales and source of supply of crude oil for each of the last three years.

**SALES & SUPPLY OF CRUDE OIL**

	For the Year Ended December 31,		
	2004	2003	2002
	(kb/d, except %)		
Sales of crude oil			
Total Sales	4,720	4,713	4,630
Sales to Downstream segment(1)	2,281	2,165	2,043
Sales to external customers	2,439	2,548	2,587
Sales to external customers as a percentage of total sales	52%	54%	56%
Supply of crude oil			
Total supply	4,720	4,713	4,630
Produced by the Group(2)(3)	1,686	1,608	1,571
Purchased from external suppliers	3,034	3,105	3,059
Production by the Group as a percentage of total supply	36%	34%	34%

(1)Excludes share of Cepsa, in which TOTAL has a 45.3% interest.

(2)Includes condensates and natural gas liquids.

(3)Includes TOTAL's proportionate share of the production of equity affiliates.

The Trading business unit operates extensively on physical and derivatives markets, both organized and over the counter. In connection with its trading activities, TOTAL, like most other oil companies, uses derivative energy instruments to adjust its exposure to fluctuations in the price of crude oil and refined products.

The Trading business unit undertakes certain physical transactions on a spot basis, but also enters into term and exchange arrangements and uses derivative instruments such as futures, forwards, swaps and options. These operations are entered into with various counterparties.

All of TOTAL's trading activities are subject to strict internal controls and trading limits. For a discussion of risks related to its trading business, see Item 11. Quantitative and Qualitative Disclosure about Market Risk – Oil and Gas Market Related Risks.

According to data from the International Energy Agency<sup>(5)</sup>, world oil demand was exceptionally high in 2004 (an increase of 2.65 Mbd, or 3.3%, compared to 2003) after also having increased in 2003 (1.85 Mbd, or 2.4%, compared to 2002). The increase in 2004 was largely due, as in 2003, to a rise in consumption in North America (up 2.3%) and China (up 15.4%). In OECD countries, demand increased by 1.4%, with gasoline demand increasing by 0.9%, diesel by 4.5% and jet fuel by 1.7%, while heavy fuel oil demand declined by 2.7%.

Further data from the same report by the International Energy Agency indicates that, faced with this unprecedented increase in demand, non-OPEC<sup>(6)</sup> producers were able to increase their oil output by only approximately 1 Mb/d, with 870 kb/d of this amount attributable to increased production in countries that were formerly in the Soviet Union. Members of OPEC, endeavoring to accommodate Iraq's return to oil production and fearing a price downturn in the spring of 2004, maintained a level of production at approximately 28 Mb/d in the first half of 2004. Strong demand, the lack of an increase in oil stocks and in oil exports from Iraq and sharp price increases caused OPEC to increase the organization's production to 29.4 Mb/d on average over the latter half of the

year, the highest level of production ever achieved. Overall, OPEC increased its crude oil production in 2004 by 1.9 Mb/d compared to that in 2003.

(5) Source: Oil Market Report, January 2005

(6) OPEC is made up of Algeria, Indonesia, Iran, Iraq, Kuwait, Libya, Nigeria, Qatar, Saudi Arabia, The United Arab Emirates and Venezuela.

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Low levels of oil stocks and events in the Middle East and Iraq fuelled fears that Saudi Arabia's excess capacity would be insufficient to meet demand. Although Saudi Arabia did supply additional volumes of oil, this additional supply was principally composed of heavy, sour crude while, due to limited capacities for conversion and hydrotreatment, refiners were in need of light, sweet crude to meet growing light-product demand. In addition, the strong surge in crude exports from the Persian Gulf, combined with the long distances to refining centers, led to upward pressure on freight rates in the tanker market, causing rates to rise to exceptionally high levels.

The combination of these factors drove the oil industry near to the limit of its capacity in 2004, propelling market components to exceptionally high levels:

			2004	2003	min 2004		max 2004	
Brent IPE	1st line	\$ /b	38.04	28.48	28.83	(February)	51.56	(October)
Diesel IPE	1st line	\$ /t	348	250	247	(February)	493	(October)
VLCC Ras Tanura Chiba								
BITR		\$ /t	20.0	12.1	9.8	(March)	45.0	(November)

(IPE: International Petroleum Exchange)

(1st line: Quotation for first month nearby delivery on the International Petroleum Exchange)

(VLCC: Very Large Crude Carrier, BITR: Baltic International Tanker Routes)

During the first quarter of 2005, the build-up of oil stocks which began in the fourth quarter of 2004 levelled off due to an increase in demand linked with cold weather in the northern hemisphere in February and March 2005. As a result, the downward trend in oil prices observed in November and December 2004 has reversed since January 2005. The effect of relatively high oil prices does not appear to have limited global economic growth and the demand for oil could remain at relatively high levels, although lower than those recorded in 2004. Other factors that may affect oil prices in 2005 include whether OPEC will increase its production in 2005, with a corresponding decrease in its excess production capacity. Upward pressure on light product prices, in particular middle-distillates, and the downturn in heavy fuel oil prices will probably continue in 2005 due to the lack of an increase in the conversion capacity of refineries that would be necessary to stabilize the market.

Throughout 2004, the Trading business unit maintained activity and results at high levels, comparable to those in 2003, trading physical volumes of crude oil and refined products amounting to approximately 5.4 Mb/d.

**Shipping**

The principal activity of the Shipping business unit is to arrange the transportation of crude oil and refined products necessary for Group activities. The Shipping business unit provides the wide range of shipping services required by the Group to develop its activities and maintains a rigorous safety policy. Like a certain number of other oil companies and shipowners, the Group uses freight-rate derivative contracts in its shipping activity in order to adjust its exposure to freight-rate fluctuations.

In 2004, the Group chartered 2,959 voyages to transport approximately 125 Mt of oil. The Group employs a fleet made up of 51 vessels chartered under long-term or medium-term agreements (including six LPG tankers). The fleet is modern, with an average age of approximately eight years for crude carriers and less than six years for product carriers, and is predominately comprised of double-hulled vessels.

In 2004, the global crude-oil tanker fleet capacity increased by 4.9%, marking the second consecutive high-growth year in terms of available tonnage, after an increase of 5.8% in 2003. World tanker demand was high, boosted both by the level of oil demand and by increased OPEC exports. Transport supply and demand were almost balanced in 2004, resulting in upward pressure on the spot chartering market. Freight rates were thus more volatile in 2004 than in 2003. Rates were also significantly higher for all vessel segments and geographical areas as a result of several factors, including higher than expected global economic growth, market uncertainty due to events in Iraq, Nigeria and Venezuela, the increase in consumption in North America and China, extraordinary climatic events in the Gulf of Mexico and increased efforts to secure the use of high quality tonnage (modern double-hulled vessels), especially in

Europe.

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In 2004, new regulations by the International Maritime Organization and the European Union governing the safety of maritime transport of crude oil and oil products came into force. In addition to introducing new rules for the shipping of heavy oil products, these regulations mandate a phase-out of single-hulled ships by 2010 (with the possibility of obtaining extensions until 2015 subject to certain conditions). The number of vessels decommissioned in 2004 was relatively low, due to high spot-chartering rates. The number of new vessels expected to enter into service in 2005 and 2006 should result in lower freight rates and an increase in the number of single-hulled ships that are decommissioned.

**CHEMICALS**

TOTAL is one of the world's largest integrated chemical producers in terms of sales. The Chemicals segment is organized into the Base Chemicals & Polymers sector, whose activities are related to the Group's refining operations, the Intermediates & Performance Polymers sector, and the Specialties sector, which includes the Group's rubber processing, resins, adhesives and electroplating activities.

In 2004, the Chemicals segment had combined sales of 20.04 B €. Of these 2004 sales, Base Chemicals & Polymers accounted for 51.5% (10.31 B €), Intermediate & Performance Polymers for 18.5% (3.71 B €) and Specialties for 30.0% (6.02 B €). By region, Europe accounted for 58% of sales, the United States for 25%, and remaining sales were generated predominantly in Asia and Latin America. Results in 2004 benefited from an improved global economic environment and increased demand. The margins for petrochemicals and chlorochemicals increased markedly in the latter half of 2004, but the margins for the Group's other activities remained under pressure due to the strong euro and the relatively high cost of raw materials.

In February 2004, TOTAL announced a reorganization of its Chemicals segment to streamline its organization and create a separate entity (alongside its petrochemicals and specialties activities) which should be able to adapt to market trends with more flexibility and be more responsive to its customers.

This new entity, named Arkema, was formally organized on October 1, 2004. It regroups the activities of the Intermediates & Performance Polymers sector, as well as those of the Chlorochemicals business unit. Arkema's activities have been organized under three divisions: Vinyl Products, Industrial Chemicals and Performance Products, which contain a total of fourteen business units, which are among the European and world leaders in their sectors.

With a global presence, a balanced, coherent industrial base and activities which are well-distributed, both in terms of product lines and regional sites, Arkema should rapidly develop its businesses. Arkema is expected to become a stand alone entity in 2006, subject to market conditions and the completion of the notification and information process with labor representatives.

For 2004, business and financial information for the Chemicals segment has been presented on the basis of the internal organization before the creation of Arkema. From January 1, 2005, this information will be presented according to the new internal organization resulting from the creation of Arkema.

Concerning industrial safety, in 2004 the Chemicals segment continued to focus on three key areas: on-the-job safety, safety management systems and risk prevention.

The table below sets forth selected financial information for TOTAL's Chemicals segment for each of the past three years.

**CHEMICALS SEGMENT FINANCIAL DATA(1)**

	<b>For the Years Ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
	<b>(in millions of euros)</b>		
Sales (excluding intra-group sales)	20,042	17,260	19,317
Operating income (adjusted for special items)	1,086	558	777

(1) See Note 4 of the Notes to the Consolidated Financial Statements included in this Annual Report for more detailed information on the Chemicals segments together with a breakdown of special items.

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The tables below show the Chemical segment's main product groups and their major applications:

**BASE CHEMICALS & POLYMERS**

<b>Main product groups</b>	<b>Major Applications</b>
<b>Base petrochemicals</b>	
<b><i>Olefins</i></b>	
Ethylene	Production of polyethylene, vinyl chloride monomer, styrene, functional polymers and copolymers
Propylene	Production of polypropylene, acrylic acid, Oxo-alcohols
Butadiene	Production of lactame 12, polybutadiene, elastomers
<b><i>Aromatics</i></b>	
Benzene	Production of styrene, cyclohexane, chlorobenzenes
Toluene	Production of chemical intermediates and solvents
Xylenes	Production of phthalic anhydride, terephthalic acid (PTA), solvents
<b>Polyethylene</b>	Packaging and packaging films, cables, pipes and tubes, blow molded bottles, fuel tanks, automobile parts
<b>Polypropylene</b>	Packaging, containers, automobile parts, household and sanitary goods, electrical appliances and fibers
<b>Styrenics</b>	
Styrene	Production of polystyrene, ABS, emulsions, resins, plastic additives
Polystyrene	Packaging, audio-video, microcomputers, TV and electrical appliances
Elastomers	Bitumen modification, footwear, plastic modification, adhesives
<b>Fertilizers</b>	Nitrogen and complex fertilizers, urea, industrial products
<b>Chlorochemicals</b>	
Vinyl chloride monomer	Production of polyvinylchloride
Caustic soda	Chemicals, alumina, pulp and paper, detergents and soaps
Polyvinylchloride (PVC)	Housing and decorative coatings, automotive industry, pipes, tubes and profiles
Chlorinated solvents and chloromethanes	Solvents and raw material in fluorinated products

**INTERMEDIATES & PERFORMANCE POLYMERS**

<b>Main product groups</b>	<b>Major Applications</b>
<b>Acrylics</b>	Resins, emulsion resins for adhesives, paints and coatings, superabsorbents, methylmethacrylate (MMA) monomers for PMMA (polymethylmethacrylate)
<b>PMMA</b>	Acrylic glass used in construction, the automotive industry, advertising signs, and the decoration and manufacture of sanitary sheets
<b>Thiochemicals</b>	Agrochemical and pharmaceutical intermediates, polymerization agents and additives, gas odorants
<b>Fluorinated industrial gases</b>	Refrigeration, air conditioning, foam blowing agents, intermediates
<b>Oxygenated products</b>	Hydrogen peroxide (pulp and paper bleaching, textile, electronics and water treatment), chlorate, hydrazine hydrates





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<b>Main product groups</b>	<b>Major Applications</b>
<b>Engineering polymers</b>	Engineering polymers including polyamides used in the automotive industry, in the space, aviation and electronic industries and for the manufacture of hot-melts and of protective coatings for pipes and tubes and fluoropolymers used in construction, chemical engineering, protective paints and coatings and for the protective coatings of off-shore pipes
<b>Plastic additives</b>	Stabilizers and impact modifiers used in polymer conversion
<b>Specialty products</b>	Gas and liquid separation, adsorption/filtration, specialty surfactants
<b>Organic peroxides</b>	Polymerization catalysts for polyethylene, PVC, polystyrene, cross-linking agents
<b>Agrochemicals</b>	Pre-harvest pesticide market (fungicides, insecticides, herbicides) post-harvest products such as coatings, waxes, fungicides and cleaners, tin intermediates segments
<b>Formaldehyde resins</b>	Glues and resins and corresponding precursors such as formaldehyde specialties

**SPECIALTIES**

<b>Main product groups</b>	<b>Major Applications</b>
<b>Rubber processing</b>	Rubber parts for the automobile, transportation and aviation industries (transmission systems, antivibration systems, fluid transfer parts, body sealings, precisions sealings, consumer products) ( <i>Hutchinson</i> )
<b>Resins</b>	Polyester resins and gel coats for boats, truck parts, sanitary and leisure, UV/ EB resins for coatings, resins and emulsions for paints, inks, varnishes and adhesives ( <i>Cray Valley, Sartomer and Cook Composites Polymers</i> )
<b>Adhesives</b>	Construction, timber, packaging, do-it-yourself, non-woven fabrics ( <i>Bostik</i> )
<b>Electroplating</b>	Decoration and protection of metal and plastic parts, plating in the electronic industry (PCBs, chip carriers, etc.) ( <i>Atotech</i> )

**Base Chemicals & Polymers**

TOTAL's Base Chemicals & Polymers activities encompass petrochemicals, including base petrochemicals (the production of olefins and aromatics), polyethylene, polypropylene and styrenics, as well as fertilizers and various chlorochemicals products (chlorinated solvents and chloromethanes, caustic soda, vinyl chloride monomer, polyvinyl chloride (PVC) and PVC compounds, pipes and profiles).

Sales reached 10.30 B in 2004, compared to 7.91 B in 2003, with demand increasing in all regions and margins increasing in spite of a significant increase in the price of raw materials.

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The following table sets forth the production capacities for TOTAL's Base Chemicals & Polymers main product groups in Europe, North America, Asia and the Middle East as at the date indicated.

**CAPACITIES AS AT DECEMBER 31, 2004**

	<b>Europe</b>	<b>North America</b>	<b>Asia and the Middle East(1)</b>	<b>Worldwide</b>
	<b>(in thousands of tons per year)</b>			
Olefins	5,265	1,125	665	7,055
Aromatics	2,550	925	565	4,040
Polyethylene	1,440	410	280	2,130
Polypropylene	1,160	1,000	145	2,305
Styrenics(2)	1,390	1,205	515	3,110
Vinyl chloride monomer (VCM)	1,030		50	1,080
Polyvinyl chloride (PVC)	960			960

(1) Including minority stakes in Qatar and 50% of Samsung-Total Petrochemicals capacities in Daesan (South Korea).

(2) Styrene, polystyrene and elastomers.

**Petrochemicals**

TOTAL's petrochemicals activities include olefins and aromatics (base petrochemicals) as well as polyethylene, polypropylene and styrenics. On October 1, 2004, the TOTAL Petrochemicals business unit was created to regroup these activities.

TOTAL's main petrochemicals sites are located in Belgium (Antwerp, Feluy), in France (Gonfreville, Carling, Feyzin, Lavéra), in the United States (Port Arthur, Houston and Bayport in Texas and Carville in Louisiana), as well as in Singapore and China (Sanshui). These sites are either adjacent or connected to Group refineries. As a result, most of TOTAL's petrochemicals activities are closely integrated with the Group's refining operations. The Samsung-Total Petrochemicals joint venture, in which TOTAL has a 50% stake, also has an integrated site in Daesan, South Korea.

TOTAL's objective is to reinforce its position among petrochemicals leaders by combining targeted growth with enhanced productivity at its existing large sites. To respond to the increasing growth of the Asian markets, TOTAL's strategy is to improve the competitiveness of its existing large sites and to grow through the development of new platforms to serve these expanding markets. These new platforms may either be located near sources of feedstock, and thereby benefit from geographic integration, or be developed at sites close to more dynamic demand markets.

2004 was the first full year of operation for the Samsung-Total Petrochemicals joint-venture which continued to develop its position on the Chinese market from its site at Daesan, South Korea. The encouraging results of the joint-venture have led TOTAL to study projects for the significant expansion of the production lines at the site.

Throughout petrochemicals, investments are carried out in accordance with the Group's sustainable development policy. In 2004, safety at the Group's sites improved in line with targets for the year.

*Base petrochemicals.* The year was characterized by a significant increase in the price of naphtha and sustained high demand for steamcracker derivatives.

For aromatics, 2004 was a record year in terms of margins, due to the high levels of gasoline demand in the United States and of polyester demand in Asia.

For olefins, production increased in 2004 by approximately 12% compared to 2003, and the Group continued to develop its marketing in Asia. In the United States, in order to increase its propylene production, TOTAL started-up a new metathesis production unit downstream from the Sabina butadiene extraction plant and the Port Arthur, Texas

steamcracker.

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*Polyethylene.* In 2004, the relative economic environment in all regions improved compared with that of 2003, with particularly high levels of demand in Asia leading to a decrease in exports from the Middle East to Europe. In this context, sales volumes increased approximately 5% and prices significantly increased in the second half of the year due to the rising cost of ethylene. With its presence in the Middle East through Qapco and in the Far East through Samsung-Total Petrochemicals, TOTAL benefited from the favorable conditions in the Asian markets.

In industrial developments, the business unit continued to pursue its strategy of adjusting production at its sites towards higher value-added grades by increasing the production of bi-modal resins (mainly for pipe applications) and metallocenes at the Antwerp plant. Also, the production lines at Mont and Balan in France were shutdown.

*Polypropylene.* Prices increased significantly in 2004 due to the combined effect of higher monomer prices and the higher levels of worldwide demand, although the European market environment remained less favorable. The business unit's capacity utilization rate continued to increase and rose above 90%. In this context, sales volumes increased by 3.2% in 2004, backed by continued improvement of production levels, notably due to the debottlenecking of the line at Feluy (Belgium), which had started production in 2002, and to the debottlenecking of the Laporte, Texas (United States) site. At the end of 2004, the global polypropylene production capacity of the Group had increased by more than 140 kt/y.

*Styrenics.* Results for 2004 in this segment were affected by the sharp increase in the price of benzene, the principal feedstock. Throughout the world, prices for styrene and polystyrene reached record levels which reduced the level of demand in the latter part of the year. The levels of demand in Europe and North America remained moderate, but were sustained in Asia, in particular in China. TOTAL continued to make improvements to its plants and production processes. In the United States the capacity of the styrene plant at Cosmar, Louisiana (a joint venture with GE Petrochemicals) was expanded by 290 kt/y, leading to an associated decrease of more than 20% in the energy consumption of one of the production units. In Europe, the program for increasing the reliability as well as the quality of production is continuing with the shutdown of the outdated polystyrene plant at Stalybridge (UK). In China, the polystyrene plant at Sanshui, acquired in 2003, reached its design capacity and the quality of its products was also improved in 2004.

***Fertilizers***

In the Fertilizers business unit, TOTAL's subsidiary Grande Paroisse continued to deal with the consequences of the explosion that struck its Toulouse plant on September 21, 2001. Grande Paroisse continued to make payments as a result of its presumed civil responsibility under French law over and above the compensation paid by insurance companies, reaching a cumulative amount of 1,065 M as of December 31, 2004. In 2004, Grande-Paroisse benefited from higher levels of demand for fertilizers in France, but was negatively affected by higher prices for its raw materials, which were not completely passed on to customers. Sales increased by 12% compared with 2003.

During the summer of 2004, the Group acquired the remaining shares of Grande-Paroisse that were held by minority investors in a squeeze-out tender offer. Grande Paroisse was delisted from the *Premier Marché* of the Euronext Paris stock exchange on August 12, 2004.

***Chlorochemicals***

TOTAL's Chlorochemicals business unit's activities are related to the various products that are produced in electrolysis, notably caustic soda, chlorinated solvents and chloromethanes, vinyl chloride monomer as well as polyvinylchloride (PVC) and certain derivative products (PVC compounds, pipes and profiles).

This business unit was included within Arkema when Arkema was formally organized in October 2004.

In the first half of 2004, Chlorochemicals suffered from a depressed caustic soda market. However, from June to the end of 2004, the markets for caustic soda and PVC began to improve in spite of the increase in the price of raw materials, most notably ethylene. Restructuring efforts for this business in recent years include the withdrawal from Mexico near the end of 2003, and the shutdown of the PVC plant at Brignoud (France) in 2004.

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In January 2005, Arkema announced a consolidation plan (subject to a notification and consultation process with labor representatives) aimed at restoring the Vinyl Products business unit's long-term competitiveness and its ability to withstand less favorable market conditions. This program includes an investment program of approximately 300 M over a five-year period which is focused on developing the most efficient plants, shutting down persistently loss-making plants, continuing efforts to improve safety and environmental concerns and continuing productivity programs already underway. Specifically, the program is aimed at prolonging the life of the Saint-Auban (France) complex, with a total investment of approximately 35 M budgeted to restructure the site to focus on PVC specialty resins, copolymers and trichloroethane 1.1.1.

Demand for PVC compounds in Europe was flat in 2004 and exports from Europe were negatively impacted by the stronger euro, while margins decreased due to higher prices for raw materials that were not entirely passed on to customers.

In 2004, the pipes and profiles activities operated in a mixed environment. While there was significant growth in construction activity during the first half of the year, in the second half of the year this trend did not continue and the business struggled to pass higher prices for raw materials on to its customers. In the pipes business, sales of pressured bimodal tubes increased. Restructuring efforts continued with resulting reductions in fixed and variable costs. In the profiles business, sales volumes remained steady, after the growth that had been recorded over the three previous years, and the focus was on providing services to clients.

**Intermediates & Performance Polymers**

The Group's Intermediates & Performance Polymers sector includes industrial chemicals, with intermediate products such as acrylics, PMMA (polymethylethacrylate), thiochemicals, fluorinated industrial gases, oxygenated products (where the principal product is hydrogen peroxide) as well as performance products used for technical applications, such as engineering polymers, plastic additives, specialty products, organic peroxides, agrochemicals and formaldehyde resins.

These activities share many of the same requirements of technical expertise and process know-how. Based in Europe, North America and Asia, they serve diversified markets.

This sector has a portfolio of well-known trade names, including Rilsan® polyamides, Kynar® fluorinated polymers, Altuglas® and Plexiglas® clear resins and sheet material, Forane® fluorinated gas and Norsocryl® acrylic monomers.

In 2004, sales in this sector reached 3.71 B, a 3.1% increase compared to 3.60 B in 2003.

*Acrylics.* The market was particularly tight in 2004 due to the upturn in worldwide demand fueled by growth in the Chinese market, while supply was constrained due to technical production problems at various producers' sites as well as occasional shortages of raw materials.

*PMMA.* Despite high demand in 2004, margins were down due to the higher prices of the raw material methylmethacrylate (MMA) and energy, which were not passed on to customers. Also in 2004, a restructuring plan was launched in Europe to group the production of extruded sheets at Bernouville (France) and that of cast sheets at Saint-Avoid (France). In another development, the capacity of the plant at Jinhae (Korea) was doubled.

*Thiochemicals.* Demand increased in 2004, although the sales of methylmercaptan were negatively affected as a result of the presence of bird flu in Asia. Margins were lower due to the weaker dollar and to higher raw material and energy prices. A program to reduce fixed costs continued with the March 2004 shutdown of the acroleine plant at Pierre-Bénite (France) and the restructuring of the Rotterdam (Netherlands) site. Also, the construction of new acroleine and MMP (methylthiopropionaldehyde) units in Beaumont, Texas continued. These units are scheduled to begin operations in May 2005. This investment, part of a joint project with Novus International, has been undertaken to strengthen the Group's position in this growing market.

*Fluorinated industrial gases.* Sales volumes increased in 2004 due to the demand for HFC products, most notably blends, and from a one-time sale of HCFC-141b stocks in the United States. Also in 2004, the performance of the production units for HFC 134a was improved, a production line at the Zaramillo (Spain) site

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was dedicated to the production of HFC-32, a key component of blends, and the capacity of the HCFC-22 plant at Changshu (China) was doubled.

*Oxygenated products.* Demand in 2004 was at high levels in all regions and for all products: hydrogen peroxide, chlorate, hydrazine and derivatives. The capacity of the plant at Shanghai (China) was increased and the plant successfully restarted in the spring of 2004.

*Engineering polymers.* In 2004, engineering polymers benefited from higher levels of demand than in 2003, but margins were negatively affected by the stronger euro. The construction of a new High Content EVA production line started at Balan (France), and near the end of the year the Group decided to increase the capacity of the Grafted Orevac® plant at Mont (France).

*Plastics additives.* Demand was strong in 2004, but results were negatively affected by increases in prices for raw materials, most notably tin and methylmethacrylate, and in energy prices.

*Specialty products.* In 2004 specialty products suffered from weak demand, the depreciation of the dollar and increases in prices for raw materials. In spite of this unfavorable environment, certain products, such as asphalt and oil additives and molecular sleeves, developed their activities. Productivity efforts continued with the launch of a restructuring program for the Parentis (France) plant which manufactures activated carbons. In another development, the Phenolic resins business was sold to Schenectady in May 2004.

*Organic peroxides.* Sales volumes increased slightly in 2004 in Europe and North America and benefited from growth in Asia. Activities were negatively affected by increases in the prices of raw materials and energy. A new plant in Guangzhou (China) is expected to enter into operation during the first half of 2005.

*Agrochemicals.* Sales in 2004 remained near the same level as in 2003, after the increase recorded in 2003. The business unit continued its investments to improve productivity.

*Formaldehyde Resins.* In 2004, in spite of higher levels of demand for particle board resins, activities suffered from a production overcapacity due to the start of operations of two plants in Belgium operated by competitors and the resulting negative effect on margins in France and the Benelux countries. This particularly affected the profitability of the Villers-Saint-Paul (France) plant, but had a lesser effect on the prices in Germany, where the Group's plant at Leuna is located.

**Specialties**

TOTAL's Specialties sector includes rubber processing (Hutchinson), resins (Cray Valley, Sartomer and Cook Composites & Polymers), adhesives (Bostik) and electroplating (Atotech). The sector covers consumer and industrial markets for which customer-oriented marketing and service are key drivers. The Group markets specialty products in more than 55 countries. Its strategy is to continue its international expansion by combining internal growth and targeted acquisitions while concentrating on growing markets and focusing on the distribution of new products with high added value. In 2004, sales for the Specialties sector reached 6.02 B €, a 4.9% increase compared with 2003.

*Rubber processing.* Hutchinson manufactures and markets products obtained from rubber processing for the automotive and aerospace industries and for consumer markets. Sales increased by around 3% in 2004. At constant dollar/euro exchange rates, the increase would have been approximately 5%. Automotive activity benefited from growth in the European market, while the industrial activity benefited from the rising military demand in the United States. Sales of the combined automotive and industry activities grew 4.5% compared with 2003. The consumer goods activities operated in a difficult environment in 2004, and its sales decreased by 3% compared with 2003. In 2004, Hutchinson continued to expand in countries where it believes there is high potential for growth, mainly in Eastern Europe, South America and China.

*Resins.* TOTAL produces and markets resins for adhesives, inks, paints, coatings and structural materials through its three subsidiaries Cray Valley, Sartomer and Cook Composites Polymers. In 2004, the resins activities grew at a good pace, notably in North America and in Asia. Sales increased by 7% compared to 2003. Cray Valley completed the restructuring of its European production of resins for coatings with the closing of its Machen (UK) site in May 2004 and the related transfer of production to its other European sites. Cray Valley also

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started-up a new monomer production line at Villers-Saint-Paul (France) as well as a new oligomer production unit in Korea. In addition, Cray Valley acquired the UV curing business of Akzo in September 2004.

*Adhesives.* TOTAL's adhesives subsidiary, Bostik, is one of the worldwide leaders in its sector on the basis of sales, with leading positions in the industrial, hygiene, construction and consumer and professional distribution sectors. In 2004, sales increased 2.6% compared with 2003. At constant dollar/euro exchange rates, they grew by 5%. The business grew significantly in the Asia-Pacific region and in North America, and began to recover in Europe. Worldwide, the construction and distribution sectors segments were the most dynamic. The restructuring program introduced after the Bostik/Ato-Findley merger continued in 2004. Bostik acquired the silicones activities of Rhodia in Australia.

*Electroplating.* Atotech, which groups TOTAL's electroplating activities, grew in 2004 in spite of the appreciation of the euro which adversely affected its performance. Its sales increased by more than 6% compared with 2003. At a constant dollar/euro exchange rate, sales grew by 11%. Atotech continued its development in Asia through the expansion of its production sites and technical centers in Guangzhou (China), Koda (Japan), Singapore, Taiwan, and Korea.

### **OTHER MATTERS**

Various factors, including certain events or circumstances discussed below, have affected or may affect our business and results.

#### **Political and Economic Factors Which May Affect Business**

The oil sector is subject to domestic regulations and the intervention of governments in such areas as:

- the award of exploration and production interests,

- the imposition of specific drilling obligations,

- environmental protection controls,

- control over the development and abandonment of a field causing restrictions on production, and

- possible, though exceptional, nationalization, expropriation or cancellation of contract rights.

The oil industry is also subject to the payment of royalties and taxes, which may be high compared with those imposed in respect of other commercial activities. In addition, substantial portions of TOTAL's oil and gas reserves are located in countries outside the European Union and North America, certain of which may individually be considered politically and economically unstable. These reserves and the related operations are subject to certain risks, including:

- increases in taxes and royalties,

- the establishment of production and export limits,

- the renegotiation of contracts,

- the expropriation or nationalization of assets,

- risks relating to changes of local governments and resulting changes in business customs and practices,

- payment delays,

- currency exchange restrictions,

- depreciation of assets due to the devaluation of local currencies or other measures taken by governments that might have a significant impact on the value of activities, and



losses and impairment of operations by armed conflicts and actions of terrorist groups.

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TOTAL, like other major international oil companies, attempts to conduct its business and financial affairs so as to protect against such political and economic risks. However, there can be no assurances that such events will not adversely affect TOTAL.

**Iran Libya Sanctions Act**

In 2001, the U.S. legislation implementing sanctions against Iran and Libya, referred to as ILSA, was extended until August 2006. In April 2004, the President of the United States terminated the application of ILSA with respect to Libya. ILSA authorizes the President of the United States to impose sanctions (from a list that includes denial of financing by the U.S. export-import bank and limitations on the amount of loans or credits available from U.S. financial institutions) against persons found by the President to have knowingly made investments in Iran of \$20 million or more in any twelve-month period. In May 1998 the U.S. government waived the application of sanctions for TOTAL's investment in the South Pars gas field in Iran. This waiver, which has not been modified since it was granted, does not address TOTAL's other activities in Iran, although TOTAL has not been notified of any related sanctions. At the end of 1996, the Council of the European Union adopted Council Regulation No. 2271/96 which prohibits TOTAL from complying with any requirement or prohibition based on or resulting directly or indirectly from certain enumerated legislation, including ILSA. It also prohibits TOTAL from extending its waiver for South Pars to other activities. In each of the years since the passage of ILSA, TOTAL has made investments in Iran (excluding South Pars) in excess of \$20 million, sometimes substantially exceeding this figure. In 2004, TOTAL's average daily production in Iran amounted to 26 kboe/d, approximately 1.0% of its average daily worldwide production. TOTAL expects to continue to invest amounts significantly in excess of \$20 million per year in Iran in the foreseeable future. TOTAL cannot predict interpretations of or the implementation policy of the U.S. government under ILSA with respect to its current or future activities in Iran. It is possible that the United States may determine that these or other activities will constitute activity prohibited by ILSA and will subject TOTAL to sanctions. TOTAL does not believe that enforcement of ILSA, including the imposition of the maximum sanctions under the current law and regulations, would have a material negative effect on its results of operations or financial condition.

**The Argentine Financial Crisis**

During 2002 the Argentine economy suffered further deterioration of the recessive cycle, which began in the fourth quarter of 1998. As a result of this depressed environment, and in particular due to the unilateral measures taken by the Argentine government pursuant to an emergency law enacted in 2002 which substantially reduced electricity prices, the Group considered that the economic context significantly modified the prospects of certain of its assets. The Group has recorded asset impairment charges related to the effects of the Argentine financial crisis which had a negative impact on net income (Group share) of 310 M in 2002 and of 114 M in 2004. TOTAL continues to follow the evolution of the economic and financial situation in Argentina and its consequences on the Group's operations in this country, which are limited relative to the overall size of the Group.

**The Geopolitical Situation in the Middle East**

In 2004, the entire Middle East represented 16% of the Group's production of oil and gas and 7% of the net income from operations of the operating segments, adjusted for special items. The Group produces in the United Arab Emirates, Iran, Oman, Qatar, Syria and Yemen. TOTAL cannot predict developments of the geopolitical situation in the Middle East and its potential consequences on the Group's activities in this area.

**Oil and Gas Exploration and Production Considerations**

Oil and gas exploration and production require high levels of investment and are associated with particular risks and opportunities. These activities are subject to risks related specifically to the difficulties of exploring underground, to the characteristics of hydrocarbons, as well as relating to the physical characteristics of an oil and gas field. The first stage of exploration involves geologic risks. For example, exploratory wells may not result in the discovery of hydrocarbons at all, or in amounts that would be sufficient to allow for economic development. Even if an economic analysis of estimated hydrocarbon reserves justify the development of a discovery, the

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reserves can prove lower than the estimates during the production process, thus adversely affecting the development economics.

Almost all the exploration and production activities of TOTAL are accompanied by a high level of risk of loss of the invested capital. It is impossible to guarantee that new resources of crude oil or of natural gas will be discovered in sufficient amounts to replace the reserves currently being developed, produced and sold to enable TOTAL to recover the capital invested.

The development of oil fields, the construction of facilities and the drilling of production or injection wells require advanced technology in order to extract and exploit fossil fuels with complex properties over several decades. The deployment of this technology in such a difficult environment makes cost predictions uncertain. TOTAL's activities can be limited, delayed or cancelled as a result of numerous factors, such as administrative delays, particularly in terms of the host states' approval processes for development projects, weather conditions, shortages of or late delivery of equipment.

**Regulation**

TOTAL's exploration and production activities are conducted in many different countries and are therefore subject to an extremely broad range of legislation and regulations. These cover virtually all aspects of exploration and production activities, including matters such as land tenure, production rates, royalties, pricing, environmental protection, export taxes and foreign exchange. The terms of the concessions, licenses, permits and contracts governing the Group's ownership of oil and gas interests vary from country to country. These concessions, licenses, permits and contracts are generally granted by or entered into with a government entity or a state company and are sometimes entered into with private owners. These arrangements usually take the form of licenses or production sharing agreements.

The oil concession agreement remains the classic model for agreements entered into with States: the oil company owns the assets and the facilities and is entitled to the entire production. In exchange, the operating risks, costs and investments are the oil company's responsibility and it agrees to remit to the State, as owner of the subsoil resources, a production-based royalty, income tax, and possibly other taxes that may apply under the local tax legislation.

The production sharing contract, or PSC, involves a more complex legal framework than the concession agreement: it defines the terms and conditions of production sharing and sets the rules governing the cooperation between the company or consortium that holds the production license and the host state, which is generally represented by a state company. The latter can thus be involved in decisions relating to operations, cost accounting and allocation of production. The consortium agrees to undertake and finance all exploration and, in certain cases, production activities at its sole risk. In exchange, it is entitled to a portion of the production, known as cost oil, the sale of which should cover all of these expenses (investments and operating costs). The balance of production, known as profit oil, is then shared in varying proportions with the State or the state company.

In some instances, concession agreements and PSCs coexist, sometimes in the same country. Even though other contractual structures still exist, TOTAL's license portfolio is comprised mainly of concession agreements. In all countries, the authorities of the host state, often assisted by international accounting firms, continually perform joint venture and PSC cost audits and ensure the observance of their contractual obligations.

In some countries, TOTAL has also signed contracts called contracts for risk services which are similar to the production-sharing contracts, but with the main difference that the repayment of expenses and the compensation for services are established on a monetary basis. In other countries, the contracts for risk services are backed by a compensation agreement (buy-back), which allows TOTAL to receive a part of the production equal to the cash value of its expenses and compensation.

Hydrocarbon exploration and production activities are subject to permits, which can be different for each of these activities; they are granted for limited periods of time and include an obligation to return a large portion in case of failure the entire portion of the permit area at the end of the exploration period.

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In general, TOTAL is required to pay income tax on income generated from its production and sale activities under its concessions or licenses. In addition, depending on the area, TOTAL's production and sale activities may be subject to a range of other taxes, fees and withholdings, including special petroleum taxes and fees. The taxes imposed on oil and gas production and sale activities may be substantially higher than those imposed on other businesses.

### **French Regulation**

TOTAL S.A., the parent holding company of the Group, is a French société anonyme with principal offices in France where a large number of the Company's top management lives and works. The Group is therefore subject to a wide range of French regulations. Certain matters related to our regulation under French corporate law are described under Item 6. Directors, Senior Management and Employees Board Practices Corporate Governance and Item 10. Additional Information Memorandum and Articles of Association. In accordance with French law, the Group participates in employee benefit plans offering retirement, death and disability, health and special termination benefits. The Group is also subject to French taxation through a consolidated income tax treatment approved by the French Ministry of Finance.

With respect to carrying on operations in France, the Group's exploration activities must be conducted under permits granted by the Minister of Industry. These permits are granted for a maximum of five years, with the possibility of renewing each permit twice (each renewal also for a maximum of five years). Development and production activities in France must be carried out under a concession granted by decree of the French Conseil d'Etat for a period of up to 25 years. When the holder of a French exploration permit makes a discovery, he is entitled to receive a concession for that discovery. In addition to normal corporate income tax, exploration and production activities in France are subject to royalties. For refining operations in France, the Group is required to give one month's prior notice of its intention to acquire, construct or shutdown refining plants. These projects are then subject to regulatory approvals. Retail service stations in France must obtain and renew certain operating permits to perform their business. In particular, highway stations must obtain a license to operate designated sites through a bidding process organized by the relevant highway operators, most of which are wholly or partially owned by the French State. The Group's business activities are also subject to a wide range of French regulations relating to health, safety and the environment. These include a number of directives of the European Commission which have been enacted into French law. Such regulations are discussed below in some detail under Health, Safety and Environment Regulations.

### **Health, Safety and Environment Regulations**

TOTAL is subject in general to extensive and increasingly strict environmental regulation in the European Union. Significant directives which apply to its operations and products, particularly refining and marketing, but also its chemicals and, to a lesser extent, its upstream business, are:

The directive for a system of Integrated Pollution Prevention and Control (IPPC), a cost/benefit framework used to assess environmental quality standards of, and place potential emissions limits on, large industrial plants, including our refineries and chemical sites.

Air Quality Framework Directive and related directives on ambient air quality assessment and management, which, among other things, limit emissions for sulfur dioxide, oxides of nitrogen, particulate matter, lead, carbon monoxide, benzene and ozone.

The Sulfur Content Directive, under which sulfur in diesel fuel is limited to 0.2% beginning July 2000, and 0.1% beginning January 2008. Beginning January 2003, sulfur in heavy fuel oil is limited to 1%, with certain exceptions for combustion plants provided that local air quality standards are met.

The Large Combustion Plant Directive, a directive which limits certain emissions from large combustion plants, including sulfur dioxide, nitrogen oxides and particulates; this directive will become effective in 2008.

Automobile emission directives which control and limit exhaust emissions from cars and other motor vehicles. Under these directives, emission controls will continue to become more stringent over time.

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From 2005, maximum sulfur levels for gasoline and diesel fuels are 50 ppm and, from 2009, a maximum sulfur content of 10 ppm will be mandatory throughout the EU.

The directive, adopted in September 2003, implementing the Kyoto Protocol within the European Union by establishing a system for greenhouse gas emissions quotas. This system, which entered into effect in January 2005, requires the Member States of the European Union to prepare quotas for industrial activities, in particular the energy sector, and to deliver carbon dioxide emissions permits based on these quotas.

The Major Hazards Directive, which requires emergency planning, public disclosure of emergency plans and ensuring that hazards are assessed, and effective emergency management systems.

The Framework Directive on Waste Disposal, intended to ensure that waste is recovered or disposed of without endangering human health and without using processes or methods which could unduly harm the environment. Numerous related directives regulate specific categories of waste.

Maritime oil spill directives, a number of which were passed in the wake of the Erika spill. The regulations coming into effect in the next few years require that tankers have double hulls and mandate improvements to navigation practices in the English channel.

Numerous water directives impose water quality standards based on the various uses of surface and coastal waters, including ground water, by setting limits on the discharges of many dangerous substances and by imposing information gathering and reporting requirements.

Adopted and effective in 2003, a comprehensive framework water directive has begun progressively replacing the numerous existing directives with a comprehensive set of requirements, including additional regulation obliging member countries to classify all water courses according to their biological, chemical and ecological quality; and to completely ban the discharges of approximately 30 toxic substances by 2017.

Numerous directives regulating the classification, labeling and packaging of chemical substances and their preparation as well as restricting and banning the use of certain chemical substances and products. The European Commission is still in the process of adopting a new system for Registration, Evaluation and Authorization of Chemicals (REACH) which will partially replace or complement the existing rules in this area. REACH is expected to require the registration of up to 100,000 chemicals, including intermediaries and polymers. In depth economic studies are currently underway to evaluate the costs to the chemicals industry of implementing this new system.

In March 2004, the European Union adopted a Directive on Environmental Liability. Member States have three years from the time of adoption to transpose the directive into their national legislation. The directive seeks to implement a strict liability approach for damage to biodiversity from high-risk operations. Citizens' right to know about activities which potentially harm the environment is ensured through a 1990 directive regarding access to environmental information. In January 2003, this directive was replaced by a subsequent right-to-know directive which goes beyond the previous directive in setting the timescale in which information must be provided and imposing fines for non-compliance. The directive also increases public disclosure of emissions to the environment.

A directive implementing the Aarhus Convention concerning certain public participation rights in a variety of activities affecting the environment was adopted in May 2003. Member States have a period of two years to implement the new procedural rules in their national systems.

In the United States, where TOTAL's operations are much smaller than in Europe, it is also subject to significant environmental and safety regulation. Of particular relevance to TOTAL's lines of business there are:

The Comprehensive Environmental Response, Compensation, and Liability Act (also known as CERCLA or Superfund), under which waste generators, site owners, facility operators and certain other parties can be strictly

liable for the entire cost of remediating sites contaminated by spills or waste

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disposal regardless of fault or the amount of waste sent to the site. Additionally, each state has laws similar to CERCLA.

Maritime oil spill laws and regulations, particularly the Oil Pollution Act of 1990 which was passed in the wake of the Exxon Valdez spill and which significantly increases oil spill prevention requirements, spill response planning obligations and spill liability for tankers and barges transporting oil, offshore oil platform facilities and onshore terminals.

The Clean Air Act and its regulations, which require, among other things, new fuel specifications and sulphur reductions, enhanced monitoring of major sources of specified pollutants; stringent air emission limits and new operating permits for chemical plants, refineries, marine and distribution terminals; and risk management plans for the storage of hazardous substances.

The Clean Water Act, which regulates the discharge of wastewater and other pollutants from both onshore and offshore operations and, among other things, requires industrial facilities to obtain permits for most surface water discharges, install control equipment, implement operational controls and preventative measures, including spill prevention and control plans and control stormwater runoff.

The Resource Conservation and Recovery Act (RCRA) regulates the storage, handling, treatment, transportation and disposal of hazardous and non-hazardous wastes and imposes corrective action requirements on regulated activities which mandate the investigation and remediation of potentially contaminated areas at these facilities.

Other significant U.S. environmental legislation includes the Toxic Substances Control Act which regulates the development, testing, import, export and introduction of new chemical products into commerce; the Occupational Safety and Health Act which imposes workplace safety and health, training and process standards to reduce the risks of chemical exposure and injury to employees; the Emergency Planning and Community Right-to-Know Act which requires emergency planning and spill notification as well as public disclosure of chemical usage and emissions.

Proceedings instituted by governmental authorities are pending or known to be contemplated against TOTAL and certain of its subsidiaries under applicable environmental laws which could result in monetary sanctions in excess of \$100,000. No individual proceeding is, nor are the proceedings as a group, expected to have a material adverse effect on TOTAL's consolidated financial position or profitability.

### **Operational Risks Related to the Environment and Safety**

TOTAL's activities present industrial and environmental risks which are inherent in the production of products that are flammable, explosive or toxic. Its activities are therefore subject to extensive government regulations concerning environmental protection and industrial security in most countries. For example, in Europe, TOTAL operates sites that meet the criteria of the European Union Seveso II directive for classification as high risk sites. Under the directive, TOTAL is obligated to implement additional safety and reporting procedures for these sites. Other sites operated by TOTAL in other parts of the world involve similar risks.

The broad scope of TOTAL's activities, which include drilling, oil and gas production, on-site processing, transportation, refining, petrochemicals activities, storage and distribution of petroleum products, production of intermediary chemical products and specialty chemicals, involve a wide range of operational risks. Among these risks are those of explosion, fire or leakage of toxic products. In the transportation area, the type of risks depends not only on the hazardous character of the products transported, but also on the transportation methods used (mainly pipelines, maritime, river-maritime, rail, road) and the volumes involved.

Most of these activities involve environmental risks related to air or water emissions and the creation of waste, and also require environmental site restoration after production is discontinued.

Certain branches or activities face specific risks. In oil and gas exploration and production, there are risks related to the physical characteristics of an oil or gas field. These include eruptions of crude oil or of natural gas, discovery of hydrocarbon pockets with abnormal pressure, crumbling of well openings, hydrocarbon leaks generating toxic risks (H<sub>2</sub>S) and risks of fire or explosion. All these events could possibly damage or even





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destroy crude oil or natural gas wells as well as related equipment and other property, cause injury or even death, lead to an interruption of activity or cause environmental damage. In addition, since exploration and production activities may take place on sites that are ecologically sensitive (tropical forest, marine environment, etc.), each site requires a specific approach to minimize the impact on the related ecosystem, biodiversity and human health.

TOTAL's activities in the Chemicals segment and, to a lesser extent, the Downstream segment also have related health, safety and environmental risks. These risks can arise from the intrinsic characteristics of the products involved, which may, for example, be flammable, toxic, or be linked to the greenhouse effect. Risks of facility contamination and off-site impacts may also arise from emissions and discharges resulting from processing or refining, and from recycling or the disposal of materials or wastes at the end of their useful life.

**Risk Evaluation and Management**

Prior to developing their activities and then on a regular basis during the operations, business units evaluate through specific procedures the related industrial and environmental risks in addition to taking into account the regulatory requirements of the countries where these activities are located.

Risk analyses are performed for new developments, updated in case of planned significant modifications of existing equipment, and periodically re-evaluated. To harmonize and reinforce risk management, TOTAL has developed a group-wide methodology which is being implemented progressively throughout the sites it operates. In France, three pilot sites are developing Risk Prevention plans in anticipation of the effectiveness of the French law of July 30, 2003. Similarly, environmental impact studies are done prior to any industrial development with a specific, thorough initial site analysis taking into account any special sensitivities. These studies also take into account the impact of the activities on the health of the neighboring population. For new products, risk characterizations and evaluations are performed. Furthermore, Life Cycle Analyses (ACV) for related risks are performed to study all the stages of a product's existence.

TOTAL actively monitors regulatory developments so as to continue complying with local and international rules and standards for the evaluation and management of industrial and environmental risks. The Group's commitment to meet its environmental and safety obligations is reflected in its Environmental contingencies and Asset retirement obligations (see Note 16 to the Consolidated Financial Statements). As indicated in Note 1 paragraph L of the Notes to the Consolidated Financial Statements, Asset retirement obligations were determined in accordance with FAS No. 143 (Accounting for Asset Retirement Obligations).

Risk evaluations lead to the establishment of management measures that are designed to minimize the risks of accidents and their consequences. These measures may be put into place through equipment design itself, reinforcing protection devices, designs of structures to be built and even compensation for the consequences of any unavoidable environmental impact. Risk evaluations may be accompanied, on a case by case basis, by an evaluation of the cost of risk control and impact reduction measures.

TOTAL is working to minimize industrial and environmental risks inherent to its activities by putting in place performance procedures and quality, security and environmental management systems, as well as by moving towards obtaining certification for its management systems (International Safety Rating System, ISO 14001, European Management and Audit Scheme), by performing strict inspections and audits, training staff and heightening awareness of all the parties involved, and by an active investment policy.

More specifically, since 2002, an action plan has been implemented in order to reach a new level of safety. The plan includes concrete steps related to organization and procedures, as well as an investment of 500 M over four years. In addition to the normal security budget, the plan carries out measures to minimize risks and increase safety for people and equipment. Investments are directed according to priorities defined in risk studies. For example, for the period from 2003 to 2006 the Downstream and Chemicals segments have planned investments in projects for the protection of units, reinforcement of control rooms and security of logistics (stored volumes, transportation chains).

Although the Group believes that, according to its current estimates, commitments or liabilities related to health, safety and environmental concerns would not have a material impact on its consolidated financial

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situation, its cash flow or its income, due to the nature of such concerns it is impossible to predict if in the future these types of commitments or liabilities could have a material adverse effect on the Group's activities.

### **Insurance and Risk Management**

#### ***Organization***

TOTAL has its own insurance and reinsurance company, Omnium Insurance and Reinsurance Company (OIRC). OIRC is totally integrated into the Group's insurance management and acts as a centralized global operations tool for covering the Group's risks. It allows the Group to implement its insurance program, notwithstanding the varying regulatory environments in the range of countries where the Group is present.

Certain countries require the purchase of insurance from a local insurance company. When a subsidiary company of the Group is subject to these constraints and is able to obtain insurance from a local company meeting Group standards, OIRC attempts to obtain a retrocession of the covered risks. As a result, OIRC negotiates reinsurance contracts with the subsidiaries' local insurance companies which transfer almost all of the risk (between 97.5% and 100%) to OIRC. When a local insurer covers the risks at a lower level than that defined by the Group, OIRC will provide additional coverage in an attempt to standardize coverage Group-wide. On the other hand, certain countries require insurance in excess of what the Group may deem necessary under Group-wide standards. In these cases, OIRC also provides the additional coverage necessary to satisfy these legal obligations and the Group does not need to turn to an outside insurer.

At the same time, OIRC negotiates a global reinsurance program with mutual insurance companies for the oil industry and commercial reinsurers. OIRC permits the Group to manage price variations in the insurance market, by taking on a greater or lesser amount of risk corresponding to the price trends in the insurance market.

In 2004, the amount of risk kept by OIRC after reinsurance was \$27.5 million per incident.

#### ***Risk and Insurance Management Policy***

In this context, the Group risk and insurance management policy is to work with the relevant internal department of each subsidiary to:

define scenarios of major disaster risks by analyzing those events whose consequences would be the most significant for third parties, for employees and for the Group;

assess the potential financial impact on the Group in case these disasters occur;

implement measures to limit the possibility such events occur and the scope of damage in case of their occurrence; and

manage the level of risk from such events that is covered internally by the Group and that which is transferred to the insurance market.

#### ***Insurance Policy***

The Group has worldwide tort and property insurance coverage for all its subsidiaries, and, for the Downstream and Chemicals segments, for loss of operations. These programs are contracted with first-class insurers (or reinsurers and mutual insurance companies of the oil industry through OIRC). The amounts insured depend on the financial risks defined in the disaster scenarios discussed above and the coverage terms offered by the market (available capacities and price conditions).

More specifically, for:

Tort liability: since the maximum financial risk cannot be evaluated using a systemic approach, the amounts insured are based on market conditions and industry practice, in particular, the oil industry. The insurance cap in 2004 for general tort and product liability was \$840 million.

Property: the amounts insured by sector and by site are based on estimated costs and reconstruction scenarios under the identified worst-case disaster scenarios and on insurance market conditions.



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Loss of operations: coverage is provided for the Refining and Chemicals sectors for a compensation period of 3 years (Refining) or 2 years (Chemicals), also based on the identified worst-case disaster scenarios and on insurance market conditions. The Group negotiates combined limits for property and loss of operations.

For example, for the highest estimated risk of the Group (the Alwyn field in the UK), the insurance cap was \$1.1 billion in 2004.

Moreover, deductibles for material damages fluctuate between \$0.1 and \$5 million depending on the level of risk, and are carried by the subsidiary.

The policy described above is given as an example of past practice over a certain period of time and cannot be considered to represent future conditions. The Group's insurance policy may be changed at any time depending on the market conditions, specific circumstances and on management's assessment of risks and the adequacy of their coverage. The Group cannot guarantee that it will not suffer any uninsured loss.

### **Competition**

The Company is subject to intense competition within the oil sector and in other related sectors in its activities related to satisfying the energy needs of the industry and of individuals. TOTAL is subject to competition from other oil companies in the acquisition of assets and licenses for the exploration and production of oil and natural gas. Competition is particularly strong with respect to the acquisition of undeveloped resources of oil and natural gas, which are in great demand. Competition is also intense in the sale of manufactured products based on crude and refined oil.

In this respect, the main competitors of TOTAL are ExxonMobil, the Royal Dutch Shell Group, BP and ChevronTexaco. At the end of 2004, TOTAL ranked fourth among international oil companies in terms of market capitalization and daily production of oil and gas, and fifth in terms of oil and gas reserves.

### **E-Commerce**

TOTAL has actively pursued e-commerce initiatives and, for those services having demonstrated real added value, intends to move from a pilot phase to industrial deployment. The primary focus is on e-purchasing (e-calls for tender, e-auctions and e-procurement), where the Group's Purchase Coordination department is organizing a progressive, group-wide program for implementation. Under this program, approximately 80,000 transactions (orders) have been electronically processed in 2004 and the total yearly sales made through online tenders or auctions amounts to more than 1 B €. Trade Ranger, the petroleum and chemical industry marketplace, continues to be TOTAL's principal service provider in this field.

In newly developing services and applications, TOTAL has strengthened its evaluation process through pilot programs focused on e-Invoicing (electronic billing) and e-Transit (cooperative online management of international transportation). If these pilot programs confirm TOTAL's expected added value from these applications, these applications could be progressively implemented group-wide, beginning as early as 2005.

### **ORGANIZATIONAL STRUCTURE**

TOTAL S.A. is the parent company of the TOTAL Group. As of December 31, 2004, there were 777 consolidated subsidiaries of which 673 were fully consolidated, 11 were proportionately consolidated, and 93 were accounted for under the equity method. For a list of the Principal Subsidiaries of the Company, see Note 31 of the Notes to the Consolidated Financial Statements.

### **PROPERTY, PLANTS AND EQUIPMENT**

TOTAL has freehold and leasehold interests in numerous countries throughout the world, none of which is material to TOTAL. See Business Overview Upstream for a description of TOTAL's reserves and sources of crude oil and natural gas.

**Table of Contents****ITEM 5. OPERATING AND FINANCIAL REVIEW AND PROSPECTS**

*Management's Discussion and Analysis is the Company's analysis of its financial performance and of significant trends that may affect its future performance. It should be read in conjunction with the Consolidated Financial Statements included elsewhere in this Annual Report. The Consolidated Financial Statements are prepared in accordance with French GAAP, which differ in certain respects from U.S. GAAP. For a description of such differences and a reconciliation of net income and shareholders' equity to U.S. GAAP, see Note 3 of the Notes to the Consolidated Financial Statements.*

*This section contains forward-looking statements which are subject to risks and uncertainties. For a list of important factors that could cause actual results to differ materially from those expressed in the forward-looking statements, see Cautionary Statement Concerning Forward-Looking Statements on page iv.*

**Overview**

TOTAL's operating results are generally affected by a variety of factors, including movements in crude oil prices and refining margins, which are both generally denominated in dollars, and in exchange rates, particularly the value of the euro against the dollar. Higher crude oil prices generally have a positive effect on the operating income of TOTAL, as its Upstream oil and gas business benefits from the resulting increase in prices realized from production. Lower crude oil prices generally have a corresponding negative effect. The effect of changes in crude oil prices on TOTAL's Downstream activities depends upon the speed at which the prices of refined petroleum products adjust to reflect such changes. TOTAL's operating results are also affected by general economic and political conditions and changes in governmental laws and regulations. For more information, see Item 4. Information on the Company's Other Matters.

**2002-2004**

In 2004, TOTAL's operating income was 16,061 M compared to 12,770 M in 2003 and 10,126 M in 2002. The 3.3 B, or 26%, increase in operating income in 2004 compared to 2003 was mainly due to the positive impacts of higher oil and natural gas prices as well as higher European refining margins, which were partially offset by the weakness in the dollar relative to the euro and the negative impact of a higher level of special items affecting operating income than in 2003<sup>(7)</sup>. In addition, 2004 operating income benefited from the positive impact of ongoing volume growth and continued productivity improvement programs. The 2.6 B, or 26%, increase in operating income in 2003 compared to 2002 was mainly due to the net positive impact of higher oil prices, higher European refining margins, and the negative impact of the weaker dollar. In addition to these market factors, 2003 operating income benefited from the positive impact of ongoing volume growth, productivity improvement and merger synergy benefits resulting from self-help programs which the Company launched in 2000 following completion of the acquisition of control of PetroFina and Elf Aquitaine in order to increase organic growth, synergies and productivity, and from a lower level of special items than in 2002.

TOTAL's net income was 9,612 M in 2004 compared to 7,025 M in 2003 and 5,941 M in 2002. The 37% increase in net income in 2004 compared to 2003 was mainly due to the increase in operating income and to the net positive difference in special items affecting net income, which in 2004 included among other items a gain related to the Sanofi-Aventis merger which more than offset recorded asset impairments. The 18% increase in net income in 2003 compared to 2002 was mainly due to the increase in operating income, partially offset by a net decrease in other income (expense), primarily as a result of lower gains on sales of assets.

(7) Special items are items, which, because of their particular nature or significance, are monitored at the Group level and excluded from the business segment figures. For more information on special items, see Results by Business Segment 2004-2002 below.

(8) Net income under U.S. GAAP was 7,221 M in 2004 compared to 6,103 M in 2003 and 6,264 M in 2002. For all periods presented, the difference in net income under French GAAP and under U.S. GAAP reflected the difference in accounting treatment primarily of crude oil and refined products inventories, derivative instruments and hedging activities, goodwill and purchase accounting with respect to the acquisition of control of Elf Aquitaine and PetroFina. See Note 3 of the Notes to the Consolidated Financial Statements for additional information on these

differences.

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The Company's self-help programs that were launched in 2000 were successfully completed in 2003, with a cumulative hydrocarbon production increase of 23% from 2.07 Mboe/d in 1999 to 2.54 Mboe/d in 2003 and a cumulative 4.8 B positive impact on operating income in the four-year period from 1999 to 2003 from growth and synergies/productivity programs. Having achieved this target, the Group realized a benefit of 0.4 B in 2004 from continuing self-help programs, including productivity efforts in the Downstream and Chemicals segments as well as ongoing production growth in the Upstream segment.

The Company's total expenditures<sup>(9)</sup> were 8,668 M in 2004, 7,728 M in 2003, and 8,657 M in 2002. The 12% increase in expenditures in 2004 includes the value of assets acquired in a swap with Gaz de France. The 11% decline in expenditures in 2003 compared to 2002 mainly reflects the weaker dollar, which is the main currency for oil and gas investments.

In all three years, the main source of funding for expenditures was cash from operating activities.

***Outlook***

Since the beginning of 2005, the oil market environment has remained favorable. Oil prices have remained high and refining margins are still strong despite a retreat from the level of the fourth quarter 2004. The overall environment for Chemicals has remained favorable. However, the dollar has remained relatively weak against the euro.

TOTAL's management measures the Company's performance, makes investment decisions and sets future objectives<sup>(10)</sup>, including for return on average capital employed (ROACE)<sup>(11)</sup> for each segment, with reference to certain assumptions about its future operating environment. In 2005, the Company adjusted certain of these assumptions for its medium-term reference environment, raising the Brent oil price assumption to \$25 per barrel from \$20 per barrel, increasing the assumption for the TRCV indicator it has developed as an indicator of European refining margins to \$15 per ton from \$12 per ton and changing the assumed exchange rate to \$1.25 per euro from \$1.10 per euro.

TOTAL's investment program is projected to amount to \$12 billion in 2005 and \$10 to 11 billion per year over the period from 2006 to 2009, with 70% of the expenditures allocated to the Upstream segment. While the actual amount of future expenditures will depend on a number of factors that cannot currently be foreseen, the Company's planned expenditures in the normal course of business, excluding acquisitions, are expected to be financed from cash flow from operating activities.

The Company will also continue to pursue its policy of disposing of non-core assets. Following the merger of Sanofi-Synthelabo and Aventis in 2004, TOTAL indicated that sales of its Sanofi-Aventis (the merged entity) shares, valued at 10.3 B as of December 31, 2004, are not planned in the short-term.

Strategically, the Company's priority for its Upstream segment is to increase its hydrocarbon production, notably through the development of large projects, while maintaining high profitability. Based on the medium-term reference environment described above, the Company's target is to increase production by an average of 4% per year through 2010 and to maintain the ROACE of the Upstream segment above 20%.

In Downstream, the Company will pursue a strategy of strengthening its positions in Europe, while targeting growth opportunities in Africa and Asia and improving returns through capital discipline and productivity gains. Under the medium-term reference environment described above, the Company's target for the ROACE for the Downstream segment is 15% during the 2007-2009 period, which includes the benefit of self-help programs.

(9) Total expenditures include intangible assets and property, plant and equipment additions; exploration costs directly charged to expenses; acquisitions of subsidiaries, net of cash acquired; investments in equity affiliates and other securities; and increases in long-term loans.

(10) For a discussion of the risks and uncertainties related to these targets and expectations, see Cautionary Statement Concerning Forward-Looking Statements.

(11) For more information on ROACE, see Results by Business Segment 2004-2002.



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In Chemicals, the Company is targeting growth in high potential areas such as Asia while continuing to implement productivity programs. In 2004, TOTAL announced its plan to separate the Chlorochemicals and Intermediates & Performance Polymers activities from the Company. These activities are encompassed in the newly-named Arkema entity, which the Company expects to spin off in 2006<sup>(12)</sup>. Under the medium-term reference environment described above and with petrochemicals at mid-cycle margins, the Company's target is to increase the ROACE of the Chemicals segment to 12% during the 2007-2009 period through a combination of portfolio restructuring and self-help measures.

TOTAL intends to pursue a dynamic dividend policy with a targeted pay-out ratio of 50% over the medium term. Future dividends will, however, depend on the Company's earnings, financial condition and other factors<sup>(13)</sup>. In addition to dividends, the Company expects to continue to buy back its shares using cash flow from operations that are available after paying the dividend and funding the investment program.

**Critical Accounting Policies**

A summary of the Group accounting policies is included in Note 1 of the Notes to the Consolidated Financial Statements. Management believes that the application of these policies on a consistent basis enables the Group to report useful and reliable information about the Group's financial condition and results of operations.

Inherent in the application of many of these accounting policies is the need for management to make estimates and judgments in the determination of certain revenues, expenses, assets and liabilities and in the disclosure of contingent assets and liabilities in conformity with generally accepted accounting principles.

The following summary provides further information about the critical accounting policies, which could have a significant impact for the results of the Group and should be read in conjunction with Note 1 of the Notes to the Consolidated Financial Statements.

Estimates and judgments are used in the Group's oil and gas accounting for reserves, assets and depreciation in application of the successful efforts method, valuation of long-lived assets, environmental remediation and restoration of sites estimations, accounting for pensions and post-retirement benefits and in the context of the computation of income taxes.

The assessment of critical accounting policies below is not meant to be an all-inclusive discussion of the uncertainties of financial results that can occur from the application of the full range of the Company's accounting policies. Materially different financial results could occur in the application of other accounting policies as well. Likewise, materially different results can occur upon the adoption of new accounting standards promulgated by the various rule-making bodies. For a discussion of the Company's change to International Financial Reporting Standards (IFRS) in 2005, see International Financial Reporting Standards below.

***Successful efforts method of oil and gas accounting***

The Group follows the successful efforts method of accounting for its oil and gas activities.

The Group's oil and gas reserves are estimated by the Group's petroleum engineers in accordance with industry standards and SEC regulations. Proved oil and gas reserves are the estimated quantities of crude oil, natural gas and natural gas liquids which geological and engineering data demonstrate with reasonable certainty to be recoverable in future years from known reservoirs under existing economic and operating conditions. Accordingly, these estimates do not include probable or possible reserves. Estimated oil and gas reserves are based on available reservoir data and prices and costs in the accounting period during which the estimate is made and are subject to future revision. The Group reassesses its oil and gas reserves at least once a year on all its properties.

(12) Subject to market conditions and after complying with applicable provisions for notification and consultation with labor representatives.

(13) The payment and amount of dividends are subject to the recommendation of the Board of Directors and resolution by the Company's shareholders at an annual ordinary general shareholders meeting. For more information, see Item 8. Financial Information Dividend Policy .

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Exploration leasehold acquisition costs are capitalized when acquired. During the exploration phase, management exercises judgment on the probability that prospects ultimately would partially or fully fail to find proved oil and gas reserves. Based on this judgmental approach, a leasehold impairment charge may be determined. This position is assessed and adjusted throughout the contractual period of the leasehold based in particular on the results of exploratory activity and the impairment is adjusted prospectively.

When a discovery is made, exploratory drilling costs continue to be capitalized pending determination of whether potentially economic oil and gas reserves have been discovered by the drilling effort. The length of time necessary for this determination depends on the specific technical or economic difficulties in assessing the recoverability of the reserves. If a determination is made that the well did not encounter oil and gas in economically viable quantities, the well costs are expensed and are reported in exploration expense.

Exploratory drilling costs are temporarily capitalized pending determination of whether the well has found proved reserves if both of the following conditions are met:

The well has found a sufficient quantity of reserves to justify, if appropriate, its completion as a producing well, assuming that the required capital expenditure is made; and

Satisfactory progress toward ultimate development of the reserves is being achieved, with the Company making sufficient progress assessing the reserves and the economic and operating viability of the project.

The Company evaluates the progress made on the basis of regular project reviews which take into account the following factors:

First, if additional exploratory drilling or other exploratory activities (such as seismic work or other significant studies) are either underway or firmly planned, the Company deems there to be satisfactory progress. For these purposes, exploratory activities are considered firmly planned only if they are included in the Company's three-year exploration plan/budget. At December 31, 2004, the Company had capitalized 172 M of exploratory drilling costs on this basis.

In cases where exploratory activity has been completed, the evaluation of satisfactory progress takes into account indicators such as the fact that costs for development studies are incurred in the current period, or that governmental or other third-party authorizations are pending or that the availability of capacity on an existing transport or processing facility awaits confirmation. At December 31, 2004, exploratory drilling costs capitalized on this basis amounted to 41 M and mainly related to two projects.

See Note 3 paragraph L(iii) of the Notes to the Consolidated Financial Statements for additional information.

In February 2005, the FASB issued a proposed FASB Staff Position (FSP) to amend FAS No. 19 Financial Accounting and Reporting by Oil and Gas Producing Companies. The proposed FSP provides for continued capitalization of exploratory drilling costs past one year if a company is making sufficient progress on assessing the reserves and the economic and operating viability of the project. The proposed FSP also provides certain disclosure requirements with respect to capitalized exploratory drilling costs.

The Company will monitor the continuing deliberations of the FASB on this matter and the possible implications, if any, of the proposed FSP on the Company's accounting policy with respect to the capitalization of exploratory drilling costs. The Company estimates that if the proposed FSP were adopted, no material change would be required to such accounting policy.

The Company also estimates that, if the proposed FSP were applied retroactively to January 1, 2002, net income would not change in 2004, 2003, or 2002. The Company believes that whether or not the FSP is adopted as proposed would not result in the write-off of any exploratory drilling costs capitalized at December 31, 2004.

The successful efforts method, among other things, requires that the capitalized costs for proved oil and gas properties (which include the costs of drilling successful wells) be amortized on the basis of reserves that are produced in a period as a percentage of the total estimated proved reserves. The impact of changes in estimated proved reserves are dealt with prospectively by amortizing the remaining book value of the asset over the



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expected future production. If proved reserve estimates are revised downward, earnings could be affected by higher depreciation expense or an immediate write-down of the property's book value. Conversely, if the oil and gas quantities were revised upwards, future per-barrel depreciation and depletion expense would be lower.

***Valuation of long-lived assets***

In addition to oil and gas assets that could become impaired under the application of successful efforts accounting, other assets could become impaired and require write-down if circumstances warrant. Conditions that could cause an asset to become impaired include lower-than-forecasted commodity sales prices, changes in the Group's business plans or a significant adverse change in the local or national business climate. The amount of an impairment charge would be based on estimates of an asset's fair value compared with its book value. The fair value usually is based on the present values of expected future cash flows using assumptions commensurate with the risks involved in the asset group. The expected future cash flows used for impairment reviews are based on judgmental assessments of future production volumes, prices and costs, considering available information at the date of review.

***Dismantling, asset retirement obligations and environmental remediation***

When legal and contractual obligations require it, the Group, upon application of FAS No. 143, records provisions for the future decommissioning of production facilities at the end of their economic lives. Management makes judgments and estimates in recording liabilities. Most of these removal obligations are many years in the future and the precise requirements that will have to be met when the removal event actually occurs are uncertain. Asset removal technologies and costs are constantly changing, as well as political, environmental, safety and public expectations.

The Group also makes judgments and estimates in recording costs and establishing provisions for environmental clean-up and remediation costs which are based on current information on costs and expected plans for remediation. For environmental provisions, actual costs can differ from estimates because of changes in laws and regulations, public expectations, discovery and analysis of site conditions and changes in clean-up technology. For more information with respect to the impact of adopting FAS No. 143 see Note 1 paragraph L and Note 16 of the Notes to the Consolidated Financial Statements.

***Pensions and post-retirement benefits***

Accounting for pensions and other post-retirement benefits involves judgments about uncertain events, including estimated retirement dates, salary levels at retirement, mortality rates, rates of return on plan assets, determination of discount rates for measuring plan obligations, health care cost-trend rates and rates of utilization of health care services by retirees. These assumptions are based on the environment in each country. The assumptions used are reviewed at the end of each year and may vary from year-to-year, based on the evolution of the situation, which will affect future results of operations. Any differences between these assumptions and the actual outcome will also impact future results of operations.

The significant assumptions used to account for pensions and other post-retirement benefits are determined as follows:

*Discount and inflation rates* reflect the rates at which the benefits could be effectively settled, taking into account the duration of the obligation. Indications used in selecting the discount rate include rates of annuity contracts and rates of return on high-quality fixed-income investments (such as government bonds). The inflation rates reflect market conditions observed country by country.

*Salary increase assumptions* (when relevant) are determined by each entity. They reflect an estimate of the actual future salary levels of the individual employees involved, including future changes attributed to general price levels (consistent with inflation rate assumptions), productivity, seniority, promotion and other factors.

*Health care cost trend assumptions* (when relevant) reflect an estimate of the actual future changes in the cost of the health care related benefits provided to the plan participants and are based on past and current health

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care cost trends including health care inflation, changes in healthcare utilization, and changes in health status of the participants.

*Demographic assumptions* such as mortality, disability and turnover reflect the best estimate of these future events for the individual employees involved, based principally on available actuarial data.

*Determination of expected rates of return on assets* is made through compound averaging. For each plan, there are taken into account the distribution of investments among bonds, equities and cash and the expected rates of return on bonds, equities and cash. A weighted-average rate is then calculated.

The effect pensions had on results of operations, cash flow and liquidity is fully set out in Note 15 of the Notes to the Consolidated Financial Statements. Net periodic benefit charge in 2004 amounted to 468 M and the Company's contributions to pension plans were 414 M.

Differences between projected and actual costs and between the projected return and the actual return on plan assets routinely occur and are called actuarial gains and losses. Generally, the actuarial gains and losses are amortized and included in the net periodic benefit charge using the straight-line method based on the estimated remaining length of service of the plan participants involved.

The unrecognized actuarial losses of pension benefits as at December 31, 2004 were 1,892 M compared to 1,897 M for 2003. Amortization of unrecognized losses and actuarial gains due to increases in the value of assets were offset by actuarial losses coming from a decrease in discount rates in 2004. As explained above, pension accounting principles require that such actuarial losses be deferred and amortized over future periods, in the Company's case 15 years.

While the Company has not completed its calculations for 2005, it is considering a decreased weighted average return for the year (6.57% compared to the 2004 rate of 6.96%), mainly due to the decrease in discount rates in 2004. The Company does not believe that it will be significantly modifying its discount rate in the near future.

The Company's estimates indicate that a 1% increase or decrease in the expected rate of return on pension plan assets would have caused a 50 M decrease or increase, respectively, in the 2004 net periodic pension cost. The estimated impact on benefit charge of the amortization of the unrecognized actuarial losses of 1,892 M as at December 31, 2004, is 97 M for 2005, compared to 121 M in 2004.

### ***Income tax computation***

The computation of the Group's income tax expense requires the interpretation of complex tax laws and regulations in many taxing jurisdictions around the world, the determination of expected outcomes from pending litigation, and the assessment of audit findings that are performed by numerous taxing authorities. Actual income tax expense may differ from management's estimates.

### **Transition to International Financial Reporting Standards (IFRS)**

With effect from January 1, 2005, the Group has adopted International Financial Reporting Standards (IFRS). The Group will publish its first accounts under IFRS when it releases its first quarter 2005 interim financial statements. TOTAL's annual report for 2005 will be prepared in accordance with IFRS and, for comparative purposes, will also provide financial information for fiscal year 2004. In that respect, the transition date to IFRS has been set at January 1, 2004. Certain summarized financial information on the IFRS transition is presented below.

Given the potential evolution of accounting principles, it is possible that the summarized financial information presented below will be different from that which is ultimately approved by the Board of Directors when they present the 2005 consolidated financial statements. However, based on the information currently available, the Group does not anticipate any significant changes to the summarized financial information presented below.

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The summarized reconciliation of shareholders' equity and net income from French GAAP to IFRS as of January 1, 2004 and for the year ended December 31, 2004, respectively, is as follows:

	Shareholders equity January 1, 2004	Net income 2004
	(billions of euros)	
<b>French GAAP</b>	30.4	9.6
Inventories/replacement cost (note 1)	1.0	0.5
Treasury shares (note 2)	(1.4)	
Employee benefits (note 3)	(0.5)	
Fixed assets		
Component based-approach (note 4.1)	0.2	
Impairment of assets (note 4.2)	(0.3)	(0.1)
Goodwill amortization (note 5.1)		0.2
Financial instruments IAS 39 (note 4.3)	0.1	
Share based payments (note 5.2)		(0.1)
Equity-method affiliates' IFRS restatements (note 5.3)	(0.1)	0.8
Other adjustments (note 4)	(0.2)	
<b>IFRS</b>	29.2	10.9

As of December 31, 2004, shareholders' equity amounted to 31.3 B under French GAAP and 31.6 B under IFRS.

**Information concerning the first-time application of IFRS**

Pursuant to IFRS 1, "First-time application of IFRS", the Group has chosen to apply the following exceptions:

offsetting currency translation adjustment (CTA) against retained earnings,

recording unrecognized net actuarial losses and gains through retained earnings,

non-restatement of business combinations that occurred before January 1, 2004.

**Modifications of the Group's accounting principles**

The principal modifications of the Group's accounting principles will concern the following subjects:

Note 1: Inventories

In accordance with IAS 2, the Group values inventories of petroleum products in the financial statements according to the FIFO (First-In, First-Out) method and other inventories using the weighted-average cost methods.

However, in the note setting forth information by business segment, the Group will continue to present the results of its Downstream segment according to the replacement cost method and those of its Chemicals segment according to the LIFO (Last-In, First-Out) method in order to ensure the comparability of the Group's results with those of its leading competitors.

Note 2: Treasury shares

In application of IAS 32 relating to financial instruments, treasury shares recorded under marketable securities in the financial statements prepared according to French GAAP have been deducted from shareholders' equity.

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### **Note 3: Employee benefits**

The Group has decided to record unrecognized net actuarial losses and gains as of December 31, 2003 through retained earnings in accordance with IFRS 1.

The Group will use the corridor method to amortize its actuarial losses and gains in its IFRS financial statements. This method entails spreading the actuarial losses and gains in excess of 10% of the highest value of funded obligations, or externally-funded plans, over the residual employment term for those still in service.

### **Note 4: Other IFRS restatements**

The other restatements at the transition date are as follows:

#### **Note 4.1: Component-based approach**

Pursuant to IAS 16 concerning tangible assets, the Group applies the component-based approach. The cost of major turnarounds of refineries and large petrochemical units are capitalized and depreciated over the period of time between two major turnarounds.

#### **Note 4.2: Impairment of assets**

IAS 36 provides for the testing of assets for impairment purposes by comparison of the assets' carrying values with the associated discounted future cash flows. The U.S. standard previously applied by the Group (FAS No. 144) provides that the calculation be based on undiscounted cash flows. As of the transition date, this difference in methodology results in the impairment of certain fixed assets, mainly within the Upstream segment.

#### **Note 4.3: Financial instruments (excluding treasury shares)**

The Group's application of IAS 32 and IAS 39 leads to the following restatements:

##### **Publicly-traded equity securities**

Publicly-traded equity securities are classified as 'available for sale' and are therefore valued at fair value. Changes in fair value of these securities are recorded through shareholders' equity.

##### **Derivatives**

Derivatives are now recorded in the balance sheet whereas they were treated as off-balance sheet commitments under French GAAP.

Derivatives (combined interest rate and exchange swap contracts) associated with debenture loans are recognized as hedging instruments. The debenture loans and the hedging derivatives are valued at fair value. Fair value changes offset each other and have no material impact on earnings.

Other derivatives instruments (interest rate and exchange swaps, futures, options) are recorded at fair value, and fair value changes are recognized as income or loss.

#### **Note 4.4: Deferred income taxes**

In application of IAS 12 «Income taxes», the Group records deferred income taxes on temporary differences resulting from the difference between the carrying value of its equity-method investments and the taxable basis of these investments. The deferred tax calculation is based on the expected future tax effect (dividend distribution rate or tax rate on the gain or loss upon sale of these investments).

### **Note 5: IFRS restatements with an impact on net income**

#### **Note 5.1: Amortization of goodwill**

Pursuant to IFRS 3 'Business combinations', goodwill is no longer amortized. Instead, it is tested for impairment annually. The impact on 2004 net income is 0.2 B, due to the cancellation of goodwill amortization.

**Table of Contents****Note 5.2: Share-based payments**

The Group applies IFRS 2 Share-based payments as published by the International Accounting Standards Board (IASB). This standard applies to employee stock-option and share purchase plans and to capital increases reserved for employees retrospectively and not solely the share transactions that were granted after November 7, 2002.

These employee benefits are recognized as expenses with a corresponding credit to shareholders' equity.

The cost of options is valued according to the Black-Scholes model and allocated on a straight line basis between the grant date and vesting date. For employee-reserved capital increases, the cost is immediately recognized as an expense.

**Note 5.3: Equity-method affiliates IFRS restatement**

This restatement primarily relates to the implementation of IFRS in the equity-method affiliates' financial statements, Sanofi-Aventis and Cepsa.

Within the financial statements prepared in compliance with IFRS by Sanofi-Aventis, in-progress research and development costs of Aventis have been capitalized from the date of the merger. According to French GAAP, the research and development costs were directly charged to expense at the time of the Sanofi-Aventis merger. The impact of this restatement is to increase net income by 0.7 billion euros.

**Results by Business Segment 2004-2002**

The tables below set forth the respective contribution of each of TOTAL's business segments to TOTAL's total sales, operating income, total expenditures and ROACE (return on average capital employed), for the years ended December 31, 2004, 2003, and 2002. Due to their particular nature or significance, certain transactions qualified as special items are monitored at the group level and excluded from the business segment figures. Special items affecting operating income include restructuring charges, asset impairment charges, gains or losses on sales of assets and other items. As indicated in Note 4 of the Notes to the Consolidated Financial Statements, the business segment information is presented in accordance with the group internal reporting system and is used by the chief operating decision maker to measure performance and to allocate resources internally. For a discussion of the manner of calculating ROACE, see Note 1 paragraph R (Main accounting and financial indicators information by business segment) of the Notes to the Consolidated Financial Statements.

	Upstream	Downstream	Chemicals	Corporate	Special Items	Total
(in millions of euro)						
<b>2004</b>						
Total sales	21,995(1)	80,640(1)	20,042(1)	23(1)		122,700(2)
Operating Income	12,820(3)	3,217(3)	1,086(3)	(215)(3)	(847)	16,061
Total Expenditures	6,170	1,516	905	77		8,668
<b>2003</b>						
Total sales	18,704(1)	68,658(1)	17,260(1)	30(1)		104,652(2)
Operating Income	10,476(3)	1,970(3)	558(3)	(209)(3)	(25)	12,770
Total Expenditures	5,302	1,235	1,115	76		7,728
<b>2002</b>						
Total Sales	16,225(1)	66,984(1)	19,317(1)	14(1)		102,540(2)
Operating Income	9,309(3)	909(3)	777(3)	(210)(3)	(659)	10,126
Total Expenditures	6,122	1,112	1,237	186		8,657

(1) Total segment sales excluding sales to other segments.

(2) Total sales excluding intersegment sales.



(3) Adjusted for special items.

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<b>ROACE</b>	<b>Upstream</b>	<b>Downstream</b>	<b>Chemicals</b>
2004	35%	25%	8.5%(1)
2003.	29%	15%	4%(1)
2002.	23%	8%	5%(1)

(1) Excluding amortization of goodwill in the Chemicals segment for amounts of 85 M in 2004, 107 M in 2003, and 131 M in 2002.

**Special Items Affecting Operating Income**

In 2004, special items (comprised mainly of asset impairments in the European vinyl products and polyethylene activities of the Chemicals segment as well as a provision for environmental remediation, also in the Chemicals segment) had a negative impact of 847 M on operating income. There was no significant impact from special items on operating income in 2003. In 2002, special items (comprised mainly of impairments of Argentine gas and power assets and LPG marketing activities) had a negative impact on operating income of 659 M. For further information on the special items affecting operating income, and for a reconciliation of segment figures to figures reported in the Company's audited consolidated financial statements, see Note 4 of the Notes to the Consolidated Financial Statements. For further information on the impairment charges, including facts and circumstances giving rise to certain of them, see Note 3 paragraph L(iv) of the Notes to the Consolidated Financial Statements.

**Special Items Affecting Net Income**

In 2004, the Group's consolidated net income includes special items that had a net positive impact of 726 M. The 2004 special items affecting net income were comprised primarily of a 1,690 M gain related to the impact of the Sanofi-Aventis merger on our holdings in that company and 688 M of asset impairments, primarily in the Chemicals segment. In 2003, special items had a net negative impact of 319 M, comprised primarily of restructuring charges and early retirement plans of 144 M plus an allowance of 155 M for litigation reserves in the Chemicals segment, following investigations of the European Commission into alleged anticompetitive practices. Special items had a net negative effect of 319 M in 2002, comprised primarily of gains on asset sales (notably shares of Sanofi-Synthelabo), impairments of Argentine gas and power assets and LPG marketing activities, and recognition of the impact on deferred taxes from a change in the UK tax law affecting oil companies. For further information on the special items affecting net income, and on reconciling segment figures to figures reported in the Company's audited consolidated financial statements, see Note 4 of the Notes to the Consolidated Financial Statements.

**Company Results 2004 vs. 2003****Group Results**

The 2004 oil market environment was more favorable than in 2003. The average Brent oil price increased by 33% to \$38.3 per barrel in 2004 from \$28.8 per barrel in 2003 and the European refining margins indicator used by TOTAL's management (TRCV) rose sharply to \$32.8 per ton from \$20.9 per ton in 2003. Despite the weakness in the dollar, the overall environment for Chemicals activities improved, with petrochemicals margins rebounding to above mid-cycle levels by year-end. The weakening of the dollar by 9% in 2004 relative to the euro, with the average exchange rate increasing to 1.24 from 1.13 in 2003, negatively affected the Company's euro-denominated results in all business segments, as most of the Company's sales, particularly crude oil, are denominated in dollars.

TOTAL's sales increased by 18.0 B, or 17%, to 122,700 M in 2004 from 104,652 M in 2003.

Operating income increased to 16,061 M in 2004 from 12,770 M in 2003.

The 3.3 B, or 26%, increase in operating income reflects the positive impact of higher hydrocarbon prices (+3.1 B), stronger refining environment (+1.5 B), improved market conditions for Chemicals (+0.3 B) and shipping (+0.1 B) activities, and productivity improvements in the Downstream and Chemicals segments (+0.3 B), all of which were partially offset by the negative impact of a weaker dollar (-1.1 B) and of less



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favorable market conditions for marketing activities (-0.2 B ) as well as a larger negative impact from special items than in 2003 (-0.8 B ).

TOTAL's net income was 9,612 M in 2004 compared with 7,025 M in 2003. The 37% increase in net income in 2004 compared to 2003 was mainly due to the increase in operating income and a higher positive impact from special items than in 2003, primarily due to a gain related to our holdings in Sanofi-Aventis pursuant to the merger of Sanofi-Synthelabo with Aventis, which more than offset asset impairments and provisions, primarily in the Chemicals segment.

***Upstream***

Upstream segment sales (excluding sales to other segments) were 21,995 M in 2004 compared to 18,704 M in 2003, reflecting the positive impact of higher hydrocarbon prices and the increase in production volumes, all of which were only partially offset by the decline in the dollar relative to the euro.

Operating income from the Upstream segment adjusted for special items increased by 22% to 12,820 M in 2004. The benefit from higher hydrocarbon prices and production growth was partially offset by the decrease in the dollar relative to the euro and higher technical costs.

Upstream ROACE was 35% in 2004 compared to 29% in 2003, reflecting primarily the increase in operating income.

Oil and gas production rose by 1.8% to 2,585 kboe/d in 2004 from 2,539 kboe/d in 2003. Adjusted for the negative impact of higher oil and gas prices on entitlement volumes from production sharing and buy-back contracts, the underlying increase in production was 3.7%. Liquids production increased by 2% in 2004 mainly due to the contribution of Amenam in Nigeria and Matterhorn in the United States. Gas production increased by 2% in 2004, mainly due to the Company's fields in the North Sea and South America. In 2004, the Upstream segment's liquids production represented 66% of its production on an oil equivalent basis and gas represented 34% of production. The Upstream segment's combined proved reserves of oil and gas decreased by 2% to 11.1 Bboe at December 31, 2004 from 11.4 Bboe at December 31, 2003, including the negative impact of the higher year-end 2004 price on the calculation of proved reserves. See Item 4. Information on the Company Business Overview Upstream Reserves Proved Reserves for a table showing changes in proved reserves by year and Supplemental Oil and Gas Information (Unaudited) contained elsewhere herein for additional information on proved reserves, including tables showing changes in proved reserves by region.

Total capital expenditures of the Upstream segment increased by 16% to 6,170 M in 2004 from 5,302 M in 2003. Total 2004 expenditures include the value of assets acquired in a swap with Gaz de France. In 2004, capital expenditures were made mainly in France, Angola, Nigeria, Norway, Kazakhstan, the United States and Venezuela, whereas in 2003, capital expenditures were made mainly in Angola, Kazakhstan, Nigeria, Norway, the United States and Venezuela.

Strategically, the Company plans to increase the contribution of the Upstream segment to its overall activities. The Company's priority is to increase its hydrocarbon production, notably through the development of large projects, including conventional oil and gas, midstream gas, LNG, and enhanced recovery projects, while maintaining high profitability by stabilizing average unit costs.

***Downstream***

Downstream segment sales (excluding sales to other segments) increased to 80,640 M in 2004 compared to 68,658 M in 2003. Refinery throughput increased by 1% to 2,496 kb/d in 2004 from 2,481 kb/d in 2003 and the refinery utilization rate rose to 93% in 2004 from 92% in 2003.

(14) Net income under U.S. GAAP was 7,221 M in 2004 compared to 6,103 M in 2003 and 6,264 M in 2002. For all periods presented, the difference in net income under French GAAP and under U.S. GAAP reflected the difference in accounting treatment primarily of crude oil and refined products inventories, derivative instruments and hedging activities, goodwill and purchase accounting with respect to the acquisition of control of Elf Aquitaine and PetroFina. See Note 3 of the Notes to the Consolidated Financial Statements for additional information on these differences.



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Downstream segment operating income adjusted for special items increased to 3,217 M in 2004 from 1,970 M in 2003. This 63% increase was mainly due to the sharp rebound in European refining margins, which averaged \$32.8/ton in 2004 compared to \$20.9/ton, and the approximately 150 M positive impact of self-help programs, all of which were only partially offset by the negative impact of the decline in the dollar relative to the euro and by weaker marketing margins in Europe.

Downstream ROACE was 25% in 2004 compared to 15% in 2003 reflecting primarily the increase in operating income.

Total capital expenditures by the Downstream segment were 1,516 M in 2004, mainly in Europe and the Caribbean region compared to 1,235 M in 2003, mainly in Europe and Africa. TOTAL plans to pursue its strategy of strengthening its positions in Europe and Africa and selectively growing in Asia while improving returns through capital discipline and productivity gains.

***Chemicals***

Chemicals segment sales (excluding sales to other segments) increased by 16% to 20,042 M in 2004 from 17,260 M in 2003, primarily in response to an overall improved market environment for Chemicals. Despite weakness in the dollar relative to the euro, market demand improved to a point where higher costs could be passed along to consumers.

Operating income adjusted for special items nearly doubled to 1,086 M in 2004 from 558 M in 2003. Approximately 200 M of this increase was due to the combined impact of a 12% increase in olefin production and the positive impact of self-help programs. This increase also reflected the impact of the overall improved market environment for Chemicals, notably the rebound in petrochemicals margins to above mid-cycle levels by year-end, which more than offset the weakness in the dollar.

Chemicals ROACE was 8.5% in 2004 compared to 4% in 2003 reflecting primarily the increase in operating income.

Total capital expenditures by the Chemicals segment decreased to 905 M in 2004 from 1,115 M in 2003. Capital expenditures in both years were made mainly in Europe, in the United States and in Asia.

In the Chemicals segment, the Company is targeting growth in high potential areas such as Asia while continuing to implement productivity programs. The Company has announced a strategic reorganization that involves spinning off an entity, recently named Arkema, which includes the Chlorochemicals and Intermediates & Performance Polymers activities. Subject to market conditions and completion of the applicable notification and consultation process with labor representatives, the Company plans to spin Arkema off in 2006.

**Company Results 2003 vs. 2002*****Group Results***

The 2003 oil market environment was more favorable than in 2002. The Brent oil price increased by 15% to \$28.8 per barrel in 2003 from \$25.0 per barrel in 2002 and the European refining margin (TRCV) increased strongly to \$20.9 per ton from \$8.0 per ton in 2002. On the other hand, the overall environment for Chemicals was more difficult than in 2002 due to the persistent unfavorable economic context and resulting weak demand in Europe and the weak dollar. The weakening of the dollar by 16% in 2003 relative to the euro, with the average exchange rate increasing to 1.13 from 0.95 in 2002, negatively affected the Company's euro-denominated results in all business segments, as most of the Company's sales, particularly crude oil, are denominated in dollars.

TOTAL's sales increased by 2.1 B, or 2%, to 104,652 M in 2003 from 102,540 M in 2002.

Operating income increased to 12,770 M in 2003 from 10,126 M in 2002.

The 2.6 B, or 26%, increase in operating income reflects the positive impact of higher hydrocarbon prices (+1.9 B), higher refining margins (+1.3 B), ongoing volume growth (+0.6 B), productivity improvement and merger synergy benefits (+0.5 B), a lower level of refinery turnaround operations (temporary shutdowns of refinery facilities for maintenance, overhaul and upgrading) (+0.2 B), and a lower level of special items

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(+0.6 B ), all of which were partially offset by the negative impact of the weaker dollar (-2.0 B ), a weaker chemical environment (-0.4 B ), and changes in the Chemicals segment portfolio (-0.1 B ).

TOTAL's net income was 7,025 M in 2003 compared to 5,941 M in 2002. The 18% increase in net income in 2003 compared to 2002 was mainly due to the increase in operating income, partially offset by a net decrease in other income (expense), primarily as a result of lower gains on sales of assets.

***Upstream***

Upstream segment sales (excluding sales to other segments) were 18,704 M in 2003 compared to 16,225 M in 2002, reflecting the positive impact of increased hydrocarbon prices and the 5% increase in production volumes, partially offset by the weaker dollar compared to the euro.

Operating income adjusted for special items increased to 10,476 M in 2003 compared to operating income adjusted for special items of 9,309 M in 2002. This 13% increase was mainly due to the positive effects of production growth and higher hydrocarbon prices, partially offset by the negative impact of the weaker dollar against the euro.

Upstream ROACE was 29% in 2003 compared to 23% in 2002, reflecting primarily the increase in operating income.

Oil and gas production rose by 5% to 2,539 kboe/d in 2003 from 2,416 kboe/d in 2002. Liquids production increased by 5% in 2003 due to the contribution of Sincor in Venezuela, Cepsa's production in Algeria, Balal and South Pars in Iran, and Amenam in Nigeria. Gas production increased by 6% in 2003, mainly due to the Company's fields in the Gulf of Mexico, Indonesia and the North Sea. In 2003, the Upstream segment's liquids production represented 65% of its production on an oil equivalent basis and gas represented 35% of production. The Upstream segment's combined proved reserves of oil and gas increased by 2% to 11.4 Bboe at December 31, 2003 from 11.2 Bboe at December 31, 2002. See Item 4. Information on the Company Business Overview Upstream Reserves Proved Reserves for a table showing changes in proved reserves by year and Supplemental Oil and Gas Information (Unaudited) contained elsewhere herein for additional information on proved reserves, including tables showing changes in proved reserves by region.

Total capital expenditures of the Upstream segment decreased to 5,302 M in 2003 from 6,122 M in 2002. This 13% decline in total capital expenditures primarily reflects the weakness of the dollar, which is the dominant currency for oil and gas investments. In 2003, capital expenditures were made mainly in Angola, Kazakhstan, Nigeria, Norway, the United States and Venezuela, whereas in 2002, capital expenditures were made mainly in Angola, Iran, Kazakhstan, Nigeria, Norway, the United Kingdom, the United States and Venezuela.

***Downstream***

Downstream segment sales (excluding sales to other segments) increased to 68,658 M in 2003 from 66,984 M in 2002. Refinery throughput increased by 6% to 2,481 kb/d in 2003 compared to 2,349 kb/d in 2002 and the refinery utilization rate rose to 92% in 2003 from 88% in 2002. Refined product sales were 3,652 kb/d in 2003 compared to 3,380 kb/d in 2002 (after correcting a reporting disparity related to sales in France).

Downstream segment operating income adjusted for special items increased to 1,970 M in 2003 from 909 M in 2002. This 117% increase was mainly due to the sharp rebound in European refining margins, averaging \$20.9/ton in 2003 compared to \$8.0/ton in 2002, and steady marketing margins in Europe combined with the positive impact of self-help programs, only partially offset by the negative impact of the depreciation of the dollar relative to the euro.

(15) Net income under U.S. GAAP decreased to 6,103 M in 2003 from 6,264 M in 2002. The difference in net income under French GAAP and under U.S. GAAP reflected the difference in accounting treatment primarily of crude oil and refined products inventories, derivative instruments and hedging activities, goodwill and purchase accounting with respect to the acquisition of control of Elf Aquitaine and PetroFina. See Note 3 of the Notes to the Consolidated Financial Statements for additional information on these differences.

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Downstream ROACE was 15% in 2003 compared to 8% in 2002 reflecting primarily the increase in operating income.

Total expenditures by the Downstream segment were 1,235 M in 2003, mainly in Europe and Africa, compared to 1,112 M in 2002, mainly in Europe and Africa. TOTAL will pursue the strategy of strengthening its positions in Europe and Africa and selectively growing in Asia while improving returns through capital discipline and productivity gains.

***Chemicals***

Chemicals segment sales (excluding sales to other segments) decreased by 11% to 17,260 M in 2003 from 19,317 M in 2002, primarily as a result of the divestment in February 2003 of the SigmaKalon paints business and the weaker dollar. Excluding sales of the paints business in both years, sales would have decreased by 2% in 2003 compared to 2002.

Operating income adjusted for special items decreased to 558 M in 2003 from 777 M in 2002. This 28% decrease reflects the impact of the disposal of the paints business and the impact of the more difficult overall market environment for Chemicals in 2003, which was only partially offset by the positive impact of productivity programs. Within the Chemicals segment, operating income for the Base Chemicals & Polymers sector was negatively affected in 2003 by the persistently very low petrochemical margins in Europe (which only temporarily rebounded in the second quarter), but nevertheless increased due to a significant productivity increase. Operating income in the Intermediates sector was affected by an unfavorable general economic environment and the weak dollar resulting in lower demand, while the Specialties sector showed good resistance despite the weaker dollar.

Chemicals ROACE was 4% in 2003 compared to 5% in 2002 reflecting primarily the decrease in operating income.

Total capital expenditures by the Chemicals segment decreased to 1,115 M in 2003 from 1,237 M in 2002. Capital expenditures in both years were made mainly in Europe, in the United States and in Asia. In 2003, TOTAL entered into a joint venture involving petrochemical assets in South Korea. With the sale of the SigmaKalon paints business in February 2003, the Company achieved its divestment target of 1.5 B for the 2000-2003 divestiture program.

**Liquidity and Capital Resources**

TOTAL's cash requirements for working capital, share buy-backs, capital expenditures and acquisitions over the past three years were financed primarily by a combination of funds generated from operations, borrowings and divestments of non-core assets. The Company continually monitors the balance between cash flow from operating activities and net expenditures. In the Company's opinion, its working capital is sufficient for its present requirements.

The largest part (approximately 90%) of TOTAL's capital expenditures are made up of additions to intangible assets and property, plant and equipment, with the remainder attributable to investments in financial assets. In the Upstream segment, as described in more detail under Supplemental Oil and Gas Information Costs incurred, capital expenditures are principally (approximately 80%) development costs (mainly for construction of new production facilities), exploration expenditures (successful or unsuccessful, approximately 12%) and acquisitions of proved and unproved properties. In the Downstream segment, about 40% of capital expenditures are related to refining activities (essentially 50% for upgrading units and 50% for new construction), the balance being used in marketing/retail activities and for information systems. In the Chemicals segment, capital expenditures relate to all activities, and are evenly split between upgrading units and new construction.

For detailed information on expenditures by business segment, please refer to the discussion of Company Results for each segment above.

TOTAL's capital expenditures amounted to 8,668 M, 7,728 M, and 8,657 M in 2004, 2003, and 2002, respectively. Such expenditures represented an increase of 12% in 2004 from 2003 and a decrease of 11% in



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2003 from 2002. During 2004, 71% of the expenditures were made by the Upstream segment, 18% by the Downstream segment, 10% by the Chemicals segment and 1% by Corporate. During 2003, 69% of the expenditures were made by the Upstream segment, 16% by the Downstream segment and 14% by the Chemicals segment. During 2002, 71% of the expenditures were made by the Upstream segment, 13% by the Downstream segment, 14% by the Chemicals segment and 2% by Corporate. The main source of funding for such expenditures has been cash from operating activities.

Cash flow from operating activities was 14,429 M in 2004 compared to 12,487 M in 2003 and 11,006 M in 2002. TOTAL's long-term debt amounted to 9,734 M at year-end 2004, 9,783 M at year-end 2003, and 10,157 M at year-end 2002. For further information on the Company's level of borrowing and the type of financial instruments, including maturity profile of debt and currency and interest rate structure, see Note 17 of the Notes to the Consolidated Financial Statements included in this Annual Report. For further information on the Company's treasury policies, including the use of instruments for hedging purposes and the currencies in which cash and cash equivalents are held, see Item 11. Quantitative and Qualitative Disclosures about Market Risk. Total divestitures, based on selling price and net of cash sold, were 1,192 M in 2004 (including the value of assets transferred to Gaz de France in a swap), 1,878 M in 2003 (including the sale of the SigmaKalon paints business in early 2003), and 2,313 M in 2002.

Proceeds from assets sales amounted to 633 M, 533 M, and 1,636 M in 2004, 2003 and 2002, respectively. In 2004, TOTAL sold certain financial assets and certain non-strategic assets in the Upstream, Downstream and Chemicals segments. In 2003 and 2002, TOTAL sold certain financial assets, including a portion of its shares in Sanofi-Synthelabo and certain non-strategic assets in the Upstream, Downstream and Chemicals segments.

Shareholders' equity increased by 854 M in 2004, decreased by 1,740 M in 2003 and decreased by 1,786 M during 2002. Changes to shareholders' equity in 2004, 2003 and 2002 were due primarily to the addition of net income, offset by the cancellation of treasury shares, the payment of the annual dividend and translation adjustments. During 2004, TOTAL repurchased 22.55 million of its own shares for approximately 3.6 B. During 2003, TOTAL repurchased 31.23 million of its own shares for approximately 4.0 B. During 2002, TOTAL repurchased 24.03 million of its own shares for approximately 3.4 B.

As of December 31, 2004, TOTAL's net-debt-to-equity ratio, which is the sum of its short term borrowings and bank overdrafts and its long-term debt, net of cash and cash equivalents and short-term investments, divided by the sum of shareholders' equity, redeemable preferred shares issued by consolidated subsidiaries and minority interest after expected dividends, was 27% compared to 26% at year-end 2003 and 29% at year-end 2002. Over the 2004-2002 period, TOTAL used its net cash flow (cash flow from operating activities less total expenditures plus total divestitures) to maintain this ratio in its target range of 25-30% primarily by managing net debt (financial short-term debt plus long-term debt less cash and cash equivalents), while higher net income increased shareholders' equity and repurchases and cancellations of shares decreased shareholders' equity. As of December 31, 2004, TOTAL S.A. had \$7,001 million of long-term confirmed lines of credit, of which \$6,956 million were unused.

In 2005, the Company expects to use net cash flow after dividends to maintain its net debt-to-equity ratio in the range of 25 to 30% and to continue to repurchase shares of the Company depending on the market environment and the level of divestments. The adoption of IFRS had the effect of increasing the net-debt-to-equity ratio as of December 31, 2004 from 27% to 31%.

**Off-Balance Sheet Arrangements**

Neither TOTAL S.A. nor any other members of the Group has any off-balance sheet arrangements that currently have or are reasonably likely to have a material future effect on the Group's financial condition, changes in financial condition, revenues or expenses, results of operation, liquidity, capital expenditure or capital resources. See Note 24 of the Notes to the Consolidated Financial Statements for information on the Company's commitments and contingencies.

**Table of Contents****Contractual Obligations**

	Payment due by period				Total
	Less than 1 year	1-3 years	3-5 years	More than 5 years	
(in millions of euros)					
Long-term debt obligations(1)		2,578	3,919	2,912	9,409
Short-term debt obligations(2)	1,765				1,765
Capital (finance) lease obligations(3)	52	91	85	231	459
Asset retirement obligations(4)	166	260	214	2,694	3,334
Operating lease obligations	203	285	173	327	988
Purchase obligations(5)	1,077	1,346	1,239	3,861	7,523
<b>Total</b>	<b>3,263</b>	<b>4,560</b>	<b>5,630</b>	<b>10,025</b>	<b>23,478</b>

(1) Long-term debt obligations excluding capital lease obligations of 325 M .

(2) The current portion of long-term debt of 1,765 M is included in the item Short-term borrowings and bank overdrafts of the balance sheet and excludes the short-term portion of capital lease obligations of 30 M .

(3) Capital (finance) lease obligations & Operating lease obligations: the Group leases real estate, service stations, ships, and other equipment through non-cancelable capital and operating leases. These amounts represent the future minimum lease payments on non-cancelable leases to which the Group is committed as of December 31, 2004.

(4) The discounted present value of upstream asset retirement obligations, primarily asset removal costs at the completion date.

(5) Purchase obligations are obligations under contractual agreements to purchase goods or services, including capital projects, that are enforceable and legally binding on the company, and that specify all significant terms, including the amount and the timing of the payments. These obligations include mainly: hydrocarbon unconditional purchase contracts (except where an active, highly-liquid market exists and which are expected to be re-sold shortly after purchase), booking of transport capacities in pipelines, unconditional exploration works and development works in Upstream, and contracts for capital investment projects in Downstream. This disclosure does not include contractual exploration obligations with host states where a monetary value is not attributed, purchases of booking capacities in pipelines where the Group has a participation superior to the capacity used, and purchase obligation commitments on fields where the Group is not the operator.

The Group has other obligations in connection with pension plans, detailed in Note 15 of the Notes to the Consolidated Financial Statements. As these obligations are not contractually fixed as to timing and amount, they have not been included in this disclosure.

Other long-term liabilities, detailed in Note 16 of the Notes to the Consolidated Financial Statements, are liabilities related to risks that are probable and amounts that can be reasonably estimated. However, no contractual agreements exist related to the settlement of such liabilities, and the timing of the settlement is not known.

**Research and Development**

The Group strategy for research and development is focused on its three business segments, principally in the following areas:

Exploration and Production technology to allow access, at acceptable costs, to new energy resources (high pressure/high temperature, deep offshore, heavy crude oils, polyphasic transportation of acidic gas) as well as environment-friendly technologies such as reduction of greenhouse gas emissions, containment of acidic gas emissions and efficient use of water in the upstream industrial process.

Refining technology to allow the identification, anticipation and the reduction of constraints linked to the operation of facilities, the evolution of specifications and the control of environmental emissions, and marketing technology allowing the creation of innovative products representing sales opportunities.

Chemical processes to increase competitiveness, quality, safety and respect of the environment, in particular on the following themes: new catalysis technology, new polymerization technologies, new products (polymers, elastomers, anti-vibrating systems, new coatings) as well as nano-technology.

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Research and development costs amounted to 635 M in 2004, 667 M in 2003 and 662 M in 2002, corresponding to 0.5% of the total sales of the last three years.

In 2004, 5,257 employees were dedicated to these research and development activities.

**ITEM 6. DIRECTORS, SENIOR MANAGEMENT AND EMPLOYEES**

In accordance with French law governing a *société anonyme*, the Company's affairs are managed by its Board of Directors and by its Chairman, President and Chief Executive Officer, who has full executive authority to manage the affairs of the Company.

**DIRECTORS AND SENIOR MANAGEMENT****Board of Directors**

As of March 31, 2005, the Company's Board of Directors was comprised of 15 members. The Company's *statuts* provide that the number of members of TOTAL's Board of Directors may be within an unspecified range permitted by French law. French law was amended in May 2001 to reduce the maximum number of directors from 24 to 18. The members are elected by the shareholders of the Company entitled to vote at ordinary general shareholders meetings.

The Company's *statuts* currently provide that each director elected by the shareholders may serve for a term not to exceed three years. In addition to reviewing and monitoring the Company's business, the powers generally held by the Board of Directors include the preparation of the Company's year-end accounts, the presentation of the accounts to the shareholders and the convening of shareholders meetings. Under French law, directors may be held liable, either individually or jointly with other directors, for their actions if these actions are contrary to the interests of the company.

The independence of the members of the Board of Directors is reviewed every year by the Board itself, with the most recent review having occurred on February 16, 2005. Upon the proposal of the Nominating & Compensation Committee, and in conformity with the 2002 AFEP-MEDEF Report on corporate governance published in France, the criteria that the Board has adopted for evaluating the independence of its members is the absence of any material relationship with the Company, the Group or its management which could compromise the independent judgment of a Director. In its evaluation, the Board examines the specific criteria listed in the above mentioned report. The Board considers that the current or past relationships existing between the Company and certain of its Directors were not of the nature that they would affect the independent judgment of those Directors. The Board of Directors considers that, with the exception of Mr. Desmarest and Mr. Boeuf, all of the directors of the Company are independent.

The table below sets forth, as of March 31, 2005 the name, year of initial appointment, year of expiration of term, age, principal business activities outside of the Company, and number of shares owned of each director of the Company.

Name	Director Since	Term Expires	Age	Principal Business Activities Outside of the Company	Number of Shares Owned
Thierry Desmarest, Chairman	1995	2007	59	Chairman and Chief Executive Officer of TOTAL S.A.(5)(6). Director of Sanofi-Aventis(5)(6) (pharmaceuticals). Member of the Supervisory Board of Air Liquide(5) (industrial and medical gases and related services) and of Areva(5) (nuclear power). Chairman and Chief Executive Officer of Elf Aquitaine.	58,300

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<b>Name</b>	<b>Director Since</b>	<b>Term Expires</b>	<b>Age</b>	<b>Principal Business Activities Outside of the Company</b>	<b>Number of Shares Owned</b>
Daniel Boeuf	2004	2007	56	Director of Training and Skills Management, Specialties sector, TOTAL France. Chairman of the Supervisory Board of the Total Actionnariat France employee investment fund.	1,223(7)
Daniel Bouton(1)	1997	2006	54	Chairman and Chief Executive Officer of Société Générale(5) (retail, corporate and investment bank). Director of Schneider Electric S.A.(5) (electrical distribution, industrial control and automation), of Arcelor(5) (steel production, distribution, transformation and trading), and of Veolia Environnement(5)(6) (environmental services).	800
Bertrand Collomb	2000	2006	62	Chairman of the Board of Lafarge(5)(6) (construction materials). Director of Vivendi Universal(5)(6) (media and telecommunications) and of Unilever (5)(6) (foods, home care and personal care).	1,178

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<b>Name</b>	<b>Director Since</b>	<b>Term Expires</b>	<b>Age</b>	<b>Principal Business Activities Outside of the Company</b>	<b>Number of Shares Owned</b>
Paul Desmarais Jr.(2)	2002	2005	50	Chairman of the Board and Co-chief Executive Officer of Power Corporation of Canada(6) (management and holding company, financial services and communications sectors). Vice-Chairman and Acting Managing Director of Pargesa Holding (holding company, media, energy, water, waste services and specialty minerals sectors). Vice-Chairman of the Supervisory Board of Imerys(5) (minerals processing). Member of the Board of Directors and of the Management Committee of Great West(6) (Canada) (financial services holding company, life and health insurance, investment and retirement savings and reinsurance businesses), of Groupe Bruxelles Lambert(5) (Belgium) (holding company, industrial companies of diversified sectors), and of the London Insurance Group Inc. (insurance). Director of Suez(5)(6) (energy, environment, water and waste services).	500
Jacques Friedmann(3)	2000	2006	72	Director of BNP Paribas(5) (retail, corporate and investment banking) and of LVMH(5) (luxury goods).	1,519
Bertrand Jacquillat	1996	2005	60	University Professor. Co-founder and Chairman and Chief Executive Officer of Associés en Finance (financial analysis and valuation). Member of the Supervisory Board of Klépierre(5) (commercial real estate management).	900
Antoine Jeancourt-Galignani	1994	2006	68	Former Chairman of Assurances Générales de France(5) (insurance). Chairman of the Board of Gecina(5) (real estate) and of the Supervisory Board of Euro Disney SCA(5) (operator of Disneyland Resort Paris). Director of Société Générale(5) (retail, corporate and investment banking) and of Kaufman & Broad(5) (residential and commercial development and	1,085



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<b>Name</b>	<b>Director Since</b>	<b>Term Expires</b>	<b>Age</b>	<b>Principal Business Activities Outside of the Company</b>	<b>Number of Shares Owned</b>
Anne Lauvergeon(4)	2000	2006	45	Chairman of the Management Board of Areva(5) (nuclear power and connectors). Director of Suez(5)(6) (energy, environment, water and waste services). Vice-Chairman of the Supervisory Board of Sagem(5) (communications).	500
Maurice Lippens	2003	2005	61	Chairman of Fortis(5) (banking, insurance and investment services). Director of Suez-Tractebel (energy and power), of Groupe Bruxelles Lambert(5) (holding company for industrial companies in diversified sectors) and of Belgacom(5) (telecommunications).	800
Michel Pébereau(3)	2000	2006	62	Chairman of BNP Paribas(5) (retail, corporate and investment banking). Director of Lafarge(5)(6) (construction materials) and of Saint-Gobain(5) (producer, processor and distributor of materials). Member of the Supervisory Board of AXA(5)(6) (insurance, asset management and financial services). President of the European Banking Federation (professional organization).	589
Thierry de Rudder(2)	1999	2007	55	Acting Managing Director of Groupe Bruxelles Lambert(5) (holding company for industrial companies in diversified sectors). Director of Suez (energy, environment, water, waste services and power). Member of the Supervisory Board of Imerys(5) (minerals processing).	989
Jürgen Sarrazin	2000	2006	69	Former Chairman of the Management Board of Dresdner Bank (commercial and investment banking).	1,477
Serge Tchuruk	1989	2007	67	Chairman and Chief Executive Officer of Alcatel(5)(6) (communications). Director of Thales(5) (defense, aerospace and information technology).	24,574



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<b>Name</b>	<b>Director Since</b>	<b>Term Expires</b>	<b>Age</b>	<b>Principal Business Activities Outside of the Company</b>	<b>Number of Shares Owned</b>
Pierre Vaillaud	2000	2006	70	Former Chairman and Chief Executive Officer of Elf Aquitaine and of Technip. Director of Technip(5)(6) (engineering, technological and construction services in the oil and gas and petrochemical sectors). Member of the Supervisory Board of Cegelec (energy and electrical power, automation, instrumentation and control systems, information and communication technologies) and of Oddo Pinatton (independent brokerage company).	500

- (1) Mr. Bouton is Chairman and Chief Executive Officer of Société Générale, which, to the Company's knowledge, owns 0.1% of the Company's shares and 0.1% of the voting rights. Mr. Bouton disclaims beneficial ownership of such shares.
- (2) Messrs. de Rudder and Desmarais Jr are Managing Director and Director, respectively, of Bruxelles Lambert Group (Belgium), which, to the Company's knowledge, owns 3.7% of the Company's shares and 6.9% of the voting rights. Messrs. de Rudder and Desmarais Jr disclaim beneficial ownership of such shares.
- (3) Messrs. Pébereau and Friedmann are Chairman and Chief Executive Officer, and Director, respectively, of BNP Paribas, which, to the Company's knowledge, owns 0.2% of the Company's shares and 0.4% of the voting rights. Messrs. Pébereau and Friedmann disclaim beneficial ownership of such shares.
- (4) Ms. Lauvergeon is Chairman of the Managing Board of Areva, which, to the Company's knowledge, owns 0.3% of the Company's shares and 0.6% of the voting rights. Ms. Lauvergeon disclaims beneficial ownership of such shares.
- (5) Listed on Euronext.
- (6) Listed on the New York Stock Exchange.
- (7) Corresponding to 1,220 shares of the TOTAL Actionnariat France employee investment fund, each of which corresponds to approximately one TOTAL share.

**Executive Officers**

Pursuant to the Company's *statuts*, general management of the Company is performed under the responsibility of either the Chairman of the Board of Directors (*Président du Conseil d'Administration*), or by another person appointed by the Board of Directors and bearing the title President and Chief Executive Officer (*Directeur Général*). The Board of Directors selects one of these methods of exercising general management and once the determination is made, it remains in effect until a contrary decision is made. Acting on a proposal of the Nominating & Compensation

Committee, on May 14, 2004 the Board of Directors resolved to continue to entrust the general management of the Company to the Chairman of the Board. This decision has not been modified.

Under French law, the President has full executive authority to manage the affairs of the Company. Pursuant to the Company's *statuts*, he or she has broad powers to act on behalf of the Company and to represent the Company in dealings with third parties, subject only to those powers expressly reserved to the Board of Directors or the shareholders. The President determines, and is responsible for the implementation of, the goals, strategies and budgets for the Company's different businesses, which are reviewed and monitored by the Board of Directors.

When general management of the Company is assumed by the Chairman, the legal, regulatory or statutory provisions relative to the President are applicable to him or her, and he or she takes the title of Chairman of the Board, President and Chief Executive Officer (*Président-directeur général*). When the Board of Directors determines the separate functions of Chairman of the Board of Directors and President-Chief Executive Officer of the Company, the Board appoints a President-Chief Executive Officer, who need not be a member of the Board of

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Directors, sets the term for his or her appointment, and the degree of his or her powers. Neither the Chairman nor the President-Chief Executive Officer may continue in office beyond his or her sixty-fifth birthday.

The Board of Directors is authorized to appoint up to two Vice Chairman (*Vice Président du Conseil d Administration*). On the basis of a proposal by the Company's President and Chief Executive Officer, the Board of Directors may also appoint Executive Vice Presidents (*Directeur Général Délégué*) to assist the President. In 2003, TOTAL amended its Articles of Incorporation to provide for the election of one Director to represent employee shareholders. Mr. Daniel Boeuf was appointed as this director at the shareholders meeting held on May 14, 2004.

The management of the Company is carried out by the Executive Committee and the Management Committee. The Executive Committee is the primary decision-making body, defining Company strategy and authorizing related investments. It also prepares decisions that fall within the purview of the Board of Directors. The Executive Committee meets twice monthly, or as often as necessary. The Management Committee facilitates coordination between the various units of the Company, monitors the results of the operational divisions and reviews the activity reports of the functional divisions. It includes all members of the Executive Committee (seven persons) as well as 22 senior managers from the various operational and functional divisions.

The table below sets forth the name of each executive officer of the Company as of March 31, 2005, his position with the Company and the year in which he began serving as an executive officer. Each executive officer devotes all of his business activities to the Company:

<b>Name</b>	<b>Position</b>	<b>Officer Since</b>
Thierry Desmarest	Chairman and Chief Executive Officer of TOTAL	1989
François Cornélis*	Executive Vice-President of TOTAL, and President of Chemicals	1999
Robert Castaigne	Executive Vice-President of TOTAL, and Chief Financial Officer	1990
Yves-Louis Darricarrère	Executive Vice-President of TOTAL, and President of Gas & Power	2000
Christophe de Margerie	Executive Vice-President of TOTAL, and President of Exploration & Production	1992
Jean-Paul Vettier	Executive Vice-President of TOTAL, and President of Refining & Marketing	1990
Bruno Weymuller	Executive Vice-President of TOTAL, and President of Strategy and Risk Assessment	2000
Michel Bénézit	Senior Vice-President, Northern Europe, Exploration & Production	1995
Philippe Boisseau	Senior Vice-President, Middle East, Exploration & Production	2005
Alain Champeaux	Senior Vice-President, Overseas, Refining & Marketing	1999
Pierre-Christian Clout	Senior Vice-President, Chairman and CEO of Hutchinson, Mapa Spontex	2002
Jean-Claude Company	Senior Vice-President, Refining, Refining & Marketing	1995
Jean-Pierre Cordier	Senior Vice-President, Executive Career Management	2004
Jean-Michel Gires	Senior Vice-President, Sustainable Development and Environment	2003
Philippe Goebel	Senior Vice-President, Performance Products, Arkema	2002
François Groh	Senior Vice-President, President of Trading-Shipping	2002
Jean-Jacques Guilbaud	Senior Vice-President, Human Resources and Corporate Communications	1998

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Ian Howat	Senior Vice-President, Corporate Strategy	1995
Jean-Marc Jaubert	Senior Vice-President, Industrial Safety	2004
Pierre Klein	Senior Vice-President, Administration, Refining & Marketing	2002
Patrick de la Chevardi�re	Senior Vice-President, Deputy Chief Financial Officer	2005
Jean-Bernard Lartigue	Senior Vice-President, President TOTAL Petrochemicals	2000

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<b>Name</b>	<b>Position</b>	<b>Officer Since</b>
Thierry Le Hénaff	Senior Vice-President, Chairman and CEO of Arkema	2004
Jean-Marie Masset	Senior Vice-President, Geosciences, Exploration & Production	2002
Charles Mattenet	Senior Vice-President, Strategy, Business Development, Research, Exploration & Production	2002
Eric de Menten	Senior Vice-President, Marketing Europe, Refining & Marketing	2002
Jean Privey	Senior Vice-President, Africa, Exploration & Production	2002
André Tricoire	Senior Vice-President, Marketing France, Refining & Marketing	2000
Hugues Woestelandt	Senior Vice-President, Specialties & Fertilizers, Chemicals	1998
Charles Paris de Bollardi�re	Treasurer	1999

\* Vice-Chairman of the Executive Committee.

There are no family relationships between any director and executive officer. No director or executive officer was elected or appointed as a result of any arrangement or understanding with any third party.

**COMPENSATION**

In 2004, the aggregate amount paid directly or indirectly by the French and foreign affiliates of the Company as compensation to the executive officers of TOTAL (29 executive officers) as of December 31, 2004 as a group was 16.9 M , including 8.1 M paid to the seven members of the Executive Committee. Variable compensation accounted for 41% of the aggregate amount paid to the executive officers in 2004. Executive officers who are directors of affiliates of the Company are not entitled to retain any directors' fees.

Mr. Thierry Desmarest's total gross compensation, including benefits in kind, paid in 2004 amounted to 2,787,239 euros. This compensation, set by the Board of Directors, is composed of a fixed base salary of 1,297,051 euros in 2004, the same amount as in 2003, and a variable portion, which is computed using the previous year's fixed base salary as the basis, which amounted to 1,490,188 euros in 2004. The variable portion is calculated by taking into account the Group's return on equity during the relevant fiscal year, as well as comparing the results to those of the other major international oil companies. The variable portion that will be paid to Mr. Thierry Desmarest in 2005, based on the Group's results for fiscal year 2004, amounts to 1,512,217 euros. Mr. Thierry Desmarest's total gross compensation was 2,528,076 euros in 2003 and 2,409,952 euros in 2002. There is no specific pension scheme for the Chairman or Mr. Boeuf, who are eligible for the same complementary pension schemes as similarly situated executives of the Group.

The amount paid to the members of the Board of Directors as directors' fees was 0.76 M in 2004 in accordance with the decision of the shareholders meeting held on May 14, 2004. There were 15 directors as of December 31, 2004 compared with 14 as of December 31, 2003.

The aggregate amount of 0.76 M paid as directors' fees in 2004 was distributed as follows:

a fixed amount of 15,000 euros per director (paid *pro rata temporis* in case of a change during the period);

an amount of 4,500 euros per director for each meeting of the Board of Directors, of the Audit Committee or of the Nominating & Compensation Committee attended.

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The table below sets forth the total gross compensation, including benefits in kind, paid to each of the directors in 2004.

<b>Director</b>	<b>2004 Compensation</b>
	( )
Thierry Desmarest	2,787,239
Daniel Boeuf	128,260(1)
Daniel Bouton	37,500
Bertrand Collomb	42,000
Paul Desmarais Jr.	37,500
Jacques Friedmann	82,500
Bertrand Jacquillat	78,000
Antoine Jeancourt-Galignani	46,500
Anne Lauvergeon	42,000
Maurice Lippens	37,500
Michel Pébereau	51,000
Thierry de Rudder	82,500
Jürgen Sarrazin	46,500
Serge Tchuruk	46,500
Pierre Vaillaud	46,500

(1) This amount corresponds to the salary received by Mr. Boeuf as an employee of the Group.

None of TOTAL S.A.'s directors have service contracts which provide for benefits upon termination of employment.

For information on stock option grants to directors and executive officers in 2004, see [Share Ownership Options](#) held by Directors and Executive Officers [below](#).

**BOARD PRACTICES****Corporate Governance**

TOTAL actively examines corporate governance matters. In particular, the Group maintains a policy of transparency regarding the compensation of and the allocation of stock purchase and subscription options to its corporate officers. As early as 1995, the Group established two special committees: a Nominating & Compensation Committee and an Audit Committee. At its meeting on February 19, 2003, the Board of Directors amended the corporate governance policies initially adopted in 1995 and in 2001 to take into account recent developments in this area, including the AFEP-MEDEF report published in France in September 2002.

At its meeting on February 18, 2004, the Board of Directors adopted a code of ethics that, in the overall context of the Group's Code of Conduct, applies to its chief executive officer, chief financial officer, chief accounting officer and the financial and accounting officers for its principal activities. A copy of this code of ethics is included as an exhibit to this annual report. See [Item 16B. Code of Ethics](#). The Board has made the Audit Committee responsible for ensuring compliance with this Code. In addition, the Board has designated Jacques Friedman, an independent director, as Chairman of the Audit Committee and as audit committee financial expert.

The shareholders meeting held on May 14, 2004 appointed a director, Mr. Daniel Boeuf, representing employee shareholders.

***Directors charter***

The Directors Charter specifies the obligations of each director and establishes the mission and operating rules and regulations of the Board of Directors. Each director undertakes to maintain the independence of his analysis, judgment, decision and action as well as not to be unduly influenced. When a director participates in and votes at

Board meetings, he is required to represent the interest of the shareholders and the Company as a whole.

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Directors must actively participate in the affairs of the Board, specifically on the basis of information communicated to him by the Company. Each director must inform the Board of conflicts of interest that may arise, including the nature and terms of any proposed transactions that could give rise to such situations. When such occasions arise, he is required to clearly express the conflict as it pertains to the plans and projects discussed by the Board. He is required to own at least 500 registered company shares (with the exception of the director representing employee shareholders, who is required to own either at least one share or the equivalent of one share via an employee savings plan) and comply strictly with provisions regarding the use of material non-public information.

In addition to stipulating that all director's shares and ADRs of TOTAL S.A. and its publicly traded subsidiaries are to be held in registered form, the Directors Charter places a prohibition on buying on margin or short selling in those same securities, and a prohibition on trading shares of TOTAL S.A. for fifteen calendar days preceding the announcement of the Company's periodic earnings and on the day of the announcement.

The mission of the Board of Directors consists of determining the overall strategic direction of the Company's operations and supervising the implementation of these strategies. With the exception of the powers and authority expressly attributed to shareholders and within the limits of the company's stated purpose, the Board addresses any issues related to the proper operation of the Company and takes decisions concerning the matters falling within its purview. Within this framework, and among other matters, the Board:

- Appoints the corporate officers responsible for managing the Company and supervises their management;

- Defines TOTAL's strategy;

- Discusses and debates major transactions under consideration by the Group, according to the criteria determined by the Board;

- Receives information on any significant event pertaining to the operations of the Company;

- Oversees the quality of the information supplied to shareholders and the financial markets through the financial statements that it approves and the annual report, or when major transactions are conducted;

- Calls and sets the agenda of shareholders meetings;

- Prepares a list each year of the directors it deems to be independent under generally accepted corporate governance criteria; and

- Performs audits and inspections as it may deem appropriate.

Specifically, with the assistance of its specialized committees, it ensures the following:

- Proper delegation of powers and authority within the Company as well as proper exercise of the respective powers and responsibilities of the Company's governing bodies;

- That no person has the power to bind the Company without proper supervision and control;

- The proper functioning of the organizations responsible for internal control and the satisfactory execution by the external auditors of their missions; and

- The proper functioning of the committees that it has created.

The Board of Directors meets at least four times a year and whenever circumstances so require. The directors are present, represented, or participate in meetings via video conferences that satisfy the technical requirements set by applicable regulations.



The Board establishes those specialized committees, whether permanent or temporary, which are required by applicable legislation or which it may deem appropriate. The Board allocates directors' fees to the directors and may allocate additional directors' fees to directors who participate on specialized committees, within the total amount established for that purpose by the shareholders.

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The Board performs an assessment of its own functioning and operations at regular intervals not to exceed three years. In addition, it holds an annual discussion of its functioning and operations. The Company does not have any service contracts with its directors providing for benefits upon termination of employment.

### ***Board Meetings***

The Board of Directors, in most circumstances, is convened after receiving written notice at least eight days in advance. The documents that are to be examined in order for the Board to make informed decisions are, if possible, included with the convening notice or are separately delivered as soon as possible thereafter. The minutes of the immediately preceding Board meeting are submitted at the next meeting for the approval of the Board.

The Board held eight meetings in 2004, with an average attendance of 81%.

The agendas for these meetings included the following points on the dates indicated.

January 8, 2004: 2004 budget, Group insurance policy, report on Ethics Committee affairs and presentation on the agreement with Gaz de France concerning GSO and CFM.

January 25, 2004: Tender offer of Sanofi-Synthélabo for Aventis.

February 18, 2004: Project for the reorganization of TOTAL's Chemicals segment, parent company and consolidated 2003 financial statements, convening of the annual shareholders meeting, compensation of the Chairman for 2004, code of ethics for financial officers and designation of an audit committee financial expert, evaluation of the independence of the directors and evaluation of the functioning and operation of the Board.

May 6, 2004: Earnings for the first quarter 2004, increased tender offer of Sanofi-Synthélabo for Aventis, dividend policy, strategy for the Gas & Power sector and preparation for the annual shareholders meeting.

May 14, 2004: Appointment of Chairman and Chief Executive Officer, delegations of power and compensation, re-appointment of Board committee members.

July 20, 2004: Estimated earnings for the second quarter and first half 2004, allocation of stock options and long-term plan for the Exploration & Production segment.

September 7, 2004: Presentation of earnings for the second quarter and first half 2004 and mid-2004 outlook, long-term plan for the Refining & Marketing segment.

November 9, 2004: Cancellation of treasury shares and related decrease of share capital, third quarter earnings, distribution of a preliminary dividend and Group strategy and five-year plan.

### ***The Audit Committee***

The mission of the Company's Audit Committee is to assist the Board of Directors so that the latter can ensure the effectiveness of internal control and oversight and the reliability of information provided to shareholders and the financial markets. The Audit Committee is specifically responsible for:

Recommending the appointment of auditors and their compensation and ensuring their independence;

Establishing the rules for the use of auditors for non-audit services;

Examining the accounting policies used in preparing financial statements, examining the parent company annual financial statements and the consolidated annual, semi-annual, and quarterly financial statements prior to their examination by the Board, having regularly examined the financial situation, cash flows and obligations of the Group;

Evaluating internal control procedures and ensuring the implementation and proper functioning of the disclosure committee, including reviewing the reports of this committee;

Approving the scope of the annual audit work of internal and external auditors;

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Examining internal audit reports and other reports (external auditors, annual report, etc.), supervising compliance with the code of ethics for financial officers;

Evaluating delegations of authority and risk monitoring and oversight procedures;

Evaluating the choice of appropriate accounting principles and methods;

Examining the policy for the use of derivatives products;

Issuing an opinion regarding major transactions contemplated by the Group; and

Annually reviewing significant litigation.

The committee is made up of at least three directors designated by the Board of Directors. Independent directors must constitute at least two-thirds of the members. In selecting the members of the committee, the Board is to pay particular attention to their financial and accounting qualifications. Members of the Audit Committee may receive from the Company and its subsidiaries only (i) the directors fees due on the basis of their positions as Directors and as members of the Audit Committee and (ii) compensation and pensions due for previous work for the Company which are not dependant upon future work or activities. The committee appoints its own Chairman. The Group Chief Financial Officer serves as the committee secretary. At the minimum, the committee meets four times a year to examine the consolidated annual and quarterly financial statements.

The Audit Committee may meet with the Chief Executive Officer, perform inspections and interview managers of operating or functional entities, as may be useful in performing its duties. The committee meets with the external auditors and examines their work, and may do so without management being present. If it deems it necessary for the accomplishment of its mission, the committee may request from the Board the means and resources to make use of outside assistance. The committee submits a written report to the Board of Directors regarding its work.

The committee members are Messrs. Jacques Friedmann, Bertrand Jacquillat and Thierry de Rudder. As of December 31, 2004, the committee members' length of service as directors of TOTAL was four years, eight years, and five years, respectively. The Board of Directors considers that each of the members of the Audit Committee is an independent director. At its meeting on February 18, 2004, the Board of Directors confirmed the appointment of Mr. Jacques Friedmann, Inspector General of Finance, former chairman and chief executive officer of Union des Assurances de Paris, director of BNP Paribas, as audit committee financial expert. See Item 16A. Audit Committee Financial Expert.

### ***Audit Committee activity in 2004***

The Audit Committee met on seven occasions in 2004, with an effective attendance rate of 100%.

At its meeting on January 8, 2004, the committee reviewed the draft report of the Chairman on internal control procedures which was required under French law for the first time. Pursuant to the French Financial Security Law of August 1, 2003 as it concerns the procedures for re-appointing external auditors, the committee reviewed the proposals of the signing partners of Ernst & Young and recommended to the Board that the signing partner for Ernst & Young be changed in 2004 to comply with rules for the rotation of audit partners. At this meeting, the committee also reviewed the Group's policy for insurance.

The meeting on February 17, 2004 was dedicated to reviewing the accounts for the fourth quarter 2003 and the consolidated earnings of the Group and parent company accounts of TOTAL S.A. for fiscal 2003.

In the second quarter, the committee met on May 4, 2004 to review the first quarter consolidated accounts. On June 16, 2004, the committee reviewed a detailed presentation on the Group's procedures for booking reserves and reviewed the work that had been done to reinforce and document the Group's internal control procedures. The committee also reviewed a presentation progress being made in preparation for the transition from French GAAP to IFRS.

In the second half, the committee met on August 5, 2004 to review the accounts for the second quarter and for the first half of 2004. The committee also met on October 8, 2004 and reviewed the progress of the efforts



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related to the Group's internal control procedures. The committee also reviewed a presentation on significant outstanding litigation and reviewed the management of risks related to oil products trading and shipping rates. On November 8, 2004, the committee's meeting was dedicated to reviewing the accounts for the third quarter 2004, the transition to IFRS and the budget for external auditors fees.

For each quarter in 2004, the committee examined the Group's financial situation and the work of the internal audit department.

### ***The Nominating & Compensation Committee***

The principal objectives of this committee are to:

Recommend to the Board of Directors the persons that are qualified to be appointed as directors or corporate officers and to prepare the corporate governance rules and regulations that are applicable to the Company; and

Review and examine the executive compensation policies implemented in the Group and the compensation of members of the Executive Committee, recommend the compensation of the Chief Executive Officer, and prepare any report that the Company must submit on these subjects.

It performs the following specific tasks:

With respect to nominations:

Assists the Board in the selection of directors, corporate officers, and directors as committee members.

Recommends annually to the Board the list of directors who may be considered as independent directors of the Company.

With respect to compensation:

Makes recommendations and proposals to the Board regarding:

Compensation, the retirement and pension system, in-kind benefits, and other financial benefits of the executive directors of TOTAL S.A., including retirement.

Allocations of stock subscription or purchase options and specifically allocations to individual executive directors.

Examines the compensation of members of the Executive Committee, including stock option plans and plans based on movements in share price (equity-based plans), retirement and pension systems, and benefits in-kind.

The committee is made up of at least three Directors designated by the Board of Directors. Independent directors must represent a majority of the members. Members of the Nominating & Compensation Committee may receive from the Company and its subsidiaries only (i) the directors' fees due on the basis of their positions as directors and as members of the Nominating & Compensation Committee and (ii) compensation and pensions due for previous work for the Company which are not dependent upon future work or activities. The committee appoints its Chairman and its secretary. The latter must be a senior executive of the Company. The committee meets at least twice a year.

The committee invites the Chief Executive Officer of the Company to submit recommendations and proposals. The latter may not be present for deliberations regarding his own situation. While appropriately maintaining the confidentiality of discussions, the committee may request that the Chief Executive Officer provide it with the assistance of any senior executive of the Company whose skills and qualifications could facilitate the handling of an agenda item. If it deems it necessary to accomplish its mission, the committee may request from the Board the means and resources to make use of outside assistance. The committee submits reports to the Board of Directors regarding its work.

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The Committee met twice in 2004 with an average of two-thirds attendance. Its members are Messrs. Bertrand Collomb, Michel Pebereau and Serge Tchuruk, all of whom are independent directors. The committee is chaired by Mr. Michel Pébèreau.

The committee proposed to the Board of Directors the list of directors to be recommended to the shareholders meeting, gave its opinion on the candidates for the appointment as the director representing employee shareholders and proposed the list of independent directors, according to generally recognized criteria for corporate governance, who did not have any significant relationship with the Company. At its meeting on February 18, 2004, the Board confirmed that Messrs. Bouton, Collomb, Desmarais, Friedman, Jacquillat, Jeancourt-Galignani, Ms. Lauvergeon, Messrs. Lippens, Pébèreau, de Rudder, Sarrazin, Tchuruk, and Vaillaud were independent directors.

Pursuant to the recommendations of the AFEP-MEDEF report of September 2002, a self-evaluation of the functioning and operations of the Board of Directors was undertaken by an outside firm in November and December 2003. The report of this evaluation was reviewed by the Nominating & Compensation Committee and was discussed by the Board at its meeting held on February 18, 2004. The Board's operation was deemed to be satisfactory and steps were taken to make improvements on certain points. The Board also updated its work schedule at this meeting.

### **Summary of Significant Differences Between French Corporate Governance Practices and the NYSE's Corporate Governance Standards**

#### ***Overview***

The following paragraphs provide a brief, general summary of significant differences between the corporate governance standards followed by TOTAL under French law and guidelines and those required by the listing standards of the New York Stock Exchange (the "NYSE") for U.S. companies that have common stock listed on the NYSE.

The principal sources of corporate governance standards in France are the French Commercial Code (*Code de Commerce*) and the French Financial and Monetary Code (*Code monétaire et financier*), both as amended in August 2003 by the French Financial Security Act (*Loi de sécurité financière*), as well as a number of general recommendations and guidelines on corporate governance, most notably the AFEP-MEDEF Report (a consolidated version of reports issued in 1995, 1998 and 2002 published in October 2003). The AFEP-MEDEF Report includes, among others, recommendations relating to the role and operation of the board of directors (creation, composition and evaluation of the board of directors and the audit, compensation and nominating committees) and the independence criteria for board members. The French Financial Security Act prohibits statutory auditors from providing certain non-audit services and defines certain criteria for the independence of auditors. In France, the independence of statutory auditors is also monitored by an independent body, the High Council for Statutory Auditors (*Haut Conseil du commissariat aux comptes*).

The NYSE listing standards are available on the NYSE's website at <http://www.nyse.com>.

#### ***Composition of Board of Directors; Independence.***

The NYSE listing standards provide that the board of directors of a U.S. listed company must consist of a majority of independent directors and that certain committees must consist solely of independent directors. A director qualifies as independent only if the board affirmatively determines that the director has no material relationship with the company, either directly or indirectly. In addition, the listing standards enumerate a number of relationships that preclude independence.

French law does not contain any independence requirement for the members of the board of directors of a French company and the functions of board chairman and chief executive officer are frequently performed by the same person. The AFEP-MEDEF Report recommends, however, that at least half of the members of the board of directors be independent in companies that have a dispersed ownership structure and no controlling shareholder. The report states that a director is independent when he or she has no relationship of any kind whatsoever with the corporation, its group or the management of either that is such as to color his or her judgment. The report

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also enumerates specific criteria for determining independence, which are on the whole consistent with the goals of the NYSE's rules although the specific tests under the two standards may vary on some points.

Based on the proposal of the Nominating & Compensation Committee, the Board of Directors of TOTAL considers that all of the directors of the Company are independent with the exceptions of Mr. Desmarest, Chairman and Chief Executive Officer of the Company, and Mr. Boeuf, the director representing employee shareholders.

***Board committees***

*Overview.* The NYSE listing standards require that a U.S. listed company have an audit committee, a nominating/corporate governance committee and a compensation committee. Each of these committees must consist solely of independent directors and must have a written charter that addresses certain matters specified in the listing standards.

French law requires neither the establishment of board committees nor the adoption of written charters. The AFEP-MEDEF Report recommends, however, that the board of directors set up an audit committee, a nominating committee and a compensation committee, indicating that the nominating and compensation committees may form one committee. The report also recommends that at least two-thirds of the audit committee members and a majority of the members of each of the compensation committee and the nominating committee be independent directors.

TOTAL has established an Audit Committee and a combined Nominating & Compensation Committee and considers all of the members of these committees to be independent. For the membership of each committee, see Corporate Governance above. Each of these committees has a charter that defines the scope of its activity.

*Audit committee.* The NYSE listing standards contain detailed requirements for the audit committees of U.S. listed companies. Starting on July 31, 2005, some, but not all, of these requirements will also apply to non-U.S. listed companies, such as TOTAL. For the time being, however, the NYSE listing standards do not require that non-U.S. listed companies, such as TOTAL, have an audit committee.

The AFEP-MEDEF Report recommends that French public companies establish an audit committee that is responsible for, among other things, examining the company's risk exposures and material off-balance sheet commitments and the scope of consolidation, reviewing the financial statements, managing the process of selecting the statutory auditors, expressing an opinion on the amount of their fees and monitoring compliance with the rules designated to ensure auditor independence, regularly interviewing statutory auditors without executive management present and which may call outside experts if necessary.

Although the audit committee recommendations of the AFEP-MEDEF Report are less detailed than those contained in the NYSE listing standards, the NYSE listing standards and the AFEP-MEDEF Report share the goal of establishing a system for overseeing the company's accounting that is independent from management and of ensuring the auditor's independence. As a result, they address similar topics, and there is some overlap.

For the specific tasks performed by the Audit Committee of TOTAL, which exceed those recommended by the AFEP-MEDEF Report, see Corporate Governance The Audit Committee above.

One structural difference between the legal status of the audit committee of a U.S. listed company and that of a French listed company concerns the degree of the committee's involvement in managing the relationship between the company and the auditor. French law requires French companies that publish consolidated financial statements, such as TOTAL, to have two co-auditors. While the NYSE listing standards require that the audit committee of a U.S. listed company have direct responsibility for the appointment, compensation, retention, and oversight of the work of the auditor, French law provides that the election of the co-auditors is the sole responsibility of the shareholders meeting. In making its decision, the shareholders meeting may rely on proposals submitted to it by the board of directors, the decision of the latter being taken upon consultation with the audit committee. The shareholders meeting elects the auditors for an audit period of six fiscal years. The auditors may only be dismissed by a court and only on grounds of professional negligence or the incapacity to perform their mission.

**Table of Contents*****Disclosure***

The NYSE listing standards require U.S. listed companies to adopt, and post on their websites, a set of corporate governance guidelines. The guidelines must address, among other things: director qualification standards, director responsibilities, director access to management and independent advisers, director compensation, director orientation and continuing education, management succession, and an annual performance evaluation. In addition, the chief executive officer of a U.S. listed company must certify to the NYSE annually that he or she is not aware of any violations by the company of the NYSE's corporate governance listing standards. The certification must be disclosed in the company's annual report to shareholders.

French law requires neither the adoption of such guidelines nor the publication of such certifications. The AFEP-MEDEF Report recommends, however, that the board of directors of a French public company perform annual self-evaluations and that a formal evaluation by an outside consultant be undertaken every three years, which for TOTAL took place in November and December 2003, and that shareholders be informed each year in the annual report of the evaluations.

***Code of business conduct and ethics***

The NYSE listing standards require each U.S. listed company to adopt, and post on its website, a code of business conduct and ethics for its directors, officers and employees. There is no similar requirement or recommendation under French law. However, under the SEC's rules and regulations, all companies required to submit periodic reports to the SEC, including TOTAL, must disclose in their annual reports whether they have adopted a code of ethics for their principal executive officer and senior financial officers. In addition, they must file a copy of the code with the SEC, post the text of the code on their website or undertake to provide a copy upon request to any person without charge. There is significant, though not complete, overlap between the code of ethics required by the NYSE listing standards and the code of ethics for senior financial officers required by the SEC's rules. For a discussion of the code of ethics adopted by TOTAL, see "Corporate Governance" above.

**EMPLOYEES**

At December 31, 2004, TOTAL employed 111,401 people worldwide, primarily in Europe, compared with 110,783 at December 31, 2003 and 121,469 at December 31, 2002. The sale of the SigmaKalon Paints activity effective in February 2003 resulted in a reduction of about 10,000 employees in the Chemicals segment. The tables below set forth the segments and geographic location in which employees worked at December 31, 2004, 2003 and 2002.

	<b>Upstream</b>	<b>Downstream</b>	<b>Chemicals</b>	<b>Corporate</b>	<b>Total</b>
2004	14,597	34,045	61,570	1,189	111,401
2003	14,017	34,410	61,212	1,144	110,783
2002	14,019	35,054	71,268	1,128	121,469

	<b>France</b>	<b>Rest of Europe</b>	<b>Rest of the World</b>	<b>Total</b>
2004	49,174	29,711	32,516	111,401
2003	49,637	30,128	31,018	110,783
2002	52,915	37,584	30,970	121,469

TOTAL believes that the relationship between its management and labor unions is, in general, satisfactory.



**Table of Contents****SHARE OWNERSHIP****Shares held by Directors and Executive Officers**

Each director elected by the shareholders of the Company at the shareholders meeting must own beneficially at least 500 shares (with the exception of the director representing employee shareholders, who is required to own either at least one share or the equivalent of one share via an employee savings plan) during his or her term of office (see table presenting the Board of Directors).

None of the directors or executive officers beneficially owned, or held options to purchase, 1% or more of the shares of the Company.

On February 28, 2005, based on registered shares held and information received from the Directors (and including, in the case of Mr. Boeuf, shares held via the TOTAL Actionnariat France Employee Savings Plan), the members of the Board of Directors including the Chairman held 94,934 shares and the executive officers (as of December 31, 2004) held 279,214 shares.

**Options Held by Directors and Officers**

As of February 28, 2005, Mr. Desmarest is the only executive officer who is also a director. His share subscription and purchase options are included in the table below and presented on an individual basis in an additional table thereafter. Mr. Boeuf is the only other director holding options, and as of February 28, 2005 he held 600 outstanding options that were granted prior to January 1, 2004.

**TOTAL SHARE SUBSCRIPTION AND PURCHASE OPTIONS GRANTED TO  
EXECUTIVE OFFICERS(1) AS A GROUP AS OF FEBRUARY 28, 2005**

	<b>1998 Purchase Plan</b>	<b>1999 Purchase Plan</b>	<b>2000 Purchase Plan</b>	<b>2001 Purchase Plan</b>	<b>2002 Purchase Plan</b>	<b>2003 Subscription Plan</b>	<b>2004 Subscription Plan</b>	<b>Total</b>
Exercise price (in euros)	93.76	113.00	162.70	168.20	158.30	133.20	159.40	
Expiration date	03/17/2006	06/15/2007	07/11/2008	07/10/2009	07/09/2010	07/16/2011	07/20/2012	
Options granted prior to January 1, 2004	134,700	213,000	245,800	304,850	332,300	355,500		1,586,150
Outstanding options as of January 1, 2004	90,700	198,000	245,800	304,850	332,300	355,500		1,527,150
Options granted in fiscal year 2004							418,500	418,500
Options exercised in fiscal year 2004	54,049	35,805	0	0	0	0	0	89,854
Outstanding options as of December 31, 2004	36,651	162,195	245,800	304,850	332,300	355,500	418,500	1,855,796

Options  
exercised  
between  
January 1 and  
February 28,  
2005

1,488 10,150 0 0 0 0 0 11,638

Outstanding  
options as of  
February 28,  
2005

35,163 152,045 245,800 304,850 332,300 355,500 418,500 1,844,158

(1) Executive officers as of December 31, 2004.

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**TOTAL SHARE SUBSCRIPTION AND PURCHASE OPTIONS GRANTED TO  
MR. THIERRY DESMAREST, CHAIRMAN OF THE BOARD, PRESIDENT AND  
CHIEF EXECUTIVE OFFICER OF TOTAL S.A.**

	<b>1998 Purchase Plan</b>	<b>1999 Purchase Plan</b>	<b>2000 Purchase Plan</b>	<b>2001 Purchase Plan</b>	<b>2002 Purchase Plan</b>	<b>2003 Subscription Plan</b>	<b>2004 Subscription Plan</b>	<b>Total</b>
Exercise price (in euros)	93.76	113.00	162.70	168.20	158.30	133.20	159.40	
Expiration date	03/17/2006	06/15/2007	07/11/2008	07/10/2009	07/09/2010	07/16/2011	07/20/2012	
Options granted prior to January 1, 2004	30,000	40,000	50,000	75,000	60,000	60,000		315,000
Outstanding options as of January 1, 2004	30,000	40,000	50,000	75,000	60,000	60,000		315,000
Options granted in fiscal year 2004							60,000	60,000
Options exercised in fiscal year 2004	30,000	22,000	0	0	0	0	0	52,000
Outstanding options as of December 31, 2004	0	18,000	50,000	75,000	60,000	60,000	60,000	323,000
Options exercised between January 1 and February 28, 2005		0	0	0	0	0	0	0
Outstanding options as of February 28, 2005		18,000	50,000	75,000	60,000	60,000	60,000	323,000

As of February 28, 2005, the directors and executive officers of the Company coming from Elf Aquitaine as a group also held options to subscribe for Elf Aquitaine shares. Pursuant to the public exchange offer on Elf Aquitaine shares, the Company committed itself to guarantee to the holders of Elf Aquitaine share subscription and purchase options, at the end of the period referred to in Article 163bis C of the French General Tax Code ( CGI ) and until the

end of the period for the exercise of the options, the possibility to exchange their future Elf Aquitaine shares for TOTAL shares, on the basis of the exchange ratio of the offer (19 TOTAL shares for 13 Elf Aquitaine shares).

**ELF AQUITAINE SHARE SUBSCRIPTION OPTIONS GRANTED TO EXECUTIVE OFFICERS  
COMING FROM ELF AQUITAINE (AS OF FEBRUARY 28, 2005), ENTITLED TO BE  
EXCHANGED, IN THE EVENT OF EXERCISE, FOR TOTAL SHARES**

	<b>1997 Plan</b>	<b>1998 Plan</b>	<b>1999 Plan n°1</b>	<b>1998 MTI Plan</b>	<b>Total</b>
Exercise price per Elf Aquitaine share (in euros)	80,65	105,95	115,60	105,95	
Expiration date	03/25/2004	03/31/2005	03/30/2009	03/31/2005	
Options granted	26,750	29,050	18,190	83,505	157,495
Outstanding options as of January 1, 2004	2,250	17,240	18,190	75,351	113,031
Options exercised in fiscal year 2004	2,250	15,850	7,800	54,273	80,173
Outstanding options as of December 31, 2004	0	1,390	10,390	21,078	32,858
Options exercised between January 1 and February 28, 2005		1,000	1,495	13,207	15,702
Outstanding options as of February 28, 2005		390	8,895	7,871	17,156
<i>Corresponding number of TOTAL shares(1)</i>		<i>570</i>	<i>13,000</i>	<i>11,504</i>	<i>25,074</i>

(1) Assumes the maximum number of shares are exchanged (19 TOTAL shares for 13 Elf Aquitaine shares).

**Share Subscription and Purchase Plans**

At the May 21, 1997 shareholders meeting, the shareholders approved a share purchase plan under which the Board of Directors was authorized to grant options to purchase previously issued shares, which have been repurchased by the Company on the open market, to employees and executives of the Company and its subsidiaries (the 1997 Authorization ). At the May 17, 2001 shareholders meeting, the shareholders approved a

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new authorization to grant options to subscribe for shares and options to purchase previously issued shares, not exceeding 3% of the total number of outstanding shares, to employees and executives of the Company and its subsidiaries (the 2001 Authorization ). At the May 14, 2004 shareholders meeting, the shareholders approved a new authorization to grant options to subscribe for shares and options to purchase previously issued shares, not exceeding 3% of the total number of outstanding shares, to employees and executives of the Company and its subsidiaries (the 2004 Authorization ).

The table below sets forth options granted by the Board of Directors.

	<b>Date of Board of Directors Meeting</b>	<b>Number of Shares Subject to Outstanding Unexercised Options as of February 28, 2005</b>	<b>Exercise Price</b>	<b>Expiration Date</b>
1997 Authorization	March 17, 1998	333,118	93.76	March 17, 2006
	June 15, 1999	904,480	113.00	June 15, 2007
	July 11, 2000	2,393,795	162.70	July 11, 2008
2001 Authorization	July 10, 2001	2,677,600	168.20	July 10, 2009
	July 9, 2002	2,861,128	158.30	July 9, 2010
	July 16, 2003	2,932,256	133.20	July 16, 2011
2004 Authorization	July 20, 2004	3,359,630	159.40	July 20, 2012

See Note 26 of the Notes to the Consolidated Financial Statements for more detailed information on employee share subscription and share purchase plans, including the Company's commitment to guarantee the holders of Elf Aquitaine share subscription options the possibility to exchange their future Elf Aquitaine shares for TOTAL shares.

**Capital Increase Reserved for Employees of the Company**

At the shareholders meeting held on May 7, 2002, the shareholders authorized, for a maximum five-year period, the Board of Directors to increase the capital of the Company by an amount not exceeding 3% of the share capital at the date of issue of the new shares, reserving subscriptions for company employees.

Pursuant to this authorization, the Board of Directors, during its November 6, 2003 meeting, implemented a first capital increase reserved for employees within the limit of 6.0 million shares at a price of 107.90 per share. These shares were entitled to the dividends paid for the 2003 fiscal year. The subscription period ran from March 22, 2004 to April 9, 2004 and 3,434,830 shares were subscribed.

The shareholders meeting held on May 14, 2004 replaced and, with respect to any unused amount, cancelled the authorization granted at the shareholders meeting held on May 7, 2002. This new authorization allows the Board of Directors, within a maximum period of five years, to increase the capital of the Company, by an amount not exceeding 3% of the share capital at the date of issue of the new shares, by subscription reserved for employees of the Company.

**ITEM 7. MAJOR SHAREHOLDERS AND RELATED PARTY TRANSACTIONS****MAJOR SHAREHOLDERS**

As of March 31, 2005, to the Company's knowledge, TOTAL Actionnariat France, an employee investment fund, held 17,487,898 shares representing 2.8% of the Company's shares and 5.4% of the voting rights in the Company. In addition, Parjointco, jointly held by Frère-Bourgeois SA mainly through Compagnie Nationale à Portefeuille and by the Desmarais family, indirectly controls Bruxelles Lambert Group. As of March 31, 2005, to the Company's knowledge, Bruxelles Lambert Group held 23,552,126 shares, or 3.7%, of the Company's shares representing 6.8% of the voting rights in the Company. Compagnie Nationale à Portefeuille also holds, on its own right, 8,314,740 shares representing 1.3% of the share capital and 1.3% of the voting rights in the Company and therefore declared on February 1, 2005 that it had an indirect participation, through the combination of its own holdings and those of Bruxelles Lambert Group, of 5% in the Company. Neither TOTAL Actionnariat France, Compagnie Nationale à

Portfeuille nor Bruxelles Lambert Group has voting rights different from other shareholders of the Company having held their shares in registered form for over 2 years. No other shareholder beneficially owns 5% or more of the Company's shares or voting rights.

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As of March 31, 2005, there were 86,724,738 ADSs outstanding in the United States, representing 6.8% of the total outstanding shares.

The Company is not directly or indirectly owned or controlled by another corporation, by any foreign government or by any other natural or legal person. The Company does not know of any arrangements that may, at a subsequent date, result in a change of control of TOTAL. The so-called "golden share" of the French State, which previously allowed the State to restrict the transfer of control of Elf Aquitaine, was abrogated on October 3, 2002 and has no further effect. For more information see Item 10. Additional Information Memorandum and Articles of Association Other Issues Specific Rights of the French State in the Share Capital of Elf Aquitaine .

### **RELATED PARTY TRANSACTIONS**

The Group's main transactions with related parties (principally all the investments carried under the equity method) and the balances receivable from and payable to them are shown in Note 30 paragraph D, respectively, to the Consolidated Financial Statements included elsewhere herein.

In the ordinary course of its business, TOTAL enters into transactions with various organizations with which certain of its directors or executive officers may be associated, but no such transactions of a material or unusual nature have been entered into during the period commencing on January 1, 2004 and ending on March 31, 2005.

### **ITEM 8. FINANCIAL INFORMATION**

#### **CONSOLIDATED STATEMENTS AND OTHER SUPPLEMENTAL INFORMATION**

See pages F-1 through F-90 and S-1 for TOTAL's consolidated financial statements and other supplemental information.

#### **Litigation**

While it is not feasible to predict the outcome of the pending claims, proceedings, and investigations described below with certainty, management is of the opinion that their ultimate disposition should not have a material adverse effect on the Company's financial position, cash flows, or results of operations.

#### ***Grande Paroisse***

An explosion occurred at the Grande Paroisse industrial site in the city of Toulouse (France) on September 21, 2001. Grande Paroisse, a former subsidiary of Atofina which became a subsidiary of Elf Aquitaine Fertilisants on December 31, 2004 pursuant to the reorganization of the Chemicals segment, was principally engaged in the production and sale of agricultural fertilizers. The explosion, which involved a stockpile of ammonium nitrate pellets, destroyed a portion of the site and caused the death of 30 people and injured many others. In addition, a portion of Toulouse was significantly damaged. This plant has been closed and the site is being restored. Individual assistance packages have been offered to employees.

Ongoing investigations have not determined the cause of the explosion, but the hypothesis that the explosion was caused by Grande Paroisse through the accidental mixing of ammonium nitrate and a chlorine compound has been discredited. Proceedings against nine of the 11 Grande Paroisse employees charged during the criminal investigation conducted by the Toulouse Regional Court (Tribunal de Grande Instance) were dismissed in 2003 and this dismissal was confirmed by the Appeals Court of Toulouse in 2004. The investigation is still under way and all possibilities are being examined.

Pursuant to applicable French law, Grande Paroisse is presumed to bear sole responsibility for the explosion as long as the cause of the explosion remains unknown. While awaiting the conclusion of the investigation, Grande Paroisse has set up a compensation system for victims. At this stage, the estimate for the compensation of all claims has been increased to 1.95 B . This figure exceeds by 1.15 B Grande Paroisse's insurance cover for legal liability (capped at 0.8 B ). This potential liability is accounted for by a provision for 110 M as of

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December 31, 2004, a decrease from the provision for 276 M as of December 31, 2003 due to the payments made by the Group during the year.

### ***Antitrust investigations***

Following an investigation into certain trade practices in the chemicals industry in the United States, Arkema and certain other chemical subsidiaries are involved in several civil lawsuits in the United States for violations of antitrust laws. The litigation reserves for these lawsuits amount to 14 M as of December 31, 2004.

The investigations commenced by the European Commission in 2000, 2003 and 2004 regarding alleged anti-competitive practices involving certain products sold by Arkema or its subsidiaries have resulted in a decision regarding one product line by the Commission, delivered on January 19, 2005, which ordered Arkema to pay a 13.5 M fine and also ordered Elf Aquitaine and Arkema to jointly pay a 45 M fine. Elf Aquitaine and Arkema have decided to appeal this decision. On January 28, 2005, the European Commission addressed a statement of objections to Arkema, TOTAL S.A. and Elf Aquitaine regarding alleged anti-competitive practices concerning a new product line. No facts have been alleged that would implicate TOTAL S.A. or Elf Aquitaine in these practices. The Group believes that the provisions recorded in the accounts of certain of its chemicals subsidiaries for an aggregate amount of 176 M as of December 31, 2004 should be adequate in light of the anticipated consequences of the investigations commenced by the Commission.

Moreover, as a result of investigations commenced in October 2002 by the European Commission concerning certain Refining & Marketing subsidiaries of the Group, Total Nederland N.V. received a statement of objections in October 2004. A statement of objections regarding these practices has also been addressed to TOTAL S.A., although no facts have been alleged that would implicate TOTAL S.A. in these practices.

Although it is not currently possible to determine with certainty the outcome of these lawsuits and investigations, the Company is of the opinion that their ultimate resolution should not have a significant adverse effect on the Company's financial position, cash flows or earnings.

### ***SEC investigation***

The SEC has issued a non-public formal order directing a private investigation in the matter of certain oil companies (including, among others, TOTAL) in connection with the pursuit of business in Iran.

### ***Sinking of the Erika***

The three major commitments that the Company undertook in December 1999 following the sinking of the Erika, a tanker that was transporting products belonging to one of the Group companies, have now been satisfied. The clean up of parts of the coastline and the pumping of the remaining cargo out of the wreck were completed in 2000 and the processing of more than 200,000 tons of waste was completed in 2003.

In the criminal investigation initiated by the Regional Court of Paris (*Tribunal de Grande Instance*), TOTAL S.A., as a legal entity, and five employees of the Group have been investigated. TOTAL believes that the violations with which the Group and these employees were charged are without substance as a matter of fact and as a matter of law.

### ***Myanmar***

In 2002, two criminal complaints, one in Belgium and the other in France, were filed against the Company, its Chairman and the former manager of its subsidiary in Myanmar.

Neither the claimants nor the relevant judicial authorities have officially notified the Company of the complaint in Belgium, which was filed on April 25, 2002. It is apparently a claim brought under the Belgian universal jurisdiction law of June 16, 1993 alleging human rights violations. This law was repealed by the law of August 5, 2003 that changed the conditions under which legal actions are admissible. The constitutionality of one of these conditions is being examined by the Belgian *Cour d'Arbitrage* at the request of the Belgian *Cour de Cassation* (the highest court of appeal).



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The complaint in France, filed with the Regional Court of Nanterre (*Tribunal de Grande Instance*) on August 26, 2002, was made by Burmese citizens who claim that they were kidnapped and held prisoner in order to provide forced labor on the oil pipeline built by a TOTAL subsidiary in Myanmar. The prosecutor's request to have this case dismissed for failure to state a claim was refused by the Versailles Court of Appeals on procedural grounds.

TOTAL believes that the accusations made against the Company and its management arising out of the activities of its subsidiary in Myanmar are without substance as a matter of fact and as a matter of law.

### ***South Africa***

In a threatened class action proceeding in the United States, TOTAL is being accused, together with approximately one hundred other multinational companies, by certain South African citizens who allege that their human rights were violated during the era of apartheid by the army, the police or militias, and who consider that these companies were complicit in the actions by the South African authorities at the time.

The claims against the companies named in the class action, which has not yet been officially brought against TOTAL, were dismissed by a federal judge in New York. The plaintiffs have appealed this dismissal.

### ***Asbestos***

Like many other industrial groups, TOTAL is involved in claims related to occupational diseases caused by asbestos exposure. The circumstances described in these claims generally concern activities prior to the beginning of the 1980s, well before the complete ban on the use of asbestos in most of the countries where the Group operates (January 1, 1997 in France). The Group's various activities are not particularly likely to lead to significant exposure to asbestos related risks, since this material was generally not used in manufacturing processes, except in very specific cases. The main source of potential exposure is related to the use of certain insulating components in industrial equipment. These components are being gradually eliminated from the Company's equipment through asbestos-elimination plans that have been underway for the past few years. However, considering the long period of time that may elapse before the harmful results of exposure to asbestos manifest themselves (up to 40 years), we anticipate that other claims will be filed in the years to come. Asbestos related issues have been subject to close monitoring in all branches of the Group. As of December 31, 2004, the Group estimates that the ultimate cost of all asbestos related claims paid or pending is not likely to have a material adverse effect on the financial situation of the Group.

### ***Cepsa***

TOTAL has held an investment in the Spanish oil and gas company Cepsa since 1990. Elf Aquitaine and the Spanish bank Santander Central Hispano S.A. (SCH) have entered into various contracts concerning their investments in and cooperation regarding Cepsa.

As of December 31, 2004 TOTAL held 36.97% of Cepsa's share capital through its 99.47% owned subsidiary Elf Aquitaine. In addition, TOTAL also indirectly holds 8.31% of Cepsa's share capital through its investment in the Spanish holding company Somaen Dos. Together, this amounts to a total direct and indirect holding of 45.28%. The other major shareholders of Cepsa are Union Fenosa and the International Petroleum Investment Company.

Without prior consultation with TOTAL, on September 26, 2003 SCH, which at the time had an indirect holding of 19.92% in the share capital of Cepsa, launched a public tender offer for 16% of Cepsa's share capital for a price of 28.00 per share. At the close of its tender offer on November 24, 2003, SCH had obtained 12.13% of Cepsa's share capital.

On October 7, 2003, TOTAL notified the *Comisión Nacional del Mercado de Valores* (CNMV), the Spanish stock market authority, of the contracts that tied it to SCH, as provided under the Spanish law 26/2003 of July 17, 2003 regarding transparency for listed companies.

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Taking into account the persistent disagreements between TOTAL and SCH regarding the possible impact of law 26/2003 on their contractual relationships and in order to protect its rights, on October 13, 2003 TOTAL announced that, pursuant to the provisions for arbitration in the relevant agreements, it had initiated arbitral proceedings before the Netherlands Arbitration Institute at the Hague.

On November 25, 2003, the Netherlands Arbitration Institute at the Hague rendered a decision imposing provisional measures while awaiting a final judgment on the merits of the case. The proceedings on the merits of the case are underway and it is possible that the Netherlands Arbitration Institute will render its decision in 2005.

### **Dividend Policy**

The Company has paid dividends on its share capital in each year since 1946. Future dividends will depend on the Company's earnings, financial condition and other factors. The payment and amount of dividends are subject to the recommendation of the Board of Directors and resolution by the Company's shareholders at an annual shareholders meeting.

For the 2004 fiscal year, the Board of Directors proposed a dividend of € 5.40 per share. This proposed dividend will be voted on by the shareholders meeting to be held on May 17, 2005. An interim dividend, with rights to an *avoir* fiscal under the laws and regulations in place at that time, of € 2.40 per share was paid on November 24, 2004. If approved, the balance of € 3.00 per share will be paid on May 24, 2005.

Dividends paid to holders of ADSs will be subject to a charge by the Depositary for any expenses incurred by the Depositary in the conversion of euro to dollars. See "Taxation" under "Item 10. Additional Information" for a summary of certain United States federal and French tax consequences to holders of shares and ADSs.

### **SIGNIFICANT CHANGES**

For a description of significant changes that have occurred since the date of the Company's Consolidated Financial Statements, see "Item 4. Information on the Company" and "Item 5. Operating and Financial Review and Prospects", which include descriptions of certain recent 2005 activities.

## **ITEM 9. THE OFFER AND LISTING**

### **MARKETS**

The principal trading market for the shares is the *Eurolist* of Euronext Paris. The shares are also listed on Euronext Brussels and the London Stock Exchange, and are quoted on SEAQ International.

### **OFFER AND LISTING DETAILS**

#### **Trading on Euronext Paris**

Official trading of listed securities on Euronext Paris, including the shares, is transacted through French stockbrokers (*sociétés de bourse*) and takes place continuously on each business day in Paris from 9:00 a.m. to 5:25 p.m. (Paris time), with a fixing of the closing price at 5:30 p.m.

All the markets of Euronext Paris are cash settlement markets (*marché au comptant*). Highly liquid shares, including those of the Company, are eligible for deferred settlement (*Service à Règlement Différé - SRD*). Payment and delivery for shares under the SRD occurs on the last day of each month. Use of the SRD service requires payment of a commission. Under this system, the determination date for settlement the following month occurs on the fifth trading day prior to the end of each month.

In France, the shares are included in the principal index published by Euronext Paris (the CAC 40 Index). The CAC 40 Index is derived daily by comparing the total market capitalization of 40 stocks included in the *Eurolist* of Euronext Paris to the total market capitalization of the same stocks on December 31, 1987. Adjustments are made to allow for expansion of the sample due to new issues. The CAC 40 Index indicates trends in the French stock market as a whole and is one of the most widely followed stock price indices in France. In the

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United Kingdom, the shares are listed in both the FT.SE Eurotop 100 and FT.SE Eurotop 300 index. As a result of the creation of Euronext, the shares are included in Euronext 100, the index representing Euronext's blue chip companies based on market capitalization. The shares are also included in the Dow Jones STOXX 50 and Dow Jones Euro STOXX 50, blue chip indices comprised of the 50 most highly capitalized and most actively traded equities throughout Europe and within the European Monetary Union, respectively. Since June 2000, the shares have been included in the Dow Jones Global Titans Index which consists of 50 global companies selected based on market capitalization, book value, assets, revenue and earnings.

The table below sets forth, for the periods indicated, the reported high and low quoted prices in euros for the currently outstanding shares on Euronext Paris.

	Price Per Share	
	High	Low
<b>2000</b>	<b>189.00</b>	<b>118.50</b>
<b>2001</b>	<b>179.80</b>	<b>126.00</b>
<b>2002</b>	<b>179.40</b>	<b>121.20</b>
<b>2003</b>	<b>147.90</b>	<b>110.50</b>
First Quarter	142.70	110.50
Second Quarter	138.80	116.60
Third Quarter	144.20	127.70
Fourth Quarter	147.90	129.20
<b>2004</b>	<b>171.80</b>	<b>139.40</b>
First Quarter	154.70	139.40
Second Quarter	164.50	146.90
Third Quarter	171.80	153.60
Fourth Quarter	170.60	157.30
October	170.60	161.40
November	168.30	162.80
December	166.20	157.30
<b>2005 (through April 15)</b>	<b>184.10</b>	<b>158.00</b>
First Quarter	184.10	158.00
January	165.90	158.00
February	182.30	165.10
March	184.10	177.40
Second Quarter	185.00	176.50
April	185.00	176.50

**Trading on the New York Stock Exchange**

ADSs have been listed on the New York Stock Exchange since October 25, 1991. The Bank of New York serves as depositary with respect to the ADSs traded on the New York Stock Exchange. Each ADS represents one-half of a share.

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The table below sets forth, for the periods indicated, the reported high and low prices quoted in dollars for the currently outstanding ADSs on the New York Stock Exchange.

	Price Per ADS	
	High	Low
<b>2000</b>	<b>81.25</b>	<b>61.13</b>
<b>2001</b>	<b>77.84</b>	<b>58.10</b>
<b>2002</b>	<b>83.24</b>	<b>60.30</b>
<b>2003</b>	<b>93.47</b>	<b>60.95</b>
First Quarter	75.10	60.95
Second Quarter	81.79	64.26
Third Quarter	79.83	72.27
Fourth Quarter	93.47	76.39
<b>2004</b>	<b>110.56</b>	<b>87.76</b>
First Quarter	95.46	87.76
Second Quarter	99.67	89.75
Third Quarter	105.56	93.54
Fourth Quarter	110.56	101.39
October	105.48	101.39
November	110.50	103.48
December	110.56	104.48
<b>2005 (through April 15)</b>	<b>122.75</b>	<b>103.73</b>
First Quarter	122.75	103.73
January	109.11	103.73
February	120.06	107.80
March	122.75	115.12
Second Quarter	119.99	112.00
April	119.99	112.00

**ITEM 10. ADDITIONAL INFORMATION****MEMORANDUM AND ARTICLES OF ASSOCIATION****Register Information**

TOTAL is registered with the Nanterre Trade Register under the registration number 542 051 180.

**Objects and Purposes**

The Company's purpose can be found in Article 3 of its *statuts*. Generally, the Company may engage in all activities relating to (i) the exploration and extraction of mining deposits and the performance of industrial refining, processing, and trading of these materials, as well as their derivatives and by-products; (ii) the production and distribution of all forms of energy; (iii) the chemicals, rubber and health industries; (iv) the transportation and shipping of hydrocarbons and other products or materials relating to the Company's business purpose; and (v) all financial, commercial, and industrial operations and operations relating to any fixed or unfixed assets and real estate, acquisitions of interests or holdings in any business or company that may relate to any of the above-mentioned purposes or to any similar or related purposes, of such nature as to promote the Company's extension or its development.

**Director Issues****Compensation**

Directors receive attendance fees, the maximum aggregate amount of which, determined by the shareholders acting at a shareholders meeting, remains in effect until a new decision is made. The Board of Directors may



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apportion this amount among its members in whatever way it considers appropriate. The Board may also grant its Chairman compensation in addition to attendance fees.

### ***Retirement***

The number of directors of TOTAL who are acting in their own capacity or as permanent representatives of a legal entity and are over 70 years old may not exceed one-third of the number of directors in office at the end of the fiscal year. If such number is exceeded, the oldest Board member is automatically deemed to have resigned. Directors who are the permanent representative of a legal person may not continue in office beyond their seventieth birthday.

### ***Shareholdings***

Each director must own at least 500 shares of TOTAL during his or her term of office.

### ***Election***

Directors are elected for a term of three years. In 2003, TOTAL amended its Articles of Incorporation to provide for the election of one director to represent employee shareholders. This director was appointed at the shareholders meeting held on May 14, 2004.

### ***Description of Shares***

The following is a summary of the material rights of holders of fully paid shares and is based on the *statuts* of the Company and French Company Law as codified in Volume II of the French Commercial Code (referred to herein as the French Company Law ). For more complete information, please read the *statuts* of TOTAL, a copy of which has been filed as an exhibit to this Annual Report.

### ***Dividend rights***

The Company may make dividend distributions to its shareholders from net income in each fiscal year, after deduction of the overhead and other social charges, as well as of any amortization of the business assets and of any provisions for commercial and industrial contingencies, as reduced by any loss carried forward from prior years, and less any contributions to reserves or amounts that the shareholders decide to carry forward. These distributions are also subject to the requirements of French Company Law and the Company's *statuts*.

Under French Company Law, the Company must allocate 5% of its net profits in each fiscal year to a legal reserve fund until the amount in that fund is equal to 10% of the nominal amount of its share capital.

The Company's *statuts* provide that its shareholders may decide to allocate all or a part of any distributable profits among special or general reserves, to carry them forward to the next fiscal year as retained earnings, or to allocate them to the shareholders as dividends. The *statuts* provide that the remainder of any distributable profits shall be distributed among the shareholders in the form of dividends, either in cash or in shares.

Under French Company Law, the Company must distribute dividends to its shareholders pro rata according to their shareholdings. Dividends are payable to holders of outstanding shares on the date of the shareholders meeting approving the distribution of dividends or, in the case of interim dividends, on the date the Company's Board of Directors meets and approves the distribution of interim dividends. Under French Company Law, dividends not claimed within five years of the date of payment revert to the French State.

### ***Voting rights***

Each shareholder of the Company is entitled to the number of votes he or she possesses or for which he or she holds proxies. According to French Company Law, voting rights may not be exercised in respect of fractional shares.

Each registered share that is fully paid and registered in the name of the same shareholder for at least two years is granted a double voting right after such two-year period. Upon capital increase by capitalization of

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reserves, profits or premiums on shares, a double voting right is granted to each registered share allocated to a shareholder relating to previously existing shares that already carry double voting rights. The double voting right is automatically canceled when the Share is converted into a bearer share or when the share is transferred, unless the transfer is due to inheritance, division of community property between spouses, or a donation during the lifetime of the shareholder to the benefit of a spouse or relatives eligible to inherit.

In certain circumstances, French Company Law limits a shareholder's right to vote:

Shares held by the Company or entities controlled by the Company, which cannot be voted;

Shares held by shareholders who paid in-kind, which cannot be voted with respect to resolutions relating to contribution in-kind; and

Shares held by interested parties, which cannot be voted with respect to resolutions relating to such shareholders.

Under the Company's *statuts*, the voting rights exercisable by a shareholder, directly, indirectly or by proxy, at any shareholders meeting are limited to 10% of the total number of voting rights attached to the Shares on the date of such shareholders meeting. This 10% limitation may be increased by taking into account double voting rights held directly or indirectly by the shareholder or by proxy, provided that the voting rights exercisable by a shareholder at any shareholders meeting may never exceed 20% of the total number of voting rights attached to the shares.

These limitations on voting lapse automatically if any individual or entity acting alone or in concert with an individual or entity holds at least two-thirds of the total number of shares as a result of a tender offer for 100% of the shares.

### ***Liquidation rights***

In the event the Company is liquidated, its assets remaining after payment of its debts, liquidation expenses and all of its other remaining obligations will first be distributed to repay the nominal value of the shares. After these payments have been made, any surplus will be distributed pro rata among the holders of shares based on the nominal value of their shareholdings.

### ***Future capital calls***

Shareholders are not liable to the Company for further capital calls other than the nominal value of their shares.

### ***Preferential subscription rights***

Holders of shares have preferential rights to subscribe on a pro rata basis for additional shares issued for cash. Shareholders may waive their preferential rights, either individually or, under certain circumstances as a group, at an extraordinary general meeting. During the subscription period relating to a particular offering of shares, shareholders may transfer their preferential subscription rights that they have not previously waived.

### ***Changes in share capital***

Under French Company Law, the Company may increase its share capital only with the approval of its shareholders at an extraordinary general meeting (or with a delegation of authority from its shareholders). There are two methods to increase share capital: (i) by issuing additional shares, including the creation of a new class of shares and (ii) by increasing the nominal value of existing shares. The Company may issue additional shares for cash or for assets contributed in kind, upon the conversion of debt securities that it may have issued, by capitalization of its reserves, profits or issuance premiums or, subject to certain conditions, in satisfaction of its indebtedness.

Under French Company Law, TOTAL may decrease its share capital only with the approval of its shareholders at an extraordinary general meeting (or with a delegation of authority from its shareholders). There

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are two methods to reduce share capital: (i) by reducing the number of shares outstanding and (ii) by decreasing the nominal value of existing shares. The conditions under which the share capital may be reduced will vary depending upon whether the reduction is attributable to losses. The Company may reduce the number of outstanding shares either by an exchange of shares or by the repurchase and cancellation of its shares. Any decrease must meet the requirements of French Company Law, which states that all the holders of shares in each class of shares must be treated equally, unless the affected shareholders otherwise agree.

***Form of shares***

The Company has only one class of shares. As a result of the conversion of the share capital into euros, the par value of each share of common stock was changed from FRF 50 to 10.00 on June 15, 1999. Shares may be held in either bearer or registered form. Shares traded on the *Eurolist* of Euronext Paris S.A. are cleared and settled through Euroclear France. The Company may use any lawful means to identify holders of shares, including a procedure known as *titres au porteur identifiable* according to which Euroclear France will, upon the Company's request, disclose to the Company the name, nationality, address and number of shares held by each shareholder in bearer form. The information may only be requested by the Company and may not be communicated to third parties.

***Holding of shares***

Under French Company Law concerning the dematerialization of securities, the ownership rights of shareholders are represented by book entries instead of share certificates (other than certificates representing French securities which are outstanding exclusively outside the territory of France and are not held by French residents). Registered shares are entered into an account maintained by the Company or by a representative that it has nominated, while shares in bearer form must be held in an account maintained by an accredited financial intermediary on the shareholder's behalf.

For all shares in registered form, the Company maintains a share account with Euroclear France which is administered by BNP Paribas Securities Services. In addition, the Company maintains accounts in the name of each registered shareholder either directly or, at a shareholder's request, through a shareholder's accredited intermediary, in separate accounts maintained by BNP Paribas Securities Services on behalf of the Company. Each shareholder's account shows the name and number of shares held and, in the case of shares registered through an accredited financial intermediary, the fact that they are so held. BNP Paribas Securities Services, as a matter of course, issues confirmations to each registered shareholder as to shares registered in a shareholder's account, but these confirmations do not constitute documents of title.

Shares held in bearer form are held and registered on the shareholder's behalf in an account maintained by an accredited financial intermediary and are credited to an account at Euroclear France maintained by the intermediary. Each accredited financial intermediary maintains a record of shares held through it and will issue certificates of inscription for the shares that it holds. Transfers of shares held in bearer form only may be made through accredited financial intermediaries and Euroclear France.

***Cancellation of treasury shares***

The Board of Directors of the Company may cancel treasury shares owned by the Company in accordance with French Company Law up to a maximum of 10% of the share capital within any period of 24 months.

***Description of TOTAL Share Certificates***

The TOTAL share certificates are issued by Euroclear France. French law allows Euroclear France to create certificates representing French securities provided that these certificates are intended to be outstanding exclusively outside the territory of France and cannot be held by residents of France. Furthermore, TOTAL share certificates may not be held by a foreign resident in France, either personally or in the form of a bank deposit, but the coupons and rights may be exercised in France.



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Certificates for TOTAL shares are either in bearer form or registered in a securities trading account. Under Euroclear France regulations applicable to bearer stock certificates, TOTAL share certificates cannot be categorized as secondary securities, such as ADSs, issued by a foreign company to represent TOTAL shares.

TOTAL share certificates have the characteristics of a bearer security, meaning:

negotiable outside France;

transmission by delivery; and

fungibility of the TOTAL share certificate, which may be converted freely from bearer form to registration in an account.

All rights attached to TOTAL shares must be exercised directly by the bearer of the TOTAL share certificates.

**Description of TOTAL ADRs**

The following is a general description of the depositary arrangement, including a summary of all material provisions of the deposit agreement pursuant to which ADSs are issued. The deposit agreement is among the Company, The Bank of New York, as depositary, and the holders from time to time of ADRs. For more complete information, please read the deposit agreement and the Form of ADR itself, copies of which are attached as Exhibit 1 to the registration statement on Form F-6 (Reg. No. 333-107311) filed with the Securities and Exchange Commission on July 24, 2003. Additional copies of the deposit agreement are available for inspection at the Corporate Trust Office of the depositary in New York, which is presently located at 101 Barclay Street, New York, New York 10286. The depositary's principal executive office is located at One Wall Street, New York, New York 10286.

***ADRs***

ADRs evidencing the ADSs are issuable by the depositary pursuant to the deposit agreement. An ADR may evidence any number of ADSs. Each ADS represents one-half of one share deposited under the deposit agreement.

***Deposit and withdrawal of shares***

All references to the deposit, surrender, delivery, transfer and withdrawal of the shares when referring to shares not in certificated form, refer to book-entry transfers and do not contemplate the physical transfer of certificates representing the shares.

Upon receipt of notice, as provided in the deposit agreement, of a deposit with the custodian in Paris, and subject to the terms of the deposit agreement, the depositary will execute and deliver through its Corporate Trust Office to the holders of such ADSs, ADRs registered in the names of those holders for the number of ADSs requested by each holder. This execution and delivery will occur only upon payment to the depositary of a fee for the execution and delivery of the ADRs and of all taxes, governmental charges and fees.

Upon surrender of ADRs at the Corporate Trust Office of the depositary and payment of the fee of the depositary, and of all taxes and governmental charges, and subject to the provisions of the deposit agreement and the *statuts* of the Company, ADR holders are entitled to the transfer of deposited securities to an account in the name of such holder as shall be designated by such holder maintained by the Company in the case of shares in registered form, or by an accredited financial institution, as in the case of shares in bearer form. The depositary will not accept for surrender an ADR representing fewer than two ADSs or integral multiples thereof.

The forwarding of documents of title for delivery at the Corporate Trust Office of the depositary in New York City will be at the request, risk and expense of the ADR holder.

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***Pre-release of ADRs***

In certain circumstances, subject to the provisions of the deposit agreement, The Bank of New York may issue ADRs before deposit of the underlying Shares. This issuance is a pre-release. The Bank of New York may also deliver shares prior to receipt and cancellation of ADRs (even if they are cancelled before the pre-release transaction has been closed out). A pre-release is closed out as soon as the underlying Shares are delivered to The Bank of New York. The Bank of New York may receive ADRs instead of shares to close out a pre-release. The Bank of New York may pre-release ADRs only under the following conditions:

before or at the time of the pre-release, the person to whom the pre-release is being made must represent to The Bank of New York in writing that it or its customer owns the shares or ADRs to be deposited;

the pre-release must be fully collateralized with cash or other collateral that The Bank of New York considers appropriate; and

The Bank of New York must be able to close out the pre-release on not more than five business days' notice.

In addition, The Bank of New York will limit the number of ADRs that may be outstanding at any time as a result of pre-release. The Bank of New York, however, may disregard the limit from time to time, if it thinks it is appropriate to do so.

***Dividends, other distributions and rights***

Whenever the depositary receives any cash dividend or cash distribution from the Company, the depositary will, to the extent that in its judgment it can convert euros or any other foreign currency on a reasonable basis into dollars and transfer the resulting dollars to the United States:

convert all cash dividends and other cash distributions that it receives on the underlying deposited securities into dollars; and

distribute the amount received net of any expense, taxes, governmental charges incurred by the depositary in connection with the conversion, to the holders of the ADRs in proportion to the number of the ADSs representing shares held by each holder.

The amount distributed will be reduced by any amounts required to be withheld by the Company or the French paying agent on account of taxes. The depositary may convert euros into dollars by sale or in any other manner that it may determine. If the depositary determines in its judgment that any foreign currency received cannot be converted on a reasonable basis and transferred to the United States, the depositary may, after consultation with the Company, distribute the foreign currency received by it or, at its discretion, hold the foreign currency, uninvested and without liability for interest, for the respective accounts of the holders of the ADRs entitled to receive the amounts. The depositary will distribute only whole U.S. dollars and cents and will round fractional cents to the nearest whole cent. If the exchange rates fluctuate during a time when the depositary cannot convert the foreign currency, the holder may lose some or all of the value.

The depositary will use reasonable efforts to follow the procedures established by the French Treasury for eligible U.S. Holders of ADRs to recover the excess 10% French withholding tax initially withheld and deducted in respect of dividends distributed to them and any fiscal or tax credit payment to be made to them by the French Treasury. To effect this recovery, the depositary will provide U.S. Holders of depositary receipts registered on the books of the depositary with the appropriate French tax forms and instructions, which will be provided by the Company to the depositary. Upon receipt by the depositary of properly completed and executed forms, the depositary will promptly cause them to be filed with the appropriate French tax authorities. Upon receipt of any resulting remittance, the depositary will distribute to the holders of the Company ADRs entitled to remittance, as soon as practicable, the remittance converted into dollars, net of expenses incurred by the depositary in connection with conversion.

If any distribution by the Company consists of a dividend in, or free distribution of, shares, the depositary may, upon prior consultation with and approval of the Company, and will, if the Company so requests, issue an



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amount of ADRs evidencing ADSs representing the amount of Shares received as a dividend or free distribution. The depositary will distribute to the holders of outstanding ADRs, in proportion to their holding and subject to the provisions of the deposit agreement, including the withholding of taxes and governmental charges and the payment of fees, additional ADRs evidencing an aggregate number of ADSs representing the number of shares received as a dividend or free distribution.

In lieu of distributing fractional ADSs, the depositary will sell the amount of the Shares represented by the aggregate amount of shares representing fractional ADSs and distribute the net proceeds in accordance with the provisions of the deposit agreement.

If additional ADSs are not so distributed, each ADS will represent the additional shares distributed. The Company and the depositary will not offer the shares to holders of ADRs unless a registration statement is in effect with respect to the securities represented by those rights under the Securities Act of 1933, as amended (the "Securities Act") or the offer and sale of such shares to the holders are exempt from registration under the provisions of the Securities Act.

### ***Record dates***

Whenever:

any cash dividend or other cash distribution becomes payable or any distribution other than cash is made;

rights are issued with respect to the underlying deposited securities;

for any reason the depositary causes, at the Company's election, a change in the number of shares represented by each ADS; or

the depositary receives notice of any meeting of holders of the shares, the depositary will fix a record date, after consultation with the Company if the date is to be different from any payment date established by the Company in respect of the shares, for the determination of the holders of ADSs who are entitled to receive the dividend, distribution or rights. The depositary will, further, give instructions for the exercise of voting rights at any such meeting or for fixing the date on or after which each ADS will represent a changed number of shares, subject to the provisions of the deposit agreement.

### ***Voting of the deposited securities***

As soon as practicable after receipt by the depositary of a notice of any meeting of shareholders of the Company, the depositary will mail a notice to the holders of the ADRs registered on the books of the depositary which will contain:

a summary in English of the notice of such meeting;

a statement that the holders of ADRs at the close of business on a specified record date will be entitled, subject to any applicable provisions of French Company Law, the Company's *statuts* and the shares, to instruct the depositary to exercise the voting rights, if any, pertaining to the shares represented by their ADSs;

summaries in English of any materials or other documents provided by the Company for the purpose of enabling holders of the ADRs to exercise voting rights; and

a statement as to the manner in which instructions for exercising voting rights may be given to the depositary, including a statement as to the manner in which the shares with respect to which the depositary does not receive properly completed voting instructions or receives a blank proxy will be voted, and stating the date established by the depositary for the receipt of those instructions.

The depositary intends so far as practicable to vote or cause to be voted the amount of the shares evidenced by the ADSs in accordance with the nondiscretionary instructions of the holders of ADSs. The depositary has agreed not to vote any of the shares so evidenced unless (i) it has received instructions from the record holders of ADRs or (ii) in accordance with the last statement of the paragraph above, if it does not receive properly



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completed voting instructions or it receives a blank proxy. Ownership of two ADRs or integral multiples of ADRs is required to exercise such voting rights subject to appropriate adjustment.

In accordance with French Company Law and the *statuts* of the Company, shares that have been fully paid and registered in the name of the same holder for at least two years will be entitled to double voting rights. Similarly, holders of ADSs that have been held in the same name for two years or more and representing shares held in registered form for two years or more are entitled to double voting rights. No other ADSs will be entitled to double voting rights. Therefore, in order to be eligible for double voting rights, each holder of the ADSs must (i) request that the depositary hold Shares in registered form and (ii) hold the ADRs in registered form (i.e., registered in the name of such holder in the books of the depositary).

***Liability of ADR holders for taxes***

The holders of ADRs will be responsible for any tax or other governmental charge that becomes payable with respect to any ADRs or any underlying deposited securities evidenced by any of the ADRs.

***Amendment and termination of the deposit agreement***

The ADRs and the deposit agreement may at any time be amended by written agreement between the Company and the depositary. Any amendment which:

imposes or increases any fees or charges, other than taxes and other governmental charges, registration fees, cable, telex, or facsimile transmission costs, deliver costs or other such expenses; or

which otherwise prejudices any substantial existing rights of holders of the ADRs, will not take effect as to outstanding ADRs until the expiration of 90 days after written notice of the amendment has been mailed to the holders of outstanding ADRs registered on the books of the depositary.

Every holder of ADRs at the time such amendment becomes effective will be deemed, if such notice shall have been mailed to the holder, by continuing to hold such ADRs, to consent to the amendment and to be bound by the deposit agreement or ADRs as amended. In no event may any amendment impair the right of any holder of ADRs to surrender his or her ADRs and receive the shares of the Company and any property represented by the ADR, except in accordance with applicable law. In the event that the depositary resigns, is removed or is otherwise substituted and the Company enters into a new deposit agreement, holders of ADRs will be notified by the successor depositary.

Whenever so directed by the Company, the depositary has agreed to terminate the deposit agreement by mailing notice of such termination to the holders of all then outstanding ADRs registered on the books of the depositary at least 30 days prior to the date fixed in the notice for the termination. The depositary may likewise terminate the deposit agreement by mailing notice of the termination to the Company and the holders of outstanding ADRs registered on the books of the depositary, if at any time 60 days after the depositary shall have delivered to the Company a written notice of its resignation, a successor depositary shall not have been appointed and accepted its appointment as provided in the deposit agreement.

The depositary will mail notice of the termination to the registered holders of ADRs then outstanding at least 30 days prior to the date fixed in the notice for the termination. On and after the date of termination, each holder shall, upon:

surrender of the holder's ADRs at the Corporate Trust Office;

payment of the fees of the depositary for the surrender of the ADRs provided in the deposit agreement;

payment of any applicable taxes and governmental charges; and

be entitled to delivery, to the holder or upon his or her order, of the amount of deposited TOTAL securities represented by the ADRs.

If any of the ADRs remain outstanding after the date of termination, the depositary will discontinue the registration of transfers of the ADRs, will suspend the distribution of dividends to the holders of the ADRs, and



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will not give any further notices or perform any further acts under the deposit agreement. The depositary will, however:

continue to collect dividends and other distributions pertaining to the underlying deposited securities;

sell rights as provided in the deposit agreement; and

continue to deliver the underlying deposited securities, together with any dividends or other distributions received, and the net proceeds of the sale of any rights or other property, in exchange for surrendered ADRs after deducting, in each case, fees and expenses of the depositary for the surrender of the ADRs, expenses for the account of the holders of the ADRs in accordance with the provisions of the deposit agreement, and taxes and governmental charges.

At any time after the expiration of one year from the date of termination, the depositary may sell: the underlying deposited securities and any other property represented by the ADSs; and

hold the net proceeds, together with any other cash then held, unsegregated and without liability for interest, for the pro rata benefit of the holders of the ADRs that have not been surrendered, in which case, the holders will become general creditors of the depositary with respect to such proceeds.

***Charges of depositary***

The depositary will charge the party to whom the ADRs are issued and the party surrendering the ADRs for delivery of shares or other underlying securities, a fee not in excess of \$5 per 100 ADSs for the issuance or surrender, respectively, of ADRs. The depositary will also charge holders of the ADRs a fee for, and will deduct the fee from, the distribution of proceeds from the sale of rights pursuant to the deposit agreement. This fee will be in an amount equal to the fee that would have been charged as a result of the deposit by holders of Shares received in exercise of rights distributed to them had such rights not been sold by the depositary and the net proceeds distributed.

In addition, the following charges will be incurred by any party depositing or withdrawing shares, surrendering the ADRs or to whom the ADRs are issued, whenever applicable:

taxes and other governmental charges;

any applicable registration fees for the registration of transfers of shares generally on the share register of the Company and applicable to transfers of shares to the name of the depositary or the custodian on the making of deposits or withdrawals under the deposit agreement;

any cable, telex and facsimile charges provided in the deposit agreement;

and expenses incurred by the depositary in the conversion of foreign currency pursuant to the deposit agreement.

The charges and expenses of the custodian are for the sole account of the depositary.

***Transfer of ADRs***

The ADRs are transferable on the books of the depositary, provided that the depositary may close the transfer books, after consultation with or at the request of the Company, at any time or from time to time, when deemed expedient by the depositary in connection with the performance of its duties. Holders of the ADRs will have the right to inspect the transfer books, subject to certain conditions provided in the deposit agreement.

As a condition precedent to the execution and delivery, registration of transfer, split-up, combination or surrender of any of the ADRs, the delivery of any distribution thereon or the withdrawal of the underlying deposited securities, the depositary or the custodian may require payment of a sum sufficient to reimburse it for any share transfer, registration or conversion fee and payments of any applicable fees provided in the deposit agreement.



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The depositary may refuse to effect any transfer of any of the ADRs or any withdrawal of the underlying deposited securities until all tax or other governmental charges payable with respect to the ADRs or deposited securities are paid. The depositary may also withhold any dividends or other distributions or, after attempting by reasonable means to notify the holder of any of the ADRs, may sell for the account of the holder any part or all of the underlying deposited securities evidenced by the ADRs, and may apply such dividends or other distributions or the proceeds of any sale to the payment of a tax or other governmental charge, with the holder of the ADRs remaining liable for any deficiency.

The delivery, transfer and registration of transfer of the ADRs generally may be suspended during any period when the transfer books of the depositary are closed, or if any such action is deemed necessary or advisable by the depositary or the Company at any time or from time to time, subject to the provisions of the deposit agreement.

The surrender of outstanding ADRs and the withdrawal of the underlying deposited securities may not be suspended subject only to:

temporary delays caused by closing the transfer books of the depositary or the Company for the deposit of shares of the Company in connection with voting at a shareholders meeting or the payment of dividends;

the payment of fees, taxes and similar charges; and

compliance with any U.S. or foreign laws or governmental regulations relating to the ADRs or to the withdrawal of the underlying deposited securities.

### ***Notices and reports***

The Company will furnish to the depositary for distribution to the holders of ADRs:

annual reports containing audited consolidated financial statements, semi-annual reports that will include unaudited summary financial information;

summaries of notices of shareholders meetings; and

other reports and summaries that are generally distributed by the Company to its shareholders.

The depositary will arrange for the mailing of copies of such reports and summaries in English to all record holders of the ADSs.

### ***Compliance with U.S. securities laws***

Notwithstanding anything in the deposit agreement to the contrary, the Company and the depositary each agrees that it will not exercise any rights it has under the deposit agreement to permit the withdrawal or delivery of the underlying deposited securities in a manner which would violate U.S. securities laws.

### ***Governing law***

The deposit agreement is governed by the laws of the State of New York.

### ***Other Issues***

#### ***Shareholders meetings***

French companies may hold either ordinary or extraordinary general meetings of shareholders. Ordinary general meetings are required for matters that are not specifically reserved by law to the extraordinary general meetings: the election of the members of the Board of Directors, the appointment of statutory auditors, the approval of a management report prepared by the Board of Directors, the approval of the annual financial statements, the declaration of dividends and the issuance of bonds. Extraordinary general meetings are required for approval of amendments to a company's *statuts*, modification of shareholders rights, mergers, increases or decreases in share capital, including a waiver of preferential subscription rights, the creation of a new class of

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shares, the authorization of the issuance of investment certificates or securities convertible, exchangeable or redeemable into shares and for the sale or transfer of substantially all of a company's assets.

The Company's Board of Directors is required to convene an annual general meeting of shareholders for approval of the annual financial statements. This meeting must be held within six months of the end of the fiscal year. However, the president of the *Tribunal de Commerce* of Nanterre, the local French commercial court, may order an extension of this six-month period. The Company may convene other ordinary and extraordinary meetings at any time during the year. Meetings of shareholders may be convened by the Board of Directors or, if it fails to call a meeting, by the Company's statutory auditors or by a court-appointed agent. A shareholder or shareholders holding at least 5% of the share capital, the employee committee or another interested party under certain urgent circumstances, may request that the court appoint an agent. The notice of meeting must state the agenda for the meeting.

French Company Law requires that a preliminary notice of a listed company's general shareholders meeting be published in the *Bulletin des annonces légales obligatoires* (BALO) at least 30 days prior to the meeting. The preliminary notice must first be sent to the *Autorité des marchés financiers* with an indication of the date it is to be published in the BALO. The preliminary notice must include the agenda of the meeting and the proposed resolutions that will be submitted to a shareholders' vote. Within 10 days of publication, one or more shareholders holding a certain percentage of the Company's share capital determined on the basis of a formula related to capitalization, may propose additional resolutions.

Notice of a shareholders meeting is sent by mail at least 15 days before the meeting to all holders of registered shares who have held their Shares for more than one month. However, in the case where the original meeting was adjourned because a quorum was not met, this time period is reduced to six days.

Attendance and the exercise of voting rights at both ordinary and extraordinary general meetings of shareholders are subject to certain conditions. Under the Company's *statuts*, in order to participate in any shareholders meeting, the owners of bearer shares or shares that are entered in an account not maintained by the Company must, at least one day before the date of the meeting, file a certificate (*certificat d'immobilisation des titres au porteur*) prepared by the broker who keeps their accounts, recording the non-transferability of the securities until the meeting date at the places indicated in the meeting notice. The owners of registered shares entered in an account maintained by the Company must be entered into the Company's registers at least one day before the day scheduled for the meeting.

Subject to the above restrictions, all of the Company's shareholders have the right to participate in the Company's shareholders meetings, either in person or by proxy. No shareholder may delegate voting authority to another person except the shareholder's spouse or another shareholder or, if the shareholder is not a resident of France, by a registered intermediary in conformity with applicable regulations. Shareholders may vote, either in person, by proxy or by mail, and each is entitled to as many votes as he or she possesses or as many shares as he or she holds proxies for. If the shareholder is a legal entity, it may be represented by a legal representative. A shareholder may grant a proxy to the Company by returning a blank proxy form. In this last case, the chairman of the shareholders meeting may vote the shares in favor of all resolutions proposed or agreed to by the Board of Directors and against all others. The Company will send proxy forms to shareholders upon request. In order to be counted, proxies must be received at least one day prior to the shareholders meeting at the Company's registered office or at another address indicated in the notice convening the meeting. Under French Company Law, Shares held by entities controlled directly or indirectly by the Company are not entitled to voting rights. There is no requirement that a shareholder have a minimum number of shares in order to be able to attend or be represented at shareholders meetings.

Under French Company Law, a quorum requires the presence, in person or by proxy, including those voting by mail, of shareholders having at least 25% of the shares entitled to vote in the case of an ordinary general shareholders meeting or at an extraordinary general meeting where shareholders are voting on a capital increase by capitalization of reserves, profits or share premium, or 33<sup>1</sup>/<sub>3</sub>% of the shares entitled to vote in the case of any other extraordinary general shareholders meeting. If a quorum is not present at any meeting, the meeting is adjourned. There is no quorum requirement when an ordinary general meeting is reconvened, but the reconvened meeting may consider only questions which were on the agenda of the adjourned meeting. When an extraordinary



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general meeting is reconvened, the quorum required is 25% of the shares entitled to vote, except where the reconvened meeting is considering capital increases through capitalization of reserves, profits or share premium. For these matters, no quorum is required at the reconvened meeting. If a quorum is not present at a reconvened meeting requiring a quorum, then the meeting may be adjourned for a maximum of two months.

At an ordinary general meeting, approval of any resolution requires the affirmative vote of a simple majority of the votes of the shareholders present or represented by proxy. The approval of any resolution at an extraordinary general meeting requires the affirmative vote of a two-thirds majority of the votes cast, except that any resolution to approve a capital increase by capitalization of reserves only requires the affirmative vote of a simple majority of the votes cast. Notwithstanding these rules, an unanimous vote is required to increase shareholders' liabilities. Abstention from voting by those present or represented by proxy is counted as a vote against any resolution submitted to a vote.

As set forth in the Company's *statuts*, shareholders meetings are held at the Company's registered office or at any other location specified in the written notice.

***Ownership of shares by non-French persons***

There is no limitation on the right of non-resident or foreign shareholders to vote securities of the Company, either under French Company Law or under the *statuts* of the Company.

***Requirement for holdings exceeding certain percentages***

French Company Law provides that any individual or entity, acting alone or in concert with others, that holds, directly or indirectly, more than 5%, 10%, 20%, 33<sup>1</sup>/<sub>3</sub>%, 50% or 66<sup>2</sup>/<sub>3</sub>% of the outstanding shares or the voting rights attached to the shares, or that increases or decreases its shareholding or voting rights by any of the above percentages must notify the Company by registered letter, with return receipt, within 5 calendar days of crossing that threshold, of the number of shares and voting rights it holds. An individual or entity must also notify the *Autorité des marchés financiers*, the self-regulatory organization that has general regulatory authority over the French stock exchanges and whose members include representatives of French stockbrokers, by registered letter, with return receipt, within five trading days of crossing that threshold. Any shareholder who fails to comply with these requirements may have all or part of its voting rights suspended for up to five years by the commercial court at the request of the Company's Chairman, any of the Company's shareholders or the *Autorité des marchés financiers*. In addition, every shareholder who, directly or indirectly, acting alone or in concert with others, acquires ownership or control of shares representing 10% or 20% of the Company's share capital must notify the Company and the *Autorité des marchés financiers* of its intentions for the 12 months following such acquisition. Failure to comply with this notification of intentions will result in the suspension of the voting rights attached to the shares exceeding this 10% or 20% threshold held by the shareholder for a period of two years from the date on which the shareholder has cured such default.

In addition, the Company's *statuts* provide that any person, whether a natural person or a legal entity, who comes to hold, directly or indirectly, 1% or more, or any multiple of 1%, of the Company's share capital or voting rights or of securities that may include future voting rights or future access to share capital or voting rights, must notify the Company by registered letter-with return receipt requested, within 15 calendar days of the acquisition. Failure to comply with these notification provisions will result in the suspension of the voting rights attached to the shares exceeding this 1% threshold held by the shareholder if requested at a shareholder's meeting by one or more shareholders holding shares representing at least 3% of the share capital.

Any individual or legal entity whose direct or indirect holding of shares falls below each of the levels mentioned must also notify the Company in the manner and within the time limits set forth above.

***Specific rights of the French State in the share capital of Elf Aquitaine***

The share capital of Elf Aquitaine previously included a specific share providing specific rights to the French Republic, following the conversion of a common share decided by the decree dated December 13, 1993. This decree provided in particular for a right of approval in case a party or a group of parties are increasing their

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ownership of capital or voting rights above defined thresholds. The French Government abrogated the specific share by decree on October 3, 2002.

### **MATERIAL CONTRACTS**

There have been no material contracts (not entered into in the ordinary course of business) entered into by members of the Group since March 31, 2003.

### **EXCHANGE CONTROLS**

Under current French exchange control regulations, no limits exist on the amount of payments that TOTAL may remit to residents of the United States. Laws and regulations concerning foreign exchange controls do require, however, that an accredited intermediary must handle all payments or transfer of funds made by a French resident to a non-resident.

### **TAXATION**

#### **General**

This section describes the material United States federal income tax and French tax consequences of owning and disposing of shares and ADSs of TOTAL to U.S. Holders that hold their shares or ADS as capital assets for tax purposes. A U.S. Holder is a beneficial owner of shares or ADSs that is (i) a citizen or resident of the United States for United States federal income tax purposes, (ii) a domestic corporation or other domestic entity treated as a corporation for United States federal income tax purposes, (iii) an estate whose income is subject to United States federal income tax regardless of its source, or (iv) a trust if a U.S. court can exercise primary supervision over the trust's administration and one or more U.S. persons are authorized to control all substantial decisions of the trust.

This section does not apply to members of special classes of holders subject to special rules, including:

dealers in securities,

traders in securities that elect to use a mark-to-market method of accounting for their securities holdings,

tax-exempt organizations,

life insurance companies,

persons liable for alternative minimum tax,

persons that actually or constructively own 5% or more of the share capital or voting rights in TOTAL,

persons that hold the shares or ADSs as part of a straddle or a hedging or conversion transaction, or

U.S. Holders whose functional currency is not the U.S. dollar.

In addition, the discussion of the material French tax consequences is limited to U.S. Holders that (i) are residents of the United States for purposes of the Treaty (as defined below), (ii) do not maintain a permanent establishment or fixed base in France to which the shares or ADSs are attributable and through which the respective U.S. Holder carries on, or has carried on, a business (or, if the holder is an individual, performs or has performed independent personal services), and (iii) is otherwise eligible for the benefits of the Treaty in respect of income and gain from the shares or ADSs.

This section is based on the Internal Revenue Code of 1986, as amended, its legislative history, existing and proposed regulations, published rulings and court decisions, and with respect to the description of the material French tax consequences, the laws of the Republic of France and French tax regulations, all as currently in effect, as well as on the Convention Between the United States of America and the Republic of France for the Avoidance of Double Taxation (the Treaty). These laws are subject to change, possibly on a retroactive basis.

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*Holders are urged to consult their own tax advisor regarding the United States federal, state and local, and French and other tax consequences of owning and disposing shares or ADSs of TOTAL in their respective circumstances. In particular, a holder is encouraged to confirm whether the holder is a U.S. Holder eligible for the benefits of the Treaty with its advisor.*

### **Taxation of Dividends**

#### ***French taxes***

Dividends paid to non-residents of France are subject to French withholding tax at a rate of 25% unless the rate is reduced pursuant to a tax treaty or similar agreement. Under the Treaty, a U.S. Holder generally is entitled to a reduced rate of French withholding tax of 15% with respect to dividends, provided the ownership of shares or ADSs is not effectively connected with a permanent establishment or a fixed base in France and certain other requirements are satisfied.

In France, companies may pay dividends only out of income remaining after tax has been paid. Until December 31, 2004, when dividends were received by shareholders resident in France, such persons were under certain circumstances entitled to a tax credit (*avoir fiscal*) representing a portion of the underlying tax paid at the corporate level.

The French Finance Law of 2004 repealed the benefit of the *avoir fiscal* with respect to dividends received (i) in 2004, except in certain specific cases, by corporate shareholders resident in France, and (ii), starting in 2005, by individual shareholders resident in France. Instead, for dividends received after December 31, 2004, French resident shareholders who are individuals are taxed on only 50% of the amount of dividends and, in addition, are entitled to a new tax credit (*crédit d'impôt*) equal to 50% of the amount of dividends they received but with an overall annual cap of 230 or, as the case may be, 115 depending on the marital status of the individual holder.

Furthermore, the French Finance Law of 2004 imposes an exceptional tax to be levied at the rate of 25% on dividends or other distributions (in each case, before withholding tax) paid in 2005 out of profits that have not been taxed at the ordinary corporate income tax rate or that were earned and taxed more than five years before the relevant dividend or distribution. An amount equal to up to one-third of this exceptional tax, if levied, will be creditable against the corporation tax liability of the Company in each of the three years beginning in 2006, with any part of such amount remaining at the end of each year of the three-year period being refunded with respect to each relevant year, upon request, in cash by the French Treasury to the Company.

Since the *avoir fiscal* has now been repealed, U.S. Holders are no longer entitled to any refund in respect thereof for dividends received after December 31, 2004. Moreover, French domestic law does not specify whether non-French resident shareholders, including U.S. Holders, are eligible to benefit from the new *crédit d'impôt*. Given the language of the Treaty, it is not possible to confirm that the *crédit d'impôt* will be available to qualifying U.S. Holders to the same extent that the *avoir fiscal* was available, if at all.

However, U.S. Holders who are individuals remain entitled to a refund of the *avoir fiscal* in respect of dividends paid to them in 2004, even if in practice, the *avoir fiscal* is refunded only in 2005.

Therefore, in respect of dividends distributed in 2004, a U.S. Holder who is an individual is entitled to the payment of an amount equal to the *avoir fiscal* equal to 50% of the dividend (subject to a deduction of the 15% withholding tax), subject to certain procedural rules.

If the applicable procedures have not been followed prior to the 2004 dividend payment date, U.S. Holders will be entitled to claim a refund of any withholding tax in excess of the 15% rate and, for U.S. Holders who are individuals, the payment of the *avoir fiscal*, by filing the French Treasury Form 5052 EU with the depositary or the French paying agent early enough to enable them to forward that form to the French tax authorities before December 31, 2005.

In respect of dividend distributions in 2005, the administrative guidelines issued on February 25, 2005 (4 J-1-05) (the February 25, 2005 Administrative Guidelines) set forth the conditions under which the reduced

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French withholding tax at the rate of 15% may be available. The immediate application of the reduced 15% rate is available to those U.S. Holders that may benefit from the so-called simplified procedure (within the meaning of the February 25, 2005 Administrative Guidelines).

Under the simplified procedure, U.S. Holders may claim the immediate application of withholding tax at the rate of 15% on the French dividends to be received by them, provided that :

- (i) they furnish to the financial institution managing their securities account a certificate of residence conforming with the model attached to the February 25, 2005 Administrative Guidelines. The immediate application of the 15% withholding tax will be available only if the certificate of residence is sent to the financial institution managing their securities account before the dividend payment date. Furthermore, each financial institution managing the U.S. Holders securities account must also send to the French paying agent the figure of the total amount of dividends to be received which are eligible to the reduced withholding tax rate before the dividend payment date;
- (ii) the U.S. financial institution managing the U.S. Holder s securities account provides to the French paying agent a list of the Eligible U.S. Holders and other pieces of information set forth in the February 25, 2005 Administrative Guidelines. Furthermore, the financial institution managing the U.S. Holders securities account should certify that each Holder is, to the best of its knowledge, a United States resident within the meaning of the Treaty. These documents must be sent as soon as possible, in all cases before the end of the third month computed as from the end of the month of the dividend payment date.

Where the U.S. Holder s identity and tax residence are known by the French paying agent, the latter may release such U.S. Holder from furnishing to (i) the financial institution managing its securities account, or (ii) as the case may be, the Internal Revenue Service, the abovementioned certificate of residence, and apply the 15% withholding tax rate to dividends it pays to such U.S. Holder.

U.S. Pension Funds and Other Tax-Exempt Entities created and operating in accordance with the provisions of Sections 401 (a), 403 (b), 457 or 501 (c) (3) of the U.S. Internal Revenue Code (IRC) are subject to the same general filing requirements except that, in addition, they have to supply a certificate issued by the U.S. Internal Revenue Service ( IRS ) or any other document stating that they have been created and are operating in accordance with the provisions of the abovementioned Code Sections. This certificate must be produced together with the first request of application of the reduced rate, once together with the first request of immediate application of the 15% withholding tax and at French Tax Authorities specific request.

In the same way, regulated companies such as RIC, REIT, REMIC will have to send to the financial institution managing their securities account a certificate from the IRS indicating that they are classified as Regulated Companies (RIC, REIT or REMIC) within the provisions of the relevant sections of the IRC. In principle, this certification must be produced each year and before the dividend payment.

For a U.S. Holder that is not entitled to the simplified procedure, the 25% French withholding tax will be levied at the time the dividends are paid. Such U.S. Holder may, however, be entitled to a refund of the withholding tax in excess of the 15% rate under the standard , as opposed to the simplified , procedure, provided that the U.S. Holder furnishes to the French paying agent an application for refund on form RF 1A EU-No 5052 (or any other relevant form to be issued by the French tax authorities), certified by U.S. financial institution managing the U.S. Holder s securities account, before December 31 of the second year following the date of payment of the withholding tax at the 25% rate to the French tax authorities. Any French withholding tax refund is generally expected to be paid within twelve months from the filing of form RF 1A EU-No 5052 (or any other relevant form to be issued by the French tax authorities). However, it will not be paid before January 15 of the year following the year in which the dividend was paid.

Copies of the form RF 1A EU-No 5052 (or any other relevant form to be issued by the French tax authorities) as well as the form of the certificate of residence and the U.S. financial institution certification, together with instructions, are (or will be, as soon as practical) available from the U.S. Internal Revenue Service and the French Centre des Impôts des Non-Residents at 9, rue d Uzès, 75094 Paris Cedex 2, France.





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These forms, together with instructions, will also be provided by the Depositary to all U.S. Holders of ADRs registered with the Depositary. The Depositary will use reasonable efforts to follow the procedures established by the French tax authorities for U.S. Holders to benefit from the immediate application of the 15% French withholding tax rate or, as the case may be, recover the excess 10% French withholding tax initially withheld and deducted in respect of dividends distributed to them by the Company, and obtain, in respect to dividend distributions in 2004 made to U.S. Holders who are individuals, the refund of the *avoir fiscal*, in accordance with the procedures established by the French tax authorities. To effect such benefit, recovery and/or refund, the Depositary shall advise such U.S. Holder to return the relevant forms to it properly completed and executed. Upon receipt of the relevant forms properly completed and executed by such U.S. Holder, the Depositary shall cause them to be filed with the appropriate French tax authorities, and upon receipt of any resulting remittance, the Depositary shall distribute to the U.S. Holder entitled thereto, as soon as practicable, the proceeds thereof in U.S. Dollars.

The identity and address of the French paying agent is available from the Company.

***United States taxation***

For United States federal income tax purposes, the gross amount of dividend a U.S. Holder must include in gross income equals the amount paid by TOTAL plus any amount of *avoir fiscal* or, as the case may be, the refund up to 115 or 230 described above (see French Taxes above) transferred to the U.S. Holder with respect to this amount (including any French tax withheld with respect to the distribution made by TOTAL or the *avoir fiscal*) to the extent of the current and accumulated earnings and profits of TOTAL (as determined for United States federal income tax purposes). The dividend will be income from foreign sources. Dividends paid to a noncorporate U.S. Holder in taxable years before January 1, 2009 that constitute qualified dividend income will be taxable to the holder at a maximum tax rate of 15% provided that the shares or ADSs are held for more than 60 days during the 121 period beginning 60 days before the ex-dividend date and the holder meets other holding period requirements. TOTAL believes that dividends paid by TOTAL with respect to its shares or ADSs will be qualified dividend income. The dividend will not be eligible for the dividends-received deduction allowed to a U.S. corporation under Section 243 of the Code. The dividend is taxable to the U.S. Holder when the holder, in the case of shares, or the Depositary, in the case of ADSs, receives the dividend, actually or constructively. To the extent that an amount received by a U.S. Holder exceeds the allocable share of the Company's current and accumulated earnings and profits, it will be applied first to reduce such holder's tax basis in shares or ADSs owned by such holder and then, to the extent it exceeds the holder's tax basis, it will constitute capital gain.

The amount of any dividend distribution includible in the income of a U.S. Holder equals the U.S. dollar value of the euro payment made, determined at the spot dollar/euro exchange rate on the date the dividend distribution is includible in the U.S. Holder's income, regardless of whether the payment is in fact converted into U.S. dollars. Any gain or loss resulting from currency exchange fluctuations during the period from the date the dividend payment is includible in the U.S. Holder's income to the date the payment is converted into U.S. dollars will generally be treated as ordinary income or loss from sources within the United States and will not be eligible for the special tax rate applicable to qualified dividend income.

Subject to certain conditions and limitations, French taxes withheld in accordance with the Treaty will be eligible for credit against the U.S. Holder's United States federal income tax liability. The limitation on foreign taxes eligible for credit is not calculated with respect to all worldwide income, but instead is calculated separately with respect to specific classes of income. In addition, special rules apply in determining the foreign tax credit limitation with respect to dividends that are subject to the maximum 15% tax rate. For this purpose, dividends distributed by the Company and the related *avoir fiscal* payments generally will constitute passive income, or, in the case of certain U.S. Holders, financial services income. Alternatively, a U.S. Holder may claim all foreign taxes paid as an itemized deduction in lieu of claiming a foreign tax credit.

***Taxation of Disposition of Shares***

In general under the Treaty, a U.S. Holder will not be subject to French tax on any capital gain from the sale or exchange of the ADSs or redemption of the underlying shares unless those ADSs or shares form part of a



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business property of a permanent establishment or fixed base that the U.S. Holder has in France. Special rules may apply to individuals who are residents of more than one country.

If a transfer of shares of the Company is evidenced by a written agreement, such share transfer agreement is, in principle, subject to registration formalities and therefore to a 1% registration duty assessed on the higher of the purchase price and the market value of the shares (subject to a maximum assessment of 3,049 per transfer), provided that, under certain circumstances, no duty is due if such written share transfer agreement is executed outside France. The Amending French Finance Law of 2004 increased the above 1% rate of registration duty to 1.1% (subject to a maximum assessment increased to 4,000 per transfer) with respect to written share transfer agreements executed in France as of January 1, 2006.

For United States federal income tax purposes, a U.S. Holder generally will recognize capital gain or loss upon the sale or disposition of shares or ADSs equal to the difference between the U.S. dollar value of the amount realized on the sale or disposition and the holder's tax basis, determined in U.S. dollars, in the shares or ADSs. The gain or loss generally will be United States source gain or loss and will be long-term capital gain or loss if the U.S. Holder's holding period of the shares or ADSs is more than one year at the time of the disposition. Long-term capital gain of a non-corporate U.S. Holder that is recognized on or after May 6, 2003 and before January 1, 2009 is taxed at a maximum rate of 15%. The deductibility of capital losses is subject to limitation.

### **French Estate and Gift Taxes**

In general, a transfer of ADSs or shares by gift or by reason of the death of a U.S. Holder that would otherwise be subject to French gift or inheritance tax, respectively, will not be subject to such French tax by reason of the Convention between the United States of America and the French Republic for the Avoidance of Double Taxation and the Prevention of Fiscal Evasion with Respect to Taxes on Estates, Inheritances and Gifts, dated November 24, 1978, unless the donor or the transferor is domiciled in France at the time of making the gift, or at the time of his death, or if the ADSs or shares were used in, or held for use in, the conduct of a business through a permanent establishment or a fixed base in France.

### **French Wealth Tax**

The French wealth tax does not apply to a U.S. Holder (i) that is not an individual, or (ii) in the case of individuals who own alone or with their parents, directly or indirectly, less than 25% of the Company's share capital.

### **United States State and Local Taxes**

In addition to United States federal income tax, U.S. Holders of shares or ADSs may be subject to U.S. state and local taxes with respect to their shares or ADSs. U.S. Holders should consult their own tax advisors.

### **DIVIDENDS AND PAYING AGENTS**

After BNP Paribas Securities Services performs centralizing procedures, dividends are paid through the accounts of financial intermediaries participating in Euroclear France's direct payment procedures. The Bank of New York acts as paying agent for dividends distributed to ADS holders.

### **DOCUMENTS ON DISPLAY**

TOTAL files annual, periodic, and other reports and information with the Securities and Exchange Commission. You may read and copy any reports, statements or other information TOTAL files with the Securities and Exchange Commission at the Securities and Exchange Commission's public reference rooms by calling the Securities and Exchange Commission for more information at 1-800-SEC-0330. All of TOTAL's Securities and Exchange Commission filings made after December 31, 2001 are available to the public at the Securities and Exchange Commission web site at <http://www.sec.gov> and from certain commercial document retrieval services. TOTAL's website at <http://www.total.com> includes information about our businesses and also includes recent press releases and other publications of TOTAL, including some of our filings with the Securities

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and Exchange Commission made prior to December 31, 2001. You may also read and copy any document the Company files with the Securities and Exchange Commission at the offices of The New York Stock Exchange, 20 Broad Street, New York, New York 10005.

**ITEM 11. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK**

The financial performance of the Company is sensitive to a number of parameters, the most significant being oil and gas prices, generally expressed in U.S. dollars, and exchange rates, in particular that of the U.S. dollar versus the euro.

Overall, a rise in the price of crude oil has a positive effect on earnings as a result of an increase in revenues from oil and gas production. Conversely, a decline in crude oil prices reduces revenues. For the year 2005, the Company estimates that an increase or decrease of \$1 per barrel in the price of Brent crude would respectively improve or reduce annual net income by approximately 0.2 B<sup>(16)</sup>. The impact of changes in crude oil prices on Downstream and Chemicals operations depends upon the speed at which the prices of finished products will adjust to reflect these changes. The Company estimates that an increase or decrease in TRCV refining margins of \$1 per ton would improve or reduce annual net income by approximately 0.06 B .

All of the Company's activities are in various degrees sensitive to fluctuations in the dollar/euro exchange rate. For the year 2005, the Company estimates that a strengthening or weakening of the U.S. dollar by 0.10 against the euro would respectively improve or reduce annual net income, expressed in euro, by approximately 0.6 B<sup>(16)</sup>.

The Company's results, in particular in the Chemicals segment, also depend on the overall economic environment.

**OIL AND GAS MARKET RELATED RISKS**

Due to the nature of its business, the Company has a significant involvement in oil and gas trading as part of its normal operations in order to attempt to optimize revenues from its crude oil and gas production and obtain favorable pricing for supplies for its refineries.

In 2004, international oil trading activities represented approximately 5.4 Mboe/d, 4.4 Mboe/d of which were crude oil related. The Company follows a policy of not selling its future oil and gas production for future delivery. However, as part of its oil trading activities, the Company uses derivative financial instruments such as futures, forwards, swaps, and options in both organized and over-the-counter markets. The Group also uses freight rate derivatives in its Shipping activities to adjust its exposure to freight-rate fluctuations. Under these practices, the Company is primarily exposed to market risks related to residual price differentials due to variations in qualities, indices or delivery periods.

(16) Calculated with a base case exchange rate of \$1.25 dollars per euro.

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The notional values of derivatives as of December 31, 2004 are stated below:

	Notional value 2004	
	Assets	Liabilities
	(in millions of euros)	
Crude oil and petroleum products and freight rates		
Petroleum products and crude oil swaps(1)	3,454	3,778
Forward freight agreements	29	71
Forwards	233	882
Options(2)	2,712	2,162
Futures(3)	536	914
Options on futures(2)	199	228
Natural gas and power		
Swaps(1)	140	240
Forwards	4,568	5,227
Options(2)	35	22
Futures(3)	17	8

(1) Swaps (including Contracts for differences): the assets/liabilities columns correspond to receive-fixed and pay-fixed swaps.

(2) Options: the assets/liabilities columns correspond to the nominal value of options (calls or puts) purchased/sold, valued based on the strike.

(3) Futures: the assets/liabilities columns correspond to the net purchasing/selling positions, valued based on the closing rate on the organized exchange market.

Contracts on crude oil and petroleum products have been primarily entered into for a short term (less than one year). For crude oil and petroleum products, Forwards include instruments that may result in physical delivery; all other spot or term contracts with physical delivery and price established on the basis of quotations of published market indexes are not included. For natural gas and power activity, Forwards include derivative instruments as well as all contracts resulting in physical delivery.

The fair value of derivatives as of December 31, 2004, was as follows:

	As of December 31, 2004	
	Carrying value	Estimated fair value
	(in millions of euros)	
Commodities (comparable to financial instruments)(1)		
Petroleum products and crude oil swaps, forward freight agreements	36	36
Petroleum products and crude oil options	9	9
Natural gas and power swaps	(1)	(1)
Natural gas and power options		

(1) Operations which will not generate physical delivery at maturity date. The carrying value corresponds to the value of these instruments on the balance sheet.

To measure market risks related to the prices of oil and gas products, the Company uses a value at risk method. Under this method, for the Company's crude oil and refined products trading activities, there is a 97.5% probability that unfavorable daily market variations would result in a loss of less than 6.4 M per day, based on positions as of December 31, 2004. Over the year 2004, the average value at risk was 7.8 M, the low value at risk was 3.9 M, the high value at risk was 11.8 M.

In 2004, Group-wide natural gas and electricity trading activity accounted for total physical volumes of 6.4 Bcf/d (1.2 Mboe/d). As part of these activities, the Company also uses derivative instruments such as futures, forwards, swaps and options in both organized and over-the-counter markets. In general, the transactions are settled at maturity date through physical delivery. Under the Company's value at risk analysis based on the model described above, there is a 97.5% probability that unfavorable daily market variations would result in a loss of

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less than 4.4 M per day, based on positions as of December 31, 2004. Over the year 2004, the average value at risk was 2.5 M , the low value at risk was 1.0 M , the high value at risk was 5.7 M .

The Company has implemented strict policies and procedures to manage and monitor these market risks. Trading and financial controls are carried out separately and an integrated information system enables real-time monitoring of trading activities. Limits on trading positions are approved by the Company's Executive Committee and are monitored daily. To increase flexibility and encourage liquidity, hedging operations are performed with numerous independent operators, including other oil companies, major energy consumers and financial institutions. The Company has established limits for each counterparty, and outstanding amounts for each counterparty are monitored on a regular basis.

**FINANCIAL MARKETS RELATED RISKS**

Risks relative to cash management activities and to interest rate and foreign exchange financial instruments are managed in accordance with rules set by the Company's Management. Liquidity positions and the management of financial instruments are centralized in the Treasury Department.

Cash management activities are organized into a specialized department for operations on financial markets. In addition, the financial control department handles the daily monitoring of limits and positions and validates results. It values financial instruments and, if necessary, performs sensitivity analysis. The Company only uses simple derivative instruments.

Commitments and contingencies related to the Company's financial derivatives activities are stated below. These amounts set the levels of notional involvement by the Company and are not indicative of an unrealized gain or loss.

As of December 31, 2004	Total	2005	2006	2007	2008	2009	2010 and after
(in millions of euros)							
<b>MANAGEMENT OF INTEREST RATE EXPOSURE</b>							
<b>Issue swaps and swaps hedging debenture issues</b>							
Notional amount	9,490	1,433	474	1,599	1,698	1,948	2,338
Received rate (as of 12.31.2004) 4.40%							
Paid rate (as of 12.31.2004) 2.68%							
<b>Long-term currency and interest rate swaps</b>							
Notional amount	105	37	2	66			
Received rate (as of 12.31.2004) 3.58%							
Paid rate (as of 12.31.2004) 3.36%							
<b>Long-term interest rate swaps</b>							
<b>Receive-fixed swaps</b>							
Notional amount	37	34	1				2
Received rate (as of 12.31.2004) 5.45%							

Paid rate (as of 12.31.2004)  
2.55%

**Pay-fixed swaps**

Notional amount	3	3
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Received rate (as of 12.31.2004)  
2.30%

Paid rate (as of 12.31.2004)  
5.56%

**Short-term interest rate swaps**

Notional amount	16,997	16,997
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**MANAGEMENT OF CURRENCY  
EXPOSURE****Currency swaps**

Notional amount	10,531	10,160	111	28	16	16	200
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**Forward exchange contracts**

Notional amount	116	116
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Most long-term swaps (interest rate and/or currency swaps, issue swaps or swaps hedging debenture issues) are aimed at converting fixed-rate debt into floating-rate debt on a LIBOR basis or equivalent.



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The average interest rates are given for information purposes and reflect, for the floating-rate portion, market conditions at year-end.

**Currency Exposure**

The Group seeks to minimize the currency exposure of each entity by reference to its functional currency (primarily the euro, U.S. dollars, pounds sterling, and Norwegian krone).

For currency exposure generated by commercial activity, the hedging of revenues and costs in foreign currencies is typically performed using currency operations on the spot market and in some cases on the forward market. The Company rarely hedges estimated flows and, in this case, may use options.

With respect to currency exposure linked to long-term assets in foreign currencies, the Company makes an effort to reduce the associated currency exposure by financing in the same currency. Long-term currency debt then compensates the economic exposure generated.

Short-term net currency exposure is periodically monitored with limits set by the Company's Management. The Group's treasury department manages this currency exposure and centralizes borrowing activities on the financial markets (the proceeds of which are then loaned to the borrowing subsidiaries) and also manages cash centralization for Group companies and investments of these funds on the monetary markets.

**Short-Term Interest Rate Exposure and Cash**

Cash balances, which are primarily composed of euros and U.S. dollars, are managed with three main objectives set out by management (to maintain maximum liquidity, to optimize revenue from investments considering existing interest rate yield curves, and to minimize the cost of borrowing), over a horizon of less than twelve months and on the basis of a daily interest rate benchmark, primarily through short-term interest rate swaps and short-term currency swaps, without modification of the currency exposure.

**Interest Rate Risk on Long-Term Debt**

The Company's policy consists of incurring debt primarily at a floating rate in order to deal with significant changes in cash flows due to external factors (oil prices and the dollar/euro exchange rate).

Long-term interest rate and currency swaps can hedge debenture loans at their issuance in order to create a variable rate synthetic debt. In order to partially modify the interest rate structure of the long-term debt, the Company can also enter into long-term interest rate swaps.

**Table of Contents****Sensitivity Analysis on Interest Rate and Foreign Exchange Risk**

The table below presents the potential impact on the fair value of the current financial instruments as of the date indicated, of an increase or decrease of 10% in the interest rate yield curves in each of the currencies.

As of December 31, 2004

			Change in fair value with a 10 % interest rate increase (unaudited)	Change in fair value with a 10 % interest rate decrease (unaudited)
	Carrying amount	Estimated fair value		
(in millions of euros)				
<b>BALANCE SHEET</b>				
Debenture loans (before swaps and excluding current portion)(1)	8,208	9,481	(110)	112
Issue swaps(1)		(1,297)	107	(109)
Fixed-rate bank loans (excluding capital lease obligations)	288	274	(8)	9
Current portion of long-term debt (excluding current portion of capital lease obligations)	1,762	1,803	(1)	1
<b>OFF-BALANCE SHEET</b>				
Bank guarantees		(2)		
Interest rate and currency swaps		32	(1)	1
Long-term interest rate swaps		1	(1)	1
Short-term interest rate swaps		1	2	(2)
Currency swaps		(313)		
Forward exchange contracts		(4)		
Currency options				

(1) Debentures loans are presented after swaps at their carrying amount and before swaps for their estimated fair value. All issue swaps specifically hedge debenture loans. The fair values of these swaps may therefore be incorporated into the overall value of debenture loans.

As a result of its policy for the management of currency exposure previously described, the Group believes that its short-term currency exposure is not material. The Group's sensitivity to long-term currency exposure is primarily attributable to the net equity of the subsidiaries whose functional currency is the U.S. dollar and, to a lesser extent, the pound sterling and the Norwegian krone. This sensitivity is reflected by the historical evolution of the currency translation adjustment imputed in the statement of changes in shareholders' equity which, in the course of the last three fiscal years, was essentially related to the evolution of the U.S. dollar and is set forth in the table below:

Dollar/Euro exchange rates	Currency Translation Adjustment
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		(in millions of euros)
December 31, 2002	1.05	(830)
December 31, 2003	1.26	(3,268)
December 31, 2004	1.36	(4,653)

The long-term debt in U.S. dollars described in Note 17 of the Notes to the Consolidated Financial Statements is generally raised by the central treasury entities either in U.S. dollars or in other currencies which are then systematically exchanged for U.S. dollars through issue swaps. The proceeds from these debt issuances are principally loaned to affiliates whose accounts are kept in U.S. dollars and any remaining balance is held in dollar-denominated investments. As a consequence, the net sensitivity of these positions to currency exposure is not material.

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Short-term currency swaps for which the nominal amount appears in Note 24 of the Notes to the Consolidated Financial Statements are used with the aim of optimization of centralized management of the cash of the Group. Thus the sensitivity to currency fluctuations which may be induced is likewise considered negligible.

As a result of this policy, the impact of currency exchange on consolidated net income, as illustrated in Note 21 of the Notes of the Consolidated Financial Statements, has not been significant despite the considerable fluctuation of the U.S. dollar (negative 72 M in 2004, negative 59 M in 2003 and negative 50 M in 2002).

**Counterparty Risk**

The Company has established standards according to which bank counterparties must be approved in advance, based on an assessment of the counter party's financial soundness and its rating (Standard & Poors, Moody's), which must be of high quality.

An overall authorized credit limit is set for each bank and is divided among the subsidiaries and the Company's Treasury Department according to their needs.

**Stock Market Risk**

The Group holds interests in a number of publicly-traded companies (see Note 9 of the Notes to the Consolidated Financial Statements). The market values of these holdings fluctuate due to various factors, including stock market trends, valuations of the sectors in which the companies operate, and the economic and financial condition of each individual company.

**Liquidity Risk**

TOTAL S.A. has confirmed lines of credit granted by international banks, which would allow it to manage its short-term liquidity needs as required. The total amount of these lines of credit as of December 31, 2004, was \$7,001 million, of which \$6,956 million was unused. The terms and availability of these lines of credit are not conditioned on the Company's financial ratios, its financial ratings or on the absence of events that could have a material adverse impact on its financial situation.

The total amount, as of December 31, 2004, of confirmed lines of credit granted by international banks to Group companies, including TOTAL S.A., was \$7,841 million of which \$7,233 million was unused. Lines of credit given to Group companies other than TOTAL S.A. are not used for general Group purposes, they are used to finance general activities of that company or for specific projects.

The following table shows the maturity of the financial assets and debts of the Group as of the date indicated (see Note 17 of the Notes to the Consolidated Financial Statements).

<b>As of December 31, 2004</b>				
	<b>Less than 1 year</b>	<b>Between 1 year and 5 years</b>	<b>More than 5 years</b>	<b>Total</b>
<b>(in millions of euros)</b>				
Financial debt after swaps	3,523	6,612	3,122	13,257
Cash and cash equivalents	(3,837)			(3,837)
<b>Total</b>	<b>(314)</b>	<b>6,612</b>	<b>3,122</b>	<b>9,420</b>

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**ITEM 12. DESCRIPTION OF SECURITIES OTHER THAN EQUITY SECURITIES**

Not applicable.

**ITEM 13. DEFAULTS, DIVIDEND ARREARAGES AND DELINQUENCIES**

None.

**ITEM 14. MATERIAL MODIFICATIONS TO THE RIGHTS OF SECURITY HOLDERS AND  
USE OF PROCEEDS**

None.

**ITEM 15. CONTROLS AND PROCEDURES**

An evaluation was carried out under the supervision and with the participation of the Group's management, including the Chief Executive Officer and the Chief Financial Officer, of the effectiveness, as of the end of the period covered by this report, of the design and operation of the Group's disclosure controls and procedures, which are defined as those controls and procedures designed to ensure that information required to be disclosed in reports filed under the U.S. Securities Exchange Act of 1934 is recorded, summarized and reported within specified time periods. Based on this evaluation, the Chief Executive Officer and Chief Financial Officer concluded that the design and operation of these disclosure controls and procedures were effective in all material respects. There were no changes in the Group's internal control over financial reporting that occurred during the period covered by this report that have materially affected, or that were reasonably likely to materially affect, the Group's internal control over financial reporting.

Pursuant to the French Financial Security Act of August 1, 2003 (*Loi de sécurité financière*), the Chairman of TOTAL's Board of Directors is now required to deliver a special report to the annual shareholders meeting regarding the Board's governance practices, the status of the internal control procedures implemented by the Company and the restrictions that the Board has placed on the powers granted to the Chief Executive Officer. In general, this report describes the objectives of the Company's internal controls, the organization of those employees responsible for internal controls and the internal control procedures that the Company currently has in place.

The report for 2004 explains that the internal control framework used by TOTAL is that of the Committee of Sponsoring Organizations of the Treadway Commission (COSO) and that TOTAL's internal control system is structured as a three-level operating organization, with internal control procedures at each profit center, the Company's business segments and on the Group level. The audit of the internal control system is primarily a centralized function handled by the Group audit department, which in 2004 employed 75 professionals. The report explains that regular reports of audits are submitted to the Audit Committee. In addition, the Company's independent auditors also report their comments to the Audit Committee as part of their statutory mission to audit the financial statements. The report further describes TOTAL's initiatives in 2004, mainly aimed at expanding documentation of disclosure controls and procedures and adapting its internal control system to certification requirements that are now applicable to the outside auditors.

**ITEM 16A. AUDIT COMMITTEE FINANCIAL EXPERT**

At its meeting on February 18, 2004, the Board of Directors confirmed the appointment of Mr. Jacques Friedmann, Inspector General of Finance, former chairman and chief executive officer of Union des Assurances de Paris, director of BNP Paribas, as audit committee financial expert.

**Table of Contents****ITEM 16B. CODE OF ETHICS**

At its meeting on February 18, 2004, the Board of Directors adopted a code of ethics that applies to its chief executive officer, chief financial officer, chief accounting officer and the financial and accounting officers for its principal activities. A copy of this code of ethics is included as an exhibit to this annual report.

**ITEM 16C. PRINCIPAL ACCOUNTANT FEES AND SERVICES**

During the fiscal years ended December 31, 2004 and December 31, 2003, fees for services provided by Ernst & Young Audit and KPMG S.A. were as follows:

	<b>KPMG S.A.</b>		<b>Ernst &amp; Young Audit</b>	
	<b>Year Ended December 31,</b>		<b>Year Ended December 31,</b>	
	<b>2004</b>	<b>2003</b>	<b>2004</b>	<b>2003</b>
	<b>(in millions of euros)</b>			
Audit Fees	12.4	9.7	12.1	10.6
Audit-Related Fees(1)	9.2	5.7	2.2	2.9
Tax Fees(2)	1.7	0.2	0.9	1.0
All Other Fees(3)	0.1	0.1	0.1	0.5
<b>Total</b>	<b>23.4</b>	<b>15.7</b>	<b>15.3</b>	<b>15.0</b>

(1) Audit-related fees are generally fees billed for services that are closely related to the performance of the audit or review of financial statements. These include due diligence services related to business combinations, attestation services not required by statute or regulation, agreed upon or expanded auditing procedures related to accounting or billing records required to respond to or comply with financial, accounting or regulatory reporting matters, consultations concerning financial accounting and reporting standards, information system reviews, internal control reviews and assistance with internal control reporting requirements.

(2) Tax fees are fees for services related to international and domestic tax compliance, including the preparation of tax returns and claims for refund, tax planning and tax advice, including assistance with tax audits and tax appeals, and tax services regarding statutory, regulatory or administrative developments and expatriate tax assistance and compliance.

(3) All other fees are principally for risk management advisory services.

**Audit Committee Pre-Approval Policy**

The Audit Committee has adopted an Audit and Non-Audit Services Pre-Approval Policy that sets forth the procedures and the conditions pursuant to which services proposed to be performed by the statutory auditors may be pre-approved. This policy provides for both general pre-approval of certain types of services through the use of an annually established budget for these types of services and special pre-approval of services on a case by case basis. The Audit Committee has designated the Company's internal audit department to monitor the performance of services provided by the statutory auditors and to assess compliance with the pre-approval policies and procedures. The internal audit department reports the results of its monitoring to the Audit Committee on a periodic basis. Both the internal audit department and management are required to report any breach of this policy to the chairman of the Audit Committee. During 2004, no audit-related fees, tax fees or other non-audit fees were approved by the Audit Committee pursuant to the *de minimis* exception to the pre-approval requirement provided by paragraph (c)(7)(i)(C) of

Rule 2-01 of Regulation S-X.

**ITEM 16D. EXEMPTIONS FROM THE LISTING STANDARDS FOR AUDIT COMMITTEES**

Not applicable.

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**Table of Contents****ITEM 16E. PURCHASES OF EQUITY SECURITIES BY THE ISSUER AND AFFILIATED PURCHASERS**

<b>Period</b>	<b>Total Number Of Shares Purchased</b>	<b>Average Price Paid Per Share ( )</b>	<b>Total Number Of Shares Purchased, As Part Of Publicly Announced Plans Or Programs</b>	<b>Maximum Number Of Shares That May Yet Be Purchased Under The Plans Or Programs(3)</b>
January 2004	800,000	144.43	800,000(1)	27,047,934
February 2004	700,000	146.32	700,000(1)	26,379,205
March 2004	2,800,000	148.34	2,800,000(1)	23,689,374
April 2004	1,800,000	157.98	1,800,000(1)	22,028,750
May 2004	3,000,000	155.69	3,000,000(1)(2)	19,450,507
June 2004	3,300,000	158.51	3,300,000(2)	16,281,372
July 2004	1,300,000	158.47	1,300,000(2)	15,044,622
August 2004	2,000,000	158.80	2,000,000(2)	13,104,195
September 2004	800,000	164.14	800,000(2)	12,403,262
October 2004	1,693,932	166.22	1,693,932(2)	10,792,098
November 2004	1,730,000	165.76	1,730,000(2)	26,992,052(4)
December 2004	2,626,068	160.71	2,626,068(2)	24,429,023
January 2005	1,495,000	160.69	1,495,000(2)	22,976,364
February 2005	375,000	175.48	375,000(2)	22,775,605
March 2005	3,000,000	180.37	3,000,000(2)	19,962,511

(1) Since May 7, 2003: the Extraordinary Shareholders Meeting of May 6, 2003 authorized the Board of Directors to buy and sell the company's own shares on the market for a period of 18 months in compliance with the objectives and procedures of the stock purchase program approved by the *Commission Opérations de Bourse* (COB) under visa no. 03-193 of March 26, 2003 (pursuant to COB Regulation no. 98-02 modified by COB Regulation no. 2000-06). The number of shares held or acquired may not exceed 10% of the authorized share capital. Under this authorization, 24,535,000 shares have been repurchased from May 7, 2003 to May 14, 2004.

(2) Since May 15, 2004: the Extraordinary Shareholders Meeting of May 14, 2004 cancelled and replaced the previous resolution from the Shareholders Meeting of May 6, 2003, authorizing hence the Board of Directors to trade in the Company's own shares on the market for a period of 18 months within the framework of the stock purchase program approved by the *Autorité des marchés financiers* (AMF) under visa no. 04-235 of April 1, 2004. The maximum number of shares that may be purchased by virtue of this authorization may not exceed 10% of the total number of shares constituting the share capital, this number being eventually adjusted to take into account operations modifying the share capital after the current Shareholders Meeting. Under no circumstances may the total number of shares the Company holds, either directly or indirectly through its indirect subsidiaries, exceed 10% of the share capital. Under this authorization, 20,100,000 shares have been repurchased from May 15, 2004 to March 31, 2005.

(3)



Based on 10% of the Company's shares capital, and after deducting the shares held by the Company for cancellation and to cover the share purchase option plans for Company employees, as well as after deducting the shares held by the subsidiaries.

- (4) The increase in the maximum number of shares is mainly due to the cancellation by the Board of Directors on November 9, 2004, of all shares held for cancellation at this date (19,873,932 shares).

**ITEM 17. FINANCIAL STATEMENTS**

Not applicable.

**Table of Contents****ITEM 18. FINANCIAL STATEMENTS**

The following financial statements, together with the report of Ernst & Young Audit and KPMG S.A. thereon, are held as part of this annual report.

	<b>Page</b>
Report of Independent Registered Public Accounting Firm	F-1
Consolidated Statement of Income for the Years Ended December 31, 2004, 2003 and 2002	F-2
Consolidated Balance Sheet at December 31, 2004, 2003 and 2002	F-3
Consolidated Statement of Cash Flows for the Years Ended December 31, 2004, 2003 and 2002	F-4
Consolidated Statement of Change in Shareholders' Equity for the years ended December 31, 2004, 2003, 2002 and 2001	F-5
Notes to the Consolidated Financial Statements	F-6
Supplemental Oil and Gas Information (Unaudited)	F-79
Schedules for the years ended December 31, 2004, 2003 and 2002	
Schedule II Valuation and Qualifying Accounts	S-1

All other Schedules have been omitted since they are not required under the applicable instructions or the substance of the required information is shown in the financial statements.

**ITEM 19. EXHIBITS**

The following documents are filed as part of this annual report:

1. *Statuts* of Total S.A. (as amended through December 31, 2004)
8. List of Subsidiaries (see Note 31 of the Notes to the Consolidated Financial Statements included in this Annual Report)
11. Code of Ethics
- 12.1 Certification of Chief Executive Officer
- 12.2 Certification of Chief Financial Officer
- 13.1 Certification of Chief Executive Officer
- 13.2 Certification of Chief Financial Officer
- 15.1 Consent of ERNST & YOUNG AUDIT
- 15.2 Consent of KPMG S.A.

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**SIGNATURE**

The registrant hereby certifies that it meets all of the requirements for filing on Form 20-F and that it has duly caused and authorized the undersigned to sign this annual report on its behalf.

TOTAL S.A.

By: /s/ Thierry Desmarest

Name: Thierry Desmarest

Title: Chairman, President and  
Chief Executive Officer

Date: April 19, 2005

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**REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRMS**

Year ended December 31, 2004

The Board of Directors and Shareholders  
Total S.A.

We have audited the accompanying consolidated balance sheets of Total S.A. and subsidiaries as of December 31, 2004, 2003 and 2002, and the related consolidated statements of income, cash flows and changes in shareholders equity for each of the three years in the period ended December 31, 2004. Our audits also include the financial statement schedule as listed in the Index as Schedule II. These consolidated financial statements and schedule are the responsibility of the Company's management. Our responsibility is to express an opinion on these consolidated financial statements based on our audits.

We conducted our audits in accordance with the auditing standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement. The Company is not required to have, nor were we engaged to perform, an audit of its internal control over financial reporting. Our audit included consideration of internal control over financial reporting as a basis for designing audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Company's internal control over financial reporting. Accordingly, we express no such opinion. An audit includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements. An audit also includes assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

In our opinion, the consolidated financial statements referred to above present fairly, in all material respects, the consolidated financial position of Total S.A. and subsidiaries as of December 31, 2004, 2003 and 2002, and the consolidated results of their operations and their cash flows for each of the three years in the period ended December 31, 2004, in conformity with accounting principles generally accepted in France. Also, in our opinion, the related financial statement schedule, when considered in relation to the basic financial statements taken as a whole, presents fairly in all material respects the information set forth herein.

Accounting principles generally accepted in France vary in certain significant respects from accounting principles generally accepted in the United States of America. Information relating to the nature and effect of such differences is presented in Note 3 to the consolidated financial statements.

As mentioned in Note 1 to the consolidated financial statements, the Company adopted Statement of Financial Accounting Standards No. 143, *Accounting for Asset Retirement Obligations* effective January 1, 2003.

Paris-La Défense, France

February 17, 2005

Except for Note 3 which is as of April 18, 2005

KPMG Audit  
A division of KPMG S.A.

René Amirkhanian

ERNST & YOUNG AUDIT

Gabriel Galet Philippe Diu

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**TOTAL**  
**CONSOLIDATED STATEMENT OF INCOME**

For the year ended December 31,

	2004	2003	2002
<b>Amounts in millions of euros(1)</b>			
Sales (Note 4 and Note 5)	122,700	104,652	102,540
Operating expenses (Note 19)	(101,141)	(86,905)	(86,622)
Depreciation, depletion and amortization of tangible assets (Note 4)	(5,498)	(4,977)	(5,792)
<b>Operating income</b> (Note 4)			
Corporate	(215)	(209)	(210)
Business Segments	16,276	12,979	10,336
<b>Total operating income</b>	16,061	12,770	10,126
Interest expense, net (Note 20)	(234)	(232)	(195)
Dividend income on non-consolidated companies	164	152	170
Dividends paid on subsidiaries' redeemable preferred shares (Note 14)	(6)	(5)	(10)
Other income/(expense), net (Note 21)	2,174	(1,060)	243
Provision for income taxes (Note 22)	(8,316)	(5,353)	(5,034)
Equity in income of affiliates (Note 8)	337	1,086	866
<b>Income before amortization of acquisition goodwill</b>	10,180	7,358	6,166
Amortization of acquisition goodwill	(308)	(139)	(212)
<b>Income before minority interests</b>	9,872	7,219	5,954
<b>Minority interests</b>	(260)	(194)	(13)
<b>Net income</b>	9,612	7,025	5,941
<b>Earnings per share (euros)</b> (Note 1.Q)	15.61	11.06	8.92

(1) Except for earnings per share.

The accompanying notes are an integral part of these consolidated financial statements.

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**TOTAL  
CONSOLIDATED BALANCE SHEET**

As of December 31,

**2004                      2003                      2002**

Amounts in millions of euros

<b>ASSETS</b>			
<b>Non-current assets</b>			
Intangible assets, net (Note 6)	1,908	2,017	2,752
Property, plant and equipment, net (Note 7)	36,422	36,286	38,592
Equity affiliates: investments and loans (Note 8)	9,874	7,833	7,710
Other investments (Note 9)	1,090	1,162	1,221
Other non-current assets (Note 10)	3,239	3,152	3,735
Total non-current assets	52,533	50,450	54,010
<b>Current assets</b>			
Inventories, net (Note 11)	7,053	6,137	6,515
Accounts receivable, net (Note 12)	14,025	12,357	13,087
Prepaid expenses and other current assets (Note 12)	5,363	4,779	5,243
Short-term investments	1,350	1,404	1,508
Cash and cash equivalents	3,837	4,836	4,966
Total current assets	31,628	29,513	31,319
<b>Total assets</b>	<b>84,161</b>	<b>79,963</b>	<b>85,329</b>
<b>LIABILITIES AND SHAREHOLDERS' EQUITY</b>			
<b>Shareholders' equity</b> (Note 13)			
Common shares (€ 10 par value; shares issued and outstanding: 2004-635,015,108; 2003-649,118,236; 2002-687,190,510)	6,350	6,491	6,872
Paid-in surplus and retained earnings	33,266	30,408	30,514
Cumulative translation adjustments	(4,653)	(3,268)	(830)
Treasury shares (2004-28,932,967; 2003-26,256,899; 2002-35,026,899)	(3,703)	(3,225)	(4,410)
Total shareholders' equity	31,260	30,406	32,146
<b>Subsidiaries' redeemable preferred shares</b> (Note 14)	147	396	477
<b>Minority interests</b> (Note 14)	629	664	724
<b>Long-term liabilities</b>			
Deferred income taxes (Note 22)	6,063	5,443	6,390
Employee benefits (Note 15)	3,600	3,818	4,103
Other long-term liabilities (Note 16)	6,449	6,344	6,150
Total long-term liabilities	16,112	15,605	16,643
<b>Long-term debt</b> (Note 17)	9,734	9,783	10,157
<b>Current liabilities</b>			
Accounts payable	11,672	10,304	10,236

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Other creditors and accrued liabilities (Note 18)	11,084	8,970	9,850
Short-term borrowings and bank overdrafts (Note 17)	3,523	3,835	5,096
<b>Total current liabilities</b>	<b>26,279</b>	<b>23,109</b>	<b>25,182</b>
<b>Total liabilities and shareholders equity</b>	<b>84,161</b>	<b>79,963</b>	<b>85,329</b>

The accompanying notes are an integral part of these consolidated financial statements.

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**TOTAL**  
**CONSOLIDATED STATEMENT OF CASH FLOWS**

For the year ended December 31,

**2004**                      **2003**                      **2002**

Amounts in millions of euros

**Cash flow from operating activities**

Income before minority interests	9,872	7,219	5,954
Depreciation, depletion and amortization (Note 4)	6,090	5,305	6,241
Long-term liabilities, valuation allowances and deferred taxes	466	(208)	(264)
Impact of coverage of pension benefit plans	(181)	(170)	
Unsuccessful exploration costs	414	359	487
(Gains)/losses on sales of assets	(3,078)	182	(862)
Undistributed affiliates equity earnings	216	(603)	(479)
Other changes, net	158	21	(7)

*Cash flow from operating activities before changes in working capital*

	13,957	12,105	11,070
(Increase)/decrease in operating assets and liabilities (Note 28)	472	382	(64)

**Cash flow from operating activities**

14,429                      12,487                      11,006

**Cash flow used in investing activities**

Intangible assets and property, plant and equipment additions	(7,167)	(6,365)	(6,942)
Exploration costs directly charged to expenses	(374)	(343)	(432)
Acquisitions of subsidiaries, net of cash acquired	(131)	(421)	(127)
Investments in equity affiliates and other securities	(209)	(123)	(298)
Increase in long-term loans	(787)	(476)	(858)

*Total expenditures*

	(8,668)	(7,728)	(8,657)
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Proceeds from sale of intangible assets and property, plant and equipment

	225	315	290
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Proceeds from sale of subsidiaries, net of cash sold

	1	820	5
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Proceeds from sale of non-current investments

	408	218	1,346
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Repayment of long-term loans

	558	525	672
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*Total divestitures*

	1,192	1,878	2,313
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(Increase)/decrease in short-term investments

	55	116	(505)
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**Cash flow used in investing activities**

(7,421)                      (5,734)                      (6,849)

**Cash flow used in financing activities**

Issuance/(repayment) of shares

Parent company's shareholders	371	69	461
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Purchase of treasury shares

	(3,554)	(3,994)	(2,945)
--	---------	---------	---------

Minority shareholders

	162	76	32
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Other equity

	(241)		
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<b>Cash dividends paid</b>			
Parent company's shareholders	(4,293)	(2,571)	(2,514)
Minority shareholders	(207)	(124)	(100)
Net issuance/(repayment) of long-term debt (Note 28)	2,249	2,108	1,642
Increase/(decrease) in short-term borrowings and bank overdrafts	(2,195)	(2,153)	746
Other changes, net	(6)	(5)	(10)
<b>Cash flow used in financing activities</b>	<b>(7,714)</b>	<b>(6,594)</b>	<b>(2,688)</b>
Net increase/(decrease) in cash and cash equivalents	(706)	159	1,469
Effect of exchange rates and changes in reporting entity	(293)	(289)	(77)
Cash and cash equivalents at the beginning of the year	4,836	4,966	3,574
<b>Cash and cash equivalents at year-end</b>	<b>3,837</b>	<b>4,836</b>	<b>4,966</b>

The accompanying notes are an integral part of these consolidated financial statements.

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**TOTAL**  
**CONSOLIDATED STATEMENT OF CHANGES IN SHAREHOLDERS EQUITY**

	Common shares issued		Paid-in surplus and retained earnings	Cumulative translation adjustments	Treasury shares		Shareholders equity
	Number	Amount			Number	Amount	
Amounts in millions of euros except for share data							
<b>As of January 1, 2002</b>	705,934,959	7,059	30,544	1,252	(37,349,899)	(4,923)	33,932
Cash dividend			(2,514)				(2,514)
Net income			5,941				5,941
Issuance of common shares (Note 13)	4,698,796	47	441				488
Purchase of treasury shares					(21,120,245)	(2,945)	(2,945)
Cancellation of purchased treasury shares (Note 13)	(23,443,245)	(234)	(3,224)		23,443,245	3,458	
Translation adjustments				(2,082)			(2,082)
Other changes, net(1)			(674)				(674)
<b>As of December 31, 2002</b>	687,190,510	6,872	30,514	(830)	(35,026,899)	(4,410)	32,146
Cash dividend			(2,571)				(2,571)
Net income			7,025				7,025
Issuance of common shares (Note 13)	1,927,726	19	113				132
Purchase of treasury shares					(31,230,000)	(3,994)	(3,994)
Cancellation of purchased treasury shares (Note 13)	(40,000,000)	(400)	(4,779)		40,000,000	5,179	
Translation adjustments				(2,438)			(2,438)
Other changes, net(2)			106				106
<b>As of December 31, 2003</b>	649,118,236	6,491	30,408	(3,268)	(26,256,899)	(3,225)	30,406
Cash dividend			(4,293)				(4,293)
Net income			9,612				9,612
Issuance of common shares (Note 13)	5,770,804	58	478				536
					(22,550,000)	(3,554)	(3,554)

Purchase of treasury shares							
Cancellation of purchased treasury shares (Note 13)	(19,873,932)	(199)	(2,877)		19,873,932	3,076	
Translation adjustments				(1,385)			(1,385)
Other changes, net(1)			(62)				(62)
<b>As of December 31, 2004</b>	635,015,108	6,350	33,266	(4,653)	(28,932,967)	(3,703)	31,260

(1) Mainly due to adjustments in employee benefit obligations.

(2) Mainly due to adjustments in employee benefit obligations and to the effect as of January 1, 2003 of the adoption of FAS No. 143.

The accompanying notes are an integral part of these consolidated financial statements.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**1. Accounting Policies**

The consolidated financial statements of TOTAL S.A. and its subsidiaries (together, the Company or Group ) have been prepared in accordance with generally accepted accounting principles in France (French GAAP ) and comply with the principles and methodology relative to consolidated financial statements, Regulation No. 99-02 approved by the decree dated June 22, 1999 of the French Accounting Regulations Committee.

Furthermore, the Company applies the standards issued by the Financial Accounting Standards Board ( FASB ) which are compatible with the French Regulations and which contribute, in their current wording, to better reflect the assets and liabilities of the Company and improve comparability with the other oil majors, in particular those from North America.

The exceptions to the use of FASB standards ( FAS ) are presented in Note 3.

**A) Principles of consolidation**

The financial statements of the significant subsidiaries over which the Group directly or indirectly has exclusive control are consolidated. The Company's interests in oil and gas ventures are proportionately consolidated. Investments in 20-50% owned companies are accounted for by the equity method.

Companies in which ownership interest is less than 20%, but over which the Company has the ability to exercise significant influence, are also accounted for by the equity method. Companies in which ownership interest is more than 50%, but over which the Company has no ability to exercise exclusive control, are also accounted for by the equity method.

All material intercompany accounts, transactions and income have been eliminated.

**B) Foreign currency translation**

The financial statements of subsidiaries are prepared in the currency that most clearly reflects their business environment. This is referred to as the functional currency.

**(i) Monetary transactions**

Transactions denominated in foreign currencies are translated at the exchange rate prevailing when the transaction is realized.

Monetary assets and liabilities denominated in foreign currencies are translated at the exchange rate prevailing at the end of the period. The resulting gains or losses are recorded in Other income (expense) in the consolidated statements of income. Translation differences arising on foreign currency loans which are specifically contracted to hedge the value of a net investment in a consolidated subsidiary or equity investee from the effect of exchange rate fluctuations are reflected as a cumulative translation adjustment to shareholders' equity.

**(ii) Translation of financial statements denominated in foreign currencies**

All assets and liabilities of consolidated subsidiaries or equity affiliates denominated in foreign currencies are translated into euros on the basis of exchange rates at the end of the period. The consolidated statements of income and of cash flows are translated using the average exchange rates during the period. Foreign exchange differences resulting from such translation are recorded either in Cumulative translation adjustments (for the Company's share) or in Minority interests as deemed appropriate.

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**TOTAL**

**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**C) Derivative instruments**

**(i) *Interest rate and foreign currency instruments***

The Company uses derivative instruments in order to manage its exposure to movements in interest rates and foreign exchange rates.

Within its hedging policy, the Company enters into interest rate and foreign currency swap agreements. The differential between interest to be paid and interest to be received or premiums and discounts on these swaps is recognized as interest expense or interest income on a prorated basis over the life of the hedged item.

The Company may also use futures, caps, floors, and options. Under hedge accounting, changes in the fair value of such contracts are recognized as interest expense or interest income in the same period as the gains and losses on the item being hedged. Similarly, for option contracts, premiums are recognized in the same period.

Regardless of the type of instruments used to hedge against risks, the gain or loss generated by early termination of the instrument is spread over the residual life of the hedged instrument. An accrual is set up for any unrealized losses related to derivatives that do not comply with the criteria required for hedge accounting.

**(ii) *Commodities***

In connection with its international trading activities, the Company, like most other oil companies, uses derivative instruments to adjust its exposure to expected fluctuations in the prices of crude oil, refined products, natural gas and power. For that purpose, the Company uses various instruments such as futures, forwards, swaps and options on organized markets or over-the-counter markets. Furthermore, the Group uses freight-rate derivative contracts in its shipping activity in order to adjust its exposure to freight-rate fluctuations.

All derivative energy-trading and freight-rate derivative contracts are marked-to-market, and the related unrealized gains and losses are recorded in income. Changes in the market value of commodity hedges for inventories of petroleum products are accounted for as additions to or reductions in inventory.

**D) Intangible assets**

Acquisition goodwill, patents, trademarks and leasehold rights are amortized on a straight-line basis over 10 to 40 years depending on the useful life of the assets.

**E) Property, plant and equipment**

**(i) *Oil and gas exploration and producing properties***

The Company applies the successful efforts method of accounting for its oil and gas exploration and production properties and assets as follows:

***Exploration costs***

Geological and geophysical costs, including seismic surveys for exploration purposes, are expensed as incurred.

Exploration leasehold acquisition costs are capitalized when acquired, impairment is determined regularly, property by property, on the basis of the results of the exploratory activity and management's evaluation.

In the event of a discovery, the unproved leasehold rights are transferred to proved leasehold rights at their net book value as soon as proved reserves are booked.

**Table of Contents**

**TOTAL**

**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

**(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

Exploratory wells are accounted for as follows:

Costs of exploratory wells that have found proved reserves are capitalized and then depreciated using the unit-of-production method based on proved developed reserves.

Costs of dry exploratory wells and wells that have not found proved reserves are charged to expense.

Costs of exploratory wells are temporarily capitalized until a determination is made as to whether the well has found proved reserves if both of the following conditions are met:

The well has found a sufficient quantity of reserves to justify, if appropriate, its completion as a producing well, assuming that the required capital expenditure is made; and

Satisfactory progress toward ultimate development of the reserves is being achieved, with the Company making sufficient progress assessing the reserves and the economic and operating viability of the project. This progress is evaluated on the basis of indicators such as whether additional exploratory works (wells, seismic work or significant studies) are under way or firmly planned and whether costs are being incurred for development studies, and takes into account that the Company may be awaiting governmental or other third-party authorizations for a proposed project or the availability of capacity on an existing transport or processing facility.

Costs of exploratory wells not meeting these conditions are charged to expense.

*Oil and gas producing assets*

Development costs incurred for the drilling of development wells and in the construction of production facilities are capitalized, together with interest costs incurred during the period of construction and estimated discounted costs of asset retirement obligations. The rate of depletion is equal to the ratio of oil and gas production for the period to proved developed reserves (unit-of-production method).

With respect to production sharing contracts, this computation is based on the portion of production and reserves assigned to the Company taking into account estimations based on the contractual clauses regarding the reimbursement of exploration and development costs (cost oil) as well as the sharing of hydrocarbon rights (profit oil).

Transportation assets are depreciated using the unit-of-production method based on throughput or by using the straight-line method whichever best reflects the economic life of the asset.

Proved leasehold rights are depreciated using the unit-of-production method based on proved reserves.

**(ii) Other property, plant and equipment**

Other property, plant and equipment are carried at cost. The basis includes interest expenses incurred until assets are placed into service. Fixed assets which are held under capital lease and similar agreements are capitalized and depreciated using the straight-line method, and the corresponding commitment is recorded as a liability.

**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

Other property, plant and equipment are depreciated using the straight-line method over their estimated useful life, as follows:

Furniture, office equipment, machinery and tools	5-10 years
Transportation equipment	5-20 years
Storage tanks and related equipment	10-15 years
Specialized complex installations and pipelines	10-30 years
Buildings	10-50 years

Equipment subsidies are deducted from the cost of the related expenditures. Routine maintenance and repairs are charged to income as incurred. However, estimated costs of refinery and major petrochemical plant turnarounds are accrued over the period from the prior turnaround to the next planned turnaround.

The Group has not adopted the option offered by the French Accounting Regulations Committee to apply by anticipation the component approach for property, plant and equipment.

**F) Valuation of long-lived assets**

Long-lived assets, either intangible or tangible, are written down when their fair market value appears to be permanently lower than their carrying value.

Impairment is determined for each autonomous group of assets by comparing its carrying value with the undiscounted future cash flow expected from it, based upon management's expectation of future economic and operating conditions or, when the asset is to be sold, by comparison with its market value.

The impairment calculated as the difference between the discounted cash flows or the market value and the carrying value of the related asset is recorded as an additional depreciation, depletion and amortization which permanently affects the carrying value.

**G) Other investments**

Investees over which the Company does not have the ability to exercise significant influence (generally less than 20% owned) or subsidiaries excluded from consolidation after consideration of their materiality to the Company's operations are valued at acquisition cost less an allowance for impairment in value, primarily based on the underlying shareholders' equity.

**H) Inventories**

Inventories are valued at either the historical cost or the market value, whichever is lower.

Given the sensitivity of the Group to the price of raw materials, the choice of methods has been limited to those intended to minimize the impact of the change in the price on the inventory effect in the income statement, i.e. replacement cost for petroleum products, LIFO (Last in-First out) for petrochemicals, and WAP (Weighted Average Price) for other products. In the replacement cost method, the variation of inventories in the income statement is determined by the average prices of the period rather than historical value.

In the individual company financial statements or tax returns, when inventories are valued using the FIFO (First in-First out) method, cost of products sold must be adjusted through the above methods by use of either a reserve for crude oil price changes in the case of replacement cost or a LIFO adjustment. This reserve is deducted from the gross value of inventory under a specific heading.

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**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

**(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

*Downstream (Refining Marketing)*

Crude oil and refined products are globally defined as petroleum products. Refined products are made up principally of kerosene, diesel fuel, heating oil and motor gasoline and are produced by the Company's refineries. The average life cycle of petroleum products is no longer than two months.

Crude oil cost flows include raw material and receipt costs. Refining cost flows principally include the cost of crude oil, production (energy, labor, depreciation of producing assets) and allocation of production overheads (taxes, maintenance, insurance). We do not include retained costs, initial tooling or other deferred start-up costs or general and administrative costs in the determination of the historical cost of refined products.

*Chemicals*

Costs consist of the cost of materials, direct labor and an allocation of production overheads. We do not include retained costs, initial tooling or other deferred start-up costs or general and administrative costs in the determination of the cost of inventories of chemicals products.

**I) Short-term investments**

Short-term investments are valued at the lower of cost or market value.

**J) Sales and operating expenses**

Revenues from sales of crude oil, natural gas and coal are recorded upon transfer of title, according to the terms of the sales contracts. Revenues from the production of crude oil and natural gas properties in which Total has an interest with the other producers are recognized on the basis of the Company's net working interest (entitlement method).

Revenues from gas transport are recognized when the services are rendered, based on the quantities transported measured according to procedures defined in each service contract.

Revenues from sales of electricity, of refining marketing activities and of chemicals products are recorded upon transfer of title, according to the terms of the related contracts.

Revenues from services are recognized when the services have been performed. Sales figures are presented after deduction of customs and excise duties on petroleum products. Oil and gas sales are inclusive of quantities delivered that represent production royalties and taxes. Crude oil and petroleum product trading activities are recorded in Sales and Operating expenses when physical delivery takes place. Exchanges of crude oil and petroleum products within normal trading activities are excluded from sales.

**K) Research and development expenses Advertising expenses**

Research and development costs, as well as advertising costs, are charged to expense as incurred.

**L) Asset retirement obligation**

The Company applies the Statement of Financial Accounting Standards No. 143, *Accounting for Asset Retirement Obligations* (FAS No. 143), modifying the rules for accounting for asset retirement obligations. FAS No. 143 establishes accounting requirements for retirement obligations associated with tangible long-lived assets, including (1) the timing of the liability recognition, (2) initial measurement of the liability, (3) allocation of asset retirement cost to expense, (4) subsequent measurement of the liability and (5) financial statement disclosure. The



**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Amounts in millions of euros, M , except for per share amount, or where otherwise indicated)**

liability is accounted for, on the basis of a reasonable estimate of its fair value, in the period in which a legal retirement obligation with determinate settlement dates appears.

An entity is required to measure changes in the liability for an asset retirement obligation due to passage of time (accretion) by applying a credit adjusted risk-free rate to the amount of the liability at the beginning of the period. The associated asset retirement costs are capitalized as part of the carrying amount of the long-lived asset and depreciated over the life of the associated fixed asset.

The cumulative effect of the change in accounting principle was 52 M , accounted for in the Group's shareholders equity at January 1, 2003.

**M) Other long-term liabilities**

The future losses related to risks which occurred during the current accounting period (litigations, legal and tax risks, environmental expenses other than asset retirement obligations, asset property, etc.) are recorded as contingency reserves when they are probable and their amount can be reasonably estimated.

FAS No. 5, *Accounting for contingencies* , classifies risks that might result in a loss on three levels: probable, reasonably possible and remote. For the losses which are considered as probable , the amount of the contingency reserve corresponds to the best possible estimate.

**N) Deferred income taxes**

The Company uses the liability method whereby deferred income taxes are recorded based upon the temporary differences between the financial statement and tax basis of assets and liabilities. Deferred tax assets and liabilities must be revalued to reflect new tax rates in the periods rate changes are enacted. A deferred tax asset is recognized up to the expected recoverable amount.

Taxes paid to Middle East producing countries are included in operating expenses for the portion which the Company held historically as concessions (Abu Dhabi-offshore and onshore, Dubai-offshore, Oman and Abu Al-Bu Khoosh).

**O) Employee benefits**

In accordance with the laws and practices of each country, the Company participates in employee benefit plans offering retirement, death and disability, healthcare and special termination benefits. These plans provide benefits based on various factors such as length of service, salaries, and contributions made to the national bodies responsible for the payment of benefits.

These plans can either be defined contribution or defined benefit pension plans and may be entirely or partially funded with investments made in various non-Company instruments such as mutual funds, insurance contracts, and securities.

For defined contribution plans, expenses correspond to the contributions paid.

For defined benefit plans, accruals and prepaid expenses are determined using the projected unit credit method.

Actuarial gains and losses resulting mainly from changes in actuarial assumptions are amortized using the straight-line method based on the estimated remaining length of service of the plan participants involved. Upon the inception of such plans or their extension to new categories of personnel, the actuarial liability, which corresponds to the validation of accrued rights existing prior to the date of extension or inception of the new plan,

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**TOTAL**

**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

**(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

is recognized using the straight-line method over a period not exceeding the average number of years of service remaining before the employees will reach retirement age.

For funded pensions plans, the difference between accumulated funding and the actuarial liability is recorded in other non-current assets or other long-term liabilities, respectively.

**P) Treasury shares**

Treasury shares which have been recorded as long-term investments by the parent company or its subsidiaries in their individual accounts have been deducted from consolidated shareholders' equity. Other treasury shares, allocated to employee stock options, are presented in short-term investments.

**Q) Earnings per share**

Earnings per common share are calculated by dividing net income by the weighted average number of common shares and common share equivalents outstanding during the period. Treasury shares deducted from consolidated shareholders' equity are not considered outstanding for purposes of this calculation.

The weighted-average number of diluted shares is calculated in accordance with the treasury stock method. The proceeds which would be recovered in the event of an exercise of options related to dilutive instruments are presumed to be a buyback of shares at market price as of the closing date of the period. The number of shares thereby obtained leads to a reduction in the total number of shares that would result from the exercise of options.

**R) Main accounting and financial indicators – information by business segment**

The financial information for each business segment is reported on the same basis that is used internally by the chief operating decision maker in assessing segment performance and the allocation of segment resources. Due to their particular nature or significance, certain transactions qualified as special items are monitored at the Group level and excluded from the business segment figures. The details of that information are presented in Note 4 to the financial statements.

In general, special items relate to transactions that are significant, infrequent or unusual. However, in certain instances, certain transactions such as restructuring costs or assets disposals, which are not considered to be representative of the normal course of business, may be qualified as special items although they may have occurred within prior years or are likely to recur within following years.

Performance measures excluding special items such as operating income, net operating income and net income adjusted for special items, are meant to facilitate the analysis of the financial performance and the comparison of income between periods.

*Operating income (measure used to evaluate operating performance)*

Operating income and expenses, including depreciation, depletion, and amortization and excluding the amortization of intangible assets and goodwill, translation adjustments, and gains or losses on the sale of assets.

*Net operating income (measure used to evaluate the return on capital employed)*

Operating income after deducting the amortization of intangible assets and goodwill, translation adjustments, and gains or losses on the sale of assets, as well as all other income and expenses related to capital employed (such as dividends from non-consolidated companies, share in income of equity method affiliates, capitalized interest expenses), and after applicable income taxes. The income and expenses not included in net operating income which are included in net income are interest expenses related to long-term liabilities net of

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**TOTAL**

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interest earned on cash and cash equivalents, after applicable income taxes (net cost of net debt and minority interests).

*Income adjusted for special items*

Operating income, net operating income, or net income excluding the effect of special items.

*Capital employed*

Non-current assets and working capital requirements net of deferred taxes and long-term liabilities.

Or:

Net debt and shareholders' equity.

*ROACE (Return On Average Capital Employed)*

Ratio of net operating income adjusted for special items to the average capital employed between the beginning and the end of the period.

*Net debt*

Long-term debt, including short-term portion, short-term borrowings, bank overdrafts less cash and cash equivalents and short-term investments.

**2. Changes in the Structure of the Company and Main Acquisitions and Divestitures**

**Year ended December 31, 2004**

Following the outcome of a combined offer by Sanofi-Synthelabo on the Aventis shares in 2004, the merger via takeover of Aventis, thereby creating the entity Sanofi-Aventis, was approved by the extraordinary shareholders meeting on December 23, 2004 and took effect on December 31, 2004.

The acquisition of Aventis by Sanofi-Synthelabo results in a dilution of the Group's equity in the company. After deduction of Sanofi-Aventis' own shares, the Group owns 13.25% of the capital of Sanofi-Aventis as of December 31, 2004 instead of 25.63% of the capital of Sanofi-Synthelabo as of December 31, 2003. The Company recorded a pre-tax gain of 2,126 M (1,690 M net of applicable income tax) net of the purchase accounting entries recorded by Sanofi-Aventis.

Sanofi-Aventis is consolidated in the Group's accounts according to the equity method.

**Year ended December 31, 2003**

On February 28, 2003, the Company finalized the sale of its Paints business, run by SigmaKalon, to Bain Capital. This sale had no material impact on the Group financial statements.

The Group acquired a 50% share in Samsung-Atofina Co. Ltd, in the petrochemical business in South Korea. The 349 M purchase price was financed through available cash. The purchase price approximates the fair value of the assets acquired.

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**TOTAL**

**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

**(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

**Year ended December 31, 2002**

In October 2002, the Company concluded a memorandum of understanding with Bain Capital for the proposed disposal of its Paints Business, run by SigmaKalon. This sale operation, which was completed in February 2003, had no effect on the 2002 financial statements.

**3. Summary of Differences Between Accounting Principles Followed by the Company and United States**

**Generally Accepted Accounting Principles**

The accompanying consolidated financial statements have been prepared in accordance with French GAAP, which differ in certain significant respects from those applicable in the United States of America ( U.S. GAAP ).

In certain instances, French GAAP permits a variety of methods of applying accounting principles and in other instances it does not provide specific rules for the accounting for certain transactions. In order to minimize the number of reconciling items between net income and shareholders' equity as determined under French and U.S. GAAP and to facilitate comparisons with other companies in the same industry, the Company has elected to apply U.S. GAAP in all such circumstances. However there remain differences which are explained in the following section.

These differences have been reflected in the financial information given in paragraph K below and mainly relate to the following items.

**A) Petrofina and Elf acquisitions**

Under U.S. GAAP, the acquisitions of PetroFina (1999) and Elf (2000) do not qualify as pooling-of-interests and therefore would have been accounted for as purchases. For U.S. GAAP purposes, the cost of the acquisition was allocated on the basis of the estimated fair value of the assets acquired and liabilities assumed. Independent valuations were performed for the major subsidiaries of PetroFina and Elf; those valuations were validated by in-house analysis for determining the estimated fair value of oil and gas properties acquired.

The main differences between French and U.S. GAAP resulting from the purchase price allocation of Petrofina and Elf were as follows:

A-1) Equity investees revaluations: Under French GAAP, equity investees held by Petrofina and Elf Aquitaine were maintained at their carrying value in the consolidated financial statements as prescribed by the French GAAP pooling of interests method. Under U.S. GAAP these investees were marked to market as part of the purchase price allocation. This line item primarily includes the difference between the fair market value and the carrying value of Sanofi-Synthelabo and Cepsa at the date of acquisition of Elf. For U.S. GAAP purposes, this difference has been amortized on a straight line basis over 30 years until December 31, 2001. U.S. GAAP adjustments to net income also include the impact of the sale of interest in these equity investees.

This caption also includes an additional net charge of 1,475 M related to the Sanofi-Aventis gain on dilution as the carrying value of the equity interest under U.S. GAAP was higher than under French GAAP.

A-2) Goodwill: This line item includes the non-allocated portion of the purchase price of Elf Aquitaine and Petrofina. Under the French GAAP pooling of interest method, no goodwill was recognized as a result of these acquisitions. Under U.S. GAAP, this goodwill was amortized on a straight line basis over 30 years until December 31, 2001.

This caption also includes a net impact of 1,245 M related to the impairment charge recorded in the Chemicals segment (refer to paragraph B).

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**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

**(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

A-3) Property, plant and equipment revaluation: This line item represents the portion of the Elf Aquitaine and Petrofina purchase price that was allocated to fixed assets. It includes primarily upstream properties, plants and equipment for which fair market value was determined based on future cash flows generated by proved reserves and risk adjusted probable reserves.

**B) Business Combinations Goodwill and Other Intangible Assets**

Effective July 1, 2001, the Company adopted for U.S. GAAP reporting purposes FASB Statement No. 141, *Business Combinations*, ( FAS No. 141 ) which requires that all business combinations be accounted for under the purchase method of accounting. FAS No. 141 also specifies the types of acquired intangible assets that are required to be recognized and reported separate from goodwill.

Effective January 1, 2002, the Company adopted for U.S. GAAP reporting purposes FASB Statement No. 142 *Goodwill and Other Intangible Assets* ( FAS No. 142 ) for all acquired goodwill and intangible assets. Under FAS No. 142, goodwill is no longer amortized, but is tested for impairment on at least an annual basis. Intangible assets with indefinite lives are also no longer amortized, but instead are tested for impairment at least annually. Intangible assets with finite lives are amortized over their estimate useful life. Goodwill acquired after June 30, 2001 has been subject to non-amortization provisions since the acquisition date.

Additionally, goodwill on equity method investments is no longer amortized since January 1, 2002. However it will continue to be tested for impairment in accordance with APB No. 18 *The Equity Method of Accounting for Investments in Common Stock*.

The impairment test for goodwill involves a two-step process. Step one consists of a comparison of a reporting unit's fair value to its carrying value, the fair value being the sum of discounted future cash flows generated by the reporting unit. If the carrying value is greater than its fair value, then step two must also be completed. Step two requires a computation of the implied fair value of a reporting unit's goodwill in comparison to the carrying amount of goodwill. Any excess of the carrying amount of goodwill over its implied fair value must be recorded as an impairment charge. FAS No. 142 requires the initial impairment test of goodwill and indefinite-lived intangibles to be performed as of January 1, 2002. The Company completed the impairment test for goodwill and determined that the reporting units' fair value were in excess of the carrying amount. Accordingly, there was no impairment of goodwill upon adoption of FAS No. 142. In addition, the Company completed the annual goodwill impairment tests required by FAS No. 142 in the fourth quarters of 2003 and 2004.

As of December 31, 2003, the fair values calculated exceeded their carrying values for all reporting units considered.

As of December 31, 2004, the fair values calculated exceeded their carrying values for all reporting units except in the Chemicals segment. In the Chemicals segment, impairments were triggered by the deterioration of the economic cycle. As a result of this depressed environment, an impairment charge of 1,245 M was recorded in accordance with the provisions of step two.

There is no indefinite-lived intangible asset and all intangible assets other than goodwill are subject to amortization.

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The components of other intangible assets were as follows:

	As of December 31,	
	2004	2003
Amortized intangible assets		
Gross carrying amount	2,670	2,352
Accumulated amortization	(1,901)	(1,683)
<b>Total other intangible assets, net</b>	<b>769</b>	<b>669</b>

A summary of changes in the carrying amount of goodwill by business segment for the year ended December 31, 2004 is as follows (net of accumulated amortization):

	As of January 1, 2004	Acquisitions	Impairment	Other(1)	As of December 31, 2004
Upstream	15,621	78		(106)	15,593
Downstream	11,474			(44)	11,430
Chemicals	5,184	24	(1,378)	(81)	3,749
<b>Total</b>	<b>32,279</b>	<b>102</b>	<b>(1,378)</b>	<b>(231)</b>	<b>30,772</b>

(1) The caption Other mainly consists of the impact of the foreign currency translation of (44) M and the impact of adjustments related to the Elf acquisition of (117) M.

**C) Reserve for Crude Oil Price Changes**

The replacement cost method as defined and applied by the Company under French GAAP primarily aims at reflecting net income based on the most recent crude oil prices.

Under this method, amounts charged to income for the monthly consumption of petroleum inventories (crude oil and refined products) are valued at the replacement cost of such inventories instead of a historical cost value computed month-by-month (FIFO or weighted average production cost). When replacement cost exceeds historical cost value (positive inventory effect), a reserve for crude oil price changes is charged against operating income.

This reserve is deducted from the gross value of inventories in the balance sheet.

However, when the inventory effect is negative (historical cost value exceeds replacement cost), the inventory reserve for crude oil price changes is reversed, thereby increasing operating income, but is limited to any existing cumulative positive inventory reserve.

Therefore, under most circumstances the replacement cost method approximates the LIFO method. When there are significant inventory decreases, however, under the LIFO method, such decreases generally lead to increased operating profits as LIFO reserves from older layers are reversed into income whereas in the replacement cost method there are no such reserves to affect the income statement.

The replacement cost method adopted by the Company to reflect the impact of price changes on crude oil and refined products sold and the related reserve for crude oil price changes would not be acceptable under U.S. GAAP.

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Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**D) Treasury Shares**

Under French GAAP, the cost of treasury shares may be either included in short-term investments or deducted from shareholders' equity if treasury shares have not been purchased in connection with employee stock options or for market price regulation purposes.

Under U.S. GAAP, such treasury shares should be reflected as a reduction of shareholders' equity. In addition, under U.S. GAAP, gains on sales of treasury shares should be excluded from the determination of net income.

**E) Equity Securities**

Under French GAAP, unrealized gains are not recognized and valuation allowances of marketable equity securities are generally determined based on year-end quotations.

Under U.S. GAAP (FAS No. 115, *Accounting for Certain Investments in Debt and Equity Securities*) and except for securities classified as held-to-maturity securities, unrealized holding gains and losses for trading and available-for-sale securities should be included in income or reported as an adjustment to shareholders' equity until realized, respectively.

Furthermore, under French GAAP, previously recorded impairment charges on investment securities may be reversed if the conditions that existed at the date of impairment have changed. However, under U.S. GAAP, once a determination that an other than temporary impairment on available-for-sale securities has occurred, and the investment has been written down to its fair value through a realized loss charged to income, the recorded impairment cannot be reversed in future periods.

The Company does not hold equity securities that would be categorized as trading.

Gross realized gains and gross realized losses (determined on a FIFO basis) on sales of available-for-sale securities were:

	<b>As of December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Gross realized gains	105	58	343
Gross realized losses	(19)	(18)	(28)

The carrying amount of available-for-sale securities and their approximate fair value were as follows:

	<b>Cost</b>	<b>Gross Unrealized Gains</b>	<b>Gross Unrealized Losses</b>	<b>Fair Value</b>
As of December 31, 2002	308	139	(56)	391
As of December 31, 2003	264	158	(7)	415
As of December 31, 2004	126	151		277

The Company does not hold debt securities that would be categorized as held-to-maturity.

**F) Stock Compensation**

The Company generally grants to its employees a discount from the market price for shares purchased pursuant to share subscription plans, share purchase plans and reserved capital increases. Accounting for this discount is not addressed by French GAAP and these transactions have no effect on net income.





Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

FAS No. 123, *Accounting for Stock-Based Compensation*, established accounting and disclosure requirements using a fair-value based method of accounting for stock-based employee compensation plans. Under FAS No. 123, companies may elect to continue to recognize stock-based employee compensation costs under the intrinsic value method described in APB No. 25 *Accounting for Stock Issued to Employees*, provided *pro forma* disclosures are presented of how net income and earnings per share would have been impacted by the fair value method. In December 2002, the Financial Accounting Standards Board issued Statement No. 148, *Accounting for Stock-Based Compensation Transition and Disclosure* (FAS No. 148). This Statement amends FAS No. 123 to provide alternative methods of transition to FAS No. 123's fair value method of accounting for stock-based employee compensation. It also amends the disclosure provisions of FAS No. 123 to require prominent disclosure in the summary of significant account policies of the effects of an entity's accounting policy with respect to stock-based employee compensation on reported net income and earnings per share in annual financial statements. FAS No. 148's amendment of the transition and annual disclosure requirements are effective for fiscal years ending after December 15, 2002.

The Company has elected to continue to account for stock-based compensation based on the provisions of APB No. 25 for U.S. GAAP purposes. Compensation cost for share subscription plans, share purchase plans and capital increases reserved to employees, if any, is measured as the excess of the quoted market price of the Company's stock at the date of grant over the amount an employee must pay to acquire the stock. The *pro forma* disclosures as if the Company adopted the cost recognition requirements under FAS No. 123 are presented in paragraph L below.

**G) Derivative Instruments and Hedging Activities**

The Company follows U.S. GAAP reporting purposes FAS No. 133, *Accounting for Derivative Instruments and Hedging Activities* as amended by FAS No. 137, FAS No. 138 and FAS No. 149 (FAS No. 133). FAS No. 133 established accounting and reporting standards for derivative instruments, including certain derivative instruments embedded in other contracts and for hedging activities. This statement requires that derivatives be recognized at fair value in the balance sheet and that changes in fair value be recognized either currently in earnings or deferred as a component of other comprehensive income, depending on the intended use of the derivative, its resulting designation and its effectiveness. If certain conditions are met, an entity may designate a derivative instrument as hedging the exposure to changes in the fair value of an asset or liability (Fair Value Hedge), the exposure to variability in expected future cash flows (Cash Flow Hedge) or the foreign currency exposure of a net investment in a foreign operation (Foreign Currency Hedge). For a derivative not designated as a hedging instrument, the changes in fair value are recognized in earnings in the period in which they occur.

*Financial derivatives*

Long-term interest and foreign currency swaps are contracted by the Company as part of the issuance of most debenture loans issued to finance the Upstream activity. A significant portion of long-term debentures are incurred or converted in U.S. dollars as the cash flows of the Upstream activity are mainly denominated in U.S. dollars. Depending on market conditions, debenture loans may be issued in euros or other European currencies at fixed rates which are immediately swapped into U.S. dollar floating rate debt. Management considers that the combination of these issue swaps with the corresponding debenture loans is economically equivalent to a synthetic floating rate debt denominated in U.S. dollars. However, FAS No. 133 requires separate accounting of the issue swaps and associated debt. As these long-term interest rate and foreign exchange swaps, which are entered into for hedging purposes, convert into a debt denominated in U.S. dollars, which is not the functional currency of the Company, they cannot be classified as hedges under FAS No. 133.

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Further, certain other financial derivatives used to manage cash activities and to hedge both foreign currency risk and interest rate risk that also qualify for hedge accounting under French GAAP are marked-to-market under FAS No. 133.

*Commodities*

All derivatives on crude oil, refined products and natural gas related to the Company's trading activities are marked-to-market with unrealized gains and losses included in the current results of operations. For these derivative instruments, there was no impact of adopting FAS No. 133 on the Company's results of operations or its financial position.

On June 27, 2003, the FASB issued FAS No. 133 Implementation Issue No. C20, Scope Exceptions: Interpretation of the Meaning of Not Clearly and Closely Related in Paragraph 10(b) regarding Contracts with a Price Adjustment Feature (Implementation Issue No. C20). This issue supersedes FAS No. 133 Implementation Issue No. C11,

Interpretation of Clearly and Closely Related in Contracts That Qualify for the Normal Purchases and Normal Sales Exception (Implementation Issue No. C11) in applying guidance regarding when a price adjustment feature in a contract would not be an impediment to the contract qualifying for the normal purchases and normal sales scope exception. Under Implementation Issue No. C11, a price adjustment feature based on an ingredient or direct factor in the production of the item being purchased or sold under the contract would be considered to be clearly and closely related to the asset being sold or purchased. That issue does not permit the use of a broad market index to serve as a surrogate or proxy for an ingredient or direct factor. Under Implementation Issue No. C20, the application of the statement not clearly and closely related to the asset being sold or purchased should involve an analysis of both qualitative and quantitative considerations. The assessment of whether a contract qualifies for the normal purchases and normal sales scope exception must be performed only at the inception of the contract.

After reviewing its portfolio of long-term commodity contracts, the Company has determined that most of these contracts would qualify, under Implementation Issue No. C20, for the normal purchases and normal sales exception set forth by FAS 133.

**H) Asset retirement obligation**

As mentioned in Note 1 paragraph L, the Group adopted FAS No. 143 in 2003. Under French GAAP, the cumulative effect of the change in accounting principle was accounted for in the retained earnings with no impact on net income.

**I) Earnings Per Share**

The Company reports earnings per share (EPS) using the method described in Note 1.

Under U.S. GAAP, the Company uses the average market price of the Company's stock over the applicable earnings period to apply the treasury stock method for the calculation of diluted earnings per share.

Under French GAAP, the Company uses market prices at the end of the applicable earnings period to apply the treasury stock method for the calculation of diluted earnings per share.

Under U.S. GAAP (FAS No. 128, *Earnings per Share*), none of the treasury shares would have been considered as outstanding.

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**J) Energy Trading Contracts EITF 02-3**

On October 25, 2002, the EITF reached a consensus on Issue 02-3, *Recognition and Reporting of Gains and Losses on Energy Trading Contracts under EITF Issues No. 98-10 and No. 00-17*, that changed the accounting for certain energy contracts. The main provisions of EITF 02-3 are as follows:

EITF 02-3 prohibits the use of mark-to-market accounting for any energy-related contracts that are not derivatives. This change applied immediately to new contracts executed after October 25, 2002 and applied to existing non-derivative energy-related contracts beginning January 1, 2003.

The task force reached a consensus that gains and losses on all derivative instruments within the scope of FAS No. 133 should be shown net in the income statement if the derivative instruments are held for trading purposes.

The FASB Staff indicated that, pending further consideration of this issue, an entity should not record unrealized gains or losses at the inception of derivative contracts unless the fair value of contracts is evidenced by observable market data.

After reviewing its portfolio of activities, the Company has determined that except for the change in the presentation of the statement of income (for U.S. GAAP reporting purposes only), the adoption of EITF 02-3 has no impact on the U.S. GAAP consolidated financial statements.

**K) Conversion to U.S. GAAP****(i) Net Income and Shareholders' Equity**

The following is a summary of the adjustments to net income and shareholders' equity for the years ended December 31, 2004, 2003 and 2002 which would be required if U.S. GAAP had been applied instead of French GAAP. These U.S. GAAP adjustments are presented net of the portion applicable to minority interests.

	<b>Net income</b>		
	<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Amounts per accompanying consolidated financial statements	9,612	7,025	5,941
Equity investees revaluations (A-1), net	(1,384)	(40)	(183)
Goodwill on consolidated companies (A-2)	(1,362)	(314)	(178)
Property, plant and equipment revaluation (A-3)	(374)	(378)	(388)
Other purchase accounting adjustments	(23)	(155)	(14)
<i>Total acquisitions of Elf and Petrofina (A)</i>	(3,143)	(887)	(763)
Business combinations: cancellation of goodwill amortization (B)	137	171	279
Reserve for crude oil price changes (C)	714	(252)	658
Treasury shares (D)	(14)	(3)	
Equity securities (E)			(43)
Stock compensation (F)	(76)	(98)	(88)
Derivative instruments and hedging activities (G)	(14)	(294)	479
Asset retirement obligation (H)		52	
Other	(28)		
Tax effect of U.S. GAAP adjustments (consolidated companies)	33	389	(199)

<b>Amounts under U.S. GAAP</b>	7,221	6,103	6,264
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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

	<b>Shareholders' equity</b>		
	<b>As of December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Amounts per accompanying consolidated financial statements	31,260	30,406	32,146
Equity investees revaluations (A-1), net	1,774	3,160	3,200
Goodwill on consolidated companies (A-2)	29,278	30,640	30,954
Property, plant and equipment revaluation (A-3)	3,643	4,040	4,439
Other purchase accounting adjustments			224
<i>Total acquisitions of Elf and Petrofina (A)</i>	34,695	37,840	38,817
Business combinations: cancellation of goodwill amortization (B)	587	450	279
Reserve for crude oil price changes (C)	2,289	1,575	1,827
Treasury shares (D)	(1,327)	(1,388)	(1,407)
Equity securities (E)	120	120	52
Derivative instruments and hedging activities (G)	302	316	610
Other	(64)		
Tax effect of U.S. GAAP adjustments (consolidated companies)	(2,688)	(2,746)	(3,212)
Cumulative translation adjustment of U.S. GAAP adjustments	(66)	(46)	(16)
<b>Amounts under U.S. GAAP</b>	<b>65,108</b>	<b>66,527</b>	<b>69,096</b>

For more information on these adjustments, refer to the lettered subheadings in this note that correspond to the letter annotations appearing in parentheses following each of the line items above.

Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**(ii) U.S. GAAP Consolidated Statements of Income**

The consolidated statements of income for the years ended December 31 2004, 2003 and 2002 presented below have been restated to reflect the differences between U.S. GAAP and French GAAP discussed above.

	<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Sales and other income	100,481	85,585	84,883
<b>Total revenues</b>	100,481	85,585	84,883
Crude oil and product purchases	58,555	49,891	51,096
Production, selling and administrative expenses	19,279	18,270	16,017
Depreciation, depletion and amortization	7,707	5,400	6,427
Unsuccessful exploration costs	414	359	487
Dividends on subsidiaries redeemable preferred shares	6	5	10
Interest expense/(income), net	179	183	195
Other financial expense/(income), net(1)	12	154	(183)
Taxes	683	664	925
<b>Total expenses</b>	86,835	74,926	74,974
Earnings from equity interests and affiliates	621	1,286	1,104
Gains/(losses) on sales of assets	1,584	(484)	679
<b>Income before income taxes and minority interests</b>	15,851	11,461	11,692
Income taxes	8,357	5,215	5,412
<b>Income before minority interests</b>	7,494	6,246	6,280
Minority interests	(273)	(195)	(16)
<b>Income before cumulative effect of accounting change</b>	7,221	6,051	6,264
Cumulative effect of accounting change, net of tax(2)		52	
<b>Net Income</b>	7,221	6,103	6,264
<b>Basic earnings per share</b>			
Income before cumulative effect of accounting change(2)	11.95	9.73	9.60
Cumulative effect of accounting change, net of tax(2)		0.08	
<b>Net earnings per share basic</b>	11.95	9.81	9.60
<b>Diluted earnings per share</b>			

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Income before cumulative effect of accounting change(2)	11.90	9.69	9.53
Cumulative effect of accounting change, net of tax(2)		0.08	
<b>Net earnings per share    diluted</b>	<b>11.90</b>	<b>9.77</b>	<b>9.53</b>

(1) Including dividends on subsidiaries    redeemable preferred shares.

(2) Accounting change is related to the adoption of FAS No. 143 in 2003.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

Breakdown between current and deferred tax is as follows:

	For the year ended December 31,		
	2004	2003	2002
Current income taxes	(7,666)	(5,097)	(5,445)
Deferred income taxes	(691)	(118)	33
<b>Total</b>	<b>(8,357)</b>	<b>(5,215)</b>	<b>(5,412)</b>

The components of deferred tax balances under U.S. GAAP as of December 31, 2004, 2003 and 2002 are as follows:

	For the year ended December 31,		
	2004	2003	2002
Net operating losses and tax credit carryforwards	933	728	384
Employee benefits	841	976	1,121
Other temporarily non-deductible provisions	2,279	2,416	1,766
<b>Gross deferred tax assets</b>	<b>4,053</b>	<b>4,120</b>	<b>3,271</b>
Valuation allowance	(342)	(280)	(202)
<b>Net deferred tax assets</b>	<b>3,711</b>	<b>3,840</b>	<b>3,069</b>
Property, plant and equipment	(8,667)	(8,461)	(8,726)
Other temporary tax deductions	(2,007)	(1,872)	(2,049)
<b>Gross deferred tax liability</b>	<b>(10,674)</b>	<b>(10,333)</b>	<b>(10,775)</b>
<b>Net deferred tax liabilities</b>	<b>(6,963)</b>	<b>(6,493)</b>	<b>(7,706)</b>

Analysis of tax items in the U.S. GAAP balance sheet is as follows:

	For the year ended December 31,		
	2004	2003	2002
Long-term deferred tax assets	1,534	1,504	1,708
Current deferred tax assets	232	216	190
Deferred tax liabilities	(8,729)	(8,213)	(9,604)
<b>Total</b>	<b>(6,963)</b>	<b>(6,493)</b>	<b>(7,706)</b>

Shares used in computing earnings per share (number) are as follows:

**For the year ended December 31,**

	<b>2004</b>	<b>2003</b>	<b>2002</b>
Shares outstanding, January 1	649,118,236	687,190,510	705,934,959
<b>Issuance of common shares</b>			
Capital increases	2,289,887		1,392,607
Stock options and warrants conversion	475	417,822	674,556
Acquisition of Petrofina and Elf and subsequent related issuances (Note 13)	1,167,512	546,041	282,236
Treasury shares	(48,470,881)	(66,234,089)	(55,512,145)
<b>Weighted average number of shares basic</b>	604,105,229	621,920,284	652,772,213
Dilutive effect of stock plans and warrants	2,600,714	2,672,796	4,682,794
<b>Weighted average number of shares diluted</b>	606,705,943	624,593,080	657,455,007

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**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**Earnings per share Pro Forma Disclosure**

Had compensation cost for the Company's grants for stock-based compensation plans and transactions been determined consistent with FAS No. 123, the Company's net income and net income per share would approximate the following *pro forma* amounts:

	<b>For the year ended December 31</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Net income, as reported	7,221	6,103	6,264
Deduct: Additional total stock-based employee compensation expense determined under fair value based method for all awards, net of related tax effects	(117)	(131)	(93)
<b>Pro forma net income</b>	<b>7,104</b>	<b>5,972</b>	<b>6,171</b>
<b>Earnings per share</b>			
Basic as reported	11.95	9.81	9.60
Basic <i>pro forma</i>	11.76	9.60	9.45
Diluted as reported	11.90	9.77	9.53
Diluted <i>pro forma</i>	11.71	9.56	9.39

The fair value of each option grant was estimated on the date of grant using the Black-Scholes option-pricing model with the following assumptions used for those options granted in 2004, 2003 and 2002.

	<b>2004</b>	<b>2003</b>	<b>2002</b>
Risk-free interest rate (%)	3.8	3.6	4.1
Dividend yield (%)	3.0	3.2	2.3
Expected volatility (%)	22	26	29
Expected life (years)	2.0	2.0	2.0
Weighted average fair value of options granted ( )	31.1	25.5	32.3

**(iii) U.S. GAAP Summarized Consolidated Balance Sheets**

The consolidated balance sheets as of December 31, 2004, 2003 and 2002 presented below have been restated to reflect the differences between U.S. GAAP and French GAAP discussed above:

	<b>As of December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
<b>Assets</b>			
Current assets			
Cash and cash equivalents	3,858	4,862	5,079
Accounts receivable	13,987	12,300	13,076

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Inventories	9,310	7,693	8,356
Other current assets	5,335	4,774	5,243
<b>Total currents assets</b>	<b>32,490</b>	<b>29,629</b>	<b>31,754</b>
Property, plant and equipment, net	40,065	40,330	43,031
Intangibles, net	31,541	32,948	34,138
Other non-current assets	18,141	17,244	15,950
<b>Total assets</b>	<b>122,237</b>	<b>120,151</b>	<b>124,873</b>

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

	As of December 31,		
	2004	2003	2002
<b>Liabilities and shareholders' equity</b>			
Current liabilities			
Accounts payable	11,672	10,304	10,236
Other liabilities	14,919	13,036	14,945
<b>Total current liabilities</b>	<b>26,591</b>	<b>23,340</b>	<b>25,181</b>
Long-term liabilities			
Long-term debt, net of current portion	11,140	10,883	9,533
Other long-term liabilities(1)	18,753	18,735	20,332
<b>Total long-term liabilities</b>	<b>29,893</b>	<b>29,618</b>	<b>29,865</b>
Minority interests	645	666	731
<b>Shareholders' equity</b>			
Common shares	6,350	6,491	6,872
Paid-in surplus	40,524	42,721	47,298
Retained earnings	28,756	26,047	22,464
Accumulated other comprehensive income	(5,492)	(4,119)	(1,721)
Treasury shares	(5,030)	(4,613)	(5,817)
<b>Total shareholders' equity</b>	<b>65,108</b>	<b>66,527</b>	<b>69,096</b>
<b>Total liabilities and shareholders' equity</b>	<b>122,237</b>	<b>120,151</b>	<b>124,873</b>

(1) Including subsidiaries' redeemable preferred shares.

**(iv) Comprehensive Income**

The Company applies for U.S. GAAP purposes FAS No. 130, *Reporting Comprehensive Income*, which requires companies to report all changes in equity during a period, except those resulting from investment by owners and distribution to owners, in a financial statement for the period in which they are recognized. The Company discloses comprehensive income, which encompasses net income, foreign currency translation

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**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

adjustments, unrealized gains or losses on the Company's available for sale securities and the minimum pension liability adjustment, in the Consolidated Statement of Shareholders' Equity.

	Comprehensive income	Common shares	Paid-in surplus	Retained earnings	Accumulated other comprehensive income	Treasury shares	Total shareholders equity
<b>As of January 1, 2002</b>		7,059	50,018	18,723	1,332	(5,872)	71,260
Net income(1)	6,264			6,264			6,264
Other comprehensive income, net of tax							
Unrealized foreign currency translation adjustments	(2,108)						
Realized foreign currency translation adjustments	15						
Unrealized losses on equity securities	(135)						
Gains on equity securities included in net income	(208)						
Minimum pension liability adjustment	(617)						
Other comprehensive income	(3,053)				(3,053)		(3,053)
Comprehensive income	3,211						
Cash dividend				(2,514)			(2,514)
Acquisitions of Elf and PetroFina		6	84	(63)			27
Other issuances of Common shares		41	420				461
Stock compensation(1)				88			88
Treasury shares(1)		(234)	(3,224)			55	(3,403)
Other				(34)			(34)
<b>As of December 31, 2002</b>		6,872	47,298	22,464	(1,721)	(5,817)	69,096

(1) Stock compensation cost and elimination of gains on treasury shares are reflected in net income above.

	Comprehensive income	Common shares	Paid-in surplus	Retained earnings	Accumulated other comprehensive income	Treasury shares	Total shareholders equity
<b>As of January 1, 2003</b>		6,872	47,298	22,464	(1,721)	(5,817)	69,096
Net income(1)	6,103			6,103			6,103
Other comprehensive income, net of tax							
Unrealized foreign currency translation adjustments	(2,399)						
Realized foreign currency translation adjustments	(74)						
Unrealized gains on equity securities	80						
Gains on equity securities included in net income	(25)						
Minimum pension liability adjustment	20						
Other comprehensive income	(2,398)				(2,398)		(2,398)
Comprehensive income	3,705						
Cash dividend				(2,571)			(2,571)
Issuances of common shares		19	202	(89)			132
Stock compensation(1)				98			98
Treasury shares(1)		(400)	(4,779)			1,204	(3,975)
Other				42			42
<b>As of December 31, 2003</b>		6,491	42,721	26,047	(4,119)	(4,613)	66,527

(1) Stock compensation cost and elimination of gains on treasury shares are reflected in net income above.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

	Comprehensive income	Common shares	Paid-in surplus	Retained earnings	Accumulated other comprehensive income	Treasury shares	Total shareholders equity
<b>As of January 1, 2004</b>		6,491	42,721	26,047	(4,119)	(4,613)	66,527
Net income(1)	7,221			7,221			7,221
Other comprehensive income, net of tax							
Unrealized foreign currency translation adjustments	(1,406)						
Realized foreign currency translation adjustments							
Unrealized gains on equity securities	48						
Gains on equity securities included in net income	(41)						
Minimum pension liability adjustment	26						
Other comprehensive income	(1,373)				(1,373)		(1,373)
Comprehensive income	5,848						
Cash dividend				(4,293)			(4,293)
Issuances of common shares		58	680	(202)			536
Stock compensation(1)				76			76
Treasury shares(1)		(199)	(2,877)	14		(417)	(3,479)
Other				(107)			(107)
<b>As of December 31, 2004</b>		6,350	40,524	28,756	(5,492)	(5,030)	65,108

(1) Stock compensation cost and elimination of gains on treasury shares are reflected in net income above.

**Disclosure of Accumulated Other Comprehensive Income Balances**

The components of accumulated other comprehensive income (loss) balances are as follows:



As of December 31,

	2004			2003			2002		
	Pre-tax Amount	Tax Exp. (Credit)	Net Amount	Pre-tax Amount	Tax Exp. (Credit)	Net Amount	Pre-tax Amount	Tax Exp. (Credit)	Net Amount
Net foreign currency translation adjustments	(4,720)		(4,720)	(3,314)		(3,314)	(841)		(841)
Net unrealized gain (loss)	163	(23)	140	163	(30)	133	95	(17)	78
Minimum pension liability adjustment	(1,353)	441	(912)	(1,393)	455	(938)	(1,417)	459	(958)
<b>Accumulated other comprehensive (loss) income</b>	<b>(5,910)</b>	<b>418</b>	<b>(5,492)</b>	<b>(4,544)</b>	<b>425</b>	<b>(4,119)</b>	<b>(2,163)</b>	<b>442</b>	<b>(1,721)</b>

**(v) Consolidated Statements of Cash Flows**

Under U.S. GAAP, unsuccessful exploration costs incurred during a period (i.e., directly charged to expense) would be presented within the operating section of the Statement of Cash Flows.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

Following this classification, cash flow from operating activities and cash flow used in investing activities would be as follows:

	<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
<b>Cash flow from operating activities</b>			
Under French GAAP	14,429	12,487	11,006
Exploration costs directly charged to expense	(374)	(343)	(432)
<b>Under U.S. GAAP</b>	<b>14,055</b>	<b>12,144</b>	<b>10,574</b>
<b>Cash flow used in investing activities</b>			
Under French GAAP	(7,421)	(5,734)	(6,849)
Exploration costs directly charged to expense	374	343	432
<b>Under U.S. GAAP</b>	<b>(7,047)</b>	<b>(5,391)</b>	<b>(6,417)</b>

**L) Additional U.S. GAAP Information****(i) Other U.S. GAAP Requirements***Related parties*

Under U.S. GAAP, information provided in Note 30.D would be presented on the face of the consolidated balance sheets and consolidated statements of income.

**(ii) Disclosure of Certain Significant Risks and Uncertainties***Nature of operations*

The Company is an integrated oil and gas group and engages in all aspects of the petroleum industry including upstream and downstream operations and the trading of crude oil and petroleum products. The Company is also a significant producer of chemicals products for industrial and consumer use (petrochemicals, intermediates, rubber-based products and specialty chemicals: resins, adhesives).

*Estimates*

The preparation of financial statements in conformity with French GAAP and U.S. GAAP requires management to make a certain number of estimates and assumptions which affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements and the reported amounts of revenues and expenses during the reporting period. Actual results may differ from those estimates.

**(iii) New U.S. Accounting Standards***Stock Compensation*

On December 16, 2004, the Financial Accounting Standards Board (FASB) issued FASB Statement No. 123 (revised 2004), Share-Based Payment, which is a revision of FASB Statement No. 123, Accounting for Stock-Based Compensation. Statement 123(R) supersedes APB Opinion No. 25, Accounting for Stock Issued to Employees, and amends FASB Statement No. 95, Statement of Cash Flows. Generally, the approach in Statement 123(R) is similar to the approach described in Statement 123. However, Statement 123(R) requires all share-

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**TOTAL**

**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

**(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

based payments to employees, including grants of employee stock options, to be recognized in the income statement based on their fair values. *Pro forma* disclosure is no longer an alternative.

Statement 123(R) must be adopted no later than January 1, 2006. Early adoption will be permitted in periods in which financial statements have not yet been issued. We expect to adopt Statement 123(R) for U.S. GAAP reporting purposes on January 1, 2005.

Statement 123(R) permits public companies to adopt its requirements using one of two methods:

A modified prospective method in which compensation cost is recognized beginning with the effective date (i) based on the requirements of Statement 123(R) for all share-based payments granted after the effective date and (ii) based on the requirements of Statement 123 for all awards granted to employees prior to the effective date of Statement 123(R) that remain unvested on the effective date.

A modified retrospective method which includes the requirements of the modified prospective method described above, but also permits entities to restate based on the amounts previously recognized under Statement 123 for purposes of pro forma disclosures either (i) all prior periods presented or (ii) prior interim periods of the year of adoption.

The company plans to adopt Statement 123(R) using the modified-prospective method.

As permitted by Statement 123, the company currently accounts for share-based payments to employees using Opinion 25's intrinsic value method and, as such, generally recognizes no compensation cost for employee stock options. Accordingly, the adoption of Statement 123(R)'s fair value method will have an impact on our result of operations, although it will have no impact on our overall financial position. The impact of adoption of Statement 123(R) cannot be predicted at this time because it will depend on levels of share-based payments granted in the future. However, had we adopted Statement 123(R) in prior periods, the impact of that standard would have approximated the impact of Statement 123 as described in the disclosure of *pro forma* net income and earnings per share in Note 3 (ii) to our consolidated financial statements.

*Accounting for Purchases and Sales of Inventory with the same Counterparty*

At its November 2004 meeting, the EITF began discussion of Issue no. 04-13, *Accounting for Purchases and Sales of Inventory with the same Counterparty*. This issue addresses the question of when it is appropriate to measure purchases and sales of inventory at fair value and record them in cost of sales and revenues and when they should be recorded as an exchange measured at the book value of the item sold. The EITF did not reach a consensus on this issue, but requested the FASB staff to further explore the alternative views.

Should the EITF reach a consensus on this Issue requiring these transactions to be recorded as exchanges measured at book value and to be presented net in the statement of income. The company does not believe the impact on its accounts would be material.

*FASB Statement No. 153, Exchanges of Nonmonetary Assets - An Amendment of APB Opinion No. 29 (FAS No. 153)*

In December 2004, the FASB issued FAS No. 153, which is effective for the Company for asset-exchange transactions beginning July 1, 2005. Under APB No. 29, assets received in certain types of nonmonetary exchanges were permitted to be recorded at the carrying value of the assets that were exchanged (i.e., recorded on a carryover basis). As amended by FAS No. 153, assets received in some circumstances will have to be recorded instead at their fair values. In the past, the Company has not engaged in a large number of nonmonetary asset exchanges for significant amounts.

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**TOTAL**

**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

**(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

*Accounting for suspended well costs*

In February 2005, the FASB issued a proposed FASB Staff Position (FSP) to amend FAS No. 19 Financial Accounting and Reporting by Oil and Gas Producing Companies. The proposed FSP provides for continued capitalization of exploratory drilling costs past one year if the enterprise is making sufficient progress on assessing the reserves and the economic viability of the project. The proposed FSP also provides certain disclosure requirements with respect to capitalized exploratory drilling costs.

The Company will monitor the continuing deliberations of the FASB on this matter and the possible implications, if any, of the proposed FSP on the Company's accounting policy with respect to the capitalization of exploratory drilling costs. The Company estimates that if the proposed FSP were adopted, no material change would be required to such accounting policy.

The Company also estimates that, if the proposed FSP were applied retroactively to January 1, 2002, net income would not change in 2004, 2003, or 2002. The Company believes that whether or not the FSP is adopted as proposed would not result in the write-off of any exploratory drilling costs capitalized at December 31, 2004.

*Accounting Method.* When a discovery is made, exploratory drilling costs continue to be capitalized pending determination of whether potentially economic oil and gas reserves have been discovered by the drilling effort. The length of time necessary for this determination depends on the specific technical or economic difficulties in assessing the recoverability of the reserves. If a determination is made that the well did not encounter oil and gas in economically viable quantities, the well costs are expensed and are reported in exploration expense.

Exploratory drilling costs are temporarily capitalized pending determination of whether the well has found proved reserves if both of the following conditions are met:

The well has found a sufficient quantity of reserves to justify, if appropriate, its completion as a producing well, assuming that the required capital expenditure is made; and

Satisfactory progress toward ultimate development of the reserves is being achieved, with the Company making sufficient progress assessing the reserves and the economic and operating viability of the project.

The Company evaluates progress made on the basis of regular project reviews which take into account the following factors:

First, if additional exploratory drilling or other exploratory activities (such as seismic work or other significant studies) are either underway or firmly planned, the Company deems there to be satisfactory progress. For these purposes, exploratory activities are considered firmly planned only if they are included in the Company's three-year exploration plan/budget. At December 31, 2004, the Company had capitalized 172 M of exploratory drilling costs on this basis, as further set forth below.

In cases where exploratory activity has been completed, the evaluation of satisfactory progress takes into account indicators such as the fact that costs for development studies are incurred in the current period, or that governmental or other third-party authorizations are pending or that the availability of capacity on an existing transport or processing facility awaits confirmation. At December 31, 2004, exploratory drilling costs capitalized on this basis amounted to 41 M and mainly related to two projects, as further described below.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

*Capitalized exploratory costs*

The following table sets forth the net changes in capitalized exploratory costs for 2004, 2003 and 2002:

	2004	2003	2002
Beginning balance	422	579	722
Additions pending determination of proved reserves(1)	269	263	276
Amounts previously capitalized and expensed during the year	(40)	(16)	(55)
Amounts transferred to Development	(196)	(333)	(266)
Foreign exchange changes	(25)	(71)	(98)
<b>Ending balance</b>	<b>430</b>	<b>422</b>	<b>579</b>

(1) Additions pending determination of proved reserves consists of exploration costs less exploration costs directly charged to expenses.

The following table sets forth a breakdown of capitalized exploratory costs at year end 2004, 2003 and 2002 by category of exploratory activity:

	2004	2003	2002
<b>Projects with recent or planned exploratory activity</b>	<b>389</b>	<b>317</b>	<b>306</b>
Wells for which drilling is not completed	91	39	141
Wells with drilling in past 12 months	126	223	96
Wells with future exploratory activity firmly planned(1)	172	55	69
future exploratory drilling planned	148	55	69
other exploratory activity planned(2)	24		
<b>Projects with completed exploratory activity</b>	<b>41</b>	<b>105</b>	<b>273</b>
Projects not requiring major capital expenditures			
Projects requiring major capital expenditures	41	105	273
<b>Total</b>	<b>430</b>	<b>422</b>	<b>579</b>
<b>Number of wells at end of year</b>	<b>56</b>	<b>62</b>	<b>68</b>

(1) All projects included in this line require major capital expenditures.

(2) At the end of 2004, this relates to a single well whose continuing capitalization is justified by firmly planned seismic activity.

At the end of 2004, there was no amount of capitalized exploratory drilling costs that was associated with areas not requiring major capital expenditures before production could begin, where more than one year had elapsed since the

completion of drilling.

At the end of 2004, an amount of 41 M was associated with suspended wells in areas where major capital expenditures will be required and no future exploratory activity is firmly planned. This amount corresponds to four projects (8 wells) and is mainly associated to two projects. First, the Itau project relates to a gas discovery in Bolivia over which 2 wells drilled between 1999 and 2001 were capitalized for an amount of 20 M as at December 31, 2004. The Company is actively pursuing commercialization of gas from the Itau discoveries on Brazilian and Argentinean markets. Booking of proved reserves is currently anticipated in 2007-2009. Second, the Bonga SW project relates to development of a deepwater oil discovery in Nigeria for which 4 wells were drilled between 2001 and 2003 and for which 11 M were capitalized as at December 31, 2004. The Company is working on the development concept with operator and co-venturers; the development will involve in particular the construction of a Floating Production, Storage and Offloading (FPSO) facility. Booking of proved reserves is currently anticipated in 2006-2008.

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**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

The following table provides an aging of capitalized exploratory costs and the number of wells to which such costs relate.

	<b>(number of wells as of December 31)</b>					
	<b>2004</b>		<b>2003</b>		<b>2002</b>	
	<b>Amount</b>	<b>Wells</b>	<b>Amount</b>	<b>Wells</b>	<b>Amount</b>	<b>Wells</b>
<b>Wells for which drilling is not completed</b>	91	13	39	10	141	15
<b>Wells with completed drilling</b>						
Less than 1 year	126	12	223	23	96	17
Between 1 and 4 years	198	29	139	26	262	26
Between 4 years and 8 years	15	2	21	3	80	10
More than 8 years						
<b>Total</b>	430	56	422	62	579	68

***(iv) Additional information on impairments***

We provide below additional information with respect to the main impairment charges on tangible and intangible assets recorded by the Group under French GAAP.

**2004**

In the Chemicals segment, impairments were triggered by the deterioration of the economic cycle. As a result of this depressed environment an impairment charge of 597 M in operating income (400 M in net income) was recorded to adjust the carrying value of the plant's tangible assets to their net realizable value.

**2003**

There were no material impairments recorded in 2003.

**2002**

The Argentine impairments were triggered by the further deterioration of the economic recessive cycle that began in Argentina in 1998. As a result of this depressed environment and in particular due to the unilateral measures taken by the Argentine government that substantially reduced electricity prices pursuant to an emergency law enacted in 2002, management determined that the future prospects of certain assets were significantly adversely affected.

As a consequence, the Group recorded an impairment charge in operating income of 431 M (229 M in net income) relating to an electricity-generating unit held by our subsidiary Central Puerto (64% group share) as part of our upstream segment. The fair value was determined using the risk-adjusted discounted future cash flows projected to be generated by the asset.

An additional impairment charge of 69 M in operating income (81 M in net income) was recorded in the downstream business based on the difference between the carrying value of an LPG production and distribution unit held by Total Gas Argentina (100% group share) and the present value of the property's projected future cash flows.

While it is difficult to predict the eventual outcome of the economic and financial situation in Argentina, the Group believes that a further decline in the Argentine economy should not materially impact its financial

**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

condition and results of operations due to the limited contribution to the consolidated accounts of Argentina operations that are likely to be affected by the crisis.

In the Chemicals segment, and following the 2002 Group decision to cease operations of the AZF Grande Paroisse fertilizer plant in Toulouse, an impairment charge of 90 M in operating income (58 M in net income) was recorded to adjust the carrying value of the plant's tangible assets to their net realizable value.

The following table indicates the financial statement captions impacted by the impairment charges recorded under French GAAP as disclosed in Note 4.

	<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Depreciation, depletion and amortization of tangible assets	(631)	(17)	(659)
Amortization of goodwill(1)	(195)		(53)
Other expense	(93)		(52)
Provision for income taxes	230	6	206
Minority interests	1		91
<b>Net impact</b>	<b>(688)</b>	<b>(11)</b>	<b>(467)</b>

(1) Reversed under U.S. GAAP.

**4. Information by business segment**

The financial information for each business segment is reported on the same basis that is used internally. Segments are based on the information from the internal structure as it is defined for directing the policies of management and for measuring segment performance.

The Company's activities are conducted through three business segments: Upstream, Downstream, and Chemicals: the Upstream segment includes, in addition to the exploration and production of hydrocarbons, the gas, power and other energies activities,

the Downstream segment includes trading and shipping activities along with refining and marketing activities,

the Chemicals segment involves Base Chemicals & Polymers, Intermediates & Performance Polymers and Specialties.

The Corporate category includes the operating and financial activities of the holding companies as well as healthcare activities (Sanofi-Aventis).

Operating profit and identifiable assets for each segment have been determined prior to the consolidation and inter-segment adjustments.



Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

Sales prices between business segments approximate market prices.

**For the year ended December 31, 2004****(adjusted for special items)**

	<b>Upstream</b>	<b>Downstream</b>	<b>Chemicals</b>	<b>Corporate</b>	<b>Intercompany</b>	<b>Total</b>
<b>Statement of income</b>						
Non-Group sales	21,995	80,640	20,042	23		122,700
Intersegment sales	14,208	2,836	699	183	(17,926)	
<b>Total sales</b>	<b>36,203</b>	<b>83,476</b>	<b>20,741</b>	<b>206</b>	<b>(17,926)</b>	<b>122,700</b>
Depreciation, depletion, and amortization of tangible assets	(3,196)	(884)	(760)	(31)		(4,871)
<b>Operating income</b>	<b>12,820</b>	<b>3,217</b>	<b>1,086</b>	<b>(215)</b>		<b>16,908</b>
Amortization of intangible assets	(21)	(112)	(129)	(33)		(295)
Equity in income/(loss) of affiliates and other items in net operating income	332	195	28	491		1,046
Tax on net operating income	(7,297)	(998)	(329)	231		(8,393)
<b>Net operating income</b>	<b>5,834</b>	<b>2,302</b>	<b>656</b>	<b>474</b>		<b>9,266</b>
Net cost of net debt						(121)
Minority interests and dividends on subsidiaries redeemable preferred shares						(259)
<b>Net income</b>						<b>8,886</b>
<b>ROACE as a percentage</b>	<b>35%</b>	<b>25%</b>	<b>9%(1)</b>			<b>24%(1)</b>
Gross expenditures	6,170	1,516	905	77		8,668
Divestitures at sale price	637	200	122	233		1,192
Cash flow from operating activities	10,316	3,111	556	446		14,429
<b>Balance sheet as of December 31, 2004</b>						
Property, plant, and equipment, net	24,143	6,904	5,188	187		36,422
Intangible assets, net	263	566	1,020	59		1,908
Investments in equity affiliates	1,430	1,241	554	5,772		8,997
Total non-current assets	27,715	10,046	7,744	7,028		52,533
Capital employed	16,442	9,623	8,338(2)	5,703		40,106

- (1) Excluding amortization of goodwill for an amount of 85 M in the Chemicals segment.
- (2) After taking into account a 110 M pre-tax contingency reserve (civil liability) related to the Toulouse AZF plant explosion.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**For the year ended December 31, 2003**  
**(adjusted for special items)**

	Upstream	Downstream	Chemicals	Corporate	Intercompany	Total
<b>Statement of income</b>						
Non-Group sales	18,704	68,658	17,260	30		104,652
Intersegment sales	11,546	2,289	590	115	(14,540)	
Total sales	30,250	70,947	17,850	145	(14,540)	104,652
Depreciation, depletion, and amortization of tangible assets	(3,289)	(880)	(756)	(35)		(4,960)
<b>Operating income</b>	10,476	1,970	558	(209)		12,795
Amortization of intangible assets	(22)	(98)	(151)	(22)		(293)
Equity in income (loss) of affiliates and other items in net operating income	265	109	(184)	529		719
Tax on net operating income	(5,460)	(521)	31	434		(5,516)
<b>Net operating income</b>	5,259	1,460	254	732		7,705
Net cost of net debt						(162)
Minority interests and dividends on subsidiaries redeemable preferred shares						(199)
<b>Net income</b>						7,344
<b>ROACE as a percentage</b>	29%	15%	4%(1)			19%(1)
Gross expenditures	5,302	1,235	1,115	76		7,728
Divestitures at sale price	428	466	891	93		1,878
Cash flow from operating activities	9,214	3,099	268	(94)		12,487
<b>Balance sheet as of December 31, 2003</b>						
Property, plant, and equipment, net	23,443	6,750	5,867	226		36,286
Intangible assets, net	196	496	1,281	44		2,017
Investments in equity affiliates	1,564	1,057	545	3,703		6,869
Total non-current assets	27,104	9,586	8,482	5,278		50,450
Capital employed	16,777	9,064	8,702(2)	4,301		38,844

- (1) Excluding amortization of goodwill for an amount of 107 M in the Chemicals segment.
- (2) After taking into account a 276 M pre-tax contingency reserve (civil liability) related to the Toulouse AZF plant explosion.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**For the year ended December 31, 2002**  
**(adjusted for special items)**

	Upstream	Downstream	Chemicals	Corporate	Intercompany	Total
<b>Statement of income</b>						
Non-Group sales	16,225	66,984	19,317	14		102,540
Intersegment sales	11,525	2,002	355	117	(13,999)	
Total sales	27,750	68,986	19,672	131	(13,999)	102,540
Depreciation, depletion, and amortization of tangible assets	(3,362)	(896)	(826)	(49)		(5,133)
<b>Operating income</b>	9,309	909	777	(210)		10,785
Amortization of intangible assets	(21)	(99)	(217)	(18)		(355)
Equity in income (loss) of affiliates and other items in net operating income	423	275	46	569		1,313
Tax on net operating income	(5,063)	(239)	(232)	429		(5,105)
<b>Net operating income</b>	4,648	846	374	770		6,638
Net cost of net debt						(196)
Minority interests and dividends on subsidiaries redeemable preferred shares						(182)
<b>Net income</b>						6,260
ROACE as a percentage	23%	8%	5%(1)			15%(1)
Gross expenditures	6,122	1,112	1,237	186		8,657
Divestitures at sale price	603	283	140	1,287		2,313
Cash flow from operating activities	7,721	1,447	1,053	785		11,006
<b>Balance sheet as of December 31, 2002</b>						
Property, plant, and equipment, net	25,189	7,061	6,047	295		38,592
Intangible assets, net	264	473	1,940	75		2,752
Investments in equity affiliates	1,409	1,431	328	3,466		6,634
Total non-current assets	29,109	10,341	9,279	5,281		54,010
Capital employed	18,998	10,207	9,341(2)	3,580		42,126

- (1) Excluding amortization of goodwill for an amount of 131 M in the Chemicals segment.
- (2) After taking into account a 995 M pre-tax contingency reserve (civil liability) related to the Toulouse AZF plant explosion.

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Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

The impact of special items on the consolidated statement of income is set forth below:

**For the year ended December 31, 2004**

	<b>Adjusted for special items</b>	<b>Special items</b>	<b>Consolidated statement of income</b>
Sales	122,700		122,700
Operating expenses	(100,921)	(220)	(101,141)
Depreciation, depletion and amortization of tangible assets	(4,871)	(627)	(5,498)
<b>Operating income</b>			
Corporate	(215)		(215)
Business Segments	17,123	(847)	16,276
<b>Total operating income</b>	16,908	(847)	16,061
Interest expense, net	(234)		(234)
Dividend income on non-consolidated companies	164		164
Dividends paid on subsidiaries' redeemable preferred shares	(6)		(6)
Other income/(expense), net	(403)	2,577	2,174
Provision for income taxes	(8,341)	25	(8,316)
Equity in income/(loss) of affiliates	1,164	(827)	337
<b>Income before amortization of acquisition goodwill</b>	9,252	928	10,180
Amortization of acquisition goodwill	(113)	(195)	(308)
<b>Income before minority interests</b>	9,139	733	9,872
<b>Minority interests</b>	(253)	(7)	(260)
<b>Net income</b>	8,886	726	9,612

The table below reconciles the information presented above with the consolidated financial statements.

**For the year ended December 31, 2004**

	<b>Analysis by segment</b>	<b>Special items</b>	<b>Consolidated financial statements</b>
Depreciation, depletion and amortization of tangible assets	(4,871)	(627)	(5,498)
	(70)	(4)	(74)

Provisions for depreciation of tangible assets (included in operating expenses)

Amortization of intangible assets	(182)	(28)	(210)
Amortization of acquisition goodwill	(113)	(195)	(308)
<b>Depreciation, depletion, and amortization (cash flow statement)</b>	<b>(5,236)</b>	<b>(854)</b>	<b>(6,090)</b>
Tax on net operating income	(8,393)	25	N/A
Tax resulting from net debt	52		N/A
<b>Provision for income taxes</b>	<b>(8,341)</b>	<b>25</b>	<b>(8,316)</b>

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Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

The impact of special items on the consolidated statement of income is set forth below:

**For the year ended December 31, 2003**

	<b>Adjusted for special items</b>	<b>Special items</b>	<b>Consolidated statement of income</b>
Sales	104,652		104,652
Operating expenses	(86,897)	(8)	(86,905)
Depreciation, depletion and amortization of tangible assets	(4,960)	(17)	(4,977)
<b>Operating income</b>			
Corporate	(209)		(209)
Business Segments	13,004	(25)	12,979
Total operating income	12,795	(25)	12,770
Interest expense, net	(232)		(232)
Dividend income on non-consolidated companies	152		152
Dividends paid on subsidiaries' redeemable preferred shares	(5)		(5)
Other income/(expense), net	(670)	(390)	(1,060)
Provision for income taxes	(5,449)	96	(5,353)
Equity in income of affiliates	1,086		1,086
<b>Income before amortization of acquisition goodwill</b>	7,677	(319)	7,358
Amortization of acquisition goodwill	(139)		(139)
<b>Income before minority interests</b>	7,538	(319)	7,219
<b>Minority interests</b>	(194)		(194)
<b>Net income</b>	7,344	(319)	7,025

The table below reconciles the information presented above with the consolidated financial statements.

**For the year ended December 31, 2003**

	<b>Analysis by segment</b>	<b>Special items</b>	<b>Consolidated financial statements</b>
Depreciation, depletion and amortization of tangible assets	(4,960)	(17)	(4,977)
	(35)		(35)

Provisions for depreciation of tangible assets (included in operating expenses)

Amortization of intangible assets	(154)		(154)
Amortization of acquisition goodwill	(139)		(139)

**Depreciation, depletion, and amortization (cash flow statement)**

	(5,288)	(17)	(5,305)
Tax on net operating income	(5,516)	96	N/A
Tax resulting from net debt	67		N/A

<b>Provision for income taxes</b>	(5,449)	96	(5,353)
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**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

The impact of special items on the consolidated statement of income is set forth below:

**For the year ended December 31, 2002**

	<b>Adjusted for special items</b>	<b>Special items</b>	<b>Consolidated statement of income</b>
Sales	102,540		102,540
Operating expenses	(86,622)		(86,622)
Depreciation, depletion and amortization of tangible assets	(5,133)	(659)	(5,792)
<b>Operating income</b>			
Corporate	(210)		(210)
Business Segments	10,995	(659)	10,336
Total operating income	10,785	(659)	10,126
Interest expense, net	(195)		(195)
Dividend income on non-consolidated companies	170		170
Dividends paid on subsidiaries' redeemable preferred shares	(10)		(10)
Other income/(expense), net	(41)	284	243
Provision for income taxes	(4,971)	(63)	(5,034)
Equity in income of affiliates	866		866
<b>Income before amortization of acquisition goodwill</b>	6,604	(438)	6,166
Amortization of acquisition goodwill	(172)	(40)	(212)
<b>Income before minority interests</b>	6,432	(478)	5,954
<b>Minority interests</b>	(172)	159	(13)
<b>Net income</b>	6,260	(319)	5,941

The table below reconciles the information presented above with the consolidated financial statements.

**For the year ended December 31, 2002**

	<b>Analysis by segment</b>	<b>Special items</b>	<b>Consolidated financial statements</b>
Depreciation, depletion and amortization of tangible assets	(5,133)	(659)	(5,792)
	(53)		(53)

Provisions for depreciation of tangible assets (included in operating expenses)

Amortization of intangible assets	(183)	(1)	(184)
Amortization of acquisition goodwill	(172)	(40)	(212)
<b>Depreciation, depletion, and amortization (cash flow statement)</b>	<b>(5,541)</b>	<b>(700)</b>	<b>(6,241)</b>
Tax on net operating income	(5,105)	(63)	N/A
Tax resulting from net debt	134		N/A
<b>Provision for income taxes</b>	<b>(4,971)</b>	<b>(63)</b>	<b>(5,034)</b>

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Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

Special items of the income statement as defined in Note 1.R are as follows:

*Special items of operating income***For the year ended December 31, 2004**

	<b>Upstream</b>	<b>Downstream</b>	<b>Chemicals</b>	<b>Corporate</b>	<b>Total</b>
Restructuring charges		(50)	(69)		(119)
Asset impairment charges		(34)	(597)		(631)
Other items			(97)		(97)
<b>Total</b>		(84)	(763)		(847)

**For the year ended December 31, 2003**

	<b>Upstream</b>	<b>Downstream</b>	<b>Chemicals</b>	<b>Corporate</b>	<b>Total</b>
Restructuring charges			(1)		(1)
Asset impairment charges			(17)		(17)
Other items			(7)		(7)
<b>Total</b>			(25)		(25)

**For the year ended December 31, 2002**

	<b>Upstream</b>	<b>Downstream</b>	<b>Chemicals</b>	<b>Corporate</b>	<b>Total</b>
Restructuring charges		(33)	4		(29)
Asset impairment charges	(461)	(69)	(129)		(659)
Other items	75	(34)	(12)		29
<b>Total</b>	(386)	(136)	(137)		(659)

*Special items of net income***For the year ended December 31, 2004**

	<b>Upstream</b>	<b>Downstream</b>	<b>Chemicals</b>	<b>Corporate</b>	<b>Total</b>
Impact of the Sanofi-Aventis merger				1,690	1,690
Restructuring charges		(31)	(112)		(143)

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Asset impairment charges	(114)	(21)	(553)		(688)
Gains on sales of assets				53	53
Toulouse AZF plant explosion			(98)		(98)
Other items	(34)	(25)	(93)	64	(88)
<b>Total</b>	<b>(148)</b>	<b>(77)</b>	<b>(856)</b>	<b>1,807</b>	<b>726</b>

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
 (Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**For the year ended December 31, 2003**

	<b>Upstream</b>	<b>Downstream</b>	<b>Chemicals</b>	<b>Corporate</b>	<b>Total</b>
Restructuring charges			(144)		(144)
Asset impairment charges			(11)		(11)
Gains/(losses) on sales of assets			(8)	30	22
Toulouse AZF plant explosion					
Other items			(186)		(186)
<b>Total</b>			(349)	30	(319)

**For the year ended December 31, 2002**

	<b>Upstream</b>	<b>Downstream</b>	<b>Chemicals</b>	<b>Corporate</b>	<b>Total</b>
Restructuring charges		(21)	(137)		(158)
Asset impairment charges	(249)	(81)	(137)		(467)
Gains on sales of assets				626	626
Toulouse AZF plant explosion			(61)		(61)
Other items	(202)	(28)	(16)	(13)	(259)
<b>Total</b>	(451)	(130)	(351)	613	(319)

**5. Information by geographical area**

**For the year ended December 31, 2004**

	<b>France</b>	<b>Rest of Europe</b>	<b>North America</b>	<b>Africa</b>	<b>Far East and rest of the world</b>	<b>Total</b>
Non-Group sales	23,427	41,853	17,984	5,527	33,909	122,700
Intangible assets and property, plant, and equipment, net	5,322	14,069	3,264	7,441	8,234	38,330
Gross expenditures	1,989	1,998	755	2,004	1,922	8,668

**For the year ended December 31, 2003**

**Far East**

	<b>France</b>	<b>Rest of Europe</b>	<b>North America</b>	<b>Africa</b>	<b>and rest of the world</b>	<b>Total</b>
Non-Group sales	20,739	36,682	13,968	4,352	28,911	104,652
Intangible assets and property, plant, and equipment, net	4,987	14,288	3,676	7,108	8,244	38,303
Gross expenditures	1,160	1,645	580	2,012	2,331	7,728

**For the year ended December 31, 2002**

	<b>France</b>	<b>Rest of Europe</b>	<b>North America</b>	<b>Africa</b>	<b>Far East and rest of the world</b>	<b>Total</b>
Non-Group sales	20,649	35,531	12,013	4,240	30,107	102,540
Intangible assets and property, plant, and equipment, net	4,815	16,317	4,447	7,416	8,349	41,344
Gross expenditures	1,251	2,118	921	2,086	2,281	8,657

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**6. Intangible assets**

As of December 31,				
	2004		2003	
	Cost	Accumulated amortization	Net	Net
Goodwill	2,353	(1,248)	1,105	1,348
Other Intangibles	2,670	(1,867)	803	669
<b>Total intangible assets(1)</b>	<b>5,023</b>	<b>(3,115)</b>	<b>1,908</b>	<b>2,017</b>

(1) As of December 31, 2003, aggregate cost and accumulated amortization amounted to 4,840 M and 2,823 M , respectively.

**7. Property, plant and equipment**

As of December 31,				
	2004		2003	
	Cost	Accumulated amortization	Net	Net
<b>Upstream properties</b>				
Proved properties	54,355	(35,419)	18,936	19,759
Unproved properties	617	(403)	214	284
Work in-progress	4,307	(26)	4,281	2,885
<b>Total upstream properties</b>	<b>59,279</b>	<b>(35,848)</b>	<b>23,431</b>	<b>22,928</b>
<b>Other Property, Plant, and Equipment</b>				
Land and preparation cost	1,556	(288)	1,268	1,271
Machinery, plant, and equipment (including transportation equipment)	20,880	(15,239)	5,641	5,980
Buildings	6,062	(3,745)	2,317	2,455
Construction in progress	1,278	(14)	1,264	1,401
Other	7,789	(5,288)	2,501	2,251
<b>Total other property, plant, and equipment</b>	<b>37,565</b>	<b>(24,574)</b>	<b>12,991</b>	<b>13,358</b>
<b>Total property, plant, and equipment(1)</b>	<b>96,844</b>	<b>(60,422)</b>	<b>36,422</b>	<b>36,286</b>

(1) As of December 31, 2003 aggregate cost and accumulated depreciation, depletion and amortization amounted to 93,819 M and 57,533 M , respectively.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

Property, plant and equipment presented below include the following amounts for facilities and equipment leases that have been capitalized:

	As of December 31,			
	2004		2003	
	Cost	Accumulated amortization	Net	Net
Machinery, plant, and equipment	570	(199)	371	378
Buildings	32	(23)	9	14
<b>Total</b>	<b>602</b>	<b>(222)</b>	<b>380</b>	<b>392</b>

Amortization expense of capital lease assets amounted to 37 M in 2004, 40 M in 2003 and 29 M in 2002.  
*Variation of property, plant and equipment*

As of January 1, 2004	Acquisitions	Disposals	Amortization	Translation adjustment	Other	As of December 31, 2004
36,286	6,903	(129)	(5,572)	(1,210)	144	36,422

**8. Equity affiliates: investments and loans**

	As of December 31,				For the year ended December 31,		
	2004	2003	2004	2003	2004	2003	2002
	% owned	% owned	Equity value	Equity value	Equity in income/ (loss)	Equity in income/ (loss)	Equity in income/ (loss)
Sanofi-Aventis(1)	13.25%	25.63%	5,772	3,703	(323)	478	412
Cepsa	45.28%	45.28%	1,633	1,462	289	269	200
NLNG	15.00%	15.00%	468	417	158	146	59
Qatargas	10.00%	10.00%	127	121	42	42	45
Qatar Petrochemical Company Ltd.	20.00%	20.00%	111	104	32	22	
Gasoducto Gasandes (Argentina) SA	56.50%	56.50%	110	117	6		7
Ocensa	15.20%	15.20%	62	67			

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Total Tractebel Emirate Power Company	50.00%	50.00%	62	61	4	4	2
Hidroneuquen Piedra del Aguila	41.30%	41.30%	49	13	41	(33)	(20)
Abu Dhabi Gas Ind. Ltd.	15.00%	15.00%	46	50			
Gasinvest SA	27.23%	27.23%	43	105	(61)		(2)
Gasoducto Gasandes SA (Chile)	56.50%	56.50%	33	34	2		(1)
Humber Power Ltd.	40.00%	40.00%	23	20	24	13	18
Gisco	10.00%	10.00%	12	25	5	5	25
CFMH(2)	0.00%	45.00%		128	32	33	37
Other	N/A	N/A	446	442	86	107	84
Total investments			8,997	6,869	337	1,086	866
Loans to equity affiliates			877	964			
<b>Total investments and loans</b>			<b>9,874</b>	<b>7,833</b>			

(1) Sanofi-Synthelabo as of December 31, 2003 and for the years ended December 31, 2003 and 2002.

(2) The investment in CFMH was disposed of in December 2004.

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**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

The Group's share in Cepsa's and Sanofi-Aventis' market value amounted to 3,639 M and 10,303 M as of December 31, 2004, respectively.

**CEPSA** condensed consolidated balance sheet as of December 31, 2004

Fixed assets	4,109
Current assets	2,799
<b>Total</b>	<b>6,908</b>
Shareholders' equity	3,292
Long-term debt and other long-term liabilities	1,554
Current debt and other short-term liabilities	2,062
<b>Total</b>	<b>6,908</b>

**SANOFI-AVENTIS** condensed consolidated balance sheet as of December 31, 2004

Fixed assets	62,143
Current assets	16,070
<b>Total</b>	<b>78,213</b>
Shareholders' equity	35,715
Minority interest	196
Long-term debt and other long-term liabilities	14,371
Current debt and other short-term liabilities	27,931
<b>Total</b>	<b>78,213</b>

The Group's ownership interest in Sanofi-Aventis, held through its subsidiaries Elf Aquitaine and VGF, amounts to 13.25% as of December 31, 2004 (see Note 2).

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**9. Other investments**

<b>As of December 31,</b>				
<b>2004</b>				
<b>2003</b>				
	<b>Cost</b>	<b>Valuation allowance</b>	<b>Net</b>	<b>Net</b>
<b>Publicly traded equity securities</b>				
BNP-Paribas				65
Santander Central Hispano (SCH)	93		93	93
Areva	69		69	69
Other	7		7	79
<b>Total publicly traded equity securities</b>	169		169	306
Market value of publicly traded equity securities			270	406
<b>Other equity securities</b>				
BBPP	77		77	83
Wepec	52		52	52
Oman LNG LLC	6		6	6
BTC Limited	108		108	61
Other	1,487	(809)	678	654
<b>Total other equity securities(1)</b>	1,730	(809)	921	856
<b>Total other investments(2)</b>	1,899	(809)	1,090	1,162

(1) Investments in subsidiaries excluded from consolidation after considering their materiality to the Company's operations accounted for 408 M and 471 M as of December 31, 2004 and 2003, respectively.

(2) As of December 31, 2003 the aggregate cost of other investments and valuation allowances amounted to 1,996 M and 834 M, respectively.

**10. Other non-current assets**

<b>As of December 31,</b>				
<b>2004</b>				
<b>2003</b>				
	<b>Cost</b>	<b>Valuation allowance</b>	<b>Net</b>	<b>Net</b>

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Deferred income tax assets	1,534		1,534	1,504
Loans and advances(1)	1,519	(607)	912	826
Other	793		793	822
<b>Total(2)</b>	<b>3,846</b>	<b>(607)</b>	<b>3,239</b>	<b>3,152</b>

(1) Excluding loans to equity affiliates (Note 8).

(2) As of December 31, 2003, the aggregate cost of other investments and valuation allowances of other non-current assets amounted to 3,652 M and 500 M , respectively.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**11. Inventories**

	As of December 31,	
	2004	2003
Crude oil and natural gas	2,641	1,916
Refined products and products in process	3,737	3,049
Chemical products	2,385	2,193
Supplies and other inventories	540	535
<b>Total under FIFO (First in First out) method</b>	<b>9,303</b>	<b>7,693</b>
Reserve for crude oil price changes and for LIFO adjustment	(2,250)	(1,556)
<b>Inventories, net</b>	<b>7,053</b>	<b>6,137</b>

**12. Accounts receivable, prepaid expenses and other current assets**

	As of December 31,			
	2004		2003	
	Cost	Valuation allowance	Net	Net
<b>Accounts receivable(1)</b>	14,512	(487)	14,025	12,357
<b>Prepaid expenses and other current assets</b>				
Other receivables	1,350		1,350	1,164
Recoverable taxes	1,886		1,886	1,515
Deferred tax assets, short-term	232		232	216
Prepaid expenses	475		475	453
Other current assets	1,458	(38)	1,420	1,431
<b>Total</b>	<b>5,401</b>	<b>(38)</b>	<b>5,363</b>	<b>4,779</b>

(1) As of December 31, 2003, the aggregate cost and valuation allowances of accounts receivable amounted to 12,875 M and 518 M, respectively.

**13. Shareholders' equity****Common Shares****Description**



The Company's common shares, par value of \$10, are the only class of shares. Shares may be held in either bearer or registered form. Holders of the Company's shares have a preemptive right to subscribe for additional shares issued by the Company on a pro rata basis according to their respective holding of shares.

Each registered Share that is fully paid and registered in the name of the same shareholder for at least two years is granted a double voting right after such two-year period. Upon a capital increase by reclassification of retained earnings or additional paid-in surplus, profits or issuance premiums, a double voting right is granted to each registered Share allocated to a shareholder in consideration of Shares which already carry double voting rights. The double voting right is automatically canceled when the Share is converted into a bearer share or when the Share is transferred.

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**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

Under the Company's *statuts*, the voting rights exercisable by a shareholder, directly, indirectly or by proxy, at any shareholders' meeting are limited to 10% of the total number of voting rights attached to the Shares on the date of such shareholders' meeting. This 10% limitation may be increased by taking into account double voting rights held directly or indirectly by the shareholder or by proxy, provided that the voting rights exercisable by a shareholder at any shareholders' meeting may never exceed 20% of the total number of voting rights attached to the Shares.

These limitations on voting terminate automatically if any shareholder or group of shareholders acting in concert holds at least two-thirds of the Shares as a result of a tender offer for 100% of the Shares.

	<b>Number of Common shares</b>
<b>Authorized Capital</b>	
As of December 31, 2001	1,128,269,536
Decrease in authorized shares	(5,411,821)
As of December 31, 2002	1,122,857,715
Decrease in authorized shares	(43,290,366)
As of December 31, 2003	1,079,567,349
Decrease in authorized shares	(9,806,215)
<b>As of December 31, 2004</b>	<b>1,069,761,134</b>

	<b>Number of TOTAL Common Shares</b>
<b>Shares issued and outstanding</b>	
<b>As of January 1, 2002</b>	<b>705,934,959</b>
Shares issued in connection with:	
Capital increase reserved for employees	2,785,214
Exercise of share subscription options	447,181
Exchange guarantee offered to the beneficiaries of Elf Aquitaine share subscription options	564,471
Conversion of U.S. warrants	901,930
Cancellation of shares(1)	(23,443,245)
<b>As of December 31, 2002</b>	<b>687,190,510</b>
Shares issued in connection with:	
Exchange guarantee offered to the beneficiaries of Elf Aquitaine share subscription options	1,092,082
Conversion of U.S. warrants	835,644
Cancellation of shares(2)	(40,000,000)
<b>As of December 31, 2003</b>	<b>649,118,236</b>

## Shares issued in connection with:

Capital increase reserved for employees	3,434,830
Exercise of share subscription options	950
Exchange guarantee offered to the beneficiaries of Elf Aquitaine share subscription options	2,335,024
Cancellation of shares(3)	(19,873,932)
<b>As of December 31, 2004(4)</b>	<b>635,015,108</b>

(1)Decided by the Board of Directors on November 19, 2002.

(2)Decided by the Board of Directors on July 16, 2003 and November 6, 2003.

(3)Decided by the Board of Directors on November 9, 2004.

(4)Including 28,932,967 treasury shares deducted from shareholders' equity.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

The variation of the weighted-average number of diluted shares used in the calculation of earnings per share is detailed as follows:

**For the year ended December 31,**

	<b>2004</b>	<b>2003</b>	<b>2002</b>
<b>Number of shares as of January 1</b>	649,118,236	687,190,510	705,934,959
<b>Number of shares issued during the year (pro rated)</b>			
Capital increase reserved for employees	2,289,887		1,392,607
Exercise of share subscription options	475		223,591
Exchange guarantee offered to the beneficiaries of Elf Aquitaine	1,167,512	546,041	282,236
Conversion of U.S. warrants		417,822	450,965
TOTAL shares held by subsidiaries and deducted from shareholders equity	(37,987,555)	(55,256,066)	(45,083,376)
<b>Weighted-average number of shares</b>	614,588,555	632,898,307	663,200,982
<b>Dilutive effect</b>			
Share subscription options	528,916	282,777	
Shares issued per exercise of exchange guarantee offered to Elf Aquitaine share subscription options holders	763,985	1,945,801	2,564,295
U.S. warrants			302,705
<b>Weighted-average number of diluted shares</b>	615,881,456	635,126,885	666,067,982

The earnings per share of the Group before and after the dilutive effect is detailed as follows:

Earnings on weighted-average number of shares	15.64	11.10	8.96
Earnings on weighted-average number of diluted shares	15.61	11.06	8.92

**Capital increase reserved for company employees**

At the Ordinary and Extraordinary Shareholders Meeting held on May 7, 2002, the shareholders authorized, for a maximum five-year period, the Board of Directors to increase the capital of the Company by an amount not exceeding 3% of the share capital at the date of issue of the new shares, reserving subscriptions to such increase for company employees.

Pursuant to this authorization, the Board of Directors, during its November 6, 2003 meeting, implemented a first capital increase reserved for employees within the limit of 6.0 million shares at a price of 107.90 euros. These shares were entitled to the dividends paid for the 2003 fiscal year. The subscription period ran from March 22 to April 9, 2004 : 3,434,830 shares were subscribed.

**Share cancellation**

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Pursuant to the authorization granted by the Ordinary and Extraordinary Shareholders Meeting held on May 7, 2002 authorizing reduction of capital by cancellation of shares held by the company within the limit of 10% of the outstanding capital every 24 months, the Board of Directors decided on November 9, 2004 to cancel 19,873,932 shares at an average price of 154.73 euros per share, with effect on November 20, 2004.

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**TOTAL**

**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**Shares held by the parent company, TOTAL S.A.**

As of December 31, 2004, TOTAL S.A. held 13,989,670 of its own shares, representing 2.20% of its share capital, detailed as follows:

9,633,602 shares allocated to covering share purchase option plans for Company employees; these shares are recorded as short-term investments and maintained within the total assets,

4,356,068 shares purchased for cancellation on November and December 2004 pursuant to the authorization granted by the Ordinary and Extraordinary Shareholders Meeting held on May 14, 2004 and that are deducted from the consolidated shareholders equity.

**Shares held by the subsidiaries**

As of December 31, 2004, TOTAL S.A. held indirectly through its subsidiaries 25,082,817 of its own shares, representing 3.95% of its share capital, detailed as follows:

505,918 shares held by a consolidated subsidiary, Total Nucléaire, indirectly controlled by TOTAL S.A. These shares were initially acquired in order to realize short-term cash investments and are recorded in short-term investments in the consolidated financial statements;

24,576,899 shares held by subsidiaries of Elf Aquitaine, Financière Valorgest, Sogapar and Fingestval (according to the agreement entered into on September 12, 1999 between Totalfina and Elf Aquitaine, Elf Aquitaine committed on behalf of these subsidiaries to tender to the public exchange offer initiated by Totalfina the 3,798,000, 702,000 and 12,315,760 Elf Aquitaine shares respectively owned by these subsidiaries at that date; consequently, these subsidiaries received respectively 5,550,926, 1,026,000 and 17,999,973 TOTAL shares). These shares were deducted from the consolidated shareholders equity.

**TOTAL U.S. warrants**

TOTAL U.S. warrants, which gave right to the purchase of one American Depositary Share of TOTAL at a price of \$46.94 per ADS expired on August 5, 2003.

Out of the 3,589,419 TOTAL warrants issued, 3,491,776 warrants were exercised. At the expiration date, the 97,643 unexercised warrants became null and void.

**Paid-In Surplus**

In accordance with French law, the paid-in surplus corresponds to share premiums of the parent company which can be capitalized or used to offset losses if the legal reserve has reached its minimum required level. The amount of the paid-in surplus may also be distributed subject to taxation unless the unrestricted reserves of the parent company are distributed prior to or simultaneously with this item.

As of December 31, 2004 paid-in surplus amounted to 38,016 M .

**Reserves**

Under French law, 5% of net income must be transferred to the legal reserve until the legal reserve reaches 10% of the capital par value. This reserve cannot be distributed to the shareholders other than in liquidation but can be used to offset losses.

If wholly distributed, the unrestricted reserves of the parent company would be taxed for an approximate amount of 75 M as of December 31, 2004.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**14. Minority interests and subsidiaries redeemable preferred shares****(i) Change to minority interests**

	As of December 31,	
	2004	2003
Balance at beginning of the year	664	724
Net income	260	194
Cash dividend	(207)	(124)
Translation adjustments	(19)	(68)
Other changes, net(1)	(69)	(62)
<b>Balance at year end</b>	<b>629</b>	<b>664</b>

(1) Mainly due to the purchase of minority interests of Atofina and Gaz du Sud-Ouest (GSO) in 2004 and to the sale of the Paints business in 2003.

**(ii) Subsidiaries redeemable preferred shares**

These non-voting shares were issued by three North American subsidiaries:

TOTAL American Holding, Inc. (TAH), (USA).

TOTAL Energy Resources Finance, Inc. (TERFIN), (USA).

TOTAL Energy Capital, Inc. (TECI), (USA).

TERFIN, TECI, and TAH, wholly-owned subsidiaries of Total America Inc. (a wholly owned subsidiary), have been established for the purpose of issuing \$500 million of Auction Preferred Stock (APS). Proceeds from the issuance of APS were loaned to Total America Inc. and certain of its subsidiaries (the borrowing subsidiaries).

The shares of APS are adjustable rate securities with dividend rates set at auction every 49 days except for TAH who has the option of altering the dividend period. Dividends are cumulative from the date of issue and are payable every 49 days in arrears. The effective dividend rates of the APS were 2.2% in 2004 and 1.3% in 2003, respectively.

The shares may be redeemed at the option of TERFIN, TECI and TAH at their liquidation preference (\$100 million for the TERFIN APS, \$150 million for the TECI APS and \$250 million for TAH APS) plus accumulated and unpaid dividends. The shares become mandatorily redeemable if certain required coverages are not met, if dividends paid are not eligible for the dividend exclusion deduction under United States tax law or if TECI must register as an investment company under the Investment Company Act of 1940, as amended.

During any period that accumulated dividends payable are unpaid or that TERFIN, TECI and TAH have not redeemed shares when required, holders of a majority of the preferred shares, voting as a single class, can elect a majority of the board of directors of the respective companies.

Total America Inc. and the borrowing subsidiaries executed promissory notes payable to TERFIN, TECI and TAH which are secured by a guarantee from the parent company. The assets of TERFIN, TECI and TAH are not available to satisfy claims of the creditors of the Company and its affiliates while shares of APS are outstanding.

In June 1999, TAH issued 900 shares of Series A, 800 shares of Series B and 800 shares of Series C flexible money market cumulative preferred stock (MMPS) at a price of \$100,000 per share for a total of \$250,000,000. The holders of the MMPS have no voting rights, except during any period that accumulated dividends payable are

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)  
 unpaid or that TAH has not redeemed the MMPS when required. In addition, holders of two-thirds of the MMPS must approve certain corporate acts, such as a merger or liquidation.

The balances at the end of periods were as follows:

	As of December 31,			
	2004		2003	
	M\$	M	M\$	M
TERFIN	50	37	100	79
TECI	150	110	150	119
TAH			250	198
<b>Total</b>		147		396

Changes in subsidiaries redeemable preferred shares:

<b>As of January 1, 2003</b>	477
Translation adjustment	(81)
<b>As of December 31, 2003</b>	396
Repayment	(241)
Translation adjustment	(8)
<b>As of December 31, 2004</b>	147

The total amount paid in respect of these redeemable preferred shares progressively decreased over the years as a result of a partial or full repayment of the blocks previously issued and of the fall of interest rates in the United States (10 M in 2002, 5 M in 2003 and 6 M in 2004).

### 15. Employee benefits obligations

	As of December 31,	
	2004	2003
Pension benefits liability	2,765	2,864
Other benefits liability	548	557
Restructuring reserves	287	397
<b>Total</b>	3,600	3,818



Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**Pension benefits and other benefits**

	<b>Pension benefits</b>		<b>Other benefits</b>	
	<b>2004</b>	<b>2003</b>	<b>2004</b>	<b>2003</b>
<b>Change in benefit obligation</b>				
Benefit obligation at beginning of year	7,797	7,947	582	678
Service cost	141	143	10	12
Interest cost	414	404	31	36
Curtailments	(1)	(18)		(3)
Settlements	(133)	(68)		(3)
Special termination benefits	10	21		
Plan participants' contributions	15	12		
Benefits paid	(407)	(392)	(42)	(31)
Plan amendments	76	7	65	(100)
Actuarial loss	260	151	33	58
Translation adjustment and other	(55)	(410)(3)	(4)	(65)
<b>Benefit obligation at end of year</b>	<b>8,117</b>	<b>7,797</b>	<b>675</b>	<b>582</b>
<b>Change in fair value of Plan Assets</b>				
Fair value of plan assets at beginning of year	(5,026)	(4,786)		
Actual return on plan assets	(455)	(469)		
Settlements	165	35		
Plan participants' contributions	(15)	(12)		
Company contributions	(414)	(337)(2)		
Benefits paid	319	289		
Translation adjustment and other	64	254(3)		
<b>Fair value of plan assets at end of year</b>	<b>(5,362)</b>	<b>(5,026)</b>		
<b>Unfunded status</b>	<b>2,755</b>	<b>2,771</b>	<b>675</b>	<b>582</b>
Unrecognized transition asset/(obligation)	10	10	(8)	(7)
Unrecognized prior service cost	(134)	(68)	19	93
Unrecognized actuarial (losses)	(1,892)	(1,897)	(138)	(111)
Minimum Liability Adjustment (MLA)(1)	1,316	1,316		
<b>Net amount recognized</b>	<b>2,055</b>	<b>2,132</b>	<b>548</b>	<b>557</b>
Accrued benefit cost	2,765	2,864	548	557
Prepaid benefit cost	(710)	(732)		

(1) Adjustment according to U.S. GAAP, equal to the excess of the Accumulated Benefit Obligation over fair value of plan assets.

(2) The Group covered certain employee pension benefit plans through insurance companies for an amount of 272 M for the year ended December 31, 2004 and an amount of 239 M for the year ended December 31, 2003.

(3) In 2003, the change in foreign currency translation and other includes the sale of the Paints business which amounts to (257) M of Projected Benefit Obligation and 150 M of fair value of plan assets.

The Accumulated Benefit Obligation for all benefit plans was 7,435 M and 7,169 M as of December 31, 2004 and 2003 respectively.

The Group expects to contribute 152 M to its pension plans in 2005.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

The estimated future payments are as follows:

	<b>Pensions benefits</b>	<b>Other benefits</b>
2005	411	42
2006	417	43
2007	439	43
2008	445	43
2009	459	43
2010-2014	2,493	217

The allocation of plan assets is as follows:

	<b>As of December 31,</b>	
	<b>2004</b>	<b>2003</b>
Equities	44%	47%
Debt securities	50%	49%
Real estate	3%	2%
Other	3%	2%

The weighted average assumptions used to determine benefit obligations were as follows:

	<b>Pension benefits</b>			<b>Other benefits</b>		
	<b>For the year ended December 31,</b>			<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>	<b>2004</b>	<b>2003</b>	<b>2002</b>
Discount rate	5.12%	5.41%	5.64%	5.28%	5.83%	6.07%
Average expected rate of salary increase	3.66%	3.74%	3.81%			
Expected rate of healthcare inflation						
Initial				5.70%	6.37%	7.85%
Ultimate				4.15%	3.83%	4.17%

**Components of net periodic benefit cost**

<b>Pension benefits</b>	<b>Other benefits</b>
<b>For the year ended December 31,</b>	<b>For the year ended December 31,</b>

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	2004	2003	2002	2004	2003	2002
Service cost	141	143	153	10	12	11
Interest cost	414	404	423	31	36	43
Expected return on plan assets	(348)	(307)	(421)			
Amortization of transition obligation (asset)		(5)	(4)	1	1	1
Amortization of prior service cost	39	34	14	(1)	(5)	(4)
Amortization of actuarial losses (gains)	121	105	33	5	6	(1)
Curtailment	(1)	(7)	(35)		(7)	
Settlement	46	(9)	(1)		(2)	
Special termination benefits	10	21	5			
<b>Net periodic benefit cost</b>	<b>422</b>	<b>379</b>	<b>167</b>	<b>46</b>	<b>41</b>	<b>50</b>

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**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

The weighted average assumptions used to determine net periodic benefit cost were as follows:

	<b>Pension benefits</b>			<b>Other benefits</b>		
	<b>Year ended December 31,</b>			<b>Year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>	<b>2004</b>	<b>2003</b>	<b>2002</b>
Discount rate	5.41%	5.64%	5.91%	5.83%	6.07%	6.41%
Average expected rate of salary increase	3.74%	3.81%	3.74%			
Rate of return on plan assets	6.96%	6.99%	7.45%			
Expected rate of healthcare inflation						
Initial				6.37%	7.85%	5.71%
Ultimate				3.83%	4.17%	3.88%

The assumptions for changes in healthcare costs have a significant impact on the valuations of commitments for coverage of medical expenses. A positive or negative change of one-percentage-point in the healthcare inflation rate would have approximately the following impact:

	<b>1% point increase</b>	<b>1% point decrease</b>
Effect on benefit obligation	66	(54)
Effect on total of service and interest cost components	9	(5)

The pension plans for which the accumulated benefit obligation is higher than the fair value of plan assets are detailed as follows as of December 31:

	<b>As of December 31,</b>	
	<b>2004</b>	<b>2003</b>
Accumulated Benefit Obligation	5,978	5,368
Projected Benefit Obligation	6,399	5,699
Fair value of plan assets	(3,634)	(2,988)

**Restructuring reserves**

The Group covered at the end of 2004 a portion of a voluntary early retirement program through insurance companies for an amount of 24 M .

**16. Other long-term liabilities**

**As of  
December 31,**

**2004                      2003**

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Litigation and accrued penalty claims	521	489
Major refinery turnarounds	298	341
Environmental contingencies	627	500
Asset retirement obligations	3,334	3,112
Other long-term liabilities	1,384	1,622
Deposits received	285	280
<b>Total</b>	<b>6,449</b>	<b>6,344</b>

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

The other long-term liabilities include:

the contingency reserve related to the Toulouse AZF plant explosion (civil liability) for an amount of 110 M as of December 31, 2004,

provisions related to restructuring of activities in the Chemicals segment for an amount of 159 M as of December 31, 2004.

The variation of the other long-term liabilities is as follows:

As of January 1, 2004	Allowances	Reversals	Translation adjustment	Other	As of December 31, 2004
6,344	1,134	(1,315)	(138)	424	6,449

Allowances for the period include:

major refinery turnarounds for 210 M ,

an additional allowance of the contingency reserve related to the Toulouse AZF plant explosion (civil liability), for an amount of 150 M ,

environmental contingencies in the Chemicals segment for 104 M .

The principal reversals of the period are related to the incurred expenses and include notably:

the contingency reserve related to the Toulouse AZF plant explosion (civil liability), for an amount of 316 M ,

major refinery turnarounds for 251 M ,

provisions for restructuring and social plans for 136 M .

The Other heading principally includes the effect of the increase of the retirement obligations in application of FAS No. 143 for 317 M and the recording in 2004 of provisions for jubilee for 99 M .

**Variation of the asset retirement obligation**

As of January 1, 2004	Accretion	Revision in estimates	New obligations	Spending on existing obligations	Translation adjustment	As of December 31, 2004
3,112	143	187	130	(161)	(77)	3,334

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**17. Debt****A) Long-term Debt**

<b>As of December 31,</b>						
<b>2004</b>			<b>2003</b>			
	<b>Secured</b>	<b>Unsecured</b>	<b>Total</b>	<b>Secured</b>	<b>Unsecured</b>	<b>Total</b>
Debenture loans		8,208	8,208		7,763	7,763
Capital lease obligations	325		325	360		360
Banks and other:						
Fixed rate	4	284	288	7	236	243
Floating rate	137	776	913	93	1,324	1,417
<b>Total</b>	466	9,268	9,734	460	9,323	9,783

Debenture loans after taking into account hedges (currency and interest rates swaps) can be detailed as follows:

<b>As of December 31,</b>		
	<b>2004</b>	<b>2003</b>
<b>Parent company(1)</b>		
6.875% Bonds 1997-2004 (USD 300 million)		237
4% Bonds 2000-2004 (CHF 200 million)		94
4% Bonds 2000-2004 (CHF 100 million)		48
4% Bonds 2000-2004 (CHF 150 million)		73
5.625% Bonds 2000-2004 (EUR 100 million)		71
8 <sup>1</sup> / <sub>5</sub> % Bonds 1995-2005 (FRF 500 million)	71	77
7.62% single Coupon Bonds 1995-2005 (FRF 950 million)	136	146
7 <sup>1</sup> / <sub>2</sub> % Bonds 1995-2005 (FRF 400 million)	57	61
6.90% Bonds 1996-2006 (FRF 990 million)	144	155
6.75% Bonds 1996-2008 (FRF 950 million)	134	145
6.75% Bonds 1996-2008 (FRF 800 million)	116	125
6.75% Bonds 1996-2008 (FRF 700 million)	98	106
5.03% Bonds 1997-2007 (FRF 620 million)	72	78
6.80% Bonds 1997-2007 (ESP 12 billion)	61	66
6.20% Bonds 1997-2009 (FRF 900 million)	127	137
Pibor 3-months + 0.38% Bonds 1998-2008 (FRF 230 million)	27	30
5.125% Bonds 1998-2009 (FRF 1 billion)	122	131
5% Bonds 1998-2013 (FRF 1 billion)	123	132
3.875% Bonds 1999-2006 (EUR 300 million)	237	257
3.25% Bonds 1999-2005 (CHF 200 million)	96	104
3.5% Bonds 2000-2006 (CHF 200 million)	93	100

6.875% Bonds 2000-2005 (GBP 150 million)	176	190
5.375% Bonds 2000-2005 (EUR 250 million)	167	180
3.25% Bonds 2000-2005 (CHF 100 million)	45	48
5.75% Bonds 2000-2005 (EUR 500 million)	318	343
5.65% Bonds 2000-2010 (EUR 100 million)	65	70

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

	As of December 31,	
	2004	2003
7% Bonds 2000-2005 (USD 500 million)	367	396
Short-term portion (less than one year)	(1,433)	(524)
<b>Total parent company</b>	<b>1,419</b>	<b>3,076</b>
<b>Elf Aquitaine</b>		
4.5% Bonds 1999-2009 (EUR 1 billion)	1,000	1,000
7% Bonds 1994-2004 (FRF 1.5 billion)		218
2.25% Bonds 1999-2004 (CHF 250 million)		133
Short-term portion (less than one year)		(351)
<b>Total Elf Aquitaine</b>	<b>1,000</b>	<b>1,000</b>
<b>TOTAL Capital S.A.(1)</b>		
3% Bonds 2002-2007 (CHF 600 million)	267	288
4.74% Bonds 2002-2007 (USD 75 million)	55	60
5.125% Bonds 2002-2007 (USD 300 million)	220	237
5.89% Bonds 2002-2012 (USD 20 million)	15	16
3% Bonds 2002-2007 (CHF 400 million)	176	190
4.75% Bonds 2002-2007 (USD 250 million)	183	198
LIBOR USD 3 months + 0.06% Bonds 2002-2007 (USD 50 million)	37	40
LIBOR USD 3 months + 0.065 % Bonds 2002-2007 (USD 50 million)	37	40
5% Bonds 2002-2007 (GBP 150 million)	169	182
2.5% Bonds 2002-2007 (CHF 200 million)	97	105
5% Bonds 2002-2007 (GBP 75 million)	87	94
5% Bonds 2003-2007 (GBP 50 million)	58	63
5% Bonds 2003-2008 (AUD 100 million)	42	45
3.5% Bonds 2003-2008 (EUR 500 million)	389	419
4.25% Bonds 2003-2008 (CAD 100 million)	48	52
4.50% Bonds 2003-2013 (USD 30 million)	22	24
3.25% Bonds 2003-2008 (USD 250 million)	184	198
5% Bonds 2003-2008 (AUD 100 million)	45	48
3.50% Bonds 2003-2008 (EUR 100 million)	78	84
3.50% Bonds 2003-2008 (EUR 150 million)	122	132
2% Bonds 2003-2008 (CHF 300 million)	159	172
2.375% Bonds 2003-2009 (CHF 300 million)	157	169
2% Bonds 2003-2008 (CHF 200 million)	107	115
6.25% Bonds 2003-2009 (AUD 100 million)	53	57
3.50% Bonds 2003-2009 (USD 500 million)	367	396
2.375% Bonds 2003-2010 (CHF 300 million)	170	183
4.875% Bonds 2004-2010 (GBP 250 million)	341	

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2.375% Bonds 2004-2010 (CHF 200 million)	119
3.75% Bonds 2004-2010 (EUR 500 million)	463
6% Bonds 2004-2009 (AUD 100 million)	58
6% Bonds 2004-2009 (AUD 50 million)	28
4.875% Bonds 2004-2010 (GBP 100 million)	135
5.75% Bonds 2004-2011 (AUD 100 million)	56

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

	As of December 31,	
	2004	2003
4% Bonds 2004-2010 (CAD 100 million)	56	
4.875% Bonds 2004-2010 (GBP 150 million)	195	
3.25% Bonds 2004-2008 (USD 50 million)	37	
3.25% Bonds 2004-2008 (USD 50 million)	37	
5% Bonds 2004-2007 (GBP 75 million)	100	
3.25% Bonds 2004-2008 Bonds (USD 100 million)	73	
4.875% Bonds 2004-2011 (CAD 200 million)	114	
4.125% Bonds 2004-2011 (USD 300 million)	220	
6.75% Bonds 2004-2010 (NZD 100 million)	50	
4.125% Bonds 2004-2011 (USD 100 million)	73	
2.385% Bonds 2004-2010 (CHF 200 million)	122	
3.5% Bonds 2004-2009 (USD 50 million)	37	
<b>Total TOTAL Capital S.A.</b>	<b>5,658</b>	<b>3,607</b>
Other consolidated subsidiaries	131	80
<b>Total Group</b>	<b>8,208</b>	<b>7,763</b>

(1) These loans are converted into U.S. dollar floating rate debt by issuance of individual hedging currency swaps. TOTAL Capital S.A. is a wholly-owned indirect subsidiary of the Company (with the exception of one share each held by the members of its board of directors, as required under French law). It acts as a financing vehicle for the Group. Its debt securities are fully and unconditionally guaranteed by the Company as to payment of principal, premium, if any, interest and any other amounts due.

**Loan repayment schedule (excluding short-term portion)**

	As of December 31,			
	2004	%	2003	%
2005.			2,020	21
2006.	697	7	894	9
2007.	1,939	20	1,856	19
2008.	1,837	19	1,853	19
2009.	2,139	22	3,160(1)	32
2010 and after	3,122	32		
<b>Total</b>	<b>9,734</b>	<b>100</b>	<b>9,783</b>	<b>100</b>

(1)2009 and after.

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Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**Analysis by currency and interest rate**

These analyses take into account interest rate and foreign currency swap operations which hedge long-term debts.

	<b>As of December 31,</b>			
	<b>2004</b>	<b>%</b>	<b>2003</b>	<b>%</b>
U.S. dollar	7,858	81	7,592	78
Pound sterling	3	0	434	4
Euro	1,548	16	1,529	16
Other currencies	325	3	228	2
<b>Total</b>	<b>9,734</b>	<b>100</b>	<b>9,783</b>	<b>100</b>

	<b>As of December 31,</b>			
	<b>2004</b>	<b>%</b>	<b>2003</b>	<b>%</b>
Fixed rates	694	7	627	6
Floating rates	9,040	93	9,156	94
<b>Total</b>	<b>9,734</b>	<b>100</b>	<b>9,783</b>	<b>100</b>

As of December 31, 2004, the Group had an amount of \$7,841 million of long-term confirmed lines of credit, of which \$7,233 million were not used.

These facilities are primarily contracted with international banks for periods initially extending up to 14 years (with an average maturity of approximately 5.2 years). Interest on borrowings under these agreements is based on prevailing money market rates. In addition, the credit lines are subject to various commitment fees on the unused portions.

**B) Short-term borrowings and bank overdrafts**

	<b>As of December 31,</b>	
	<b>2004</b>	<b>2003</b>
Current portion of long-term loans	1,795	1,657
Short-term financial debt and bank overdrafts	1,728	2,178
<b>Total</b>	<b>3,523</b>	<b>3,835</b>

Short-term borrowings consist mainly of commercial papers or treasury bills or draws on bank loans. These instruments bear interest at rates which are close to market rates.





Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**18. Other creditors and accrued liabilities**

	<b>As of December 31,</b>	
	<b>2004</b>	<b>2003</b>
Advances from customers (including advances from related parties)	881	798
Accruals and deferred income	319	315
Payables to states (including taxes and duties)	6,392	4,990
Payroll	940	925
Other	2,552	1,942
<b>Total</b>	<b>11,084</b>	<b>8,970</b>

**19. Operating expenses**

	<b>Year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Crude oil and product purchases(1)	(81,496)	(67,837)	(67,013)
Unsuccessful exploration costs	(414)	(359)	(487)
Other operating expenses(2)	(19,885)	(19,997)	(19,330)
Long-term operating liabilities (allowances)	679	1,277	292
Short-term operating liabilities (allowances/(reversals))	(25)	11	(84)
<b>Operating expenses</b>	<b>(101,141)</b>	<b>(86,905)</b>	<b>(86,622)</b>

(1)The cost of goods sold includes royalties paid on oil and gas production in the Upstream segment (see in particular the taxes paid to Middle East oil producing countries for the Group's concessions as detailed in Note 30).

(2)The other operating expenses are principally composed of production and administrative costs (see in particular the payroll costs as detailed in Note 27).

**20. Interest expense, net**

	<b>Year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Financial interest charge on debt	(756)	(629)	(686)
Financial income on cash and cash equivalents and equity securities	588	408	356

<b>Cost of net debt</b>	(168)	(221)	(330)
Financial interest capitalized	35	46	89
Other financial gains/(losses)	(101)	(57)	46
<b>Financial (charge)/income of operational nature</b>	(66)	(11)	135
<b>Interest expense, net</b>	(234)	(232)	(195)

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Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**21. Other income/(expense), net**

	<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Foreign exchange gains/(losses)	(72)	(59)	(50)
Gains/(losses) on sales of assets	3,078	(182)	862
Amortization of intangible assets	(210)	(153)	(184)
Contingency reserve for Toulouse-AZF plant explosion	(150)		(95)
Other	(472)	(666)	(290)
<b>Total</b>	<b>2,174</b>	<b>(1,060)</b>	<b>243</b>

For 2004, the Other heading includes notably early retirement plans and restructuring costs for 165 M and other allowances for various litigation reserves for 82 M .

For 2003, the Other heading includes notably early retirement plans and restructuring costs for 284 M , an allowance of 155 M for litigation reserves, following investigations of the European Commission into alleged anticompetitive practices involving certain products sold by Atofina or its subsidiaries, and other allowances for various litigation reserves for 90 M .

For 2002, the Other heading includes restructuring costs in the Chemicals segment for 215 M .

**22. Income taxes**

Since 1966, TOTAL and Elf have been taxed in accordance with consolidated income tax treatment approved on a renewable basis by the French Ministry of Finance. At the end of 1999, Elf became part of the same tax consolidated group as Totalfina in accordance with the principles of continuity and neutrality of this tax treatment. The renewal of the agreement has been granted to the Group for the period 2002-2004 and requested for the period 2005-2007.

French income and foreign withholding taxes are not provided for the temporary differences between the financial statement carrying amount and tax bases of investments in foreign subsidiaries which are considered to be permanent investments. Undistributed earnings of foreign subsidiaries considered to be reinvested indefinitely amounted to 17,054 M as of December 31, 2004. The determination of the tax effect relating to such reinvested income is not practicable.

In addition, no provision for income taxes has been made for approximately 12,519 M of unremitted earnings of the Company's French subsidiaries in that the remittance of such earnings would be tax exempt for the subsidiaries in which the Company owns 95% or more of the outstanding shares.

Income tax is detailed as follows:

	<b>Year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Current income taxes	(7,666)	(5,098)	(5,446)
Deferred income taxes	(650)	(255)	412
<b>Provision for income taxes</b>	<b>(8,316)</b>	<b>(5,353)</b>	<b>(5,034)</b>

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

Before netting deferred tax assets and liabilities by fiscal entity, the components of deferred tax balances as of December 31, 2004 and 2003 are as follows:

	As of December 31,	
	2004	2003
Net operating losses and tax credit carryforwards	933	728
Employee benefits	841	976
Other temporarily non-deductible provisions	3,006	2,930
<b>Gross deferred tax assets</b>	4,780	4,634
Valuation allowance	(342)	(280)
<b>Net deferred tax assets</b>	4,438	4,354
Excess tax over book depreciation	(6,821)	(6,363)
Other temporary tax deductions	(1,953)	(1,750)
<b>Gross deferred tax liability</b>	(8,774)	(8,113)
<b>Net deferred tax liabilities</b>	(4,336)	(3,759)

After netting deferred tax assets and liabilities by fiscal entity, deferred taxes are presented on the balance sheet as follows:

	As of December 31,	
	2004	2003
Deferred tax assets, long-term (Note 10)	1,534	1,504
Deferred tax assets, short-term (Note 12)	232	216
Deferred tax liabilities, long-term	(6,063)	(5,443)
Deferred tax liabilities, short term (Note 18)	(39)	(36)
<b>Net amount</b>	(4,336)	(3,759)

**Reconciliation between provision for income taxes and pre-tax income**

	As of December 31,		
	2004	2003	2002
Net income	9,612	7,025	5,941
Minority interests	260	194	13

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Provision for income taxes	8,316	5,353	5,034
<b>Pre-tax income</b>	18,188	12,572	10,988
French statutory tax rate	35.43%	35.43%	35.43%
Theoretical tax charge	(6,444)	(4,454)	(3,893)
Difference between French and foreign income tax rates	(2,758)	(1,973)	(1,834)
Tax effect of equity in income (loss) of affiliates	119	385	307
Permanent differences	846	781	413
Change in valuation allowance	(71)	(88)	(17)
Other	(8)	(4)	(10)
<b>Provision for income taxes</b>	(8,316)	(5,353)	(5,034)

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

French statutory tax rate includes standard corporate tax rate (33.33%) and additional taxes currently applicable.

Permanent differences are mainly due to amortization of goodwill and to dividends from non-consolidated companies as well as the specific taxation rules applicable to some activities and within the consolidated income tax treatment.

**Net operating losses and tax credit carryforwards**

Deferred tax assets relating to NOLs and tax credit carryforwards were available in various tax jurisdictions as of December 31, 2004 expiring in the following years:

	<b>Basis</b>	<b>Tax</b>
2005	291	122
2006	368	143
2007	180	76
2008	603	214
2009 and after	65	29
Unlimited	1,605	349
<b>Total</b>	<b>3,112</b>	<b>933</b>

**23. Leases**

The Company leases real estate, service stations, ships and other equipment, through non-cancelable capital and operating leases.

The future minimum lease payments on non-cancelable leases to which the Company is committed as of December 31, 2004 are shown as follows:

	<b>Operating Leases</b>	<b>Capital Lease Obligations</b>
2005	203	52
2006	169	47
2007	116	44
2008	105	46
2009	68	39
2010 and after	327	231
<b>Future lease payments</b>	<b>988</b>	<b>459</b>
Less amount representing interest		(104)
Present value of net minimum lease payments		355
Less current portion of capital leases		(30)
<b>Total</b>		<b>325</b>



Net rental expense incurred under operating leases for the years ended December 31, 2004, 2003, and 2002 was 244 M , 197 M , and 204 M , respectively.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**24. Commitments and contingencies****Maturity and instalments of payments****As of December 31, 2004**

	<b>Total</b>	<b>Less than 1 year</b>	<b>Between 1 and 5 years</b>	<b>More than 5 years</b>
Excise taxes payment given	2,892	2,668	48	176
Collateral given against borrowings	454	5	150	299
Other commitments given	2,462	1,165	568	729
<b>Total commitments given</b>	<b>5,808</b>	<b>3,838</b>	<b>766</b>	<b>1,204</b>
Mortgages and liens received	196	9	124	63
Other commitments received	1,169	588	310	271
<b>Total commitments received</b>	<b>1,365</b>	<b>597</b>	<b>434</b>	<b>334</b>

**As of December 31, 2003**

	<b>Total</b>	<b>Less than 1 year</b>	<b>Between 1 and 5 years</b>	<b>More than 5 years</b>
Excise taxes payment given	2,248	2,248		
Collateral given against borrowings	570	67	236	267
Other commitments given	1,823	833	614	376
<b>Total commitments given</b>	<b>4,641</b>	<b>3,148</b>	<b>850</b>	<b>643</b>
Mortgages and liens received	389	214	119	56
Other commitments received	1,582	534	635	413
<b>Total commitments received</b>	<b>1,971</b>	<b>748</b>	<b>754</b>	<b>469</b>

The information regarding contractual obligations related to long-term debt and credit facilities is in Note 17. The information regarding capital and operating leases is in Note 23.

**Excise taxes payment given**

Guarantees given on customs duties which amount to 2,892 M as of December 31, 2004 mainly consist of guarantees given to other oil and gas companies in order to comply with French tax authorities requirements for oil and gas importation in France. A payment would be triggered by a failure of the guaranteed party with respect to the French tax authorities. The default of the guaranteed parties is however considered to be highly remote by the Group.

**Collateral given against borrowings**

The Group guarantees bank debt and finance lease obligations of certain unconsolidated affiliates. Expiration dates vary, or guarantees will terminate on payment and/or cancellation of the obligation. A payment would be triggered by failure of the guaranteed party to fulfil its obligation covered by the guarantee, and no assets are held as collateral for these guarantees. The amount of these guarantees total approximately 454 M as of December 31, 2004 for debt guarantees with maturities up to 2019.

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**TOTAL**

**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**Other commitments given**

***Non-consolidated subsidiaries***

The Group also guarantees the current liabilities of some of its non-consolidated affiliates. Performance under these guarantees would be triggered by a financial default of the entity. At year-end 2004, the total amount of these guarantees is estimated to be 80 M .

***Indemnities***

In the ordinary course of business, the Group executes contracts involving indemnities standard in the industry and indemnifications specific to a transaction such as sale of a business. These indemnifications might include claims against any of the following: environmental, tax and shareholder matters; intellectual property rights; governmental regulations and employment-related matters; dealer, supplier, and other commercial contractual relationships. Performance under these indemnities would generally be triggered by a breach of terms of the contract or by a third party claim. The Group regularly evaluates the probability of having to incur costs associated with these indemnifications.

The amount of guarantees related to business sales is estimated at 296 M . They mainly consist of the guarantees given for the Elf Antargaz sale in 2001 and the sale of the Paints business in 2003.

***Other guarantees***

As part of normal ongoing business operations and consistent with generally accepted and recognized industry practice, the Group enters into numerous agreements with other parties. These commitments are often entered into for commercial purposes or for regulatory purposes and for other operating agreements. As of December 31, 2004, these other commitments include guarantees given to customers or suppliers for 618 M , guarantees on documentary letters of credit for 816 M and other operating commitments for 652 M .

Similar to the business practice of all oil and gas companies for development of gas fields, the Group is involved in long-term sale agreements on quantities of natural gas. The price of these contracts is indexed on prices of petroleum products and other forms of energy.

Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**Interest rate and foreign currency agreements**

Commitments and contingencies related to the Company's financial derivatives activities are stated below. These amounts set the levels of notional involvement by the Company and are not indicative of an unrealized gain or loss.

As of December 31, 2004	Total	2005	2006	2007	2008	2009	2010 and after
<b>MANAGEMENT OF INTEREST RATE EXPOSURE</b>							
<b>Issue swaps and swaps hedging debenture issues</b>							
Notional amount	9,490	1,433	474	1,599	1,698	1,948	2,338
Received rate (as of 12.31.2004) 4.40%							
Paid rate (as of 12.31.2004) 2.68%							
<b>Long-term currency and interest rate swaps</b>							
Notional amount	105	37	2	66			
Received rate (as of 12.31.2004) 3.58%							
Paid rate (as of 12.31.2004) 3.36%							
<b>Long-term interest rate swaps</b>							
<b>Receive-fixed swaps</b>							
Notional amount	37	34	1				2
Received rate (as of 12.31.2004) 5.45%							
Paid rate (as of 12.31.2004) 2.55%							
<b>Pay-fixed swaps</b>							
Notional amount	3						3
Received rate (as of 12.31.2004) 2.30%							
Paid rate (as of 12.31.2004) 5.56%							
<b>Short-term interest rate swaps</b>							
Notional amount	16,997	16,997					

**MANAGEMENT OF  
CURRENCY EXPOSURE****Currency swaps**

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Notional amount	10,531	10,160	111	28	16	16	200
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**Forward exchange contracts**

Notional amount	116	116
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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

As of December 31, 2003	Total	2004	2005	2006	2007	2008	2009 and after
<b>MANAGEMENT OF INTEREST RATE EXPOSURE</b>							
<b>Issue swaps and swaps hedging debenture issues</b>							
<b>Receive-fixed swaps</b>							
Notional amount	8,479	875	1,546	512	1,561	1,672	2,313
Received rate (as of 12.31.2003)							
4.43%							
Paid rate (as of 12.31.2003)	1.63%						
<b>Long-term currency and interest rate swaps</b>							
Notional amount	153	40	40	3	70		
Received rate (as of 12.31.2003)							
3.04%							
Paid rate (as of 12.31.2003)	2.67%						
<b>Long-term interest rate swaps</b>							
<b>Receive-fixed swaps</b>							
Notional amount	79	41	38				
Received rate (as of 12.31.2003)							
5.63%							
Paid rate (as of 12.31.2003)	1.50%						
<b>Pay-fixed swaps</b>							
Notional amount	877	161			396	317	3
Received rate (as of 12.31.2003)							
1.36%							
Paid rate (as of 12.31.2003)	3.44%						
<b>Short-term interest rate swaps</b>							
Notional amount	9,540	9,540					
<b>FRA</b>							
Notional amount	48	48					
Buying	24	24					
Sale	24	24					
<b>MANAGEMENT OF CURRENCY EXPOSURE</b>							
<b>Currency swaps</b>							
Notional amount	6,221	6,191	30				

**Forward exchange contracts**

Notional amount	257	244	13
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**Currency options**

Notional amount	10	10
Buying		
Sale	10	10

Most long-term swaps (interest rate and/or currency swaps, issue swaps or swaps hedging debenture issues) are aimed at converting fixed-rate debt into floating-rate debt on a LIBOR basis or equivalent.

The average interest rates are given for information purposes and reflect, for the floating-rate portion, market conditions at year-end.

**Impact on the reported interest expenses**

The Company does not consider it meaningful to measure this impact for the issue swaps. These swaps are an integral part of the issuance of most of the debenture loans, the fixed rate of which is thereby converted into a U.S. dollar floating rate at the issuance date. Hence, the original fixed rate of the debenture loans and, similarly, of the issue swap is not meaningful.

Regarding the other derivative instruments, the only significant impact on the statement of income is an expense, amounting to 26 M , for the year ended December 31, 2004, a profit, amounting to 3 M , for the year ended December 31, 2003, and an expense, amounting to 4 M , for the year ended December 31, 2002, related to



**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

the premiums/discounts on currency swaps primarily used to manage the conversion of the Company's currency deposits into euros.

**Commodity contracts**

The commitments related to the Company's operations on crude oil, petroleum products and natural gas and power futures markets are stated below. These amounts represent the levels of involvement by the Company and are not indicative of a market risk or gains or losses.

	<b>Notional value 2004</b>		<b>Notional value 2003</b>	
	<b>Assets</b>	<b>Liabilities</b>	<b>Assets</b>	<b>Liabilities</b>
<b>Crude oil and petroleum products and freight rates</b>				
Petroleum products and crude oil swaps(1)	3,454	3,778	2,546	2,724
Forward freight agreements	29	71		
Forwards	233	882	262	1,050
Options(2)	2,712	2,162	1,742	1,409
Futures(3)	536	914	660	912
Options on futures(2)	199	228	92	139
<b>Natural gas and power</b>				
Swaps(1)	140	240	272	166
Forwards	4,568	5,227	6,106	7,116
Options(2)	35	22	227	239
Futures(3)	17	8	3	17

(1) Swaps (including Contracts for differences): the assets/ liabilities columns correspond to receive-fixed and pay-fixed swaps.

(2) Options: the assets/ liabilities columns correspond to the nominal value of options (calls or puts) purchased/ sold, valued based on the strike.

(3) Futures: the assets/ liabilities columns correspond to the net purchasing/ selling positions, valued based on the closing rate on the organized exchange market.

Contracts on crude oil and petroleum products have been primarily entered into for a short term (less than one year).

For crude oil and petroleum products, Forwards include instruments that may result in physical delivery, such as BFO contracts; all other spot or term contracts with physical delivery and price established on the basis of quotations of published market indexes are not included.

For natural gas and power activity, Forwards include derivative instruments as well as all contracts resulting in physical delivery.

**25. Fair value of financial instruments**

Fair values are estimated for the majority of the Company's financial instruments, with the exception of publicly traded equity securities and marketable securities for which market prices are used. Fair values are not estimated for inter segment financial instruments.

The estimation of fair values, based in particular on principles such as discounting to present value of future cash flows, must be weighted by the fact that the value of a financial instrument at a given time may be modified depending on the market environment (liquidity, especially), and also the fact that subsequent changes in interest rates and exchange rates are not taken into account. In some cases, the estimations have been made based on

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Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

simplifying assumptions. As a consequence, the use of different estimations, methodologies and assumptions may have a material effect on the estimated fair value amounts.

The methods used are as follows:

**Cash and cash equivalents, accounts and notes receivable, bank overdrafts, short-term borrowings, accounts and notes payable:** The carrying amounts reflected in the consolidated financial statements are reasonable estimates of the fair value because of the relatively short period of time between the origination of the instruments and their expected realization.

**Investments:** Estimated fair values for publicly traded equity securities are based on quoted average market prices of the month of December 2004 and 2003.

**Long-term debt, current portion of long-term debt, long-term interest rate and foreign currency swaps:** The fair values of these financial instruments have been determined by estimating future cash flows on a borrowing-by-borrowing basis and discounting these future cash flows using the zero coupon interest rate curves at year-end and taking into account a spread that corresponds to the average risk classification of the Company.

**Bank guarantees:** the fair value of these instruments are based on average fees currently charged for similar agreements, taking into account the average risk classification of the Company.

**Other off-balance sheet financial instruments:** The fair value of the interest rate swaps and of FRA are calculated by discounting future cash flows on the basis of the zero coupon interest rate curves existing at year-end after adjustment for interest accrued yet unpaid (except the short term interest rate swaps). Forward exchange contracts and currency swaps are valued on the basis of a comparison of the forward rates negotiated with the rates in effect on the financial markets at year-end for similar maturities. Foreign exchange options are valued based on the Garman-Kohlhagen model including market quotations as of December 31, 2004.

**As of December 31,**

	<b>2004</b>		<b>2003</b>	
	<b>Carrying amount</b>	<b>Estimated fair value</b>	<b>Carrying amount</b>	<b>Estimated fair value</b>
<b>BALANCE SHEET</b>				
Other investments				
Publicly traded	169	270	306	406
Non-publicly traded (subsidiaries excluded from consolidation and other)	921	921	856	856
Short-term investments				
Publicly traded	1,327	1,632	1,389	1,544
Non-publicly traded	23	23	15	15
Loans and advances to subsidiaries excluded from consolidation and others	912	912	826	826
Debenture loans (before swaps and excluding current portion)(a)	8,208	9,481	7,763	9,182
Issue swaps(a)		(1,297)		(1,414)
Bank loans (excluding capital lease obligations)(b):				
Fixed-rate	288	274	243	252
Floating-rate	913	926	1,417	1,417
	1,762	1,803	1,626	1,694

Current portion of long-term debt (excluding current  
portion of capital lease obligations)

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

As of December 31,

	2004		2003	
	Carrying amount	Estimated fair value	Carrying amount	Estimated fair value
<b>OFF-BALANCE SHEET</b>				
<b>Treasury management instruments</b>				
Bank guarantees		(2)		(2)
Swaps hedging debenture issues(a)				
Long-term interest rate and currency swaps		32		25
Long-term interest rate swaps	(f)	1	(2)(f)	(9)
Short-term interest rate swaps(c)		1		1
Short-term and long-term currency swaps(d)		(313)		(174)
Forward exchange contracts		(4)		3
Currency options				(1)
<b>Commodities (comparable to financial instruments)(e)</b>				
Petroleum products and crude oil swaps, forward freight agreements	36	36	(16)	(16)
Petroleum products and crude oil options	9	9	15	15
Natural gas and power swaps	(1)	(1)	12	12
Natural gas and power options			(2)	(2)

(a) All issue swaps specifically hedge debenture loans. They were concluded under ISDA agreements in order to create synthetic debt at a floating rate in U.S. dollars in most cases. The fair values of these swaps must therefore be incorporated into the overall value of debenture loans.

In the same sense, some long-term interest rate swaps were concluded to partly modify the Company's interest rate exposure. The corresponding fair value should be considered together with the fair value of the long-term debt hedged by these swaps.

(b) The fair value does not take into account the interest rate swaps since they are presented separately.

(c) The fair value of the short-term interest-rate swaps correlates with the value of the short-term loans and borrowings; these swaps are used in order to fit with the negotiated rates to the daily rate which is the benchmark.

(d) Currency swaps are used in the context of managing the current position of the Company, in order to be able to borrow or invest cash in markets other than the euro market. Thus, their fair value, if significant, is offset by the value of the short-term loans and borrowings which they hedge.

(e) Operations which will not generate physical delivery at maturity date. The carrying value corresponds to the value of these instruments in the balance sheet.

(f) This amount corresponds to the unrealized loss on swaps not considered as hedging instruments.

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**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**26. Employee share subscription and share purchase plans****Total share subscription plans**

	<b>1996 Plan(1)</b>	<b>2003 Plan(2)</b>	<b>2004 Plan(3)</b>	<b>Total</b>
<b>Exercise price (in euros)</b>	59.76	133.20	159.40	
<b>Options</b>				
Outstanding as of January 1, 2002.	449,881			449,881
Granted				
Cancelled	(2,700)			(2,700)
Exercised	(447,181)			(447,181)
Outstanding as of December 31, 2002				
Granted		2,935,306		2,935,306
Cancelled				
Exercised				
Outstanding as of December 31, 2003		2,935,306		2,935,306
Granted			3,365,630	3,365,630
Cancelled		(2,100)	(12,000)	(14,100)
Exercised		(950)		(950)
Outstanding as of December 31, 2004		2,932,256	3,353,630	6,285,886
<b>Expiration date</b>	Dec. 2002	July 2011	July 2012	

- (1) Grants decided by the Board of Directors on December 11, 1996 pursuant to the authorization given by the Extraordinary Shareholders Meeting held on June 4, 1996. The options are exercisable only after a 3-year period from the date the option is granted to the individual employee and must be exercised within 6 years from the date of grant.
- (2) Grants decided by the Board of Directors on July 16, 2003 pursuant to the authorization given by the Extraordinary Shareholders Meeting held on May 17, 2001. The options are exercisable only after a 2-year period from the date the option is granted to the individual employee and must be exercised within 8 years from this date. Underlying shares may not be sold for 4 years from the date of grant.
- (3) Grants decided by the Board of Directors on July 20, 2004 pursuant to the authorization given by the Extraordinary Shareholders Meeting held on May 14, 2004. The options are exercisable only after a 2-year period from the date the option is granted to the individual employee and must be exercised within 8 years from this date. Underlying shares may not be sold for 4 years from the date of grant.





**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

**Total share purchase plans**

	<b>1998 Plan(1)</b>	<b>1999 Plan(2)</b>	<b>2000 Plan(3)</b>	<b>2001 Plan(4)</b>	<b>2002 Plan(5)</b>	<b>Total</b>
<b>Exercise price (in euros)</b>	93.76	113.00	162.70	168.20	158.30	
<b>Options</b>						
Outstanding as of January 1, 2002	905,980	1,469,617	2,417,595	2,692,475		7,485,667
Granted				4,000	2,870,850	2,874,850
Cancelled	(900)	(1,800)	(2,950)	(9,200)	(1,000)	(15,850)
Exercised	(4,200)	(11,850)				(16,050)
Outstanding as of December 31, 2002	900,880	1,455,967	2,414,645	2,687,275	2,869,850	10,328,617
Granted						
Cancelled		(5,100)	(5,600)	(3,650)	(6,650)	(21,000)
Exercised	(178,342)	(44,250)				(222,592)
Outstanding as of December 31, 2003	722,538	1,406,617	2,409,045	2,683,625	2,863,200	10,085,025
Granted						
Cancelled			(1,300)	(2,700)	(800)	(4,800)
Exercised	(333,526)	(380,088)	(1,300)		(772)	(715,686)
Outstanding as of December 31, 2004	389,012	1,026,529	2,406,445	2,680,925	2,861,628	9,364,539
<b>Expiration date</b>	March 2006	June 2007	July 2008	July 2009	July 2010	

- (1) Grants decided by the Board of Directors on March 17, 1998 pursuant to the authorization given by the Extraordinary and Ordinary Shareholders Meeting held on May 21, 1997. The options are exercisable only after a 5-year period from the date the option is granted to the individual employee and must be exercised within 8 years from this date.
- (2) Grants decided by the Board of Directors on June 15, 1999 pursuant to the authorization given by the Extraordinary and Ordinary Shareholders Meeting held on May 21, 1997. The options are exercisable only after a 5-year period from the date the option is granted to the individual employee and must be exercised within 8 years from this date.
- (3) Grants decided by the Board of Directors on July 11, 2000 pursuant to the authorization given by the Extraordinary and Ordinary Shareholders Meeting held on May 21, 1997. The options are exercisable only after a 4-year period from the date the option is granted to the individual employee and must be exercised within 8 years from this date.

For beneficiaries holding contracts with French companies or working in France, the shares arising from the exercise of options may not be sold for 5 years from the date of grant.

(4) Grants decided by the Board of Directors on July 10, 2001 pursuant to the authorization given by the Extraordinary and Ordinary Shareholders Meeting held on May 17, 2001. The options are exercisable only after January 1, 2005 and must be exercised within 8 years from the date of grant. For beneficiaries holding contracts with French companies or working in France, the shares arising from the exercise of options may not be sold for 4 years from the date of grant.

(5) Grants decided by the Board of Directors on July 9, 2002 pursuant to the authorization given by the Extraordinary and Ordinary Shareholders Meeting held on May 17, 2001. The options are exercisable only after a 2-year period from the date the option is granted to the individual employee and must be exercised within 8 years from this date. Underlying shares may not be sold for 4 years from the date of grant.

**Exchange guarantee granted to the holders of Elf Aquitaine share subscription options**

Pursuant to the public exchange offer for Elf Aquitaine shares which was made in 1999, the Company made a commitment to guarantee the holders of Elf Aquitaine share subscription options, at the end of the period referred to in Article 163 bis C of the French Tax Code (CGI), and until the end of the period for the exercise of the options, the possibility to exchange their future Elf Aquitaine shares for TOTAL shares, on the basis of the

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

exchange ratio of the offer (19 TOTAL shares for 13 Elf Aquitaine shares). As of December 31, 2004, a maximum of 987,066 Elf Aquitaine shares, either outstanding or to be created, were covered by this guarantee, as follows:

	<b>1998 Plan</b>	<b>1999 Plan n°1</b>	<b>1999 Plan n°2</b>	<b>MTI Plan(1)</b>	<b>Total</b>
Exercise price (in euros)	105.95	115.60	171.60	105.95	
Options outstanding as of December 31, 2004	237,105	436,965	57,600	222,185	953,855
Outstanding Elf Aquitaine shares covered by the exchange guarantee as of December 31, 2004	11,051	5,765		16,395	33,211
Total of Elf Aquitaine shares, either outstanding or to be created, covered by the exchange guarantee for TOTAL shares as of December 31, 2004	248,156	442,730	57,600	238,580	987,066
Expiration date	March 2005	March 2009	September 2009	March 2005	

(1) Medium-Term Incentive (MTI) plan granted by Elf Aquitaine's Board of Directors on April 1, 1998, provided that performance objectives were met by Elf Aquitaine for the 1998, 1999, 2000, 2001 and 2002 accounting periods.

Thus, as of December 31, 2004, a total of 1,442,634 shares of the Company were likely to be created within the scope of the application of this exchange guarantee.

**27. Payroll and staff**

	<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
<b>Personnel expense</b>			
Wages and salaries (including social charges)	6,107	6,153	6,429
<b>Average number of employees</b>			
<b>France</b>			
Management	11,338	11,194	11,736
Other	37,836	38,443	41,179
<b>International</b>			
Management	14,891	14,326	14,650
Other	47,336	46,820	53,904

<b>Total</b>	111,401	110,783	121,469
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Average number of employees includes employees of consolidated subsidiaries.

## **28. Consolidated statement of cash flows**

### **A) Disclosure of accounting policies applied**

The consolidated statement of cash flows in foreign currency has been translated into euros at the average exchange rates.

It excludes the currency translation differences arising from translation of assets and liabilities denominated in foreign currency into euros using exchange rates prevailing at the end of accounting periods (except for cash

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Table of Contents**TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

(Amounts in millions of euros, M except for per share amount, or where otherwise indicated) and cash equivalents). Therefore, the consolidated statement of cash flows will not agree with the figures derived from the consolidated balance sheet.

**(i) Cash and cash equivalents**

Cash and cash equivalents are highly liquid investments that are readily convertible to cash and have original maturities of three months or less. Changes in bank overdrafts are included in cash provided by financing activities.

**(ii) Long-term debt**

Changes in long-term debt have been presented net to reflect significant changes mainly related to revolving credit agreements.

The detailed analysis is as follows:

	<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Issuance of long-term debt	2,801	2,657	2,148
Repayments of long-term debt	(552)	(549)	(506)
<b>Net issuance/(repayment) of long-term debt</b>	<b>2,249</b>	<b>2,108</b>	<b>1,642</b>

**B) Changes in working capital**

	<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Inventories	(899)	(19)	(179)
Accounts receivable	(1,929)	(393)	(519)
Prepaid expenses and other current assets	(955)	(60)	1,645
Accounts payable	1,775	941	1,149
Other creditors and accrued liabilities	2,480	(87)	(2,160)
<b>Net (increase)/decrease in working capital</b>	<b>472</b>	<b>382</b>	<b>(64)</b>

**C) Supplemental Disclosures**

	<b>For the year ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
Cash paid during the year for:			
Interest expense (net of amount capitalized)	847	505	609
Income taxes	4,376	3,908	4,012

**D) Non-cash investing activities**

Cash flow used in investing activities includes an amount of 276 M related to the termination of cross-shareholders' agreements with Gaz de France in Gaz du Sud-Ouest (GSO) and Compagnie Française du Méthane (CFM), cashed out on January 3, 2005.

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**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)****29. Other risks and contingent liabilities**

The Company is not currently aware of any event, litigation, risk or contingent liabilities which could materially adversely affect the financial condition, assets, results or business of the Company.

**Antitrust Investigations**

Following an investigation into certain trade practices in the chemical industry in the United States, Arkema and certain other chemical subsidiaries are involved in several civil lawsuits in the United States for violations of antitrust laws. The litigation reserves for these lawsuits amount to 14 M .

The investigations, commenced by the European Commission in 2000, 2003 and 2004, into alleged anti-competitive practices involving certain products sold by Arkema or its subsidiaries have resulted in a decision regarding one product line by the Commission, delivered on January 19, 2005, which ordered Arkema to pay a 13.5 M fine and also ordered Elf Aquitaine and Arkema to jointly pay a 45 M fine.

On January 28, 2005, the European Commission addressed a statement of objections to Arkema, TOTAL S.A. and Elf Aquitaine regarding alleged anti-competitive practices concerning a new product line. No facts have been alleged that would implicate TOTAL S.A. or Elf Aquitaine in these practices. The Group believes that the provisions recorded in the accounts of certain of its chemicals subsidiaries, for an aggregate amount of 176 M , should be adequate in light of the anticipated consequences of the investigations commenced by the Commission.

Moreover, as a result of investigations commenced in October 2002 by the European Commission concerning certain Refining & Marketing subsidiaries of the Group, Total Nederland N.V. received a statement of objections in October 2004. A statement of objections regarding these practices has also been addressed to TOTAL S.A., although no facts have been alleged that would implicate TOTAL S.A. in these practices.

Although it is not currently possible to determine with certainty the outcome of these lawsuits and investigations, the Company is of the opinion that their ultimate resolution should not have a significant adverse effect on the Company's financial position, cash flows or earnings.

**30. Other information****A) Customs duties and excise taxes**

They amounted to 21,517 M in 2004, 21,049 M in 2003 and 22,639 M in 2002.

**B) Research and development costs**

The Group strategy of research and development is focused on the three segments of activity, principally in the following areas:

Exploration-Production technology allowing the access, at acceptable cost, to new energy resources (high pressure-high temperature, deep offshore, heavy crude oils, polyphasic transportation of acidic gas) as well as environmental-friendly technologies such as reduction of gaseous emissions which erode the atmosphere, containment of acidic gas emissions, and efficient use of water in the upstream industrial process.

Refining technology allowing the identification, the anticipation, and the reduction of constraints linked to the operation of the facilities, the evolution of specifications and the control of environmental emissions, and marketing technology allowing the creation of innovative formulations of products representing sales opportunity.

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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
**(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)**

Chemical processes allowing a stronger competitiveness, quality, safety and respect of environment, in particular of the following themes: new catalysis technology, new polymerization technologies, new products (polymers, elastomers, anti-vibration systems, new coatings) as well as nano-technology.

Research and development costs amounted to 635 M in 2004, 667 M in 2003 and 662 M in 2002, corresponding to 0.5% of the turnover of the last three years.

The staff dedicated to these research and development activities are estimated at 5,257 people.

**C) Taxes paid to Middle East oil-producing countries for the portion which Total held historically as concessions**

Taxes paid for the portion which Total held historically as concessions (Abu Dhabi offshore and onshore, Dubai offshore, Oman and Abu Al-Bu Khoosh) included in operating expenses amounted to 1,487 M in 2004, 1,315 M in 2003 and 1,210 M in 2002.

**D) Related Parties**

The main transactions with related parties (principally all the investments carried under the equity method and subsidiaries excluded from consolidation) and balances receivable from and payable to them were as follows:

	<b>As of December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
<b>Balance Sheet Data</b>			
Receivables			
Trade accounts	303	173	70
Loans (excluding loans to equity affiliates)	463	243	63
Payables			
Trade accounts	273	174	154
Loans		7	36

	<b>For the Year Ended December 31,</b>		
	<b>2004</b>	<b>2003</b>	<b>2002</b>
<b>Statements of Income Data</b>			
Sales	1,363	1,160	440
Purchases	1,646	1,419	1,238
Interest expense			2
Interest income	79	98	8



**Table of Contents****TOTAL****NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)****31. List of the principal consolidated subsidiaries as of December 31, 2004**

As of December 31, 2004, 777 subsidiaries were consolidated of which 673 were fully consolidated, 11 were proportionately consolidated, and 93 were accounted for under the equity method.

The following is a list of the principal consolidated subsidiaries:

	<b>Company s Shares %</b>
<b>UPSTREAM</b>	
Central Puerto	63.8
Elf Exploration Production	99.5
Elf Petroleum Iran	99.8
Elf Petroleum Nigeria	99.8
Gaz du Sud-Ouest	99.5
E Piedra del Aguila	41.3
Tepma Colombie	99.7
Total Abu Al Bu Khoosh	99.8
Total Austral	99.8
Total (BTC) Ltd.	99.8
Total Coal South Africa Ltd.	100.0
Total Energie Gaz	99.5
Total Exploration Production Algérie	99.8
Total Exploration Production Angola	99.8
Total Exploration Production Azerbaidjan	99.7
Total Exploration Production Bolivie	99.8
Total Exploration Production Borneo B.V	99.7
Total Exploration Production Cameroun	75.4
Total Exploration Production Congo	99.5
Total Exploration Production France	99.5
Total Exploration Production Indonésie	99.8
Total Exploration Production Kazakhstan	100.0
Total Exploration Production Libye	99.8
Total Exploration Production Myanmar	99.8
Total Exploration Production Nederland BV	99.7
Total Exploration Production Nigeria	100.0
Total Exploration Production Norge SA	99.7
Total Exploration Production Oman	99.8
Total Exploration Production Qatar	99.8
Total Exploration Production Russie	99.8
Total Exploration Production Syrie	99.8
Total Exploration Production Thaïlande	99.8
Total Exploration Production USA, Inc.	100.0
Total Exploration Production Yemen	99.8
Total Gabon	58.0
Total Gasandes S.A.	100.0
Total Gaz & Electricité Holdings France	99.5

Total Holdings Nederland BV	99.7
Total LNG Nigeria Ltd.	99.5
Total Midstream UK Ltd.	99.7
Total Oil & Gas Venezuela BV	99.7
Total Profils Pétroliers	99.8
Total Qatar Oil & Gas	99.8
Total Sirri	99.8
Total South Pars	99.8
Total Upstream UK Ltd.	99.7
Total Venezuela	100.0
<b>DOWNSTREAM</b>	
Air Total International	100.0
AS 24.	99.8
Atlantic Trading and Marketing	100.0
E Cepsa	45.0
Chartering & Shipping Services S.A.	100.0
Egedis	99.8
P S.A de la Raffinerie des Antilles	49.9
Socap International	99.5
Stela	99.8
Total (Africa) Ltd.	99.5
Total Belgium	100.0
Total (China) Investments	100.0
Total (Philippines) Corp.	99.8
Total Côte d'Ivoire	72.9
Total Deutschland GmbH	99.7
Total Espana	99.8
Total Fluides	99.8
Total France S.A.	99.8
TotalGaz Argentina	99.8
TotalGaz	99.8
Total Holdings Deutschland	99.7
Total International Ltd.	100.0
Total Italia	99.7
Total Kenya	87.9
Total Lindsey Oil Refinery	99.7
Total Lubrifiants S.A.	99.8
Total Maroc	100.0
Total Nederland N.V	99.7
Total Nigeria	61.6
Total Oil Trading S.A.	99.5
Total Outre-Mer	100.0
Total Portugal Petroleos	100.0
Total Raffinerie Mitteldeutschland	99.7
P Total Raffinaderij Nederland	55.0
Total Sénégal	94.9

E = Equity method

P = Proportionate consolidation



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**TOTAL**  
**NOTES TO CONSOLIDATED FINANCIAL STATEMENTS (Continued)**  
(Amounts in millions of euros, M except for per share amount, or where otherwise indicated)

	Company's Shares %
<b>DOWNSTREAM (continued)</b>	
Total South Africa Ltd.	66.8
Total South East Asia	99.8
Total Turkiye	99.9
Total UK Ltd.	99.7
Urbaine des Pétroles	99.8
<b>CHEMICALS</b>	
Arkema Inc.	99.9
Arkema Quimica S.A.	99.3
Arkema S.A.	99.5
Arkema SRL	99.5
Bostik Findley S.A.	99.5
Bostik Holding S.A.	99.5
Cray Valley S.A.	100.0
Grande Paroisse S.A.	99.5
Hutchinson Corporation	100.0
Hutchinson S.A.	100.0
E Qatar Petrochemicals Company Ltd.	19.9
P Samsung Total Petrochemicals	49.9
Total Petrochemicals France	99.5
Total Petrochemicals Iberica	100.0
Total Petrochemicals USA Inc.	100.0
<b>CORPORATE AND OTHER ACTIVITIES</b>	
Elf Aquitaine S.A.	99.5
Elf Aquitaine Fertilisants	99.5
Omnium des Participations S.A.	100.0
Omnium Insurance and Reinsurance Cy	100.0
PetroFina International Group	100.0
PetroFina S.A.	100.0
E Sanofi Aventis	13.2
Socap Ltd.	99.5
Sofax Banque	99.5
Total Capital	100.0
Total Chimie	100.0
Total Finance S.A.	100.0
Total Holdings UK Ltd.	99.7
Total Holdings USA, Inc.	100.0
Total S.A.	100.0
Total Treasury	100.0
VGF	99.5
Total Holdings Europe	99.7

E = Equity method

P = Proportionate consolidation

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited)**

Information shown in the following tables is presented in accordance with Statement of Financial Accounting Standards No. 69 (FAS No. 69, *Disclosures About Oil and Gas Producing Activities* ).

As explained in Note 3 of the Notes to the Consolidated Financial Statements ( *Summary of Differences Between Accounting Principles followed by the Company and United States Generally Accepted Accounting Principles* ), the acquisitions of Petrofina and Elf Aquitaine have been accounted for as pooling-of-interests in accordance with French Generally Accepted Accounting Principles (French GAAP).

Under U.S. GAAP, the acquisitions of PetroFina and Elf Aquitaine do not qualify as pooling-of-interests and therefore would have been accounted for as purchases.

Therefore, the FAS No. 69 disclosures, which are based on the Company's primary financial statements prepared in accordance with French GAAP, have been supplemented with an additional set of tables derived from U.S. GAAP figures.

**Capitalized costs**

Capitalized costs represent the amounts of capitalized proved and unproved property costs, including support equipment and facilities, along with the related accumulated depreciation, depletion and amortization.

The following tables present a detail of the capitalized costs as of December 31, 2004, 2003 and 2002, relating to the Company's oil and gas exploration and producing activities:

**Consolidated subsidiaries**

	Europe	Africa	North America	Asia	Rest of World	Total
(Amounts in M )						
<b>French GAAP basis</b>						
<b>December 31, 2004</b>						
Proved properties	25,036	16,285	1,551	2,605	7,540	53,017
Unproved properties	51	544	113	17	104	829
Total capitalized costs	25,087	16,829	1,664	2,622	7,644	53,846
Accumulated depreciation	(17,518)	(10,338)	(881)	(1,012)	(3,457)	(33,206)
Net capitalized costs	7,569	6,491	783	1,610	4,187	20,640
Company's share of equity affiliates net capitalized costs		214			501	715
<b>December 31, 2003</b>						
Proved properties	24,020	16,051	1,574	2,434	7,220	51,299
Unproved properties	127	519	165	33	100	944
Total capitalized costs	24,147	16,570	1,739	2,467	7,320	52,243
Accumulated depreciation	(16,595)	(10,352)	(858)	(867)	(3,152)	(31,824)
Net capitalized costs	7,552	6,218	881	1,600	4,168	20,419
Company's share of equity affiliates net capitalized costs		277			525	802

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Consolidated subsidiaries**

	<b>Europe</b>	<b>Africa</b>	<b>North America</b>	<b>Asia</b>	<b>Rest of World</b>	<b>Total</b>
(Amounts in M )						
<b>December 31, 2002</b>						
Proved properties	25,554	16,660	2,064	2,383	7,034	53,695
Unproved properties	90	825	234	19	243	1,411
Total capitalized costs	25,644	17,485	2,298	2,402	7,277	55,106
Accumulated depreciation	(17,102)	(10,987)	(1,275)	(787)	(3,139)	(33,290)
Net capitalized costs	8,542	6,498	1,023	1,615	4,138	21,816
Company's share of equity affiliates net capitalized costs		23			659	682
<b>U.S. GAAP basis</b>						
<b>December 31, 2004</b>						
Proved properties	27,798	18,146	1,712	2,605	7,540	57,801
Unproved properties	51	544	113	17	104	829
Total capitalized costs	27,849	18,690	1,825	2,622	7,644	58,630
Accumulated depreciation	(18,492)	(10,774)	(970)	(1,012)	(3,457)	(34,705)
Net capitalized costs	9,357	7,916	855	1,610	4,187	23,925
Company's share of equity affiliates net capitalized costs		214			507	715
<b>December 31, 2003</b>						
Proved properties	26,800	17,910	1,742	2,434	7,220	56,106
Unproved properties	127	519	165	33	100	944
Total capitalized costs	26,927	18,429	1,907	2,467	7,320	57,050
Accumulated depreciation	(17,362)	(10,703)	(937)	(867)	(3,152)	(33,021)
Net capitalized costs	9,565	7,726	970	1,600	4,168	24,029
Company's share of equity affiliates net capitalized costs		277			525	802
<b>December 31, 2002</b>						
Proved properties	28,335	18,518	2,234	2,383	7,034	58,504
Unproved properties	90	825	234	19	243	1,411
Total capitalized costs	28,425	19,343	2,468	2,402	7,277	59,915
Accumulated depreciation	(17,651)	(11,257)	(1,347)	(787)	(3,139)	(34,181)
Net capitalized costs	10,774	8,086	1,121	1,615	4,138	25,734
		23			659	682

Company's share of equity affiliates  
net capitalized costs

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Costs incurred**

The following table shows the costs incurred in the Company's oil and gas property acquisition, exploration and development activities: they include both capitalized and expensed amounts.

	Consolidated subsidiaries					
	Europe	Africa	North America	Asia	Rest of World	Total
	(Amounts in M )					
<i>French GAAP and U.S. GAAP basis</i>						
<b>December 31, 2004</b>						
Proved property acquisition		2			29	31
Unproved property acquisition			5	3		8
Exploration costs	99	279	94	29	142	643
Development costs(1)	1,084	1,588	203	379	874	4,128
<b>Total costs incurred</b>	<b>1,183</b>	<b>1,869</b>	<b>302</b>	<b>411</b>	<b>1,045</b>	<b>4,810</b>
<b>December 31, 2003</b>						
Proved property acquisition		61	3	2	180	246
Unproved property acquisition		15	8	1		24
Exploration costs	69	211	58	48	220	606
Development costs	910	1,361	219	434	833	3,757
<b>Total costs incurred</b>	<b>979</b>	<b>1,648</b>	<b>288</b>	<b>485</b>	<b>1,233</b>	<b>4,633</b>
<b>December 31, 2002</b>						
Proved property acquisition	8	20			54	82
Unproved property acquisition		7	60			67
Exploration costs	112	266	53	10	267	708
Development costs	1,194	1,111	463	312	1,080	4,160
<b>Total costs incurred</b>	<b>1,314</b>	<b>1,404</b>	<b>576</b>	<b>322</b>	<b>1,401</b>	<b>5,017</b>

(1) Including asset retirement costs capitalized during the year and any gain or losses recognized upon settlement of asset retirement obligations during the year.

Company's share of equity affiliates' costs of property acquisition, exploration and development:

Year ended December 31, 2004	56	184	240
Year ended December 31, 2003	64	171	235
Year ended December 31, 2002	2	128	130

**Costs to develop Proved Undeveloped Reserves**

The following table presents the amounts spent to develop the proved undeveloped reserves in 2002, 2003 and 2004, as well as the amounts included in the most recent standardized measure of future net cash flows to develop proved undeveloped reserves in each of the next three years.

	2002	2003	2004	2005	2006	2007
	(Amounts in M )					
Costs to develop Proved Undeveloped Reserves	3,870	3,480	3,567	4,034(1)	3,333(1)	2,677(1)

(1)Estimates

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Results of operations of oil and gas producing activities**

The following tables include revenues and expenses associated directly with the Company's oil and gas producing activities. It does not include any interest cost.

	Consolidated subsidiaries					
	Europe	Africa	North America	Asia	Rest of World	Total
(Amounts in M )						
<b>French GAAP basis</b>						
<b>Year ended December 31, 2004</b>						
Revenues						
Sales to unaffiliated parties	2,027	1,163	40	1,446	1,820	6,496
Transfers to affiliated parties	4,917	6,081	548	250	645	12,441
Total Revenues	6,944	7,244	588	1,696	2,465	18,937
Production costs	(787)	(578)	(49)	(162)	(247)	(1,823)
Exploration expenses	(40)	(146)	(90)	(31)	(107)	(414)
Depreciation, depletion and amortization and valuation allowances	(1,197)	(839)	(245)	(252)	(507)	(3,040)
Other expenses(1)	(176)	(764)	(5)	(15)	(288)	(1,248)
Pretax income from producing activities	4,744	4,917	199	1,236	1,316	12,412
Income tax	(2,697)	(3,224)	(87)	(591)	(247)	(6,846)
Results of oil and gas producing activities	2,047	1,693	112	645	1,069	5,566
<b>Year ended December 31, 2003</b>						
Revenues						
Sales to unaffiliated parties	1,994	731	48	1,286	1,722	5,781
Transfers to affiliated parties	4,635	4,679	494	195	623	10,626
Total Revenues	6,629	5,410	542	1,481	2,345	16,407
Production costs	(778)	(562)	(86)	(171)	(240)	(1,837)
Exploration expenses	(40)	(95)	(55)	(35)	(134)	(359)
Depreciation, depletion and amortization and valuation allowances	(1,278)	(792)	(164)	(190)	(590)	(3,014)
Other expenses(1)	(188)	(640)	(14)	(16)	(259)	(1,117)
Pretax income from producing activities	4,345	3,321	223	1,069	1,122	10,080
Income tax	(2,485)	(1,961)	(82)	(498)	(208)	(5,234)
Results of oil and gas producing activities	1,860	1,360	141	571	914	4,846

**Year ended December 31, 2002**

<b>Revenues</b>						
Sales to unaffiliated parties	2,674	600	43	1,240	1,717	6,274
Transfers to affiliated parties	3,884	4,733	262	170	662	9,711
<b>Total Revenues</b>	<b>6,558</b>	<b>5,333</b>	<b>305</b>	<b>1,410</b>	<b>2,379</b>	<b>15,985</b>
Production costs	(904)	(613)	(56)	(190)	(302)	(2,065)
Exploration expenses	(65)	(149)	(53)	(7)	(212)	(486)
Depreciation, depletion and amortization and valuation allowances	(1,439)	(939)	(191)	(180)	(601)	(3,350)
Other expenses(1)	(118)	(574)	(11)	(15)	(241)	(959)
<b>Pretax income from producing activities</b>	<b>4,032</b>	<b>3,058</b>	<b>(6)</b>	<b>1,018</b>	<b>1,023</b>	<b>9,125</b>
Income tax	(2,483)	(1,768)	14	(487)	(361)	(5,085)
<b>Results of oil and gas producing activities</b>	<b>1,549</b>	<b>1,290</b>	<b>8</b>	<b>531</b>	<b>662</b>	<b>4,040</b>

(1) Including production taxes and, from 2003, FAS No. 143 accretion expense (121 M in 2003, 137 M in 2004).  
Company's share of equity affiliates' results of oil and gas producing activities:

Year ended December 31, 2004	80	200	280
Year ended December 31, 2003	118	176	294
Year ended December 31, 2002	7	175	182

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Consolidated subsidiaries**

	Europe	Africa	North America	Asia	Rest of World	Total
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(Amounts in M )

***U.S. GAAP basis*****Year ended December 31, 2004****Revenues**

Sales to unaffiliated parties	2,027	1,163	40	1,446	1,820	6,496
Transfers to affiliated parties	4,917	6,081	548	250	645	12,441

Total Revenues	6,944	7,244	588	1,696	2,465	18,937
Production costs	(787)	(578)	(49)	(162)	(247)	(1,823)
Exploration expenses	(40)	(146)	(90)	(31)	(107)	(414)
Depreciation, depletion and amortization and valuation allowances	(1,403)	(925)	(255)	(252)	(507)	(3,342)
Other expenses(1)	(176)	(764)	(5)	(15)	(288)	(1,248)

Pretax income from producing activities	4,538	4,831	189	1,236	1,316	12,110
Income tax	(2,574)	(3,179)	(81)	(591)	(247)	(6,672)

Results of oil and gas producing activities	1,964	1,652	108	645	1,069	5,438
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**Year ended December 31, 2003****Revenues**

Sales to unaffiliated parties	1,994	731	48	1,286	1,722	5,781
Transfers to affiliated parties	4,635	4,679	494	195	623	10,626

Total Revenues	6,629	5,410	542	1,481	2,345	16,407
Production costs	(778)	(562)	(86)	(171)	(240)	(1,837)
Exploration expenses	(40)	(95)	(55)	(35)	(134)	(359)
Depreciation, depletion and amortization and valuation allowances	(1,497)	(872)	(171)	(190)	(590)	(3,320)
Other expenses(1)	(188)	(640)	(14)	(16)	(259)	(1,117)

Pretax income from producing activities	4,126	3,241	216	1,069	1,122	9,774
Income tax	(2,364)	(1,918)	(80)	(498)	(208)	(5,068)

Results of oil and gas producing activities	1,762	1,323	136	571	914	4,706
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**Year ended December 31, 2002**

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Revenues						
Sales to unaffiliated parties	2,674	600	43	1,240	1,717	6,274
Transfers to affiliated parties	3,884	4,733	262	170	662	9,711
Total Revenues	6,558	5,333	305	1,410	2,379	15,985
Production costs	(904)	(613)	(56)	(190)	(302)	(2,065)
Exploration expenses	(65)	(149)	(53)	(7)	(212)	(486)
Depreciation, depletion and amortization and valuation allowances	(1,653)	(1,027)	(205)	(180)	(601)	(3,666)
Other expenses(1)	(118)	(574)	(11)	(15)	(241)	(959)
Pretax income from producing activities	3,818	2,970	(20)	1,018	1,023	8,809
Income tax	(2,365)	(1,720)	19	(487)	(361)	(4,914)
Results of oil and gas producing activities	1,453	1,250	(1)	531	662	3,895

(1) Including production taxes and, from 2003, FAS No. 143 accretion expense (121 M in 2003, 137 M in 2004).  
Company's share of equity affiliates' results of oil and gas producing activities:

Year ended December 31, 2004	80	200	280
Year ended December 31, 2003	118	176	294
Year ended December 31, 2002	7	175	182

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**TOTAL  
SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Oil and gas reserves**

The following tables present, for crude oil, condensates and natural gas liquids reserves and for natural gas reserves, an estimate of the Group's oil and gas quantities by geographical areas at December 31, 2004, 2003 and 2002.

Quantities shown concern:

proved developed and undeveloped reserves together with changes in quantities for 2004, 2003 and 2002.

proved developed reserves.

The definitions used for proved oil and gas reserves, proved developed oil and gas reserves and proved undeveloped reserves are in accordance with the applicable U.S. Securities & Exchange Commission regulation, Rule 4-10 of Regulation S-X.

Proved reserves are estimated using geological and engineering data to determine with reasonable certainty whether the crude oil or natural gas in known reservoirs is recoverable under existing economic and operating conditions.

This process involves making subjective judgments; consequently, measures of reserves are not precise and are subject to revision.

The estimation of proved reserves is controlled by the Group through established validation guidelines. Reserves evaluations are established annually by senior level geoscience and engineering professionals (assisted by a central reserves group with significant technical experience) including reviews with and validation by senior management.

Significant features of the reserves estimation process include:

internal peer reviews of technical evaluations also ensuring that the SEC definitions and guidance are followed, and

a requirement that management make significant funding commitments toward the development of the reserves prior to booking.

All references in the following tables to reserves or production are to the entire Group's consolidated share of such reserves or production. TOTAL's worldwide proved reserves include the proved reserves of its consolidated subsidiaries as well as its proportionate share of the proved reserves of equity affiliates and two companies accounted for by the cost method.

The reserve estimates shown below do not include quantities that may or may not be produced, due to changes in economic conditions or pursuant to new technologies.

Rule 4-10 of Regulation S-X requires the use of the year-end price, as well as existing operating conditions, to determine reserve quantities. Reserves at year-end 2004 have been determined based on the Brent price on December 31, 2004 (40.47 \$/b).

Proved reserves are the estimated quantities of TOTAL's entitlement under concession contracts, production sharing agreements or buy-back agreements. These estimated quantities may vary depending on oil and gas prices.

An increase in year-end price has the effect of reducing proved reserves associated with production sharing or buy-back agreements (which represent approximately 30% of TOTAL's reserves). Under such contracts, TOTAL is entitled to receive a portion of the production, calculated so that its sale should cover expenses incurred by the Company. With higher oil prices, the level of entitlement necessary to cover the same amount of expenses is lower.

This reduction is partially offset by an extension of the duration over which fields can be produced economically. However, the increase in reserves due to extensions is smaller than the decrease in reserves under

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**TOTAL**

**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

production sharing agreements. For this reason, a higher year-end price translates into a decrease in TOTAL's reserves.

The percentage of proved developed reserves has remained relatively stable over the past five years, indicating that proved reserves are consistently moved from undeveloped to developed status. Over time, undeveloped reserves will be reclassified to the developed category as new wells are drilled, existing wells are recompleted and/or facilities to produce from existing and future wells are installed. Major development projects typically take two to four years from the time of recording proved reserves to the start of production from these reserves.

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Estimated proved reserves of crude oil and natural gas**

The following tables reflect the estimated proved reserves of crude oil and natural gas as of December 31, 2002, 2003 and 2004, and the changes therein.

**Crude Oil, Condensate and Natural Gas Liquids (Mb)**

	Europe	Africa	North America	Asia	Rest of World	Total	Equity Affiliates and Non-Consolidated	Total Group
<b>French GAAP and U.S. GAAP basis</b>								
<b>Balance as of January 1, 2002</b>	1,170	2,882	33	94	1,367	5,546	1,415	6,961
Revisions of previous estimates	62	266	3	1	(59)	273	(35)	238
Extensions, discoveries and other	26	140			356	522		522
Acquisitions of reserves in place	49	1			41	91	1	92
Sales of reserves in place	(2)					(2)		(2)
Production for the year	(170)	(214)	(2)	(8)	(100)	(494)	(86)	(580)
<b>Balance as of December 31, 2002</b>	1,135	3,075	34	87	1,605	5,936	1,295	7,231
Revisions of previous estimates	108	53	1	1	245	408	(20)	388
Extensions, discoveries and other	5	55	67		127	254		254
Acquisitions of reserves in place		2			77	79		79
Sales of reserves in place	(6)	(16)	(1)			(23)		(23)
Production for the year	(169)	(221)	(2)	(9)	(102)	(503)	(103)	(606)
<b>Balance as of December 31, 2003</b>	1,073	2,948	99	79	1,952	6,151	1,172	7,323
Revisions of previous estimates	93	(26)	(13)	11	(119)	(54)	(15)	(69)
Extensions, discoveries and other	43	46			227	316	61	377
Acquisitions of reserves in place	12					12		12
Sales of reserves in place	(1)	(18)				(19)		(19)
Production for the year	(154)	(255)	(6)	(11)	(91)	(517)	(104)	(621)

<b>Balance as of December 31, 2004</b>	1,066	2,695	80	79	1,969	5,889	1,114	7,003
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Minority interests in proved developed and undeveloped reserves as of (Mb):

December 31, 2002	28	74				102		102
December 31, 2003	23	85				108		108
December 31, 2004	22	80				102		102

Proved developed and undeveloped reserves of equity and non-consolidated affiliates as of:

Year ended December 31, 2002	107				1,188	1,295		
Year ended December 31, 2003	97				1,075	1,172		
Year ended December 31, 2004	73				1,041	1,114		

Proved developed reserves as of (Mb):

December 31, 2002	855	1,199	5	52	579	2,690	886	3,576
December 31, 2003	769	1,354	28	50	574	2,775	788	3,563
December 31, 2004	734	1,351	15	48	477	2,625	772	3,397

Proved developed reserves of equity and non-consolidated affiliates as of:

Year ended December 31, 2002	81				805	886		
Year ended December 31, 2003	77				711	788		
Year ended December 31, 2004	67				705	772		

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Natural Gas (Bcf)**

							<b>Equity Affiliates and Non- Consolidated</b>	<b>Total Group</b>
	<b>Europe</b>	<b>Africa</b>	<b>North America</b>	<b>Asia</b>	<b>Rest of World</b>	<b>Total</b>		
<b><i>French GAAP and U.S. GAAP basis</i></b>								
<b>Balance as of January 1, 2002</b>	6,966	3,845	536	6,384	2,507	20,238	1,691	21,929
Revisions of previous estimates	212	(157)	57	(56)	132	188	9	197
Extensions, discoveries and other	770	146	11	13	96	1,036		1,036
Acquisitions of reserves in place	64				9	73		73
Sales of reserves in place	(2)		(4)			(6)		(6)
Production for the year	(814)	(137)	(78)	(410)	(131)	(1,570)	(84)	(1,654)
<b>Balance as of December 31, 2002</b>	7,196	3,697	522	5,931	2,613	19,959	1,616	21,575
Revisions of previous estimates	173	54	80	(201)	84	190	66	256
Extensions, discoveries and other	39				2,175	2,214		2,214
Acquisitions of reserves in place								
Sales of reserves in place	(3)		(28)			(31)		(31)
Production for the year	(834)	(148)	(108)	(421)	(146)	(1,657)	(90)	(1,747)
<b>Balance as of December 31, 2003</b>	6,571	3,603	466	5,309	4,726	20,675	1,592	22,267
Revisions of previous estimates	84	609	(91)	(137)	355	820	65	885
Extensions, discoveries and other	148	728		18	450	1,344	63	1,407
Acquisitions of reserves in place	68					68		68
Sales of reserves in place	(44)		(7)			(51)		(51)
Production for the year	(812)	(161)	(88)	(448)	(188)	(1,697)	(94)	(1,791)
	6,015	4,779	280	4,742	5,343	21,159	1,626	22,785

**Balance as of  
December 31, 2004**

Minority interests in proved developed and undeveloped reserves as of (Bcf):

December 31, 2002	120	28	148	148
December 31, 2003	102	29	131	131
December 31, 2004	111	84	195	195

Proved developed and undeveloped reserves of equity and non-consolidated affiliates as of:

Year ended December 31, 2002		1,616	1,616
Year ended December 31, 2003		1,592	1,592
Year ended December 31, 2004	18	1,608	1,626

Proved developed reserves as of (Bcf):

December 31, 2002	5,362	1,785	385	3,563	965	12,060	1,586	13,646
December 31, 2003	4,862	1,775	348	3,214	1,367	11,566	1,568	13,134
December 31, 2004	4,300	2,071	232	2,862	1,548	11,013	1,562	12,575

Proved developed reserves of equity and non-consolidated affiliates as of:

Year ended December 31, 2002		1,586	1,586
Year ended December 31, 2003		1,568	1,568
Year ended December 31, 2004	18	1,544	1,562

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Standardized measure of discounted future net cash flows**

The standardized measure of discounted future net cash flows from production of proved reserves was developed as follows:

1. estimates of proved reserves and the corresponding production profiles are based on technical and economic conditions at year end;
2. the estimated future cash flows from proved reserves are determined based on prices at December 31, except in those instances where fixed and determinable price escalations are included in existing contracts;
3. the future cash flows include estimated production costs (including production taxes), future development costs and asset retirement costs, all estimates are based on year-end technical and economic conditions;
4. future income taxes are computed by applying the year-end statutory tax rate to future net cash flows after consideration of permanent differences and future income tax credits;
5. future net cash flows are discounted at a standard rate of 10 percent.

The principles applied are those required by SFAS 69 and do not necessarily reflect the expectations of real revenues from these reserves, nor their present value; hence, they do not constitute criteria of investment decision. An estimate of fair value would also take into account, among other things, the recovery of reserves not presently classified as proved, anticipated future changes in prices and costs and a discount factor more representative of the time value of money and the risks inherent in reserve estimates.

The following is the projected standardized measure of discounted future net cash flows relating to proved oil and gas reserves:

**Consolidated subsidiaries**

	Europe	Africa	North America	Asia	Rest of World	Total
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(Amounts in M )

***French GAAP and U.S. GAAP  
basis***

**December 31, 2002**

Future cash inflows	52,482	87,137	3,189	18,895	38,162	199,865
Future production costs	(7,730)	(13,263)	(437)	(2,998)	(9,793)	(34,221)
Future development costs	(5,916)	(10,904)	(337)	(3,573)	(3,678)	(24,408)
Future net cash flows, before income taxes	38,836	62,970	2,415	12,324	24,691	141,236
Future income taxes	(22,908)	(36,693)	(321)	(5,496)	(7,286)	(72,704)
Future net cash flows, after income taxes	15,928	26,277	2,094	6,828	17,405	68,532
Discount at 10%	(5,884)	(12,190)	(688)	(3,068)	(9,472)	(31,302)
	10,044	14,087	1,406	3,760	7,933	37,230

Standardized measure of  
discounted future net cash flows

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Consolidated subsidiaries**

	<b>Europe</b>	<b>Africa</b>	<b>North America</b>	<b>Asia</b>	<b>Rest of World</b>	<b>Total</b>
(Amounts in M )						
<b>December 31, 2003</b>						
Future cash inflows	44,136	69,191	3,507	14,315	39,544	170,693
Future production costs	(6,862)	(12,423)	(901)	(2,143)	(9,855)	(32,184)
Future development costs	(6,317)	(9,645)	(417)	(2,269)	(4,784)	(23,432)
Future net cash flows, before income taxes	30,957	47,123	2,189	9,903	24,905	115,077
Future income taxes	(20,241)	(25,960)	(379)	(4,233)	(7,037)	(57,850)
Future net cash flows, after income taxes	10,716	21,163	1,810	5,670	17,868	57,227
Discount at 10%	(3,389)	(10,151)	(691)	(2,575)	(11,303)	(28,109)
Standardized measure of discounted future net cash flows	7,327	11,012	1,119	3,095	6,565	29,118
<b>December 31, 2004</b>						
Future cash inflows	49,233	76,576	2,695	13,737	42,437	184,678
Future production costs	(7,389)	(13,170)	(792)	(2,077)	(10,561)	(33,989)
Future development costs	(6,448)	(10,001)	(356)	(2,316)	(4,436)	(23,557)
Future net cash flows, before income taxes	35,396	53,405	1,547	9,344	27,440	127,132
Future income taxes	(23,711)	(33,859)	(304)	(4,091)	(8,613)	(70,578)
Future net cash flows, after income taxes	11,685	19,546	1,243	5,253	18,827	56,554
Discount at 10%	(4,085)	(8,919)	(455)	(2,167)	(12,091)	(27,717)
Standardized measure of discounted future net cash flows	7,600	10,627	788	3,086	6,736	28,837

Minority interests in the standardized measure of discounted future net cash flows as of:

Year ended December 31, 2002	364	337	701
Year ended December 31, 2003	351	304	655
Year ended December 31, 2004	297	287	584

Company's share of equity affiliates standardized measure of discounted future net cash flows as of:

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Year ended December 31, 2002	63	1,194	1,257
Year ended December 31, 2003	666	1,139	1,805
Year ended December 31, 2004	494	1,101	1,595

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**TOTAL**  
**SUPPLEMENTAL OIL AND GAS INFORMATION (Unaudited) (Continued)**

**Changes in the standardized measure of discounted future net cash flows**

The following table reflects the changes in standardized measure of discounted future net cash flows for each of the years 2004, 2003 and 2002.

	For the year ended December 31,		
	2004	2003	2002
	(Amounts in M )		
<b><i>French GAAP and U.S. GAAP basis</i></b>			
Consolidated			
Beginning of year	29,118	37,230	27,794
Sales and transfers, net of production costs	(12,791)	(14,870)	(11,792)
Net change in sales and transfer prices, net of production costs	12,919	(13,453)	17,687
Extensions, discoveries and improved recovery, net of future production and development costs	974	1,997	2,394
Changes in estimated future development costs	(1,215)	832	1,544
Previously estimated development costs incurred during the year	3,790	3,987	4,168
Revisions of previous quantity estimates	(2,684)	(1,109)	(428)
Accretion of discount	2,912	3,723	2,779
Net change in income taxes	(4,255)	10,778	(7,633)
Purchases of reserves in place	292	190	716
Sales of reserves in place	(223)	(187)	1
End of year	28,837	29,118	37,230

Up to December 31, 2002 the line Previously estimated development costs incurred during the year carried the exact same amount as the line Development costs of the Cost incurred table. As of December 31, 2003, presentation of this table has been changed to indicate the amounts in the future net cash flows as they had been estimated in the previous year.

The same change of presentation has been made for the line Sales and transfers, net of production costs and other expenses .

The amounts displayed for 2002 have been modified accordingly.

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**SCHEDULE II**  
**TOTAL**  
**VALUATION AND QUALIFYING ACCOUNTS**

	<b>Balance at beginning of period</b>	<b>Charged to other accounts(1)</b>	<b>Charged to costs and expenses</b>	<b>Deductions(2)</b>	<b>Balance at end of period</b>
(Amounts in M )					
<b>VALUATION AND QUALIFYING ACCOUNTS DEDUCTED FROM THE RELATED ASSETS ACCOUNTS</b>					
2004					
Investments and other non current assets(3)	1,334	129	51	98	1,416
Inventories (including reserve for crude oil price changes)	1,908	(53)	756		2,611
Accounts receivable	518	(18)		13	487
Other current assets	42	(2)		2	38
<b>Total</b>	<b>3,802</b>	<b>56</b>	<b>807</b>	<b>113</b>	<b>4,552</b>
2003					
Investments and other non current assets(3)	1,555	(166)	93	148	1,334
Inventories (including reserve for crude oil price changes)	2,239	(55)		276	1,908
Accounts receivable	555	(40)	3		518
Other current assets	54	(5)		7	42
<b>Total</b>	<b>4,403</b>	<b>(266)</b>	<b>96</b>	<b>431</b>	<b>3,802</b>
2002					
Investments and other non current assets(3)	1,700	(74)	162	233	1,555
Inventories (including reserve for crude oil price changes)	1,552	(5)	810	118	2,239
Accounts receivable	557	(39)	137	100	555
Other current assets	56	(13)	15	4	54
<b>Total</b>	<b>3,865</b>	<b>(131)</b>	<b>1,124</b>	<b>455</b>	<b>4,403</b>
<b>LONG-TERM LIABILITIES</b>					
2004					
Employee benefits	3,818	(49)	407	576	3,600
	11,507	171	2,176	1,628	12,226

Other liabilities and deferred income taxes					
Total	15,325	122	2,583	2,204	15,826
2003					
Employee benefits	4,103	(117)	419	587	3,818
Other liabilities and deferred income taxes	12,267	(396)	1,709	2,073	11,507
Total	16,370	(513)	2,128	2,660	15,325
2002					
Employee benefits	3,355	869	274	395	4,103
Other liabilities and deferred income taxes	12,354	(335)	2,188	1,940	12,267
Total	15,709	534	2,462	2,335	16,370

- (1) Amounts charged to other accounts includes (i) minimum liability adjustments and (ii) currency translation adjustments.
- (2) Deductions correspond to (i) amounts reversed into income, which offset charges for which the reserves were created (ii) adjustments to deferred tax assets and liabilities and (iii) adjustments in our replacement cost reserve.
- (3) The breakdown between investments and other non current assets is as follows:

## As of December 31,

	2004	2003	2002
Investments	809	834	844
Other non current assets	607	500	711
	1,416	1,334	1,555