

MOODY'S INDUSTRIAL MANUAL

JOHN MOODY

1960

AMERICAN AND FOREIGN

PERGAD-Bygonne,N.J

PLAINTIFF'S
EXHIBIT
EXX-167

STANDARD OIL COMPANY

(A New Jersey Corporation)

CAPITAL STRUCTURE

LONG TERM DEBT

Issue	Rating	Amount Outstanding
1. Debenture 2 3/4s, 1971	Aaa	\$85,000,000
2. Debenture 2 3/4s, 1974	Aaa	150,000,000
3. 3% notes due 1979		75,000,000
4. Subsidiary debt		481,032,167

CAPITAL STOCK

Issue	Par Value	Amount Outstanding
1. Capital stock	\$7	216,532,661 shs.

†Subject to change; see text. ‡Based on average no. of shares outstanding: 1959, \$2.93; 1958, \$2.72. §Range since 1949. ¶Range since 3-for-1 split in 1956; range from 2-for-1 split in 1951 and to the 3-for-1 split in 1956, 169-587%. ††Range since 1932 and to the split in 1951, 12 1/2-19 1/2. †††As of Mar. 15, 1960, including reacquired shares.

HISTORY

Incorporated in New Jersey, Aug. 5, 1882, as Standard Oil Company of New Jersey by the trustees of the Standard Oil Trust to acquire from the trustees in exchange for stock the property of The Standard Oil Co. (Ohio). In March, 1892, in exchange for additional stock acquired from the trustees of the Standard Oil Trust the stocks of other companies and properties of other companies which had previously been held by the trustees. (Standard Oil Trust was thereupon dissolved). On March 19, 1892, name of the company was changed to Standard Oil Company.

In May, 1911, the United States Supreme Court sustained a lower court decision that the company was a combination in violation of the Sherman Anti-Trust Law. In accordance with a dissolution decree the company, in December, 1911, and in January, 1912, distributed pro rata among stockholders its shares in the 33 companies listed below.

Anglo-American Oil Co. Ltd.
Atlantic Refining Co.
Borneo-Serimser Co.
Buckeye Pipe Line Co.
Chesapeake Manufacturing Co.
Colonial Oil Co.
Continental Oil Co.
Crescent Pipe Line Co.
Cumberland Pipe Line Co.
Eureka Pipe Line Co.
Galena-Signal Oil Co.
Indiana Pipe Line Co.
National Transit Co.
New York Transit Co.
Northern Pipe Line Co.
The Ohio Oil Co.
Prairie Oil & Gas Co.
Solar Refining Co.
South Penn Oil Co.
Southern Pipe Line Co.
South West Penna. Pipe Lines
Standard Oil Co. (California)
Standard Oil Co. (Indiana)
Standard Oil Co. (Kentucky)
Standard Oil Co. (Nebraska)
Standard Oil Co. (New York)
Standard Oil Co. (Ohio)
Standard Oil Co. (Kansas)
Swan & Finch Co.
Union Tank Line Co.
Vacuum Oil Co.
Washington Oil Co.
Waters-Pierce Oil Co.

In 1922, company acquired additional stock which gave it control of The West India Oil Refining Co.

In Aug., 1924, announced a joint ownership with General Motors Corp. in the Ethyl Gasoline Corp. which had just been formed to take over the business of General Motors Chemical Co. in the development and distribution of ethyl fluid, a chemical compound added to gasoline to improve the anti-knock quality.

During 1927, company divested itself of all physical property and became exclusively a holding company. In this process it organized Standard Shipping Co. which, in August, 1927, acquired all company's vessels and other equipment of its marine department and also organized Standard Oil Co. of N. J. (now Esso Standard Oil Co.) which, in September, 1927, acquired all company's manufacturing and marketing plants and equipment.

In July, 1928, acquired shares in Creole Petroleum Corp. (formerly The Creole Syndicate) in exchange for its shares in Standard Oil Co. of Venezuela, to which latter company had previously been transferred all outstanding shares of American British Oil Co. Company also purchased additional shares in Creole Petroleum Corp., making its interest a majority of stock. (Subsequently increasing interest to 95%).

In January, 1929, purchased for \$19.10 per share 350,000 shares of treasury stock in the Beacon Oil Co. and offered holders of the outstanding common stock one share of company stock for each 2 1/4 shares of Beacon common stock which expired Jan. 19, 1929, resulted in the acquisition of about 448,771 additional shares and gave company majority control. In 1936, made a new offer for stock of this company which was then known as Colonial Beacon Oil Co. (name having been changed in 1930), on the basis of 1 share of company stock for each 2 1/4 shares of Colonial Beacon. Offer expired Oct. 15, 1936. The assets and business of Colonial Beacon were transferred to Standard Oil Co. of N. J. (now Esso Standard Oil Co.) on Dec. 31, 1947.

Rating	Amount Outstanding	Charges Earned	Interest Dates	Call Price	Price Range
		1959 1958			1959 1932-59
			M&N 15	100 1/2	84 1/2-78 1/4
			J & J 15	102	86 3/4-80 1/2

Par Value	Amount Outstanding	Earned per Sh.	Divs. per Sh.	Call Price	Price Range
		1959 1958			1959 1932-59

On April 30, 1932, entered into a contract with Standard Oil Co. (Indiana) to purchase from the latter 971,897 shares of Class "A" stock and 2,301,400 shares of Class "B" stock in Pan American Foreign Corp. for a consideration of \$47,910,107 cash and 1,778,973 shares of company stock, to be paid over a four-year period.

In November, 1932, ended patent litigation with Petroleum Chemical Corp. (which was controlled by National Distillers Products Corp. and by Barnsdall Corp.) by selling its business in the manufacture of alcohol from petroleum to the newly organized Standard Alcohol Co. in which Petroleum Chemical Corp. took a minority stock interest and the company a majority stock interest.

In 1933, company transferred its entire interest in Nederlandsche Koloniale Petroleum Maatschappij, Gilbert & Barker Mfg. Co. (Australia) Ltd. and Union Atlantic Co. to Standard Vacuum Oil Co. for a 50% stock interest. The Socony Vacuum Oil Co. Inc. also transferred various assets to Standard Vacuum Oil Co. in exchange for the other 50% interest. Standard Vacuum Oil Co. became an important producer, refiner and marketer in the Far East, Australia and parts of Africa.

In March, 1935, distributed as a stock dividend shares in Mission Corp. which had been organized to acquire company's shareholdings in Tide Water Associated Oil Co. and in Skelly Oil Co.

In June, 1936, made available to a subsidiary, Standard Oil Export Corp., approximately \$82,444,800 which was applied to the retirement of the latter's preferred stock, following which this subsidiary was dissolved and its assets distributed to the company as the sole common stockholder.

Also, in 1936, the Pan American Foreign Corp. and the Mexican Petroleum Co. Ltd. (of Delaware) were liquidated. Standard Pipe Line Co. was merged with Standard Oil Co. of Louisiana.

In March, 1938, the Mexican properties of the following subsidiaries were expropriated by the Mexican government: Huasteca Petroleum Co., Mexican Petroleum Co., Compañia Transcontinental de Petroleo, S. A., Compañia Petrolera Minerva, S. A., Compañia Petrolera Ulises, S. A., Tuxpan Petroleum Co., J. A. Brown, S. e. C., Doheny Bridge y Compañia, Green y Compañia, Yamahia Petroleum Co. This expropriation resulted from a controversy over labor decrees. The properties of company's subsidiaries (as well as those of other foreign oil companies) have since been operated by the Mexican government. On Dec. 28, 1943 subsidiaries received from U. S. Secretary of Treasury a first payment in amount of \$9,507,748 toward settlement of their claims. Total award amounted to \$22,332,486 including interest, all of which has been paid.

In December, 1937, International Petroleum Co., Ltd., which was then a subsidiary of Imperial Oil, Ltd., contracted with Mene Grande Oil Co. C. A., (an indirect subsidiary of Gulf Oil Corp.) which owned petroleum rights in eastern and western Venezuela, for the purchase of half the oil recovered and for the purchase of an undivided half interest in the producing equipment and facilities. International Petroleum also obtained an option to purchase at cost an undivided half interest in all oil concessions in Venezuela hereafter acquired by Mene Grande. International made an advance cash payment to Mene Grande of \$25,000,000 on Dec. 15, 1937, and gave non-interest bearing notes due in 1938, 1939 and 1945 for an additional \$75,000,000. International was to share equally with Mene Grande in the expenses of development and operation. In 1938, International sold at cost a one half interest in its contract (with the sole made retroactive to Dec. 15, 1937) to N. V. Nederlandsche Olie Maatschappij, a subsidiary of N. V. de Bataafsche Petroleum Maatschappij (Bataafian Petroleum Co.) which, in turn, is 60% owned by N. V. Koninklijke Nederlandsche Maatschappij tot Exploitatie van Petroleumbronnen in Nederlandsch Indie (Royal Dutch Co. for the Working of Petroleum Wells in the Netherlands Indies).

In June, 1944, merged Lago Petroleum Corp. and Pan Foreign Corp. and issued 50,155 shares to minority interests of these companies.

On June 30, 1944, company acquired direct ownership of ocean-going tankers and incidental marine properties formerly held by its wholly-owned subsidiary, Standard Oil Co.

of N. J. (Del.). In exchange, parent company transferred to its subsidiary all of the stock of Standard Oil Co. of L.A.

As of Dec. 31, 1944, pipeline properties and operations of Standard Oil Co. of Louisiana were acquired by Interstate Pipe Line Co. (formerly Oklahoma Pipe Line Co.), another wholly-owned subsidiary. In exchange for 104,000 shares of latter company's stock. Immediately thereafter Standard Oil Co. of Louisiana was merged into Standard Oil Co. of N. J. (Del.) (now Esso Standard Oil Co.).

In Apr., 1946, company sold entire outstanding stock of Montreal Pipe Line Co., Ltd., a subsidiary, to British-American Oil Co., Ltd., Imperial Oil, Ltd., McColl-Frontenac Oil Co., Ltd., and Shell Oil Co. of Canada, Ltd., an affiliate of Shell Union Oil Corp. Montreal Pipe Line owns and operates a pipe line from the international boundary near North Troy, to Montreal East. In addition, the oil companies through a newly formed subsidiary, Portland Pipe Line Corp., have acquired from Standard Oil (New Jersey) all assets of Portland Pipe Line Co. which owns and operates a pipe line running from Portland, Me., to the international boundary, where it connects with the Montreal line, providing a continuous system from Portland to Montreal. The share interest in both companies is 40% by Imperial Oil and 20% held by each of the other companies.

In Jan., 1948, Domestic Coke Corp., a wholly owned subsidiary engaged in manufacture of coke and by-products at Fairmont, W. Va. sold its fixed assets to a steel manufacturer for \$3,955,000. Name was changed in 1949 to Esso Shipping Co. and on Jan. 1, 1950 acquired the parent company's U. S. flag ocean going fleet.

In Mar., 1948 sold Daggett & Ramsdell, a cosmetic subsidiary.

In June, 1948, Imperial Oil Ltd., offered to sell to its stockholders, in proportion to their holdings, its entire stock interest in International Petroleum Co., Ltd. As a stockholder of Imperial, company thus acquired 6,239,359 shares of International stock at \$9.20 per share. At same time company (S. O. N. J.) offered to all other stockholders of International 3 shares of its stock in exchange for each 20 shares of International. As of Jan. 31, 1949, the date when exchange offer terminated, company had acquired 5,755,023 additional shares of International stock in exchange for 862,336 shares of its own stock and as a result it now held 82.58% interest in International Petroleum.

In May, 1958, company (S. O. N. J.) offered 9 shares for each 10 shares of International Petroleum Co.; acquiring 1,997,900 additional shares in exchange for 1,798,110 Jersey shares (increasing interest to 96.8%). In Jan., 1960 Esso Standard (Inter-America) Inc., a wholly owned subsidiary purchased this stock at \$45 per share.

In Sept., 1948, purchased for \$6,600,000 Societe du Naphte, S. A. (Switzerland) engaged in marketing operations in various Middle East countries.

In Dec., 1948 acquired 30% interest in Arabian American Oil Co. for \$74,133,000. For details see under "Middle East Activities" below.

In Dec., 1948, Stanco Inc. was merged with Esso Standard Oil Co.

In 1948 sold its 22% interest in Mississippi River Fuel Corp. for \$3,446,000.

In Jan., 1950, company's U. S. flag ocean going fleet and related marine assets were transferred to Esso Shipping Co., a wholly owned subsidiary.

In Apr., 1952 sold 50% interest in Attapulguis Clay Co.

On Aug. 6, 1953 sold 54% interest in Interstate Natural Gas Co. for about \$23,000,000.

In 1956 acquired by exchange of 265,000 shares entire stock of Pate Oil Co., Perfect Power Corp. and Oklahoma Oil Co., Perfect Power Corp. was subsequently merged with Oklahoma Oil Co.

Early in 1958 acquired Lehigh Realty, Inc. (Conn.) by issuance of 52,571 shares and Gaseteria, Inc. (Ind.) by issuance of 105,500 shares.

Humble Oil & Refining Merger: In 1959 a new Humble Oil & Refining Co. was formed in Delaware to acquire assets of Humble Oil & Refining Co. (Texas) (minority stockholders received 1 1/4 SONJ shares for each Humble share). On Dec. 1, 1959 Humble (Texas) was merged and on Dec. 31, 1959 Carter Oil Co. and Esso Standard Oil Co., both 100% owned by SONJ were merged into new Humble company.

Natural Gas Holdings Segregated: Stockholders of record Nov. 15, 1943 received on Dec. 15 one share of Consolidated Natural Gas Co. for each 10 shares of Standard Oil Co. of N. J. The Consolidated Natural Gas Co. was organized to acquire Standard Oil Co. (N. J.) holdings in the following companies: East Ohio Gas Co., River Gas Co., Home Natural Gas Co., and Peoples Natural Gas Co.

Segregation of these resulted from an SEC ruling that Standard Oil Co. was a holding company within the meaning of the Holding Company Act as long as it retained interest in these natural gas utility companies.

SUBSIDIARIES

Company is predominately a holding company, owning as of Dec. 31, 1959, 100% voting control of the following:

Name, place of incorporation and business:

Ancon Insurance Co., S. A., Panama

Anbal Co., N. V. (Neth. Antilles)

Bahna Insurance Co., S. A., Panama

A/S Esso-Raffineriet, Norge, Norway—Refining in Norway

Atlantic Barrere, S. A., Uruguay—Marketing

Baltisch-Amerische Petroleum-Import G. m. b. H. Danzig

Butterworth System, Inc., Delaware

Carter Oil Co., W. Va.—(Merged into Humble Oil & Refining Co., Dec. 31, 1959)

Companhia Maritima Brasileira, Brazil

Danish American Prospecting Co., Fla.—In liquidation

Dansk Esso A/S—Marketing in Denmark and Marine Transportation

A/S Kalundborg Olieraffineri (55.17%)

Esso Afrique Occidentale S. A. France—France

Esso A. G.—Germany—Refining and marketing in West Germany

Vereinigte Asphalt-und Teerprodukten-Fabriken G.m.b.H.

Esso Belgium—Refining and marketing in Belgium

Esso Congo Belge

Esso Marine (Belgium)

Esso Standard (Luxemburg) S. A.

Esso (Cuba), Inc., Delaware

Esso Exploration, Italia, Inc., Delaware—Inactive

Esso Export Corp., Del.—Worldwide wholesale marketer and coordinator of retail, bunkering and aviation sales activities.

Esso Export Ltd.—Wholesale Marketing in Eastern Hemisphere countries

Esso Hellenic, Inc., Del.

Esso Iberia, Inc., Del.

Esso Mediterranean, Inc., Del.—Marketing in eastern Mediterranean area, North and West Africa and the Iberian Peninsula

Esso Standard Espanola, S. A., Panama

Esso Standard (near East), Inc., Del.

Esso Standard Portugal, Inc., Del.

Esso Supply Co., Inc., Panama

Esso West Africa, Inc., Del.

Esso Mexicano S. A. de C. V. Mexico

Esso Petroleum Co. Ltd., England—Refining, transportation and marketing in United Kingdom and Eire

British Mexican Petroleum Co., Ltd.—Tankers

Cleveland Petroleum Co., Ltd., England—Marketing

British Oil Storage Co., Ltd.—Marketing

National Filling Stations Ltd.—Inactive

Esso Pension Trust Ltd., Great Britain

Esso Petroleum Co. (Ireland) Ltd.

Esso (Ireland) Pension Trust Ltd. (Ireland)

Purfleet Deep Wharf & Storage Co., Ltd.

Redline-Gilco Ltd.—Inactive

Standard Candle Co., Ltd.—Inactive

Esso Research & Engineering Co., Del.

Esso Research Ltd., Great Britain

International Catalytic Oil Processes Corp., Del. (75%)

Jasco, Inc., Del.

Standard Catalytic Co., Del.

Esso (Sahara) Inc., Del.

Esso Services, S. A., Panama—Formed in 1959 to finance construction of pipeline under terms of agreement between Esso (Argentina) Inc. and Argentine government oil company.

Esso Sirte Inc., Del.

Esso Standard (Guatemala) Inc.—Exploration in Guatemala

Esso S. A. Petrolera Argentina—Producing, exploring, marine transportation, refining transportation & marketing in Argentina

Esso (Argentina), Inc., Delaware

Esso Standard (Austria) A.G.—Marketing in Austria

Gasolin G.m.b.H., Austria

Esso Standard do Brasil Inc., W. Va.—Marketing in Brazil. Name changed to Esso Brasileira de Petroleos, S. A., in Jan. 1960

Esso Standard (Cuba), Inc., Delaware

Esso Standard (Inter-America) Inc., Del.—In Jan. 1960 acquired 16.6% interest in Anglo-Ecuadorean Oil Fields Ltd., an integrated producer with over 300 sq. miles of concessions in Ecuador for about \$2-600,000 for just under 750,000 shares acquired from South American Gold & Platinum Co. Another big block of Anglo-Ecuadorean stock is owned by Lobitos Oilfields, Ltd. Lobitos and Standard holdings combined come to just over 50% of Anglo-

Ecuadorean's outstanding shares. Also in Jan. 1960 purchased companies holdings in International Petroleum Co. Ltd. (see below)

Esso Limitada (1) (0.33%)—Chile

Esso Standard Italiana—Soc. per Azioni

Italy—Marketing and refining in Italy

"La Columbia" Soc. Marittima per Azioni (6) (31.52%)

Esso Standard (Libya), Inc., Del.—Exploration in Libya

Esso Standard (Malta), Ltd.—Great Britain

Esso Standard Paraguay, Paraguay

Esso Standard Oil, S. A.—Panama—Refining, exploring, producing and marketing in Caribbean area and Central America

Esso Standard Oil Co. (Puerto Rico) (100%)

—Marketing in Puerto Rico and Virgin Islands

Esso Gas Co. of Puerto Rico—Del.—Inactive

Lands Exploitation Co., Ltd., Surinam

Stemco S. A. F.—France

Esso Standard Oil Co.—Delaware—(Merged with Humble Oil & Refining Co. Dec. 31, 1959)

Colonial Beacon Oil Co. (Del.)—Inactive

Enjay Co., Inc.—Merged into Humble Oil Refining Co., effective May 31, 1960.

Name changed to Enjay Chemical Co., Marketing and coordination of Humble's chemical product activities in U. S. and sells chemicals to Esso Export Corp. for distribution in foreign markets.

Esso Incorporated

Kesbes, Inc., New York—Inactive.

Penola Oil Co. (Del.)

Smedly & Mehl Co. (Del.)

Stanco, Inc.—Inactive

Tuscarora Pipe Line Co., Ltd. (99.97%), Pa.—Pipe lines

Esso Standard Oil Co. (Uruguay), S. A., Uruguay—Marketing in Uruguay

Esso Standard (Switzerland)—Marketing in Switzerland

Esso Standard (Turkey), Inc.—Organized in 1954 to undertake exploration work in Turkey

Esso Tankers, Inc., Delaware—Manages affiliates engaged in marine operation

Esso Tankerschiff Reederei G.m.b.H., Germany

Esso Trading Co. of Iran—Del.

Esso Transportation Co. Ltd.—Great Britain

—In liquidation

General Automatic Corp., Md.

Gilbert & Barker Mfg. Co., Mass.—Manufactures and sells oil burners and service station equipment

Flexham A. G., Switzerland

Gilbarco Limited, Great Britain

Gilbert & Barker Mfg. Co. Ltd., Canada

Globe Fuel Products, Inc., Ill.

Humble Oil & Refining Co. (Del.)—Integrated oil activities in the U. S. Its principal divisions and present locations of their operations are:

Carter Division—Exploration, producing, refining, and marketing in central United States, Pacific Northwest, and Rocky Mountain areas.

Esso Standard Division—Refining, transportation, and marketing in certain eastern seaboard and southern states.

Humble Division—Exploration and/or producing in southeast, southwest, Gulf Coast, Pacific Coast areas, and Alaska; refining and transportation in Texas; marketing in Tex., N. M. and Ariz.

Interstate Oil Pipe Line Co., Del.—Pipeline transportation, Louisiana, Mississippi, Illinois and Montana

Yellowstone Pipe Line Co. (40%)—Organized in 1953. In 1954 completed a 540 mile products pipeline from Billings, Mont. to Spokane, Wash.

"La Columbia" Societa Marittima per Azioni (4) (65.48%) Italy

Lago Oil & Transport Co., Ltd., Canada—Refining in Aruba, N.W.I.

Medqatar, Inc., Panama

Mediterranean Standard Oil Co., Del.—Purchase and sale of Middle East crude and products.

Mediraq Ltd.—Iraq

Medkuwait, Inc., Panama

Medqatar, Inc., Panama

Oklahoma Oil Co., Ill.—Marketing in Ky., Wisc., Ind., Mich., Ill and Ia. To be absorbed by Humble Oil & Refining Co. (Del.)

Bonded Oil Co., Inc., Md.

Gaseteria Corp., Md.

Oy Esso Ab—Marketing in Finland

Panama Transport Co., Panama—Marine transportation

Pate Oil Co., Del.—Marketing in Milwaukee area. To be absorbed by Humble Oil & Refining Co.

Romano-Americana, Roumania

"Vac-Petrol" S.A.

Sociedade Tecnica e Industrial de Lubrificantes Solutes S. A.

Standard Oil Co. of Canada, Ltd.

Standard Oil Co. (Nfld.) Ltd.—Inactive

Standard Oil Co. of Egypt, S. A., Egypt—(98.33%)—Inactive

Standard Tankers (Bahamas) Co. Limited, Bahamas (99.98%)

Jersey Production Research Co., Del.—Organized in 1953 to direct geological, geophysical and production research.

Standard Oil International Ltd.—Great Britain—Purchase and sale of Middle East crude oil

Stamrac Ltd.—Iraq

Stankuwait, Limited

Stankuwait, Limited

Svenska Esso Aktiebolag, Sweden—Marketing in Sweden

Esso Rederi Aktiebolag (99.85%)

Skandinavisk-Amerikanska Petroleum Aktiebolaget

Standard Petroleum Aktiebolag—Inactive

Note: Numbers in parentheses indicate same company with split ownership. See other identical numerals similarly enclosed for total interest of company and subsidiaries.

Also owned, as of Dec. 31, 1958, less than 100% voting control of the following subsidiaries:

Name, place of incorporation and business:

A/S Norske Esso (77.99%)—Refining and marketing in Norway

Aktieselskapet Tiger (98%)

A/S Christiania Kul-Vedbolag

Ancon, Ltd. (Bermuda) (99.9%)

Cie Esso-Saharienne (France) (99.2%)

Creole Petroleum Corp. (95.40%), Del.—Producing, refining, transportation and marketing in Venezuela

Compania de Petroleo Lago (100%)

Standard Oil Co., C.A. (100%)—Inactive

Esso Exploration Guine Inc., Del. (80% directly and indirectly)—Exploration in Portuguese Guinea

Esso-Nederland N. V. (99.9%), Netherlands—Marketing in Netherlands

Esso Tankvaart Maatschappij N. V., Netherlands

Esso Standard Algerie S. A., Algeria (99.9%)

—Marketing in Algeria

Esso Standard Maroc S. A. (3) (Morocco) (20.46%)

Esso Standard Maroc S. A., (3) Morocco (79.44%)

Esso Limitada (99.67%) (1)—Chile

Esso Standard Oil Co. (Chile) S. A. C. (2) (25%)

Esso Standard Oil Co. (Chile) S.A.C. (2) (75%)—Chile—Marketing in Chile

Esso Standard Tunisie S. A. (98%)—Tunisia

—Marketing in Tunisia

European Gas & Electric Co., Del. (81.68%)

European Gas & Electric Co. von Oesterreich G.m.b.H.—Inactive

Magyar Amerikai Olajipari Reszvenytarsasag

Imperial Oil, Ltd. (70.05%) Canada —Producing, refining, marketing and transportation in Canada

Aquila Petroleum Ltd.—Canada

Atlas Supply Co. of Canada, Ltd.

Caribbean Oil & Transport, Inc.

Chalton Oil & Gas Co., Limited

Devcon Petroleum Ltd., Canada

Devon Estates Ltd., Canada

Devonian Natural Gas Co. Ltd.—Canada

Eron Oil & Gas Co. Limited

Esso of Canada Limited

Imperial Oil Shipping Co., Ltd.—Inactive

Imperial Pipe Line Co., Ltd., The

Ioco Townsite, Ltd., Canada

Lowlands Exploration Ltd.—Canada

Maple Leaf Petroleum Ltd., Canada

Nisku Products Pipe Line Co., Ltd.

Northwest Co., Ltd.

Oval Natural Gas Co. Limited

Padol Petroleum Ltd., Canada

Falcon Petroleum Ltd., Canada

Seaway Bunkers Limited, Canada

St. Clair Processing Corp., Ltd.—Inactive

St. Lawrence Tankers, Ltd. Canada (50%)

Stannmount Pipe Line Co. (inactive)

Stromo Petroleum Ltd., Canada

Tercol Petroleum Ltd., Canada

Transit Co., Ltd., Canada

Winnipeg Pipe Line Co. Ltd.

International Petroleum Co., Ltd. (96.75%)

Canada—Producing, refining, transportation and marketing in Peru and Colombia and producing interest in Venezuela and marketing in Ecuador.

Note: In Jan., 1960, Esso Standard (Inter-America) Inc., (see above) purchased outstanding shares (96.8%) of International Petroleum Co., Ltd., at \$45 per share from parent.

Andian National Corp. Ltd. (98.42%)—Canada

Compania Peruana de Gas S.A., Peru (77.87%)

Esso Colombiana S. A. (6) (74.7%)—Colombia

International Petroleum (Colombia) Ltd.—Canada

Esso Colombiana S. A. (6) (25%)

Tropical Oil Co.—Inactive

United Petroleum Securities Corp. (77.4%)

Esso Standard S.A.F.—France (81.55%)—Refining, transportation and marketing in France

Soc. Immobiliere Paris-Niel, S. A.—Inactive

Soc. Esso de Recherches et D'Exploitation Petrolieres Esso Rep. (89.97%)—Exploring and producing in southwest France

See separate statement following Standard Oil Co. (N. J.).

See Moody's Transportation Manual.

Note: Numbers in parentheses indicate same

company with split ownership. See other identical numerals similarly enclosed for total interest of company and subsidiaries.

Affiliates: As of Dec. 31, 1959 company held 50% or minority interest in following:
Ethyl Corp. (50%)—balance held by General Motors Corp.; Manufactures and sells an antiknock compound in United States.

Standard-Vacuum Oil Co. (50%)—balance owned by Socony-Mobil Oil Co. Inc.—Producing, transportation, refining and marketing in Far East, Australasia, and Africa. See under "Far East" below.

Near East Development Co. (50%)—balance owned by Socony-Mobil Oil Co. Inc.

Iraq Petroleum Co., Ltd. (23%)—Producing in Iraq and Qatar, transportation in Iraq, Qatar, Syria and Lebanon and refining in Lebanon. See "Middle East" below.

Arabian American Oil Co. (30%)—Producing refining and transportation in Saudi Arabia. See "Middle East" below.

Trans-Arabia Pipe Line Co. (30%)—Pipeline transportation from Saudi Arabia to Mediterranean terminal in Lebanon. See "Middle East" below.

Gewerkshaft Brigitta (50%)—Producing in West Germany.

N. V. Nederlandse Aardolie Mij. (50%)—Producing in Netherlands.

Stano-Industria Petrolifera S.p.A. (50%)—Refining in Italy.

Iranian Oil Participants Ltd. (7%)—Producing and refining in Iran. See "Iran" below.

Plantation Pipe Line Co. (48.83%)—See Moody's Transportation Manual.

Interprovincial Pipe Line Co. (23%)—See Moody's Transportation Manual. Pipeline transportation from Alberta to Sarnia, Ont.

Trans-Mountain Oil Pipe Line Co. (6%)—See Moody's Transportation Manual. Pipeline transportation from Edmonton, Alta., to Vancouver, B. C. and Ferndale, Wash.

BUSINESS & PRODUCTS
Is primarily a holding company, subsidiaries engaging in the acquisition, exploration and exploitation of oil and gas lands; in buying and selling crude oil; in transporting oil by pipe line; in refining crude oil; in transporting refined products by pipe line, boat and automobile; in marketing petroleum products at wholesale and retail.

Subsidiaries also engage in producing, buying, selling, transporting and distributing of natural gas. An allied activity is the licensing of patent rights relating to the oil industry. Subsidiaries also manufacture and/or sell gasoline and oil storage and dispensing equipment, oil heating equipment, insecticides, etc.

Subsidiaries also produce special lines of chemical products consumed by the petroleum industry and general lines of chemical products made from by-products of the industry. Incidental to marketing operations, subsidiaries sell tires, batteries and other automotive accessories.

General references to the types of activity carried on in various geographical areas will be found under "Principal Plants & Properties."

PRINCIPAL PLANTS & PROPERTIES

Production Statistics—World Wide
Estimated Oil and Natural Gas Liquid Reserves at Dec. 31, 1959 (in millions of bbls.):

	Gross	Net
United States	4,370	3,754
Canada	881	760
Venezuela	9,562	8,181
Oth. West. Hem.	262	252
Europe & Africa	892	725
Middle East	16,193	15,562
Far East	155	155

Total 32,325 29,389

Net Acreage and Producing Wells at Dec. 31, 1959:

	Proved	Total	Wells
	—Ne: Acreage—		—Net
United States	1,141,000	21,176,000	19,307
Canada	235,000	16,895,000	2,477
Venezuela	495,000	3,537,000	3,586
Oth. West. Hem.	64,000	25,081,000	2,343
Europe & Africa	46,000	31,841,000	527
Middle East	335,000	98,367,000	115
Far East	16,000	35,814,000	466

Total 2,354,000 252,711,000 28,821

These statistics include 100% of holdings and operations of those affiliates in which company owns more than 50% of the shares. For companies in which company owns 50% or less of shares, the figures include only that percentage of each company's holdings or operations as corresponds to percentage of company's ownership.

Net oil and gas condensate wells capable of producing.

Drilling Operation: In 1959, company's worldwide affiliates drilled 332 (1958, 428) net exploratory wells. Drilling in proved areas, 941 (1958, 981) net wells. Most of the reduction in drilling was in Venezuela, where spare producing capacity continues to grow.

WESTERN HEMISPHERE OPERATIONS

Producing Department: Within the United States the producing subsidiaries were merged at end of 1959 into Humble Oil &

Refining Co. Exploration and producing activities are conducted throughout the United States and offshore Gulf Coast and California. Principal producing properties are in Texas, Louisiana and Illinois. Exploration program continued along Gulf Coast and in Rocky Mountain area. Although 11% fewer exploration wells were drilled more oil was found than in 1958. Major discoveries were in Bayou Sale field, La., in Red Fish Reef on Texas coast, and on King Ranch in southwest Texas.

Imperial Oil Ltd. operates in Canada, the most important properties being in the Prairie Provinces, British Columbia and Ontario. Exploration drilling in Ontario, Prince Edward Island and New Brunswick has not yet resulted in any significant discovery.

Creole Petroleum Corp. operates in Venezuela. In 1958 and 1957 acquired from the Venezuelan Government new oil concessions on 471,700 acres for \$77,000,000.

Production in 1959 averaged 942,000 bbls. daily.

International Petroleum Co., Ltd., operates in Peru and Colombia and through contractual arrangement with Mene Grande Oil Co. Ltd. in Venezuela. Company obtained new concessions in Venezuela on 225,700 acres for \$34,400,000 in 1956 and 1957. In 1959 company produced 108,000 bbls. daily.

Eso S.A. Petrolera Argentina produces relatively small quantities of crude in Argentina and in carrying out exploration and development latter activities on over 1,250,000 acres. In 1959 plans were announced to build a 400 mile crude pipeline under contract with the Argentine government oil company.

In 1956 Esso Standard (Guatemala) Inc., a new company, began exploration of concessions granted in Guatemala.

Pipe Line Department: Subsidiaries owned and operated at end of 1959, 7,777 miles of oil trunk pipe lines in the United States. In 1959 the lines carried 1,094,000 bbls. daily of crude and other refined products.

Details of company's principal domestic pipe line subsidiaries are as follows:

Humble Pipe Line Co. operated 5,810 miles of trunk lines and 3,982 miles of gathering lines in Texas and New Mexico, which deliver to the Baytown refinery in Texas and to Gulf ports.

Interstate Oil Pipe Line Co. operated about 1,967 miles of trunk lines in Louisiana, Arkansas, Mississippi, Montana, Illinois and Wyoming, which deliver to connecting carriers in Anchorage, and Baton Rouge, La. and Billings and Laurels, Mont. In 1959 company delivered 468,000 (1958, 434,000; 1957, 461,000) barrels a day. Owns 40% interest in Yellowstone Pipe Line Co. which operates a 574 mile products pipeline from Billings, Mont. to Spokane, Wash. (transported 27,000 bbls. daily in 1959).

Not included in above are statistics of those systems in which company has a minority interest, i. e., Plantation Pipe Line Co. (49% owned) (see Moody's Transportation Manual) operated 2,425 miles of line (delivered 290,000 bbls. daily in 1959), the Portland-Montreal system which transported 231,000 bbls. daily in 1959 through its 490 miles of trunk line pipe; the Lakehead Pipe Line Co. transported 247,000 bbls. daily in 1959 on its 1,292 miles of trunk line.

In Canada Imperial Oil owns three pipelines: Imperial Pipe Line Co. Ltd. which gathers oil in Alberta; Winnipeg Pipe Line Co. Ltd. which has a 77 mile trunk line from Gretna Manitoba to Winnipeg; Sarnia product line which consists of 235 miles from Sarnia to Toronto. Imperial Oil also has minority interest in Trans Mountain Pipe Line which completed in 1953 a line from Edmonton to Vancouver; Interprovincial Pipe Line Co. which operates a line from Edmonton to Sarnia, Peace River Oil Pipe Line Co., Ltd. operates a gathering system in Sturgeon Lake area of Alberta and 107 mile trunk line to Trans Mountain station at Edson, Alta.; West-spur Pipe Line Co. operates a 109 mile trunk line connecting southeastern Saskatchewan fields with the Interprovincial line.

In Colombia, South America, Andian National Corp., Ltd., owned 670 miles of crude oil pipe line from De Mares fields to Barrancabermeja refinery and to seaboard terminal near Cartagena. Contract expires Oct. 1, 1973. In Venezuela, Creole Petroleum Corp. has interest in 800 miles of trunk line pipe including a 143 mile line from Lake Maracaibo to Amuay Bay.

Marine Transportation: At Dec. 31, 1959, subsidiaries owned 185 tankers totaling 3,300,000 dwt. Of these 34 vessels (775,000 dwt.), sail under American flag. Remainder are owned by foreign affiliates and operate under respective national flags. Besides owned fleet, affiliates had 160 tankers under term charter. In addition, Standard-Vacuum Oil Co. owned 13 vessels aggregating 402,000 dwt.

Refining Department: Subsidiaries operate the refineries as follows:

Humble Oil & Refining Co.	Bayonne, N. J.	Charleston, S. C.
Boway, N. J.	Humble O. & R.	Baytown, Tex.
Everett, Mass.	Baton Rouge, La.	Carter Oil Co.
Baltimore, Md.		Billings, Mont.

Creole Petroleum Corp.	Sarnia, Ont.
Ioco, B. C.	Sarnia, Ont.
Calgary, Alta.	Montreal E., Que.
Edmonton, Alta.	Halifax, N. S.
Regina, Sask.	Norman Wells, N.W.T.
Winnipeg, Man.	Imperial Oil Ltd.
	Caripito

Logo, O. & T. Int'l Petroleum

Aruba, N.W.I. Talara, Peru

Note: In Apr., 1959 Esso Standard Oil Co., S. A. stated that it planned to construct a refinery to cost \$18-20,000,000 at Kingston, Jamaica, under agreement with Jamaican government. Plant will have 25,000 bbl. daily capacity when completed 2 years after site selection.

Western Hemisphere refinery operating statistics (in thousand bbls. daily):

Crude Oil Runs:	1959	1957	1956
United States	861	749	827
Canada	289	269	275
Venezuela	364	308	321
Peru	42	43	42
Aruba, N.W.I.	412	399	412
Other	133	130	95
Total	2,101	1,898	1,898

end of 1959 were:

Petrochemicals: Company's revenue from petrochemical sales world-wide was \$256,000,000 in 1959.

Sales in the United States, are made primarily through Enjay Chemical Co. Such oil-derived products include plastics, resins, synthetic rubbers, fibers, and detergents.

Atlas Bucron tires, made of butyl rubber, were introduced in domestic market in summer of 1959. Butyl, which company developed and is currently producing, has been the principal rubber used in inner tubes for a number of years and, now, is also used as wire and cable insulation, hoses, and industrial belts. Sales increased by 35% in 1959, and manufacturing capacity is being expanded.

In May, 1960, opened a polypropylene plant at Baytown, Tex., with an annual capacity of 40,000,000 lbs. This new plastic is used to make fibers, films, pipe, and a variety of molded products.

Plants abroad, for which substantial capital outlays were made in 1959, now constitute more than a third of the company's total petrochemical investments. Major additions to capacity were made in Germany and France; a second project for Germany was announced; and Standard-Vacuum has begun construction of the first major petrochemical installation in Australia.

In 1959 research continued in the development of new plastics, synthetic rubbers, and basic organic chemicals. In addition to the polypropylene, processes were developed to manufacture chlorinated butyl and latex, two important additions to line of butyl rubbers, and to make a new family of resins called Butons, which are useful as surface coatings and in manufacture of pipes and structural forms.

Marketing Department: In connection with the sale of products in the various parts of the world in which subsidiaries do business, they own or lease from others and operate terminals, bulk plants, service stations, tank wagons and other equipment. Nearly all the 23,000 service stations owned or leased by subsidiaries in the United States are operated by others under lease. Subsidiaries sell products at wholesale and retail.

Note: For product sales on world-wide basis see Statistical Tabulation below.

The principal marketing subsidiaries of the company in Western Hemisphere at the end of 1959 were:

Subsidiary	Marketing in
Humble Oil & Refining Co.	United States
Esso Standard Div.	
Humble Div.	
Carter Div.	
Imperial Oil Co.	Canada
Okla. Oil Co.	
Imperial Oil Ltd.	Brazil
Brasileira de Petroleo S. A.	West Indies and Central America.
Esso Standard Oil S. A.	
Esso Standard Oil S. A. C.	Chile
Int'l Petroleum Co., Ltd.	Peru, Colombia & Ecuador
Creole Petroleum Corp.	Venezuela
Esso S. A. Petrolera Argentina	Argentina
Esso Standard Oil Co. (Uruguay) S. A.	Uruguay
Operates in Wisconsin.	
Operates in Ind., Ill., Ia., Mich., Wisc. and Ky.	

The marketing subsidiaries obtain most of their petroleum products from their own refineries or from refineries of other subsidiaries. However, substantial quantities of such products are purchased from outsiders both in the United States and abroad.

Research: Principal research centers are located at Abingdon, England; Baton Rouge,

La.; Linden and Florham Park, N. J.; Tulsa, Okla.; Baytown, Tex.; and Sarnia, Ont. Over 3,970 were active in research work. Research expenditures were \$67,000,000 in 1959; \$62,000,000 in 1958; \$55,500,000 in 1957; \$44,000,000 in 1956 and \$35,200,000 in 1955.

Research activities are directed toward development of new or improved methods of finding, producing, and refining crude oil, the improvement of product performance and development of new products. About 25% of research costs are concerned with development of processes for production from petroleum of chemical intermediates and finished chemical products such as plastics and synthetic rubbers.

In 1959 long-range search for new products and processes was centralized in a new group in Esso Research and Engineering Co.

Esso Research continued work on high-energy solid propellants for rockets under an expanded, nonprofit contract with U. S. Department of Defense. Results include successful firings of laboratory-scale rocket motors powered by experimental fuels.

Other accomplishments included the development, for jet aircraft, of a fuel yielding more energy per gallon and of a lower cost synthetic lubricant giving better performance at high temperatures. Also developed were a lubricant for diesel locomotives that reduces engine wear and two engine-cleaning additives for motor oils.

See also "Petrochemicals" above. Miscellaneous: Gilbert & Barker Mfg. Co. owns a plant at West Springfield, Mass., for manufacture of equipment for dispensing and storing oil and gasoline, of oil heating and air conditioning equipment, and of miscellaneous articles.

Subsidiaries and certain companies in which company has investments are engaged in licensing of various patent rights relating directly or indirectly to oil business and in the manufacture of general and special lines of chemical products made from by-products of the petroleum industry.

EASTERN HEMISPHERE OPERATIONS

(For production statistics, etc. see below).

Europe: In the United Kingdom, Esso Petroleum Co. Ltd., the Fawley refinery capacity was raised to 220,000 barrels daily. Manufacture of petrochemicals was being expanded through the addition of a new plant. Chief among products to be manufactured are butadiene and ethylene, which will supply basic chemicals for the manufacture of synthetic rubber and plastics by other, nonaffiliates now building facilities near the refinery.

Construction began in 1958 on a new refinery at Milford Haven, on deep water on the coast of Wales.

In 1959 a 40,000 bbl. daily refinery at Whitegate, Ireland went on stream.

In France Esso Rep., a producing, affiliate of Esso Standard S.A.F., continued development of its Parentis and Cazaux fields. In 1959, a 32,000 bbl. daily refinery in the Bordeaux area went on stream.

West German affiliate, Esso A. G., in 1958 placed in operation 63,500 bbl. daily refinery at Cologne. Also a petrochemical plant is to be built at this site. This affiliate also has a refinery at Hamburg with a capacity of 50,000 bbls. daily. A refinery is to be built at Karlsruhe. In 1958 Nord-West Oelleitung GmbH in which Esso A.G. has a 47% interest, completed a 245 mile crude oil pipeline from Wilhelmshaven to Cologne. Company's 50% owned affiliate Gewerkschaft Brigitta owned producing fields in Oldenburg.

Dutch affiliate Esso-Nederland N. V. is a new refinery in Rotterdam with a capacity of 95,000 bbls. daily, to go on stream in 1960. N. V. Nederlandsche Aardolie Mij., a 50% owned affiliate produces oil in the Netherlands.

In Italy Stanic-Industria Petrolifera, S.P.A., a 50% owned refining company has refineries at Bari and Leghorn. Esso Standard Italiana expanded its marketing activities.

Another newly formed affiliate, Esso Standard (Libya) Inc., intensified search for oil in Libya.

In Belgium, company's 100% owned affiliate Esso Standard Refinery had a refinery at Antwerp which was placed in operation in 1954 and processed 35,000 bbls. daily in 1957.

In Norway, A/S Esso-Raffineriet, Norge (organized in 1957) a new 40,000 bbls. refinery about 50 miles south of Oslo is scheduled to go on stream in 1960. When completed, it will not only supply the needs of A/S Norske Esso but will also furnish products to Svensko Esso A/B. in Sweden.

Search for oil continued in Turkey.

In 1959, Esso Standard (Libya) Inc. com-

pleted a well at Zeiten, a 100 miles from Mediterranean coast, tested at 17,500 bbls. a day. Subsequent drillings indicated this to be a major find as a result a pipeline to coast and a tanker loading terminal are being planned. Company also acquired a half interest in three large concessions in Libya held by other companies. Three discoveries have already been made on these properties, which Esso Sirte Inc. will operate.

Elsewhere in Africa, company is conducting exploration on concessions held jointly with two French participants in Algeria, and exploration continues on a concession held in Portuguese Guinea.

In 1959, company acquired exploration rights on 800,000 acres in Spain and has applied for exploration rights on 1,000,000 acres in Greece.

Middle East: On Dec. 2, 1948, Jersey acquired a 30% stock interest in Arabian American Oil Co. (Aramco). Remaining interest is held 30% by Standard Oil Co. of Calif. and Texas Co. and 10% by Socony Vacuum Oil Co. Company has extensive concessions in Saudi Arabia and a refinery at Ras Tanura.

In Saudi Arabia Aramco constructed in 1958, a large-scale gas injection plant at its Ain Dar field, and development drilling to delineate new Khurais field and new offshore Manifa field was continued. At Ras Tanura refinery new alkylation facilities for production of aviation gasoline were under construction.

	Crude Oil Production	Refinery Runs
1959-----	1,095,400	174,300
1958-----	1,015,000	168,000
1957-----	992,000	193,000
1956-----	986,000	199,000
1955-----	985,000	203,000
1954-----	953,000	220,000

Trans-Arabian Pipe Line Co. completed its 1,067-mile pipeline in Saudi Arabia in Dec., 1950. Operation of the TAPLine system began Dec. 2, 1950. Deliveries at terminal at Sidon in eastern Mediterranean totaled (bbls. daily): 1959, 338,000; 1958, 368,000; 1957, 348,000; 1956, 340,000; 1955, 322,000; 1954, 318,000; 1953, 308,000.

In 1957, Company added power to main stations and built remotely controlled booster stations which raised its capacity from 320,000 to 420,000 bbls. a day. This was part of a project to raise capacity to 460,000 bbls. which was completed in 1958.

Iraq Petroleum Co., Ltd., and its associates, in which company has an approximately 12% interest, had no interruptions to production and transportation of oil in 1958 despite political disturbances. The pipeline which was blown up during Suez crisis was restored to full previous capacity by middle of 1958. The Basrah Petroleum Co. Ltd., in Iraq, prepared to construct a new island loading terminal for large tankers in Persian Gulf, in conjunction with expansion of producing facilities in Rumaila field.

Far East: Standard-Vacuum Oil Co. (50% owned) operates from the Philippines to East Africa. Crude production averaged: 84,000 (1958, 77,000; 1957, 65,000; 1956, 66,000; 1955, 72,000; 1954, 69,300) barrels a day in 1959. Most of this was from fields in Sumatra. Is also exploring in India, Pakistan, Philippines and Australia. A 10,300-square-mile concession was obtained in Somalia, East Africa, where it began to explore in 1958.

Wholly-owned refineries are located in Indonesia, Australia, South Africa and India and 2 refineries in Japan in which company has a majority interest processed 207,000 bbls. a day in 1958. The largest refinery is at Palembang, in Sumatra. Subsidiary plans to invest \$35,700,000 in Melbourne's proposed petrochemical industry and \$33,600,000 in a refinery near Adelaide, bringing total Australian investment to \$229,600,000 by 1962.

At Dec. 31, 1959, Stanvac owned tankers with a deadweight tonnage of 402,000 tons.

Consolidated Earnings, years to Dec. 31 (in \$1000) of Stanvac:

	Gross Oper. rev.	Net Income	Div. Paid
1956-----	856,000	32,070	14,000
1957-----	946,000	40,900	13,000
1958-----	958,000	26,716	9,000
1959-----	1,024,550	23,256	10,000

Consolidated net assets, Dec. 31, 1959, \$456,648,000.

Iran: Company, together with Socony-Mobil Oil Co., Inc., Standard Oil Co. (N. J.), Standard Oil Co. of Cal., Texas Co., Gulf Oil Corp., Anglo-Iranian Oil Co. (now British Petroleum Co., Ltd.), Royal Dutch Shell and Compagnie Francaise des Petroles, formed a consortium to restore Iranian oil to world commerce. Agreements, to run for 40 years

were approved by Iranian parliament in Oct., 1954.

Consortium members have set up two companies under the laws of the Netherlands: one to explore for and produce crude oil in Iran within the area covered by the agreement; the other to operate the Abadan refinery. The two companies exercise managerial controls necessary to ensure successful operation. The National Iranian Oil Co. (owned by Iranian Government) has sole responsibility for all marketing within Iran and for producing and refining operations outside the area of the agreement. Iran is to receive one-half of net profits of the consortium.

A British company called Iranian Oil Participants Ltd., was formed which holds the shares of the two Netherlands companies. Each consortium member subscribed to shares in this company equivalent to its interest under the applicable agreements. British Petroleum holds 40% interest, the American firms share 40%, Royal Dutch Shell, 14% and Compagnie Francaise des Petroles, 6%. Each member takes its oil at the border of Iran and markets it independently.

In Apr., 1955, the 5 American companies referred to above reduced their interest from 40% to 35% by turning over a 5% interest to Iricon Agency, Ltd. organized to administer interests of Standard Oil Co. (Ohio), Atlantic Refining Co., Hancock Oil Co., Pacific Western Oil Corp., Richfield Oil Corp., Signal Oil & Gas Co., Tide Water Associated Oil Co., American Independent Oil Co. and San Jacinto Petroleum Corp.

Production in Iran in 1959 continued to rise, with an averaged 923,000 bbls. a day (1958, 820,000).

CAPITAL EXPENDITURES

Of the total 1959 expenditures, those for additions to property, plant and equipment amounted to \$729,146,000 distributed as follows (in thousands of dollars):

	U. S.	Foreign	Total
Producing -----	137,395	78,361	266,256
Refining -----	50,453	120,953	181,411
Marketing -----	46,764	102,830	149,594
Transportation -	18,487	97,567	116,054
Other -----	11,406	4,425	15,831

Total ----- 315,010 414,136 729,146

In addition to the expenditures capitalized, other amounts spent in the search for oil during 1959 by consolidated companies totaled \$197,203,000; (1958, \$212,536,000; 1957, 246,000,000).

MANAGEMENT

Officers

L. O. Welch, Chairman
M. J. Rathbone, Pres. & Chief Exec. Off.
L. W. Elliott, Exec. Vice-President
D. A. Shepard, Exec. Vice-President
E. E. Soubry, Exec. Vice-President
S. P. Coleman, Vice-President
M. W. Boyer, Vice-Pres.—Invest.
M. L. Haider, Vice-Pres.—Lat. Amer.
P. T. Lamont, Vice-Pres.—Eur. & Med.
W. R. Stott, Vice-Pres.—Eur. & Med.
H. W. Page, Vice-Pres.—Middle East
E. G. Collado, Treasurer
A. O. Savage, Comptroller
J. O. Larson, Secretary

Directors

M. W. Boyer, New York
C. L. Burrill
S. P. Coleman, New York
E. G. Collado
L. W. Elliott, New York
H. W. Fisher
M. L. Haider
P. T. Lamont, New York
H. W. Page, New York
M. J. Rathbone, New York
D. A. Shepard, New York
E. E. Soubry, New York
W. R. Stott
L. D. Welch, New York
J. R. White
M. A. Wright
General Counsel: T. E. Monaghan, New York.

Auditor: Price Waterhouse & Co.

Annual Meeting: Last Wednesday in May.

No. of Stockholders: Feb. 8, 1960, 591,179.

General Office: 30 Rockefeller Plaza, N. Y.

Payrolls and Employees: Wages

	Employees	Sal. & benef.
1959-----	146,000	\$969,000,000
1958-----	154,000	953,000,000
1957-----	160,000	993,000,000
1956-----	156,000	906,000,000
1955-----	153,000	859,000,000
1954-----	155,000	803,900,000
1953-----	158,000	778,600,000

Consolidated, including European and North Africa affiliates.

OPERATING STATISTICS

COMPARATIVE OPERATING STATISTICS, YEARS ENDED DEC. 31

(Consolidated and non-consolidated companies)

	1959	1958	1957	1956	1955	1954	1953
Gross Production							
United States -----	507,000	472,000	538,000	546,000	520,000	484,000	516,000
Canada -----	96,000	88,000	112,000	122,000	110,000	98,000	92,000
Latin America -----	1,259,000	1,219,000	1,289,000	1,208,000	1,094,000	932,000	899,000
Total Western Hemisphere -----	1,862,000	1,779,000	1,939,000	1,876,000	1,724,000	1,514,000	1,507,000
Europe & North Africa -----	45,000	42,000	42,000	33,000	24,000	14,000	10,000
Middle East & Far East -----	557,000	508,000	451,000	457,000	437,000	405,000	361,000
Total World-wide -----	2,464,000	2,329,000	2,432,000	2,366,000	2,185,000	1,933,000	1,878,000

MOODY'S INDUSTRIAL MANUAL

JOHN MOODY

1960



AMERICAN AND FOREIGN

STANDARD OIL COMPANY

(A New Jersey Corporation)

CAPITAL STRUCTURE

LONG TERM DEBT

Issue	Rating
1. Debenture 2 3/4%, 1971	Aaa
2. Debenture 2 3/4%, 1974	Aaa
3. 3% notes due 1979	---
4. Subsidiary debt	---

CAPITAL STOCK

Issue	Par Value
1. Capital stock	\$7

Amount	Times Charges Earned	Interest Dates	Call Price	Price Range
Outstanding	1959 1958			1959 1932-59
\$85,000,000		M&N15	\$100 1/2	84 1/2-78 1/4
150,000,000	22.65 24.36	J&J15	\$102	86 1/4-80 1/2
\$75,000,000				103 1/4-80 1/2
481,032,167				

Amount	Earned per Sh.	Divs. per Sh.	Call Price	Price Range
Outstanding	1959 1958	1959 1958		1959 1932-59
\$216,532,661 shs.	\$2.91 \$2.62	\$2.25 \$2.25		59 1/2-45 1/2
				68 1/2-45 1/2

[Subject to change; see text.]Based on average no. of shares outstanding: 1959, \$2.93; 1958, \$2.72. [Range since 1949. [Range since 3-for-1 split in 1956; range from 2-for-1 split in 1951 and to the 3-for-1 split in 1956, 169-58 1/2; from 1932 and to the split in 1951, 12 3/4-19 1/2. [As of Mar. 15, 1960, including reacquired shares.

HISTORY

Incorporated in New Jersey, Aug. 5, 1882, as Standard Oil Company of New Jersey by the trustees of the Standard Oil Trust to acquire from the trustees in exchange for stock the property of The Standard Oil Co. (Ohio). In March, 1892, in exchange for additional stock acquired from the trustees of the Standard Oil Trust the stocks of other companies and properties of other companies which had previously been held by the trustees. (Standard Oil Trust was thereupon dissolved). On March 19, 1892, name of the company was changed to Standard Oil Company.

In May, 1911, the United States Supreme Court sustained a lower court decision that the company was a combination in violation of the Sherman Anti-Trust Law. In accordance with a dissolution decree the company, in December, 1911, and in January, 1912, distributed pro rata among stockholders its shares in the 33 companies listed below.

Anglo-American Oil Co. Ltd.
Atlantic Refining Co.
Borneo-Scrymser Co.
Buckeye Pipe Line Co.
Chesapeake Manufacturing Co.
Colonial Oil Co.
Continental Oil Co.
Crescent Pipe Line Co.
Cumberland Pipe Line Co.
Eureka Pipe Line Co.
Galena-Signal Oil Co.
Indiana Pipe Line Co.
National Transit Co.
New York Transit Co.
Northern Pipe Line Co.
The Ohio Oil Co.
Prairie Oil & Gas Co.
Solar Refining Co.
South Penn Oil Co.
Southern Pipe Line Co.
South West Penna. Pipe Lines
Standard Oil Co. (California)
Standard Oil Co. (Indiana)
Standard Oil Co. (Kentucky)
Standard Oil Co. (Nebraska)
Standard Oil Co. (New York)
Standard Oil Co. (Ohio)
Standard Oil Co. (Kansas)
Swan & Finch Co.
Union Tank Line Co.
Vacuum Oil Co.
Washington Oil Co.
Waters-Pierce Oil Co.

In 1922, company acquired additional stock which gave it control of The West India Oil Refining Co.

In Aug., 1924, announced a joint ownership with General Motors Corp. in the Ethyl Gasoline Corp. which had just been formed to take over the business of General Motors Chemical Co. in the development and distribution of ethyl fluid, a chemical compound added to gasoline to improve the anti-knock quality.

During 1927, company divested itself of all physical property and became exclusively a holding company. In this process it organized Standard Shipping Co. which, in August, 1927, acquired all company's vessels and other equipment of its marine department and also organized Standard Oil Co. of N. J. (now Esso Standard Oil Co.) which, in September, 1927, acquired all company's manufacturing and marketing plants and equipment.

In July, 1928, acquired shares in Creole Petroleum Corp. (formerly The Creole Syndicate) in exchange for its shares in Standard Oil Co. of Venezuela, to which latter company had previously been transferred all outstanding shares of American British Oil Co. Company also purchased additional shares in Creole Petroleum Corp., making its interest a majority of stock. (Subsequently increasing interest to 95%).

In January, 1929, purchased for \$19.10 per share 350,000 shares of treasury stock in the Beacon Oil Co. and offered holders of the outstanding common stock one share of company stock for each 2 1/4 shares of Beacon common stock. Offer which expired Jan. 19, 1929, resulted in the acquisition of about 448,771 additional shares and gave company majority control. In 1936, made a new offer for stock of this company which was then known as Colonial Beacon Oil Co. (name having been changed in 1930), on the basis of 1 share of company stock for each 2 1/4 shares of Colonial Beacon stock. Offer expired Oct. 15, 1936. The assets and business of Colonial Beacon were transferred to Standard Oil Co. of N. J. (now Esso Standard Oil Co.) on Dec. 31, 1947.

On April 30, 1932, entered into a contract with Standard Oil Co. (Indiana) to purchase from the latter 971,897 shares of Class "A" stock and 2,301,400 shares of Class "B" stock in Pan American Foreign Corp. for a consideration of \$47,910,107 cash and 1,778,973 shares of company stock, to be paid over a four-year period.

In November, 1932, ended patent litigation with Petroleum Chemical Corp. (which was controlled by National Distillers Products Corp. and by Barnsdall Corp.) by selling its business in the manufacture of alcohol from petroleum to the newly organized Standard Alcohol Co. in which Petroleum Chemical Corp. took a minority stock interest and the company a majority stock interest.

In 1933, company transferred its entire interest in Nederlandsche Koloniale Petroleum Maatschappij, Gilbert & Barker Mfg. Co. (Australia) Ltd. and Union Atlantic Co. to Standard Vacuum Oil Co. for a 50% stock interest. The Socony Vacuum Oil Co. Inc., also transferred various assets to Standard Vacuum Oil Co. in exchange for the other 50% interest. Standard Vacuum Oil Co. became an important producer, refiner and marketer in the Far East, Australia and parts of Africa.

In March, 1935, distributed as a stock dividend shares in Mission Corp. which had been organized to acquire company's shareholdings in Tide Water Associated Oil Co. and in Skelly Oil Co.

In June, 1936, made available to a subsidiary, Standard Oil Export Corp., approximately \$82,444,800 which was applied to the retirement of the latter's preferred stock, following which this subsidiary was dissolved and its assets distributed to the company as the sole common stockholder.

Also, in 1936, the Pan American Foreign Corp. and the Mexican Petroleum Co. Ltd. (of Delaware) were liquidated. Standard Pipe Line Co. was merged with Standard Oil Co. of Louisiana.

In March, 1938, the Mexican properties of the following subsidiaries were expropriated by the Mexican government: Huasteca Petroleum Co., Mexican Petroleum Co., Compania Transcontinental de Petroleo, S. A., Compania Petrolera Minerva, S. A., Compania Petrolera Ulises, S. A., Tuxpan Petroleum Co., J. A. Brown, S. en C., Doheny, Bridge y Compania, Green y Compania, Tamiahua Petroleum Co. This expropriation resulted from a controversy over labor decrees. The properties of company's subsidiaries (as well as those of other foreign oil companies) have since been operated by the Mexican government. On Dec. 28, 1943 subsidiaries received from U. S. Secretary of Treasury a first payment in amount of \$9,807,748 toward settlement of their claims. Total award amounted to \$22,332,486 including interest, all of which has been paid.

In December, 1937, International Petroleum Co., Ltd., which was then a subsidiary of Imperial Oil, Ltd., contracted with Mene Grande Oil Co. C. A., (an indirect subsidiary of Gulf Oil Corp.) which owned petroleum rights in eastern and western Venezuela, for the purchase of half the oil recovered and for the purchase of an undivided half interest in the producing equipment and facilities. International Petroleum also obtained an option to purchase at cost an undivided half interest in all oil concessions in Venezuela hereafter acquired by Mene Grande. International made an advance cash payment to Mene Grande of \$25,000,000 on Dec. 15, 1937, and gave non-interest bearing notes due in 1938, 1939 and 1945 for an additional \$75,000,000. International was to share equally with Mene Grande in the expenses of development and operation. In 1938, International sold at cost a one half interest in its contract (with the sale made retroactive to Dec. 15, 1937) to N. V. Nederlandsche Olie Maatschappij, a subsidiary of N. V. de Bataafische Petroleum Maatschappij (Batavian Petroleum Co.) which, in turn, is 60% owned by N. V. Koninklijke Nederlandsche Maatschappij tot Exploitatie van Petroleumbronnen in Nederlandsch Indie (Royal Dutch Co. for the Working of Petroleum Wells in the Netherlands Indies).

In June, 1944, merged Lago Petroleum Corp. and Pan Foreign Corp. and issued 50,155 shares to minority interests of these companies.

On June 30, 1944, company acquired direct ownership of ocean-going tankers and incidental marine properties formerly held by its wholly-owned subsidiary, Standard Oil Co.

of N. J. (Del.). In exchange, parent company transferred to its subsidiary all of the stock of Standard Oil Co. of La.

As of Dec. 31, 1944, pipeline properties and operations of Standard Oil Co. of Louisiana were acquired by Interstate Pipe Line Co. (formerly Oklahoma Pipe Line Co.), another wholly-owned subsidiary, in exchange for 104,000 shares of latter company's stock. Immediately thereafter Standard Oil Co. of Louisiana was merged into Standard Oil Co. of N. J. (Del.) (now Esso Standard Oil Co.).

In Apr., 1946, company sold entire outstanding stock of Montreal Pipe Line Co., Ltd., a subsidiary, to British-American Oil Co., Ltd., Imperial Oil, Ltd., McColl-Frontenac Oil Co., Ltd. and Shell Oil Co. of Canada, Ltd., an affiliate of Shell Union Oil Corp. Montreal Pipe Line owns and operates a pipe line from the international boundary near North Troy, to Montreal, East. In addition, the oil companies through a newly formed subsidiary, Portland Pipe Line Corp., have acquired from Standard Oil (New Jersey) all assets of Portland Pipe Line Co. which owns and operates a pipe line running from Portland, Me., to the international boundary, where it connects with the Montreal line, providing a continuous system from Portland to Montreal. The share interest in both companies is 40% by Imperial Oil and 20% held by each of the other companies.

In Jan., 1948, Domestic Coke Corp., a wholly owned subsidiary engaged in manufacture of coke and by-products at Fairmont, W. Va. sold its fixed assets to a steel manufacturer for \$3,355,000. Name was changed in 1949 to Esso Shipping Co. and on Jan. 1, 1950 acquired the parent company's U. S. flag ocean going fleet.

In Mar., 1948, sold Daggett & Ramsdell, a cosmetic subsidiary.

In June, 1948, Imperial Oil Ltd., offered to sell to its stockholders, in proportion to their holdings, its entire stock interest in International Petroleum Co., Ltd. As a stockholder of Imperial, company thus acquired 6,239,359 shares of International stock at \$9.20 per share. At same time company (S. O. N. J.) offered to all other stockholders of International 3 shares of its stock in exchange for each 20 shares of International. As of Jan. 31, 1949, the date when exchange offer terminated, company had acquired 5,755,023 additional shares of International stock in exchange for 862,336 shares of its own stock and as a result it now held 82.58% interest in International Petroleum.

In May, 1958, company (S. O. N. J.) offered 9 shares for each 10 shares of International Petroleum Co.; acquiring 1,997,900 additional shares in exchange for 1,798,110 Jersey shares (increasing interest to 96.8%). In Jan., 1960 Esso Standard (Inter-America) Inc., a wholly owned subsidiary purchased this stock at \$45 per share.

In Sept., 1948, purchased for \$6,600,000 Societe du Naphte, S. A. (Switzerland) engaged in marketing operations in various Middle East countries.

In Dec., 1948 acquired 30% interest in Arabian American Oil Co. for \$74,133,000. For details see under "Middle East Activities" below.

In Dec., 1948, Stanco Inc. was merged with Esso Standard Oil Co.

In 1948 sold its 22% interest in Mississippi River Fuel Corp. for \$3,446,000.

In Jan., 1950, company's U. S. flag ocean going fleet and related marine assets were transferred to Esso Shipping Co., a wholly owned subsidiary.

In Apr., 1952 sold 50% interest in Attapulugus Clay Co.

On Aug. 6, 1953 sold 54% interest in Interstate Natural Gas Co. for about \$23,000,000.

In 1956 acquired by exchange of 265,000 shares entire stock of Pate Oil Co., Perfect Power Corp. and Oklahoma Oil Co. Perfect Power Corp. was subsequently merged with Oklahoma Oil Co.

Early in 1958 acquired Lehigh Realty, Inc. (Conn.) by issuance of 52,571 shares and Gaseteria, Inc. (Ind.) by issuance of 108,500 shares.

Humble Oil & Refining Merger: In 1959 a new Humble Oil & Refining Co. was formed in Delaware to acquire assets of Humble Oil & Refining Co. (Texas) (minority stockholders received 1 1/4 SONJ shares for each Humble share). On Dec. 1, 1959 Humble (Texas) was merged and on Dec. 31, 1959 Carter Oil Co. and Esso Standard Oil Co., both 100% owned by SONJ were merged into new Humble company.

Natural Gas Holdings Segregated: Stockholders of record Nov. 15, 1943 received on Dec. 15 one share of Consolidated Natural Gas Co. for each 10 shares of Standard Oil Co. of N. J. The Consolidated Natural Gas Co. was organized to acquire Standard Oil Co. (N. J.) holdings in the following companies: East Ohio Gas Co., River Gas Co., Hope Natural Gas Co., and Peoples Natural Gas Co.

Segregation of these resulted from an SEC ruling that Standard Oil Co. was a holding company within the meaning of the Holding Company Act as long as it retained interest in these natural gas utility companies.

SUBSIDIARIES

Company is predominately a holding company, owning as of Dec. 31, 1959, 100% voting control of the following:

Name, place of incorporation and business:

Ancon Insurance Co., S. A., Panama
Anbal Co., N. V. (Neth. Antilles)
Bahoa Insurance Co., S. A., Panama
A/S Esso-Raffineriet, Norge, Norway—Refining in Norway
Atlantic Barrere, S. A., Uruguay—Marketing
Baltisch-Amerikanische Petroleum-Import G. m. b. H. Danzig
Butterworth System, Inc., Delaware
Carter Oil Co., W. Va.—(Merged into Humble Oil & Refining Co., Dec. 31, 1959)
Companhia Maritima Brasileira, Brazil
Danish American Prospecting Co., Fla.—In liquidation
Dansk Esso A/S—Marketing in Denmark and Marine Transportation
A/S Kalundborg Olieraffineri (55.17%)
Esso Afrique Occidentale S. A. Française—France
Esso A. G.—Germany—Refining and marketing in West Germany
Vereinigte Asphalt-und Teerprodukten-Fabriken G.m.b.H.
Esso Belgium—Refining and marketing in Belgium
Esso Congo Belge
Esso Marine (Belgium)
Esso Standard (Luxemborg) S. A.
Esso (Cuba), Inc., Delaware
Esso Exploration, Italia, Inc., Delaware—Inactive
Esso Export Corp., Del.—Worldwide wholesale marketer and coordinator of retail, bunkering and aviation sales activities.
Esso Export Ltd.—Wholesale Marketing in Eastern Hemisphere countries
Esso Hellenic, Inc., Del.
Esso Iberia, Inc., Del.
Esso Mediterranean, Inc., Del.—Marketing in eastern Mediterranean area, North and West Africa and the Iberian Peninsula
Esso Standard Espanola, S. A., Panama
Esso Standard (near East), Inc., Del.
Esso Standard Portugal, Inc., Del.
Esso Supply Co., Inc., Panama
Esso West Africa, Inc., Del.
Esso Mexicana, S. A. de C. V., Mexico
Esso Petroleum Co. Ltd., England—Refining, transportation and marketing in United Kingdom and Eire
British Mexican Petroleum Co., Ltd.—Tankers
Cleveland Petroleum Co., Ltd.
England—Marketing
British Oil Storage Co., Ltd.—Marketing
National Filling Stations Ltd.—Inactive
Esso Pension Trust Ltd., Great Britain
Esso Petroleum Co. (Ireland) Ltd.
Esso (Ireland) Pension Trust Ltd. (Ireland)
Purfleet Deep Wharf & Storage Co., Ltd.
Redline-Glico Ltd.—Inactive
Standard Candle Co., Ltd.—Inactive
Esso Research & Engineering Co., Del.
Esso Research Ltd., Great Britain
International Catalytic Oil Processes Corp., Del. (75%)
Jasco, Inc., Del.
Standard Catalytic Co., Del.
Esso (Sahara) Inc., Del.
Esso Services, S. A., Panama—Formed in 1959 to finance construction of pipeline under terms of agreement between Esso (Argentina) Inc. and Argentine government oil company.
Esso Sirte Inc., Del.
Esso Standard (Guatemala) Inc.—Exploration in Guatemala
Esso S. A. Petrolera Argentina—Producing, exploring, marine transportation, refining transportation & marketing in Argentina
Esso (Argentina), Inc., Delaware
Esso Standard (Austria) A.G.—Marketing in Austria
Gasolin G.m.b.H., Austria
Esso Standard do Brasil Inc., W. Va.—Marketing in Brazil. Name changed to Esso Brasileira de Petroleos, S. A., in Jan. 1960
Esso Standard (Cuba), Inc., Delaware
Esso Standard (Inter-America) Inc., Del.—In Jan., 1960 acquired 16.6% interest in Anglo-Ecuadorian Oil Fields Ltd., an integrated producer with over 300 sq. miles of concessions in Ecuador for about \$2,000,000 for just under 750,000 shares acquired from South American Gold & Platinum Co. Another big block of Anglo-Ecuadorian stock is owned by Lobitos Oilfields, Ltd. Lobitos and Standard holdings combined come to just over 50% of Anglo-

Ecuadorian's outstanding shares. Also in Jan., 1960 purchased companies holdings in International Petroleum Co. Ltd. (see below).

Esso Limitada (1) (0.33%)—Chile
Esso Standard Italiana—Soc. per Azioni
Italy—Marketing and refining in Italy
"La Columbia" Soc. Marittima per Azioni (6) (31.52%)
Esso Standard (Libya), Inc., Del.—Exploration in Libya
Esso Standard (Malta), Ltd.—Great Britain
Esso Standard Paraguay, Paraguay
Esso Standard Oil S. A. Panama—Refining exploring, producing and marketing in Caribbean area and Central America
Esso Standard Oil Co. (Puerto Rico) (100%)
—Marketing in Puerto Rico and Virgin Islands
Esso Gas Co. of Puerto Rico—Del.—Inactive
Lands Exploitation Co., Ltd., Surinam
Stemco S. A. F.—France
Esso Standard Oil Co.—Delaware—(Merged with Humble Oil & Refining Co. Dec. 31, 1959)
Colonial Beacon Oil Co. (Del.)—Inactive
Enjay Co., Inc.—Merged into Humble Oil & Refining Co., effective May 31, 1960. Name changed to Enjay Chemical Co., Marketing and coordination of Humble's chemical product activities in U. S. and sells chemicals to Esso Export Corp. for distribution in foreign markets.
Esso Incorporated
Kesbes, Inc., New York—Inactive.
Penola Oil Co. (Del.)
Smedley & Mehl Co. (Del.)
Stanco, Inc.—Inactive
Tuscarora Pipe Line Co., Ltd. (99.97%), Pa.—Pipe lines
Esso Standard Oil Co. (Uruguay), S. A., Uruguay—Marketing in Uruguay
Esso Standard (Switzerland)—Marketing in Switzerland
Esso Standard (Turkey), Inc.—Organized in 1954 to undertake exploration work in Turkey
Esso Tankers, Inc., Delaware—Manages affiliates engaged in marine operation.
Esso Tankschiff Reederei G.m.b.H., Germany
Esso Trading Co. of Iran—Del.
Esso Transportation Co. Ltd.—Great Britain
—In liquidation
General Automatic Corp., Md.
Gilbert & Barker Mfg. Co., Mass.—Manufactures and sells oil burners and service station equipment
Flexham A. G., Switzerland
Gilbarco Limited, Great Britain
Gilbert & Barker Mfg. Co. Ltd., Canada
Globe Fuel Products, Inc., Ill.
Humble Oil & Refining Co. (Del.)—Integrated oil activities in the U. S. Its principal divisions and present locations of their operations are:
Carter Division—Exploration, producing, refining, and marketing in central United States, Pacific Northwest, and Rocky Mountain areas.
Esso Standard Division—Refining, transportation, and marketing in certain eastern seaboard and southern states
Humble Division—Exploration and/or producing in southeast, southwest, Gulf Coast, Pacific Coast areas, and Alaska; refining and transportation in Texas; marketing in Tex., N. M. and Ariz.
Interstate Oil Pipe Line Co., Del.—Pipeline transportation, Louisiana, Mississippi, Illinois and Montana
Yellowstone Pipe Line Co. (40%)—Organized in 1953. In 1954 completed a 540 mile products pipeline from Billings, Mont. to Spokane, Wash.
"La Columbia" Societa Marittima per Azioni (4) (63.48%) Italy
Lago Oil & Transport Co., Ltd., Canada—Refining in Aruba. N.W.I.
Medqatar, Inc., Panama
Mediterranean Standard Oil Co., Del.—Purchase and sale of Middle East crude and products.
Mediraq Ltd.—Iraq
Medkuwait, Inc., Panama
Medqatar, Inc., Panama
Oklahoma Oil Co., Ill.—Marketing in Ky., Wisc., Ind., Mich., Ill. and Ia. To be absorbed by Humble Oil & Refining Co. (Del.)
Bonded Oil Co., Inc., Md.
Gaseteria Corp., Md.
Oy Esso Ab—Marketing in Finland
Panama Transport Co., Panama—Marine transportation
Pate Oil Co., Del.—Marketing in Milwaukee area. To be absorbed by Humble Oil & Refining Co.
Romano-Americana, Roumania
"Neo-Petrol" S.A.
Sociedade Tecnica e Industrial de Lubrificantes Solutec S.A.
Standard Oil Co. of Canada, Ltd.
Standard Oil Co. (Nfld.) Ltd.—Inactive
Standard Oil Co. of Egypt, S. A., Egypt—(98.33%)—Inactive
Standard Tankers (Bahamas) Co. Limited, Bahamas (99.98%)
Jersey Production Research Co., Del.—Organized in 1958 to direct geological, geo-physical and production research.

Standard Oil International Ltd.—Great Britain—Purchase and sale of Middle East crude oil

Staniraq Ltd.—Iraq
Stankuwait Limited
Stanquatar, Limited
Svenska Esso Aktiebolag, Sweden—Marketing in Sweden
Esso Rederi Aktiebolag (99.85%)
Skandinavisk-Amerikanska Petroleum Aktiebolaget
Standard Petroleum Aktiebolag—Inactive
Note: Numbers in parentheses indicate same company with split ownership. See other identical numerals similarly enclosed for total interest of company and subsidiaries.
Also owned, as of Dec. 31, 1958, less than 100% voting control of the following subsidiaries:
Name, place of incorporation and business:
A/S Norske Esso (77.99%)—Refining and marketing in Norway
Aktieselskapet Tiger (98%)
A/S Christiana Kul-Vedbolag
Ancon, Ltd. (Bermuda) (99.9%)
Cie Esso-Saharienne (France) (99.2%)
Creole Petroleum Corp. (95.40%), Del.—Producing, refining, transportation and marketing in Venezuela
Compania de Petroleo Lago (100%)
Standard Oil Co. C.A. (100%)—Inactive
Esso Exploration Guine Inc., Del. (80% directly and indirectly)—Exploration in Portuguese Guinea
Esso-Nederland N. V. (99.9%), Netherlands—Marketing in Netherlands
Esso Tankvaart Maatschappij N. V., Netherlands
Esso Standard Algerie S. A., Algeria (99.9%)
—Marketing in Algeria
Esso Standard Maroc S. A. (3) (Morocco) (20.46%)
Esso Standard Maroc S. A., (3) Morocco (79.44%)
Esso Limitada (99.67%) (1)—Chile
Esso Standard Oil Co. (Chile) S. A. C. (2) (25%)
Esso Standard Oil Co. (Chile) S.A.C. (2) (75%)—Chile—Marketing in Chile
Esso Standard Tunisie S. A. (98%)—Tunisia
—Marketing in Tunisia
European Gas & Electric Co., Del. (81.68%)
European Gas & Electric Co. von Oesterreich G.m.b.H.—Inactive
Magyar Amerikai Olajipari Reszvenytarsasag
Imperial Oil, Ltd. (70.05%) Canada —Producing, refining, marketing and transportation in Canada
Aquila Petroleum Ltd.—Canada
Atlas Supply Co. of Canada, Ltd.
Caribbean Oil & Transport, Inc.
Chalton Oil & Gas Co., Limited
Devcan Petroleum Ltd., Canada
Devon Estates Ltd., Canada
Devonian Natural Gas Co., Ltd.—Canada
Eron Oil & Gas Co. Limited
Esso of Canada Limited
Imperial Oil Shipping Co., Ltd.—Inactive
Imperial Pipe Line Co., Ltd., The
Ioco Townsite, Ltd., Canada
Lowlands Exploration Ltd.—Canada
Maple Leaf Petroleum Ltd., Canada
Nisku Products Pipe Line Co., Ltd.
Northwest Co., Ltd.
Oval Natural Gas Co. Limited
Padol Petroleum Ltd., Canada
Palcan Petroleum Ltd., Canada
Seaway Bunkers Limited, Canada
St. Clair Processing Corp., Ltd.—Inactive
St. Lawrence Tankers, Ltd., Canada (50%)
Stannmount Pipe Line Co. (inactive)
Stromo Petroleum Ltd., Canada
Tercol Petroleum Ltd., Canada
Transit Co., Ltd., Canada
Winnipeg Pipe Line Co. Ltd.
International Petroleum Co., Ltd. (96.75%)
Canada—Producing, refining, transportation and marketing in Peru and Colombia and producing interest in Venezuela and marketing in Ecuador.
Note: In Jan., 1960, Esso Standard (Inter-America) Inc., (see above) purchased outstanding shares (96.8%) of International Petroleum Co., Ltd., at \$45 per share from parent.
Andian National Corp. Ltd. (98.42%)—Canada
Compania Peruana de Gas S.A., Peru (77.97%)
Esso Colombiana S. A. (6) (74.7%)—Colombia
International Petroleum (Colombia) Ltd.—Canada
Esso Colombiana S. A. (6) (25%)
Tropical Oil Co.—Inactive
United Petroleum Securities Corp. (77½%)
Esso Standard S.A.F.—France (81.55%)
—Refining, transportation and marketing in France
Soc. Immobiliere Paris-Niel, S. A.—Inactive
Soc. Esso de Recherches et D'Exploitation Petrolieres Esso Rep. (88.97%)
—Exploring and producing in southwest France
See separate statement following Standard Oil Co. (N. J.).
See Moody's Transportation Manual.
Note: Numbers in parentheses indicate same

company with split ownership. See other identical numerals similarly enclosed for total interest of company and subsidiaries.

Affiliates: As of Dec. 31, 1959 company held 50% or minority interest in following:

Ethyl Corp. (50%)—balance held by General Motors Corp.; Manufactures and sells an antiknock compound in United States.

Standard-Vacuum Oil Co. (50%)—balance owned by Socony-Mobil Oil Co. Inc.—Producing, transportation, refining and marketing in Far East, Australasia, and Africa. See under "Far East" below.

Near East Development Co. (50%)—balance owned by Socony-Mobil Oil Co. Inc.

Iraq Petroleum Co., Ltd. (23%)—Producing in Iraq and Qatar, transportation in Iraq, Qatar, Syria and Lebanon and refining in Lebanon. See "Middle East" below.

Arabian American Oil Co. (30%)—Producing refining and transportation in Saudi Arabia. See "Middle East" below.

Trans-Arabia Pipe Line Co. (30%)—Pipeline transportation from Saudi Arabia to Mediterranean terminal in Lebanon. See "Middle East" below.

Gewerkschaft Brigitta (50%)—Producing in West Germany.

N. V. Nederlandse Aardolie Mij. (50%)—Producing in Netherlands.

Stamic-Industria Petrolifera S.p.A. (50%)—balance owned by Italian Government—Refining in Italy.

Iranian Oil Participants Ltd. (7%)—Producing and refining in Iran. See "Iran" below.

Plantation Pipe Line Co. (48.83%)—See Moody's Transportation Manual.

Interprovincial Pipe Line Co. (23%)—See Moody's Transportation Manual. Pipeline transportation from Alberta to Sarnia, Ont.

Trans-Mountain Oil Pipe Line Co. (6%)—See Moody's Transportation Manual. Pipeline transportation from Edmonton, Alta., to Vancouver, B. C. and Ferndale, Wash.

BUSINESS & PRODUCTS

Is primarily a holding company, subsidiaries engaging in the acquisition, exploration and exploitation of oil and gas lands; in buying and selling crude oil; in transporting oil by pipe line; in refining crude oil; in transporting refined products by pipe line, boat and automobile; in marketing petroleum products at wholesale and retail.

Subsidiaries also engage in producing, buying, selling, transporting and distributing of natural gas. An allied activity is the licensing of patent rights relating to the oil industry. Subsidiaries also manufacture and/or sell gasoline and oil storage and dispensing equipment, oil heating equipment, insecticides, etc.

Subsidiaries also produce special lines of chemical products consumed by the petroleum industry and general lines of chemical products made from by-products of the industry. Incidental to marketing operations, subsidiaries sell tires, batteries and other automotive accessories.

General references to the types of activity carried on in various geographical areas will be found under "Principal Plants & Properties."

PRINCIPAL PLANTS & PROPERTIES

Production Statistics—World Wide
Estimated Oil and Natural Gas Liquid Reserves at Dec. 31, 1959 (in millions of bbls.):

	Gross	Net
United States	4,370	3,754
Canada	881	760
Venezuela	9,562	8,181
Oth. West. Hem.	262	252
Europe & Africa	802	725
Middle East	16,193	15,562
Far East	155	155

Total 32,325 29,389

Net Acreage and Producing Wells at Dec. 31, 1959:

	Proved	Total	Wells
	—Net Acreage—		—Net—
United States	1,141,000	21,176,000	19,307
Canada	255,000	16,895,000	2,477
Venezuela	495,000	3,537,000	3,586
Oth. West. Hem.	64,000	25,081,000	2,343
Europe & Africa	46,000	51,841,000	527
Middle East	335,000	98,367,000	115
Far East	18,000	35,814,000	466

Total 2,354,000 252,711,000 28,821

These statistics include 100% of holdings and operations of those affiliates in which company owns more than 50% of the shares. For companies in which company owns 50% or less of shares, the figures include only that percentage of each company's holdings or operations as corresponds to percentage of company's ownership.

Net oil and gas condensate wells capable of producing.

Drilling Operation: In 1959, company's worldwide affiliates drilled 332 (1958, 428) net exploratory wells. Drilling in proved areas, 41 (1958, 981) net wells. Most of the reduction in drilling was in Venezuela, where spare producing capacity continues to grow.

WESTERN HEMISPHERE OPERATIONS

Producing Department: Within the United States the producing subsidiaries were merged at end of 1959 into Humble Oil &

Refining Co. Exploration and producing activities are conducted throughout the United States and offshore Gulf Coast and California. Principal producing properties are in Texas, Louisiana and Illinois. Exploration program continued along Gulf Coast and in Rocky Mountain area. Although 11% fewer exploration wells were drilled more oil was found than in 1958. Major discoveries were in Bayou State field, La., in Red Fish Reef on Texas coast, and on King Ranch in southwest Texas.

Imperial Oil Ltd. operates in Canada, the most important properties being in the Prairie Provinces, British Columbia and Ontario. Exploration drilling in Ontario, Prince Edward Island and New Brunswick has not yet resulted in any significant discovery.

Creole Petroleum Corp. operates in Venezuela. In 1956 and 1957 acquired from the Venezuelan Government new oil concessions on 471,700 acres for \$77,000,000.

Production in 1959 averaged 942,000 bbls. daily.

International Petroleum Co., Ltd., operates in Peru and Colombia and through contractual arrangement with Mene Grande Oil Co. Ltd. in Venezuela. Company obtained new concessions in Venezuela on 225,700 acres for \$34,400,000 in 1956 and 1957. In 1959 company produced 108,000 bbls. daily.

Esso S.A. Petrolera Argentina produces relatively small quantities of crude in Argentina and in carrying out exploration and development latter activities on over 1,250,000 acres. In 1959 plans were announced to build a 400 mile crude pipeline under contract with the Argentine government oil company.

In 1956 Esso Standard (Guatemala) Inc., a new company, began exploration of concessions granted in Guatemala.

Pipe Line Department: Subsidiaries owned and operated at end of 1959, 7,777 miles of oil trunk pipe lines in the United States. In 1959 the lines carried 1,094,000 bbls. daily of crude and other refined products.

Details of company's principal domestic pipe line subsidiaries are as follows:

Humble Pipe Line Co. operated 5,810 miles of trunk lines and 3,932 miles of gathering lines in Texas and New Mexico, which deliver to the Baytown refinery in Texas and to Gulf ports.

Interstate Oil Pipe Line Co. operated about 1,967 miles of trunk lines in Louisiana, Arkansas, Mississippi, Montana, Illinois and Wyoming, which deliver to connecting carriers in Anchorage, and Baton Rouge, La. and Billings and Laurels, Mont. In 1959 company delivered 468,000 (1958, 434,000; 1957, 461,000) barrels a day. Owns 40% interest in Yellowstone Pipe Line Co. which operates a 574 mile products pipeline from Billings, Mont. to Spokane, Wash. (transported 27,000 bbls. daily in 1959).

Not included in above are statistics of those systems in which company has a minority interest, i. e., Plantation Pipe Line Co. (49% owned) (see Moody's Transportation Manual) operated 2,425 miles of line (delivered 290,000 bbls. daily in 1959), the Portland-Montreal system which transported 231,000 bbls. daily in 1959 through its 490 miles of trunk line pipe; the Lakehead Pipe Line Co. transported 247,000 bbls. daily in 1959 on its 1,292 miles of trunk line.

In Canada Imperial Oil owns three pipelines: Imperial Pipe Line Co. Ltd. which gathers oil in Alberta; Winnipeg Pipe Line Co., Ltd. which has a 77 mile trunk line from Gretna Manitoba to Winnipeg; Sarnia product line which consists of 235 miles from Sarnia to Toronto. Imperial Oil also has minority interest in Trans Mountain Pipe Line which completed in 1953 a line from Edmonton to Vancouver; Interprovincial Pipe Line Co. which operates a line from Edmonton to Sarnia, Peace River Oil Pipe Line Co., Ltd. operates a gathering system in Sturgeon Lake area of Alberta and 107 mile trunk line to Trans Mountain station at Edson, Alta.; West-spur Pipe Line Co. operates a 109 mile trunk line connecting southeastern Saskatchewan fields with the Interprovincial line.

In Colombia, South America, Andian National Corp., Ltd., owned 670 miles of crude oil pipe line from De Mares fields to Barrancabermeja refinery and to seaboard terminal near Cartagena. Contract expires Oct. 1, 1973.

In Venezuela, Creole Petroleum Corp. has interest in 800 miles of trunk line pipe including a 143 mile line from Lake Maracaibo to Amuay Bay.

Marine Transportation: At Dec. 31, 1959, subsidiaries owned 185 tankers totaling 3,300,000 dwt. Of these 34 vessels (775,000 dwt.), sail under American flag. Remainder are owned by foreign affiliates and operate under respective national flags. Besides owned fleet, affiliates had 160 tankers under term charter. In addition, Standard-Vacuum Oil Co. owned 13 vessels aggregating 402,000 dwt.

Refining Department: Subsidiaries operate the refineries as follows:

Humble Oil & Refining Co.	
Bayonne, N. J.	Charleston, S. C.
Boway, N. J.	Humble, O. & R.
Everett, Mass.	Baytown, Tex.
Baton Rouge, La.	Carter Oil Co.
Baltimore, Md.	Billings, Mont.

Creole Petroleum Corp.	
Ioco, B. C.	Sarnia, Ont.
Calgary, Alta.	Sarnia, Ont.
Edmonton, Alta.	Montreal E. Que.
Regina, Sask.	Halifax, N. S.
Winnipeg, Man.	Norman Wells, N.W.T.

Amuay Bay	
Logo, O & T.	Caripito
Aruba, N.W.I.	Int'l Petroleum
	Talara, Peru

Note: In Apr., 1959 Esso Standard Oil Co., S. A. stated that it planned to construct a refinery to cost \$18-20,000,000 at Kingston, Jamaica, under agreement with Jamaican government. Plant will have 25,000 bbl. daily capacity when completed 2 years after site selection.

Western Hemisphere refinery operating statistics (in thousand bbls. daily):

Crude Oil Runs:	1959	1958	1957	1956
United States	861	749	760	827
Canada	289	269	267	275
Venezuela	364	308	321	275
Peru	42	43	43	42
Aruba, N.W.I.	412	399	412	439
Other	133	130	95	76

Total 2,101 1,898 1,898 1,934
end of 1959 were:

Petrochemicals: Company's revenue from petrochemical sales world-wide was \$256,000,000 in 1959.

Sales in the United States, are made primarily through Enjay Chemical Co. Such oil-derived products include plastics, resins, synthetic rubbers, fibers, and detergents.

Atlas Bucron tires, made of butyl rubber, were introduced in domestic market in summer of 1959. Butyl, which company developed and is currently producing, has been the principal rubber used in inner tubes for a number of years and, now, is also used as wire and cable insulation, hoses, and industrial belts. Sales increased by 35% in 1959, and manufacturing capacity is being expanded.

In May, 1960, opened a polypropylene plant at Baytown, Tex., with an annual capacity of 40,000,000 lbs. This new plastic is used to make fibers, films, pipe, and a variety of molded products.

Plants abroad, for which substantial capital outlays were made in 1959, now constitute more than a third of the company's total petrochemical investments. Major additions to capacity were made in Germany and France; a second project for Germany was announced; and Standard-Vacuum has begun construction of the first major petrochemical installation in Australia.

In 1959 research continued in the development of new plastics, synthetic rubbers, and basic organic chemicals. In addition to the polypropylene, processes were developed to manufacture chlorinated butyl and latex, two important additions to line of butyl rubbers, and to make a new family of resins called Butons, which are useful as surface coatings and in manufacture of pipes and structural forms.

Marketing Department: In connection with the sale of products in the various parts of the world in which subsidiaries do business, they own or lease from others and operate terminals, bulk plants, service stations, tank wagons and other equipment. Nearly all the 23,000 service stations owned or leased by subsidiaries in the United States are operated by others under lease. Subsidiaries sell products at wholesale and retail.

Note: For product sales on world-wide basis see Statistical Tabulation below.

The principal marketing subsidiaries of the company in Western Hemisphere at the end of 1959 were:

Subsidiary	Marketing in
Humble Oil & Refining Co.	United States
Esso Standard Div.	
Humble Div.	
Carter Div.	
Imperial Oil Co.	Canada
Imperial Oil Ltd.	
Brasileira de Petroleo S. A.	Brazil
Esso Standard Oil S. A.	West Indies and Central America.
Esso Standard Oil S. A. C.	Chile
Int'l Petroleum Co., Ltd.	Peru, Colombia & Ecuador
Creole Petroleum Corp.	Venezuela
Esso, S. A. Petrolera Argentina	Argentina
Esso Standard Oil Co. (Uruguay) S. A.	Uruguay

Operates in Wisconsin.

Operates in Ind., Ill., Ia., Mich., Wisc. and Ky.

The marketing subsidiaries obtain most of their petroleum products from their own refineries or from refineries of other subsidiaries. However, substantial quantities of such products are purchased from outsiders both in the United States and abroad.

Research: Principal research centers are located at Abingdon, England; Baton Rouge,

La.; Linden and Florham Park, N. J.; Tulsa, Okla.; Baytown, Tex.; and Sarnia, Ont. Over 3,970 were active in research work. Research expenditures were \$67,000,000 in 1959; \$62,000,000 in 1958; \$55,500,000 in 1957; \$44,000,000 in 1956 and \$35,200,000 in 1955.

Research activities are directed toward development of new or improved methods of finding, producing, and refining crude oil, the improvement of product performance and development of new products. About 25% of research costs are concerned with development of processes for production from petroleum of chemical intermediates and finished chemical products such as plastics and synthetic rubbers.

In 1959 long-range search for new products and processes was centralized in a new group in Esso Research and Engineering Co.

Esso Research continued work on high-energy solid propellants for rockets under an expanded, nonprofit contract with U. S. Department of Defense. Results include successful firings of laboratory-scale rocket motors powered by experimental fuels.

Other accomplishments included the development, for jet aircraft, of a fuel yielding more energy per gallon and of a lower cost synthetic lubricant giving better performance at high temperatures. Also developed were a lubricant for diesel locomotives that reduces engine wear and two engine-cleaning additives for motor oils.

See also "Petrochemicals" above. **Miscellaneous:** Gilbert & Barker Mfg. Co. owns a plant at West Springfield, Mass., for manufacture of equipment for dispensing and storing oil and gasoline, of oil heating and air conditioning equipment, and of miscellaneous articles.

Subsidiaries and certain companies in which company has investments are engaged in licensing of various patent rights relating directly or indirectly to oil business and in the manufacture of general and special lines of chemical products made from by-products of the petroleum industry.

EASTERN HEMISPHERE OPERATIONS

(For production statistics, etc. see below).

Europe:

In the United Kingdom, Esso Petroleum Co. Ltd., the Fawley refinery capacity was raised to 220,000 barrels daily. Manufacture of petrochemicals was being expanded through the addition of a new plant. Chief among products to be manufactured are butadiene and ethylene, which will supply basic chemicals for the manufacture of synthetic rubber and plastics by other, nonaffiliates now building facilities near the refinery.

Construction began in 1958 on a new refinery at Milford Haven, on deep water on the coast of Wales.

In 1959 a 40,000 bbl. daily refinery at Whitegate, Ireland went on stream.

In France Esso Rep. a producing, affiliate of Esso Standard S.A.F. continued development of its Parentis and Cazaux fields. In 1959, a 32,000 bbl. daily refinery in the Bordeaux area went on stream.

West German affiliate, Esso A. G., in 1958 placed in operation 68,500 bbl. daily refinery at Cologne. Also a petrochemical plant is to be built at this site. This affiliate also has a refinery at Hamburg with a capacity of 50,000 bbls. daily. A refinery is to be built at Karlsruhe. In 1958 Nord-West Oelleitung GmbH in which Esso A.G. has a 47% interest, completed a 245 mile crude oil pipeline from Wilhelmshaven to Cologne. Company's 50% owned affiliate Gewerkschaft Brigitta owned producing fields in Oldenburg.

Dutch affiliate Esso-Nederland N. V. is a new refinery in Rotterdam with a capacity of 95,000 bbls. daily, to go on stream in 1960. N. V. Nederlandsche Aardolie Mij. a 50% owned affiliate produces oil in the Netherlands.

In Italy Stanic-Industria Petroliera, S.P.A., a 50% owned refining company has refineries at Bari and Leghorn. Esso Standard Italiana expanded its marketing activities.

Another newly formed affiliate, Esso Standard (Libya) Inc., intensified search for oil in Libya.

In Belgium, company's 100% owned affiliate Esso Standard Refinery had a refinery at Antwerp which was placed in operation in 1954 and processed 35,000 bbls. daily in 1957.

In Norway, A/S Esso-Raffineriet, Norge (organized in 1957) a new 40,000 bbls. refinery about 60 miles south of Oslo is scheduled to go on stream in 1960. When completed, it will not only supply the needs of A/S Norske Esso but will also furnish products to Svensko Esso A/B, in Sweden.

Search for oil continued in Turkey. In 1959, Esso Standard (Libya) Inc. com-

pleted a well at Zelten, a 100 miles from Mediterranean coast, tested at 17,500 bbls. a day. Subsequent drillings indicated this to be a major find as a result a pipeline to coast and a tanker loading terminal are being planned. Company also acquired a half interest in three large concessions in Libya held by other companies. Three discoveries have already been made on these properties, which Esso Sirte Inc. will operate.

Elsewhere in Africa, company is conducting exploration on concessions held jointly with two French participants in Algeria, and exploration continues on a concession held in Portuguese Guinea.

In 1959, company acquired exploration rights on 800,000 acres in Spain and has applied for exploration rights on 1,000,000 acres in Greece.

Middle East: On Dec. 2, 1948, Jersey acquired a 30% stock interest in Arabian American Oil Co. (Aramco). Remaining interest is held 30% by Standard Oil Co. of Calif. and Texas Co. and 10% by Socony Vacuum Oil Co. Company has extensive concessions in Saudi Arabia and a refinery at Ras Tanura.

In Saudi Arabia Aramco constructed in 1958, a large-scale gas injection plant at its Ain Dar field, and development drilling to delineate new Khurais field and new offshore Manifa field was continued. At Ras Tanura refinery new alkylating facilities for production of aviation gasoline were under construction.

	Crude Oil Production	Refinery Runs
1959-----	1,095,400	174,300
1958-----	1,015,000	168,000
1957-----	992,000	193,000
1956-----	986,000	199,000
1955-----	965,000	203,000
1954-----	953,000	220,000

Trans-Arabian Pipe Line Co. completed its 1,067-mile pipeline in Saudi Arabia in Dec. 1950. Operation of the TAPLine system began Dec. 2, 1950. Deliveries at terminal at Sidon in eastern Mediterranean totaled (bbls. daily): 1959, 338,000; 1958, 368,000; 1957, 348,000; 1956, 340,000; 1955, 322,000; 1954, 318,000; 1953, 308,000.

In 1957, Company added power to main stations and built remotely controlled booster stations which raised its capacity from 320,000 to 420,000 bbls. a day. This was part of a project to raise capacity to 460,000 bbls. which was completed in 1958.

Iraq Petroleum Co. Ltd., and its associates, in which company has an approximately 12% interest, had no interruptions to production and transportation of oil in 1958 despite political disturbances. The pipeline which was blown up during Suez crisis was restored to full previous capacity by middle of 1958. The Basrah Petroleum Co. Ltd., in Iraq, prepared to construct a new island loading terminal for large tankers in Persian Gulf, in conjunction with expansion of producing facilities in Rumaila field.

Far East: Standard-Vacuum Oil Co. (50% owned) operates from the Philippines to East Africa. Crude production averaged: 84,000 (1958, 77,000; 1957, 65,000; 1956, 66,000; 1955, 72,000; 1954, 69,300) barrels a day in 1959. Most of this was from fields in Sumatra. Is also exploring in India, Pakistan, Philippines and Australia. A 10,300-square-mile concession was obtained in Somalia, East Africa, where it began to explore in 1958.

Wholly-owned refineries are located in Indonesia, Australia, South Africa and India and 2 refineries in Japan in which company has a majority interest processed 207,000 bbls. a day in 1958. The largest refinery is at Palembang, in Sumatra. Subsidiary plans to invest \$35,700,000 in Melbourne's proposed petrochemical industry and \$33,600,000 in a refinery near Adelaide, bringing total Australian investment to \$229,600,000 by 1962.

At Dec. 31, 1959, Stanvac owned tankers with a deadweight tonnage of 402,000 tons.

Consolidated Earnings, years to Dec. 31 (in \$1000) of Stanvac:

	Gross Oper. rev.	Net Income	Div. Paid
1956-----	856,000	32,070	14,000
1957-----	946,000	40,900	13,000
1958-----	958,000	26,716	9,000
1959-----	1,024,550	28,256	10,000

Consolidated net assets, Dec. 31, 1959, \$456,648,000.

Iran: Company, together with Socony Mobil Oil Co., Inc., Standard Oil Co. (N. J.), Standard Oil Co. of Cal., Texas Co., Gulf Oil Corp., Anglo-Iranian Oil Co. (now British Petroleum Co., Ltd.), Royal Dutch Shell and Compagnie Francaise des Petroles, formed a consortium to restore Iranian oil to world commerce. Agreements, to run for 40 years

were approved by Iranian parliament in Oct., 1954.

Consortium members have set up two companies under the laws of the Netherlands: one to explore for and produce crude oil in Iran within the area covered by the agreement; the other to operate the Abadan refinery. The two companies exercise managerial controls necessary to ensure successful operation. The National Iranian Oil Co. (owned by Iranian Government) has sole responsibility for all marketing within Iran and for producing and refining operations outside the area of the agreement. Iran is to receive one-half of net profits of the consortium.

A British company called Iranian Oil Participants Ltd., was formed which holds the shares of the two Netherlands companies. Each consortium member subscribed to shares in this company equivalent to its interest under the applicable agreements. British Petroleum holds 40% interest, the American firms share 40%, Royal Dutch Shell, 14% and Compagnie Francaise des Petroles, 6%. Each member takes its oil at the border of Iran and markets it independently.

In Apr., 1955, the 5 American companies referred to above reduced their interest from 40% to 35% by turning over a 5% interest to Iricon Agency, Ltd. organized to administer interests of Standard Oil Co. (Ohio), Atlantic Refining Co., Hancock Oil Co., Pacific Western Oil Corp., Richfield Oil Corp., Signal Oil & Gas Co., Tide Water Associated Oil Co., American Independent Oil Co. and San Jacinto Petroleum Corp.

Production in Iran in 1959 continued to rise, with an averaged 923,000 bbls. a day (1958, 820,000).

CAPITAL EXPENDITURES

Of the total 1959 expenditures, those for additions to property, plant and equipment amounted to \$729,146,000 distributed as follows (in thousands of dollars):

	U. S.	Foreign	Total
Producing -----	137,895	78,361	266,256
Refining -----	50,458	120,953	181,411
Marketing -----	46,764	102,830	149,594
Transportation -----	18,487	97,567	116,054
Other -----	11,406	4,425	15,831

Total ----- 315,010 414,136 729,146

In addition to the expenditures capitalized, other amounts spent in the search for oil during 1959 by consolidated companies totaled \$197,203,000; (1958, \$212,536,000; 1957, 246,000,000).

MANAGEMENT

Officers

L. O. Welch, Chairman
M. J. Rathbone, Pres. & Chief Exec. Off.
L. W. Elliott, Exec. Vice-President
D. A. Shepard, Exec. Vice-President
E. E. Soubry, Exec. Vice-President
S. P. Coleman, Vice-President
M. W. Boyer, Vice-Pres.—Invest.
M. L. Haider, Vice-Pres.—Lat. Amer.
P. T. Lamont, Vice-Pres.—Eur. & Med.
W. R. Stott, Vice-Pres.—Eur. & Med.
H. W. Page, Vice-Pres.—Middle East
E. G. Collado, Treasurer
A. O. Savage, Comptroller
J. O. Larson, Secretary

Directors

M. W. Boyer, New York
C. L. Burrill
S. P. Coleman, New York
E. G. Collado
L. W. Elliott, New York
H. W. Fisher
M. L. Haider
P. T. Lamont, New York
H. W. Page, New York
M. J. Rathbone, New York
D. A. Shepard, New York
E. E. Soubry, New York
W. R. Stott
L. D. Welch, New York
J. R. White
M. A. Wright

General Counsel: T. E. Monaghan, New York.

Auditor: Price Waterhouse & Co.

Annual Meeting: Last Wednesday in May.

No. of Stockholders: Feb. 8, 1960, 591,179.

General Office: 30 Rockefeller Plaza, N. Y.

Payrolls and Employees: Wages

	Employees	Sal. & benef.
1959-----	146,000	\$969,000,000
1958-----	154,000	953,000,000
1957-----	160,000	993,000,000
1956-----	158,000	906,000,000
1955-----	153,000	839,000,000
1954-----	155,000	803,900,000
1953-----	156,000	778,600,000

Consolidated, including European and North Africa affiliates.

COMPARATIVE OPERATING STATISTICS, YEARS ENDED DEC. 31

(Consolidated and non-consolidated companies)

	1959	1958	1957	1956	1955	1954	1953
Gross Production (Barrels per day)							
United States -----	507,000	472,000	538,000	546,000	520,000	484,000	516,000
Canada -----	96,000	88,000	112,000	122,000	110,000	98,000	92,000
Latin America -----	1,259,000	1,219,000	1,289,000	1,208,000	1,094,000	932,000	899,000
Total Western Hemisphere -----	1,862,000	1,779,000	1,939,000	1,876,000	1,724,000	1,514,000	1,507,000
Europe & North Africa -----	45,000	42,000	42,000	33,000	24,000	14,000	10,000
Middle East & Far East -----	557,000	508,000	451,000	457,000	437,000	405,000	361,000
Total World-wide -----	2,464,000	2,329,000	2,432,000	2,366,000	2,185,000	1,933,000	1,878,000