State Petroleum Enterprises and the International Oil Industry:

The Case of Trinidad and Tobago

Submitted by

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SUMMARY

British and US oil companies set up the world's largest oil refinery transhipment complex in the Caribbean after the Suez Crisis and a technological revolution in oil tanker design in 1956. Trinidad and Tobago became one of the world's largest oil refinery and transhipment centres. In 1969 the British oil companies began to withdraw their investments and requested the nationalisation of their assets.

In 1985 the US companies withdrew their investments in response to the US government's deregulation of the domestic oil industry and financial incentives to bring their investments back home. Requested nationalisation led to the state-ownership of the oil sector.

The government of Trinidad set up state-owned petrochemical and iron and steel industries, with some of the world's most sophisticated technology, to utilise the country's large natural gas reserves. But by 1988 state capitalism had failed to provide the expected economic and social benefits, despite the drain on limited financial reserves and massive foreign loans. The government's reliance on the oil sector as the `prime mover' of the economy had caused sectoral and trade imbalance, high inflation, increased unemployment, currency instability, debt crisis and political instability which culminated in an attempted coup in July 1990.

The root cause of the failure of state capitalism was

the governments' rush to industrialise and the structure of the state petroleum enterprises. The lack of accountability and responsibility of top management and government interference led to poorly run, unprofitable industries in which government waste and corruption were common.

STATEMENT OF AUTHORSHIP

Except where reference is made in the text of the thesis, this thesis contains no material published elsewhere or extracted in whole or in part from a thesis by which I have qualified for or been awarded another degree or diploma.

No other person's work has been used without due acknowledgement in the main text of the thesis.

This thesis has not been submitted for the award of any degree or diploma in any other tertiary institution.

Graham E.L. Holton

10 August 1994.

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Glossary

Bunkering Station: The bunker is the space allocated to hold fuel. A bunkering station is the terminal where ships are supplied with fuel and lubricants.

Catalytic Cracker: This is the process which breaks down, or cracks, heavy crude oil into lighter products such as gasoline.

Chapter 11: In the United States a company can file for Chapter 11 to allow it time to pay off its creditors, before liquidators are called in.

C.I.F.: Cost includes freight. See f.o.b.

Development or Production Well: is drilled in a proven field to produce oil and gas.

Downstream/Upstream: The oil industry is seen as a stream. The upstream is the oil exploration and production operations. The pipelines and shipping are the midstream. The downstream activities are refining and marketing. When an oil company controls both upstream and downstream activities, it is fully integrated.

Dry Hole: A well which is drilled without signs of oil or gas.

DWT: Dead Weight Tons is the weight of the ship out of water.

Feedstock: Is the crude oil or partially refined oils which are refined to produce petroleum products.

F.O.B.: Free on board, the price does not include the cost of transportation. See c.i.f.

Fractions: Constituents of crude oil.

Fully Integrated Oil Company: Controls upstream and downstream activities in the oil industry.

Gasoline: Is the US term for petrol.

Heavy Oils: Long-chained hydrocarbons.

Hydrocarbons: All oils and natural gases consist of hydrogen and carbon molecules.

Light Oils: Small-chained hydrocarbons.

Majors and Independents: The fully integrated oil companies are referred to as the majors. All other oil companies are independents.

Nameplate Capacity: All refineries have a theoretical limit to how much oil can be refined during a year. This upper limit is called the nameplate capacity. Refineries usually operate at 85 per cent of this capacity.

Octane rating: The knocking rating of fuel oil. Petrol engines of compression ratios of 9 to 1 require 100 octane fuel.

Oil and Gas Reserves: Reserves are calculated from production tests and is the volume of oil that can be withdrawn from a field during its production life.

Oil and Gas Reservoir: Oil and natural gas are produced from porous sandstone or limestone at depths usually two to ten kilometres below the surface of the Earth.

Oil and Gas Production: Oil and natural gas are brought to the surface by the built-up pressure in the reservoir and without the aid of pumps. This is called primary production. If pumping is required because the pressure is too low, it is referred to as secondary production.

Overcapacity: If the supply of crude oil or petroleum products exceeds market demand, there is an overcapacity.

Petroleum: The generic term for natural gas, condensates, oils and bitumen, i.e., for hydrocarbons.

Prorationing: This policy was introduced in the United States in 1934 to eliminate excess oil production by a coordinated state control of all oil production.

Residual Fuel Oil: The heavy residue left after kerosene and gasoline are extracted. It is used as a cheap fuel for shipping and for heating.

Refinery Transhipment Complex: A complex in which crude oil is shipped in, unloaded, refined and then loaded onto shallower-draught tankers for the oil consuming countries.

Secondary Recovery: Steam or water is forced into a reservoir to flush out the remaining recoverable oil.

Seven Sisters: Term used for the world's largest oil companies in the 1950s, Exxon, Shell, BP, Texaco, Gulf, Mobil and Chevron.

Shut-In: Production at a well is shut-in or stopped by a series of valves.

Shut-Down: A refinery is shut-down by stopping the feedstock from entering the system.

Stripper Production: Wells with thirty barrels per day or less oil production.

Throughput: The volume of oil that is refined. It is less than the input because of losses during refining.

Currency Exchange Rates

Austrian Schilling

1993	ASch11.5 = US$1.00

British Pound Sterling

1930	£ = US$4.86
1940	£ = US$3.83
1950	£ = US$2.80
1960	£ = US$2.80
1970	£ = US$2.40
1980	£ = US$2.32
1992	£ = US$1.70

Canadian Dollar

1986	Can$1.40 = US$1.00
1987	Can$1.38 = US$1.00
1988	Can$1.26 = US$1.00
1989	Can$1.19 = US$1.00
1990	Can$1.16 = US$1.00
1991	Can$1.16 = US$1.00
1992	Can$1.18 = US$1.00

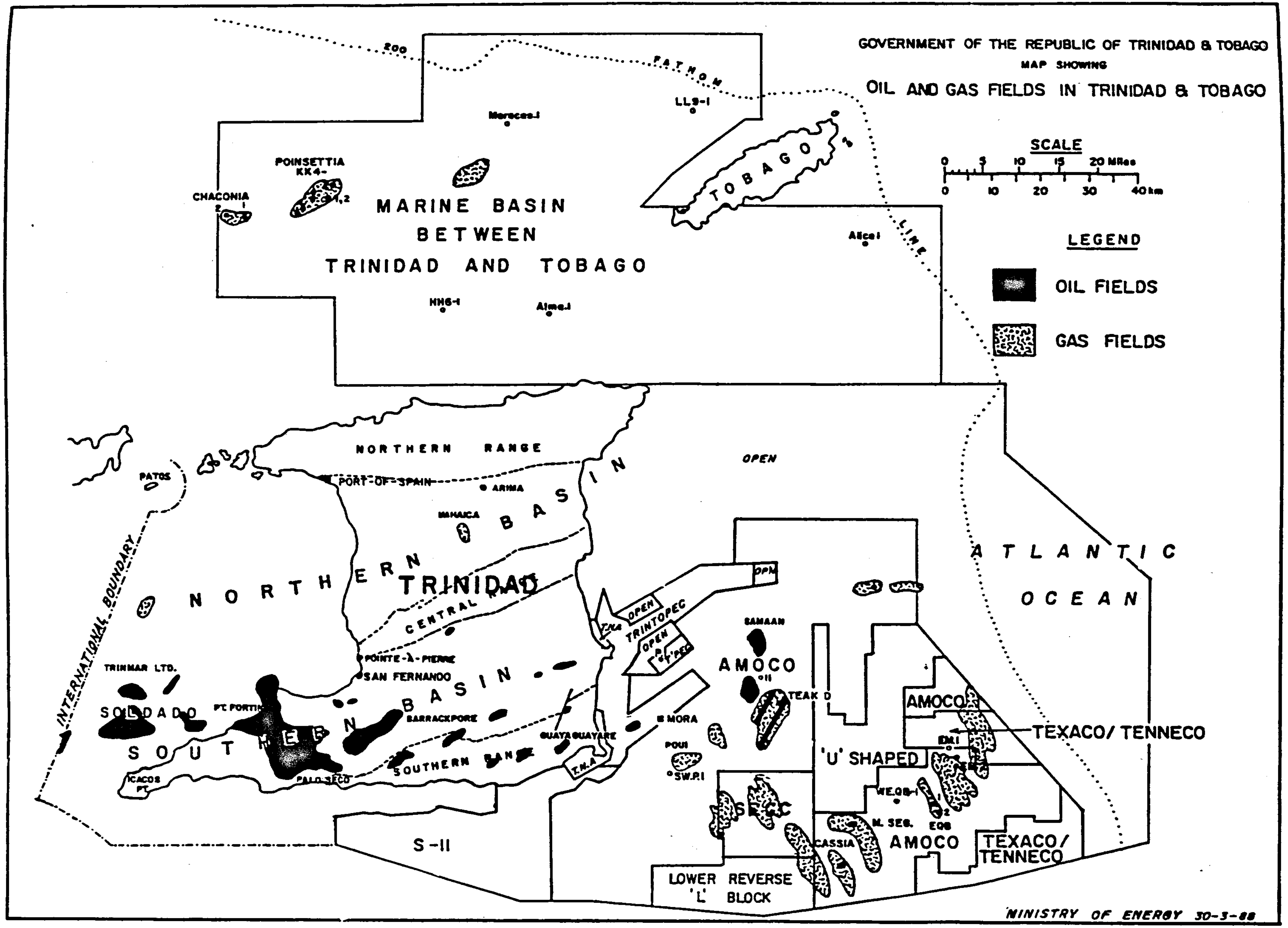
Trinidad Dollar

Trinidad's currency changed in 1966 from West Indian dollars (WI$) to Trinidad and Tobago dollars (TT$).

1959	WI$1.71 = US$1.00
1967	TT$1.74 = US$1.00
1968	TT$2.00 = US$1.00
1971	TT$1.98 = US$1.00
1972	TT$1.92 = US$1.00
1973	TT$1.96 = US$1.00
1974	TT$2.05 = US$1.00
1975	TT$2.17 = US$1.00
1976	TT$2.44 = US$1.00
1977	TT$2.40 = US$1.00
1986	TT$3.60 = US$1.00
1988	TT$4.25 = US$1.00

Unit Conversions

Metric	Imperial
1 metre	3.28 feet
1 kilometre	0.62 mile
	0.54 nautical mile
1 square metre	10.7 square feet
1 square kilometre	0.39 square mile
0.004 square kilometre	1 acre
1 cubic metre	35.3 cubic feet
0.158 cubic metre	1 barrel (35 imperial gallons)
1 tonne	2,204.6 pounds
0.907 tonne	1 short ton (2,000 lbs)
0.984 tonne	1 long ton (2,240 lbs)


GOVERNMENT OF THE REPUBLIC OF TRINIDAD & TOBAGO
MAP SHOWING
OIL AND GAS FIELDS IN TRINIDAD & TOBAGO
SCALE
0 5 10 15 20 Miles
0 10 20 30 40 km
LEGEND
OIL FIELDS
GAS FIELDS
200 FATHOM LINE
MARINE BASIN BETWEEN TRINIDAD AND TOBAGO
TOBAGO
CHACONIA
POINSETTIA
KK4-
LL9-1
HH6-1
NORTHERN RANGE
PORT-OF-SPAIN
ARIMA
NORTHERN BASIN
TRINIDAD
CENTRAL RANGE
POINTE-À-PIERRE
SAN FERNANDO
SOUTHERN BASIN
SOUTHERN RANGE
BARRACKPORE
GUAYAGUAYARE
PALO SECO
PT. FORTIN
ICACOS PT.
SOLDADO
TRINMAR LTD.
PATOS
INTERNATIONAL BOUNDARY
S-II
OPEN
TRINTOPEC
SAMAAN
AMOCO
TEAK
MORA
POUI
SW.P.I
CASSIA
'U' SHAPED
AMOCO
TEXACO/ TENNECO
TEXACO/ TENNECO
LOWER REVERSE 'L' BLOCK
ATLANTIC OCEAN
MINISTRY OF ENERGY 30-3-88