

# Can the Petroleum Fund Exorcise the Resource Curse from Timor-Leste?

By Charles Scheiner, 28 May 2014 <sup>1</sup>

## Abstract

Oil and gas exports provide about 95% of state revenues and three-fourths of GDP, making Timor-Leste one of the most petroleum-dependent countries in the world. Although this has fuelled 'double-digit GDP growth' in the short term, poverty and inequality are increasing. Current development plans are unlikely to rescue Timor-Leste's people from the 'resource curse' inflicted by its rentier economy, which distorts planning, governance, decision-making and politics, leading to neglect of non-petroleum investments, especially agriculture and human resources.

Income from exporting non-renewable petroleum wealth is channelled through a Petroleum Fund which contains US\$15 billion. Although Timor-Leste's currently active oil and gas fields will be dry by 2020, many believe that earnings from Petroleum Fund investments will continue to pay for state activities. Unfortunately, La'o Hamutuk's model shows that the Petroleum Fund may be empty within five years after that.

The prospect that the Petroleum Fund could be gone in a decade underscores the urgency to develop Timor-Leste's non-oil economy, increase domestic revenue and use public funds wisely. The Petroleum Fund may have created an illusion of economic security that enabled postponing difficult choices and challenging tasks.

Oil and gas comprised 77% of Timor-Leste's GDP in 2011 (RDTL DGS 2013) and provided more than 96% of state revenues in 2013.<sup>2</sup> Income from exporting non-renewable petroleum wealth is channelled through the Petroleum Fund, which contains US\$15 billion. People expect the Fund to finance state activities after the oil and gas fields are exhausted, which could happen within six years, but the Petroleum Fund may be empty by 2025. Timor-Leste has about a decade to use its finite oil resources to underpin long-term prosperity and development.

## Oil swamps the economy.

Petroleum dependency does not come from vast oil and gas reserves, but from a miniscule non-petroleum economy which scarcely existed when oil exploration started. Timor-Leste relies on its petroleum exports more than every nation except South Sudan, Libya and perhaps Equatorial Guinea.

Even though 23% of Timor-Leste's economy is 'non-oil,' about half of this is generated by state spending for purchases and infrastructure construction, the bulk of which was paid for with oil money. When the wells dry up, this will also end.

**Table 1: Gross Domestic Product in 2011**

(million USD)

<b>Total Gross Domestic Product (GDP)</b>	<b>\$4,525</b>	
GDP from Petroleum Sector	\$3,478	77%
Non-oil GDP	\$1,047	23%
Of which: Productive GDP (agriculture and manufacturing)	\$179	4%

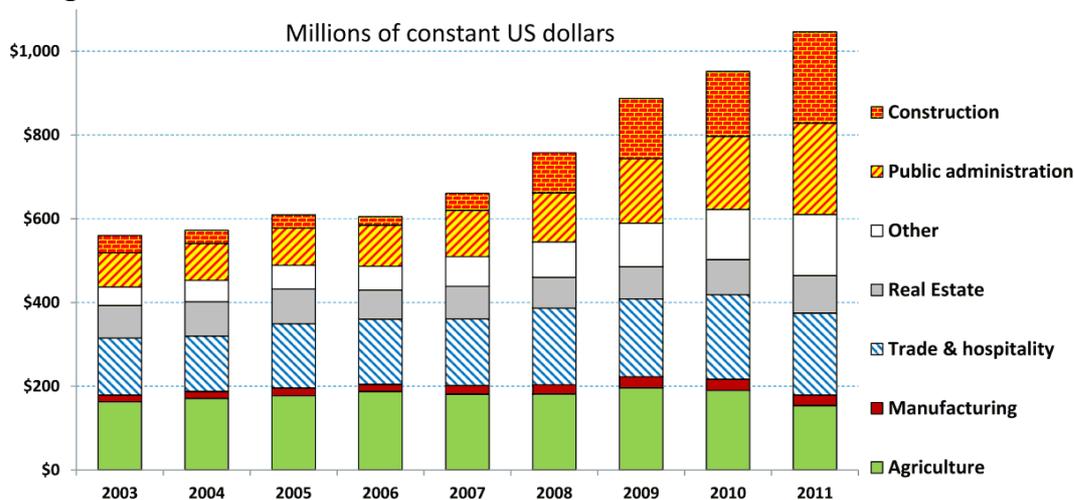
Source: RDTL DGS 2013

<sup>1</sup> The author is a researcher at La'o Hamutuk (The Timor-Leste Institute for Development Monitoring and Analysis), Dili, Timor-Leste. Telephone: +670-332-1040. Email: [peacefulsystems@gmail.com](mailto:peacefulsystems@gmail.com). Website: <http://www.laohamutuk.org>. An earlier version of this paper was presented at the ANU Timor-Leste Update conference in Canberra in November 2013, and a revised, later version will be published in the forthcoming edited book from that conference.

<sup>2</sup> During 2013 Timor-Leste received USD \$3,050 million from oil and gas revenues and \$865m from investing the Petroleum Fund, including unrealized stock price changes (Central Bank of Timor-Leste 2014). Non-oil state income totaled \$146m, of which a significant portion was paid by the state to itself (RDTL MoF 2014).

Government officials often claim that the non-oil GDP is growing at ‘double-digit rates,’ (RDTL Prime Minister 2014, 3; La’o Hamutuk 2014b; Global-Insight 2014, 6) but virtually all of the growth reflects state spending. The productive parts of the economy – agriculture and manufacturing – are only 4% of total GDP, and their value (in inflation-corrected dollars, but not adjusted for population or GDP growth) was lower in 2011 than in any year since Timor-Leste restored its independence in 2002 (RDTL DGS 2013).

**Figure 1: Sectorial contributions to Timor-Leste’s ‘non-oil’ GDP**



Graphic by La’o Hamutuk based on RDTL General Directorate for Statistics ‘TL National Accounts 2000-2011’, May 2014

A lack of local production, combined with a surplus of cash (among state agencies and the small upper middle class), leads those with money to buy imported goods and overseas services (such as health care and education) rather than to spend in the domestic economy.

**Table 2: Balance of external trade in 2013**

(million USD)

<b>Goods</b>	<b>\$711</b>
Imports <sup>3</sup>	\$694 98%
Exports (excluding offshore oil and gas)	\$18 2%
<b>Services</b>	<b>\$672</b>
Imports	\$627 93%
Exports	\$45 7%
<b>Total trade deficit</b>	<b>\$1,258</b>

Sources: RDTL DGS 2014 (goods); Central Bank of TL 2014a (services)

Trade is even less diverse and more import-heavy than the numbers show. More than 90% of the exported goods are coffee, whose value fluctuates with the weather and the global market. A large part of the exported services are tickets on international airlines sold through travel agencies in Timor-Leste.

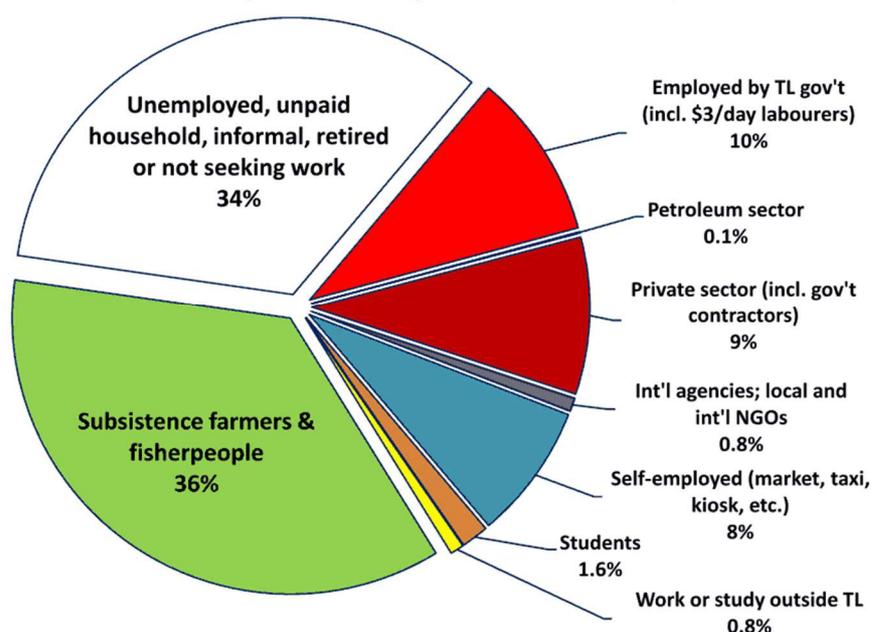
A ‘buy not build’ mindset results in extreme import dependency. More than half of state spending immediately goes abroad. Most people have little economic nationalism, preferring cheaper or more available imports over local products, even for basic necessities. Chickens come from Brazil, rice from Vietnam, eggs and beer from Singapore, fruit juice from Cyprus, onions from Holland, garlic from China, milk from Australia... In 2013, more than \$180 million went to Indonesian companies for goods ranging from water to candles to cigarettes to instant noodles to sugary drinks to canned fish. When the oil money is gone, foreign suppliers will still expect to be paid.

<sup>3</sup> Recent Central Bank trade reports erroneously include U.S. dollar notes as imports; they are not included here.

Counting people rather than dollars tells a different story. Timor-Leste is an agricultural country, and most households live mainly from subsistence farming.

The formal economy, both public and private, employs less than a third of the working-age population. Only 9% of the working-age population works for companies, and less than one-fiftieth of these work in the petroleum industry. As the IMF explains, ‘The oil and gas sector is the mainstay of the economy. ... However ... the sector directly accounts for virtually no on-shore employment. Its economic impact is entirely via government spending’ (IMF 2013).

**Figure 2: What do Timorese people do for work?**  
Population aged 15-64: 630,000



Sources: RDTL MoF 2014a; RDTL DGS 2013c; Mehran 2014; La'o Hamutuk estimates

### Oil fuels the state machinery.

As Table 3 shows, more than 90% of Timor-Leste's government income is from oil.

**Table 3: Sources of income in the 2014 General State Budget** (million USD)

<b>Projected revenues (to be deposited into the Petroleum Fund)</b>	<b>\$2,380</b>
Revenue from oil and gas exports	\$1,443 61%
Return on Petroleum Fund investments	\$770 32%
Non-petroleum (domestic) revenue sources	\$166 7%
<b>Budgeted sources for financing state expenditures</b>	<b>\$1,500</b>
Withdrawn from the Petroleum Fund during 2014	\$903 60%
Withdrawn from the Petroleum Fund before 2014 (balance carried over)	\$400 27%
Withdrawn from the Petroleum Fund after 2014 (borrowing to be repaid)	\$31 2%
Non-petroleum (domestic) revenues	\$166 11%

Source: RDTL MoF 2014a

About \$25 million of 'domestic revenues' comes from taxes paid by the state to itself (such as import taxes paid by companies working on state-financed projects). Another \$19 million is gross receipts to the highly-subsidized public electricity system, which recovers only 20% of its operational costs from users, covering its deficit and capital expenditures with oil money.

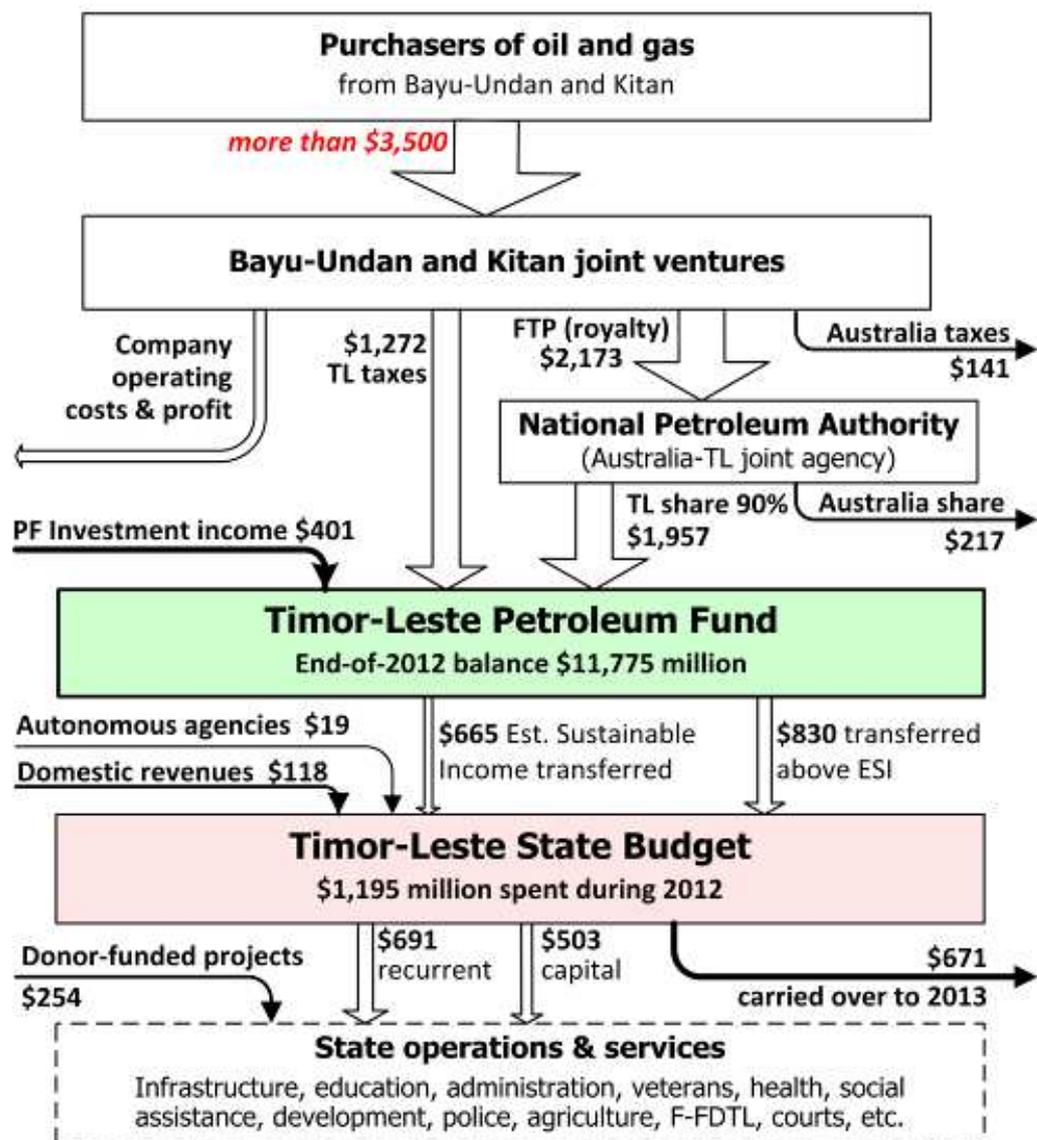
Other domestic revenues are neglected; a 2008 "tax reform" slashed import, wage and business taxes on the mistaken belief that this would encourage foreign investment and reduce prices to consumers. As a result, Timor-Leste now has the third-lowest Total Tax Rate in the world, one-fourth of the global average (World Bank/PWC 2013).

Timor-Leste's Petroleum Fund receives all oil and gas revenue, providing a buffer between this income and annual spending which allows the state budget to respond to public needs, rather than oil price and production fluctuations. The Fund is invested in bonds and stocks, on the theory that return from these investments will replace oil revenues after the fields run dry (La'o Hamutuk 2013).

Every year, the Ministry of Finance calculates an Estimated Sustainable Income (ESI) benchmark equal to 3% of the current Fund balance added to the net present value of expected future revenues from oil and gas fields with approved development plans.<sup>4</sup> The ESI informs Parliament's decision of how much to transfer from the Fund to the annual state budget, although it has been exceeded every year from 2008 to 2012, and will be again in 2014.

**Figure 3: Timor-Leste's Petroleum Revenue Streams**

Totals for 2012. Millions of U.S. dollars, estimates in *italics*.



**Note:** Figures for petroleum operations and income to the Petroleum Fund (numbers above the Petroleum Fund box) are amounts received in 2012, not including overdue and advance taxes. Figures for the state budget (numbers below the Petroleum Fund box) are amounts executed during 2012.

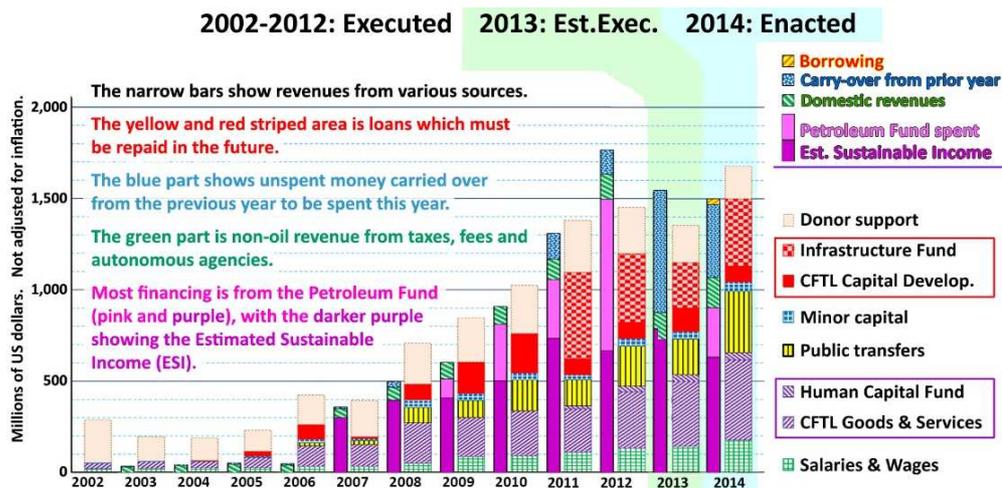
*Graphic by La'o Hamutuk based on information from RDTL BCTL and MoF Petroleum Fund reports, budget and transparency portal, Santos ASX filings, ANP website. May 2014*

The ESI was designed to spend more initially, investing in Timor-Leste's future and being supplemented by other revenues over time. If oil revenues and investment returns followed projections, ESI would be the same amount every year, regardless of population growth, local inflation (which has been 10% above global rates), improved state services or growing popular expectations. Nevertheless, its objective to continue to provide some income from investments after the oil is used up may not come to pass, due to transfers above ESI, rapid budget escalation, revision of the Petroleum Fund Law, less prudent price projections and reduced oil production and income.

<sup>4</sup> At present, this includes the Bayu-Undan and Kitan fields in the Joint Petroleum Development Area, from which Australia takes 10% of the revenue. The Greater Sunrise development plan has not yet been approved, so it is not part of the ESI.

The narrow bars in Figure 4 show actual state revenues through 2013 and budgeted revenues during 2014. The lowest two segments (solid pink and purple) represent withdrawals from the Petroleum Fund, while the upper segment (stippled blue) is the balance carried over from excess Petroleum Fund withdrawals in prior years. However, the blue (carryover) and yellow/red (debt) also come from the Petroleum Fund in the past and the future.

**Figure 4: State Revenues and Expenditures (including autonomous agencies)**



Graph by La'o Hamutuk based on RDTL Ministry of Finance data and projections. 23 January 2014

Large oil revenues began in 2006; they have been declining since 2012. Between 2008 and 2012, Timor-Leste state expenditures grew more than 25% annually, higher than every nation except Zimbabwe.

Expenditures are shown as the wider bar in Figure 4. The two upper (red) segments represent physical infrastructure. Infrastructure construction absorbed more than half of state expenditures while the electricity system was being built in 2011-2012 and still takes one-third of the budget. Although spending on large projects has lessened due to delays, it will resurge if current plans are implemented.

Spending on recurrent costs (salaries, goods, services, public grants) continues to increase about 20% per year, even as the total budget shrinks. Although health and education are gradually getting more funding, Timor-Leste still invests 40% less on these human resources than other well-managed developing countries. Most children born during the post-1999 'baby boom' are not getting decent nutrition or education. The future of Timor-Leste lies in these people, but they may be a lost generation or worse, a time-bomb.

**Figure 5: Allocation of the enacted 2014 State Budget (US \$1,500 million)**



Graphic by La'o Hamutuk based on enacted 2014 RDTL General State Budget. March 2014

Agriculture, which sustains the majority of Timorese households, gets only 2% of state spending, even lower than in 2013 (La'o Hamutuk 2014).

In mid-2013, Bayu-Undan operator Conoco-Phillips reduced its projection of future revenues by 49%, with production to end four years earlier than previously estimated (RDTL Ministry of Finance 2014a). Partly in response, for the first time in history, the Government withdrew less than the Parliamentary

limit (which had been set at ESI) from the Petroleum Fund.<sup>5</sup> For 2014, the Government proposed withdrawing \$903 million, well above the \$632 million ESI. La'o Hamutuk suggested to Parliament that this is unwarranted (La'o Hamutuk 2013b) and the Committee on Public Finances agreed (RDTL Parliament 2013), but the enacted budget reflected the Government's request.

### The resource curse has many faces.

Timor-Leste's economy and politics are typical of the 'resource curse' (Neves, 2013), a set of choices and outcomes that usually makes citizens of extractive-export-dependent countries worse off than people in countries with little oil or mineral wealth. The resource curse is not magic or metaphysical – it occurs in almost every impoverished country whose economy is dominated by the export of non-renewable resources, including Nigeria, Ecuador, the USSR, Gabon, Iraq, DRC, PNG and Nauru. Oil and gas exporters are the most vulnerable, due to the volatility of the international market, avarice of the petroleum industry, and the industrialized world's addiction to petroleum.

Some factors are nearly impossible for Timor-Leste to control, such as the ruthlessness of huge international oil companies, global and local environmental damage, and the capital-intensive, high-skill nature of the industry. Others, however, can be overcome – although it is rare to find political leaders in any country with the far-sightedness, wisdom and courage to make the right decisions.

Timor-Leste's oil and gas dependency is exacerbated by history and geography, including:

- **Small size.** A tiny fraction of Timor-Leste's 1.2 million people have had good education, entrepreneurial skills, or managerial experience.
- **Extreme poverty and underdevelopment.** Portugal did little to develop economic production or human resources, while Indonesia destroyed infrastructure and punished individual initiative.
- **Emergence from foreign rule.** Until 2002, leaders and citizens never lived under democratic self-government or rule of law. Administrative and legal structures must be built from scratch. Many civil servants learned bad habits while working for and/or resisting inefficient, illegal and corrupt Indonesian and Portuguese administrations.
- **Recovery from prolonged war.** Many people are traumatized. Repeated unpredictable, uncontrollable interruptions to people's lives has taught them not to plan for or invest in the future. Leaders who excelled at combatting foreign occupation lack the skills for peacetime, democratic, consultative governance. In other countries, war and conflict is often caused by struggles over oil or minerals, but Timor-Leste hopes that that phase of its history is over.
- **Self-interested neighbours.** Although both Australia and Indonesia claim to support the new nation, their thirst for oil and eagerness to avoid legal accountability sabotage their benevolence.

This poisonous combination makes it almost impossible to develop a sustainable, equitable economy. PowerPoints substitute for plans; the Strategic Development Plan 2011-2030 (RDTL 2011) is an enticing, impossible dream. Projects like the Tasi Mane south coast petroleum infrastructure project and the Special Economic and Social Market Zone in Oecusse fail to consider economic viability, competitive advantage or potential markets, while overstating employment and spin-off benefits. In search of showy quick solutions, planning neglects the unglamorous but essential tasks of alleviating poverty, replacing imports and working toward food sovereignty.

At the moment, the state has lots of money, but there are very few taxpayer-voters to insist that 'their' money be used prudently, honestly or thriftily. The elite and some constituencies proclaim their entitlement to public funds, a pattern set by 'buying peace' to neutralize possibly troublesome groups or

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<sup>5</sup> The 2013 budget authorized \$787 million to be withdrawn from the Fund, equal to the Estimated Sustainable Income, but the Government withdrew only \$730m because much more had been withdrawn during 2012 than the government could spend (La'o Hamutuk 2013a). Nevertheless, 2013 ended with \$634m in the Treasury account, more than triple the cushion the Government says it needs.

political opponents. Instead of the give-and-take which constrains state spending in 'normal' countries, the whims of politicians or promoters consume Timor-Leste's finite oil wealth.

Total life cycle costs of multi-year projects are concealed or ignored, while borrowing (sometimes concealed as Public-Private Partnerships) incurs hundreds of millions of dollars in debt to be repaid after the oil and gas is gone (La'o Hamutuk 2013c; La'o Hamutuk 2014d).

When a decision-maker has access to money, it seems like the solution to every problem. It's easier to buy a scholarship than to build a quality university -- the 2014 budget for overseas scholarships is 35% more than the appropriation for the National University, which educates four times as many students as will receive the scholarships. Similarly, the state pays for a few well-connected people to fly to overseas hospitals while most have no access to decent health care. Roads and bridges in the capital used by diplomats or VIP visitors are repaved frequently, while rural communities struggle with impassable lanes and rivers. Airport and highway construction could consume a billion dollars of oil money -- yet very few Timorese people will ever fly or own a car. Hundreds of millions more will build a container port which can handle an eight-fold increase in imports -- but without oil money, how can Timor-Leste pay for the imports or guarantee the investor's expected return?

More portentous, petroleum dominates decision-making about current and future plans, diverting attention and resources from sustainable, equitable, realizable development paths. Because oil is where the action and money are today, the most persuasive, creative and ambitious people choose to work in that sector, in regulatory agencies, corporations and the national oil company. They persuade budgeters to award millions of dollars for concept studies, 'pre-FEED' designs and promotional PowerPoints. When the resulting proposals are compared with those for agriculture, tourism or import-substituting manufacturing, the playing field is tilted.

Similarly, the best and brightest university students major in petroleum engineering, similar to the rent-seeking that led many in the West to become stockbrokers and lawyers during the bubble before the 2007 financial crisis (Stiglitz 2014, chapter 2). As a result, less glamorous but more necessary fields like civil engineering, education, business development, water supply, sanitation, nutrition and health care are deprived of both financial and human resources, with ominous future consequences.

### **This petro-state doesn't have much petrol.**

If Timor-Leste's oil reserves were as large as Brunei's or Saudi Arabia's, these problems could be drowned in dollars. Unfortunately, geology has not been that generous to this new nation. Even if the Greater Sunrise field is developed with an LNG plant in Timor-Leste and Australia taking only half of the upstream revenues, total expected oil and gas revenues will not even be enough to support one (current) dollar per person per day of public spending over the next four decades. This would be less than one-third of the current State Budget, which pays for a level of services that nobody would consider adequate for the long term. If the balance in the Petroleum Fund goes up and the stock market booms, additional revenue from investments could help a little, but recent patterns make this improbable (Scheiner, 2014).

Oil revenues peaked in 2012, and Timor-Leste has already received about 2/3 of its expected income from its two producing oil and gas fields. Kitan production will end in 2016 and Bayu-Undan by 2021 (RDTL MoF 2014; La'o Hamutuk 2014c). By comparison, Australia is richer in petroleum than Timor-Leste, with larger future potential. Indonesian reserves are smaller for its population, but they are being pumped more slowly than Timor-Leste's.

**Table 4: Oil and gas reserves in nearby countries**

	Timor-Leste 50% Sunrise	Timor-Leste no Sunrise	Australia 50% Sunrise	Australia no Sunrise	Indonesia	Brunei
Known oil and gas reserves per person	800 barrels	310 barrels	1,180 barrels	1,150 barrels	91 barrels	6,960 barrels
Likelihood of additional discoveries	Low (small area, explored for decades)		High (further offshore)		Moderate (large area)	Moderate (deeper water)
How long reserves will last at 2012 production rates	13.7 years	5.4 years	57.5 years	56.3 years	28.1 years	21.2 years

Sources: La'o Hamutuk estimates, Santos 2014 and ANP 2014 for Timor-Leste; BP 2013 for other countries

Unfortunately, petroleum officials continue to boast that Timor-Leste has large undiscovered oil and gas deposits. For example, today's newspaper quotes the president of the national oil company saying that they will keep pumping from Bayu-Undan after ConocoPhillips finds it unprofitable (*Timor Post* 2014).<sup>6</sup> During the discussion of a preliminary version of this paper at ANU in November 2013, National Petroleum Authority President Gualdino da Silva said '[Timor-Leste] is a proven petroliferous zone. It is also a new frontier; we need more production, we need more discoveries. How could one believe in a conclusion based only on the two production fields? The country is still in an early stage, in its infancy, of researching and discovering more oil and gas. It is too early to reach that conclusion' (ANU 2013).

Although anything is possible, the country's small and constrained land and sea area, geological structures, and 120-year history of oil exploration make significant additional reserves unlikely. The first Sunrise test well was drilled in 1974; Kitan is the only commercial field discovered after the flurry of exploration after the 1991 Timor Gap Treaty, and more than a dozen dry wells have been drilled since the occupation ended in 1999. During Timor-Leste's most recent offshore licensing round in 2006, no company which had previously explored the area submitted a bid.

### What does the future hold?

Timor-Leste does not have enough oil and gas to sustain the country for very long. If the non-oil economy hasn't developed when it runs dry in half a generation, many more Timorese people will join the swelling majority who live below the poverty line. When state revenues can no longer cover expenses, Timor-Leste will fall into austerity, with drastic implications for the state and its citizens.

Timor-Leste has insulated itself against some consequences of the resource curse by using an international currency; the U.S. dollar protects against runaway inflation and 'Dutch disease'. However, inflation in Timor-Leste has been far higher than in our trading partners, due to the lack of local productive capacity and the supply of dollars exceeding the supply of imports.

Combined with good planning, the Petroleum Fund could help support sustainability. Although documents and officials often refer to inter-generational equity, suggestions for more serious efforts to develop alternatives to petroleum (UNDP 2011; Scheiner 2011; La'o Hamutuk 2012; *Petroleum Economist* 2013) were rebuffed (RDTL Spokesperson 2011; RDTL Spokesperson 2013) until recently (RDTL MoF 2013c; RDTL MoF 2013d). Nevertheless, Timor-Leste's government continues to boast about its strong, growing, inclusive economy (Global Insight 2014), although it is unclear how many policy-makers believe their own advertising.

However, others are beginning to understand the urgency. After years of echoing the government's petroleum-dominated priorities, the World Bank highlighted the need for non-petroleum economic development in its 2013-2017 Country Partnership Strategy (World Bank 2013). When President Taur Matan Ruak promulgated the 2014 State Budget in early February, he wrote to Parliament:

*Once again, I am concerned about the excessive dependency of government revenue on the Petroleum Fund. I am absolutely convinced that it is urgent to correct this situation. ... I believe that it is necessary to adopt active policies to diversify economic development...* (RDTL President 2014).

<sup>6</sup> In 2007, Timor-Leste tried to continue oil production from the Elang-Kakatua field after ConocoPhillips decided it was no longer worth operating. They were unable to attract another company.

La'o Hamutuk and civil society have been urging this course for more than a decade (La'o Hamutuk 2002; La'o Hamutuk 2005a; Scheiner 2011; Scheiner 2013; FONGTIL 2013). In 2012, we began to estimate Timor-Leste's state revenues and expenditures based on current trends, external factors and anticipated policy choices (La'o Hamutuk 2012; La'o Hamutuk 2012a). The spreadsheet model is online and frequently updated based on new information and refined methodology, as part of an ongoing effort to encourage prudent, evidence-based planning and decision-making (Scheiner 2014).

The model uses an engineering approach, based on causality and Timor-Leste history, rather than correlations with other countries. It does not try to simulate the macro economy and therefore does not estimate GDP, inflation, poverty or trade. Rather, it projects how much the state will receive and spend, based on oil and gas receipts, investment returns, domestic revenues and policy decisions about recurrent spending, megaprojects, borrowing, Sunrise development and other factors. The model uses data and estimates from a variety of sources, including state budgets and executed expenditures (RDTL MOF 2013; RDTL MOF 2013a; RDTL MOF 2013b; RDTL MOF 2014; RDTL MOF 2014a), population projections (RDTL DGS 2013b), oil price projections (US EIA 2013) and La'o Hamutuk's calculations of oil and gas production and debt repayments based on published and unpublished information from oil companies and lenders. Detailed description of the model's outputs and suggestions of what should be cut after Timor-Leste runs out of money are beyond the scope of this paper.

Figure 6 shows the model's baseline scenario, based on 'best-guess' assumptions of what is likely to happen and too optimistic for prudent planning. It uses higher oil prices than the Ministry of Finance uses to calculate the ESI, and assumes a better return on Petroleum Fund investments than they earned in 2012-2013.

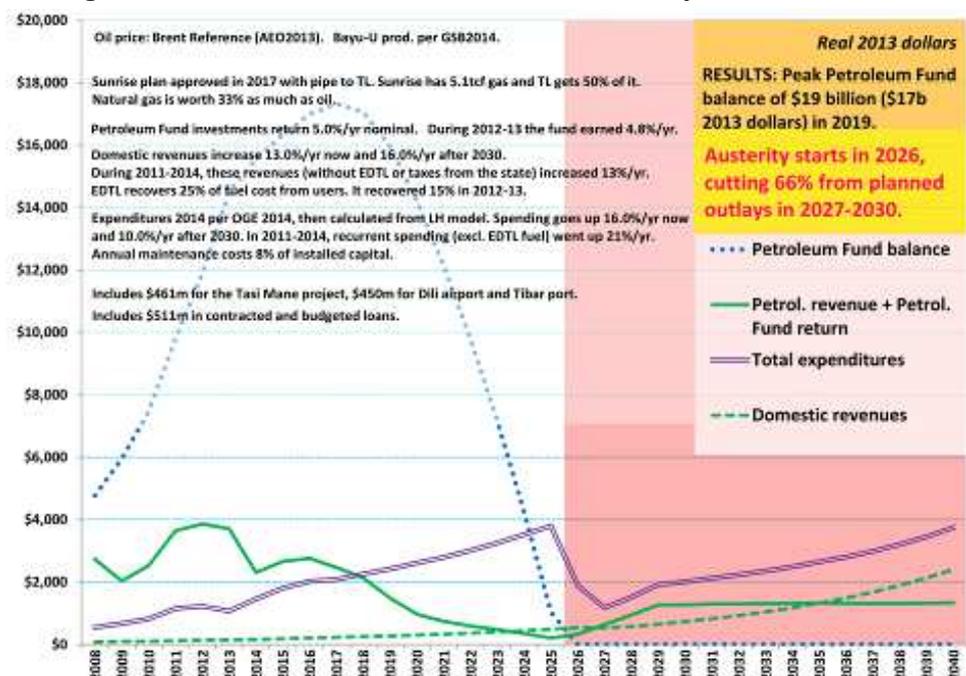
With these assumptions, spending exceeds oil and interest income in 2019, and the Petroleum Fund begins to shrink. By 2026, before today's infants finish secondary school, the Fund will be used up, and state spending will have to be slashed by two-thirds from desired levels, as shown by the red shaded background.

This scenario assumes that the Greater Sunrise project goes ahead soon with an LNG plant in Beacu, so austerity cuts are 'only' 66%. If the companies prevail and they build a floating LNG plant, austerity will be 70%, a little harsher. But if no Sunrise agreement is reached and the project remains stalled, Timor-Leste will have to cut 88% from 2026 on, closing even more schools, clinics, offices and police stations.

Changes in other assumptions can bring on bankruptcy and austerity up to three years earlier or seven years later. However, without a dramatic redirection of policy approaches, Timor-Leste's petroleum reserves and petroleum wealth will not be able to finance the state for more than 20 years, even if the country's wishes for Sunrise development, investment returns, and global oil market prices are granted.

Although limiting expenditure and increasing non-oil revenue could delay austerity for a few years, it is inevitable that geometrically growing budgets, increasing population and greater expectations will exhaust the country's finite petroleum wealth. This can only be avoided with a rapid, radical shift of

**Figure 6: Base Case scenario from Sustainability Model**



Source: Scheiner 2014.

direction, toward increasing local food production, reducing imports, cutting wasteful spending and cancelling unprofitable megaprojects. Timor-Leste must fortify its strongest resource – its people – by investing in education, nutrition, health care and rural water and sanitation. It must develop agricultural production, the sector which employs most of its people, to meet basic necessities and reduce the need for imports. Timorese people of all economic classes, genders, regions and generations will have to work together to defeat the resource curse, to survive and thrive by creating an equitable, sustainable economy.

The Timorese people proved their unity and persistence through their difficult, long struggle to achieve political sovereignty over the Indonesian occupation. Achieving economic sovereignty by overcoming the petroleum occupation may be even more difficult. It will require diverse approaches, building on Timor-Leste's strengths and prioritizing medium- and long-term sustainability. Economic justice must supersede subsidies for particular groups. Planning should be based on genuine benefits for the majority, not on slick presentations, impulsive decisions, flashy megaprojects or unbalanced decision making.

Timor-Leste has about seven years before its remaining petroleum wealth – the only ship which can take the nation away from poverty – will have sailed. If the nation has not built a solid foundation for its non-petroleum economy, the Petroleum Fund will have failed to avert the resource curse. Sadly, the Fund may have been a delusion of economic security that enabled Timor-Leste's officials, advisors and donors to delay hard choices and avoid challenging, difficult tasks.

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