



Workshop Working Paper
**Options for Savings and
Stabilization Funds¹**

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¹ Adapted from the forthcoming World Bank report *The Extractive Industries Sector: Essentials for Economists and Public Finance Professionals*. Vol. 2. Fiscal Management in Resource-Rich Countries

Many Resource-Rich Countries (RRCs) have established resource revenue funds in response to the challenges and complications that resource wealth poses to fiscal policy and asset management. Resource funds are a group of funds that form part of the wider set of government-operated investment funds known as Sovereign Wealth Funds (SWFs). SWFs make up a heterogeneous group of funds, with various objectives, asset accumulation and withdrawal mechanisms, and institutional features.

Resource funds can be broadly classified into three types according to their main objectives. The main types of funds in RRCs are stabilization funds, savings funds, and financing funds. Stabilization funds and savings funds typically have rigid rules (which can be contingent or non-contingent) for the accumulation and withdrawal of assets. Financing funds have flexible operational principles. A number of funds have separate spending authority from the budget.

Stabilization funds aim to reduce the short-term impact of volatile resource revenue on the budget and the economy and support fiscal discipline. Most of these funds have rigid price- or revenue-contingent deposit and withdrawal operational rules. Deposits and withdrawals depend on the realization of an outcome (resource price or revenue) relative to a specified trigger. In some cases, the entire "excess revenue" relative to the benchmark trigger is mandated to be deposited in the fund; in others, only a specified share, and similarly for allowed withdrawals. In some funds, limits are placed on the total accumulation of assets.

The operational objective of stabilization funds is to reduce the volatility and uncertainty of resource revenue flows to the budget. The reduced revenue volatility would, in turn, facilitate the decoupling of budget expenditure from changes in revenue flows and saving resources that can be used later when prices fall. When resource prices are "high", the expectation is that making deposits in the fund – and therefore making those resources unavailable to the budget – will help "discipline the budget" and contain spending. When prices are "low", the fund is expected to act as a damper (through the transfer of funds to the budget) to forestall unpredictable fiscal adjustments.

Stabilization funds do not reduce the revenue volatility and uncertainty faced by the public sector as a whole. The reduction of volatility and uncertainty of budget revenue is achieved by transferring volatility and uncertainty to the fund.

Two types of contingent mechanisms for the accumulation and withdrawal of assets are most frequently used.

- Rules contingent on resource prices or revenues that are pre-specified in advance (either fixed or set through a formula). Examples of current or earlier resource funds with these rules include Chile (copper stabilization fund until 2006), Russia, Sudan and Venezuela.
- Rules contingent on the difference between the price (revenue) set in the budget for the current year – which can be specified by formula or on an ad-hoc basis – and the actual price (revenue). Examples include Alberta (since 2004), Algeria, Ghana, Iran (until 2011), Libya, Mexico, Mongolia, Oman (since 1998), Qatar, and Trinidad and Tobago.

Certain accumulation rules for stabilization funds may turn them partly into savings funds. If the accumulation rule is set "conservatively" as a matter of strategy (i.e., with "low" price or revenue triggers for deposits into the fund), stabilization funds *de facto* also fulfil a "saving" role on an expectational basis, at least in terms of there being a significant probability of holding a growing amount of gross financial assets.

Savings funds aim to create a store of wealth for future generations. This would allow those generations to benefit from part of the revenues that are currently generated from the depletion of exhaustible resources.

Savings funds typically have rigid non-contingent operational rules. The rules require the deposit of a specified share of RRs, or of total revenues, into the fund. For example, the Kuwaiti Reserve Fund for Future Generations (FFG) requires the deposit of 10 percent of total budget revenue. Rules for the withdrawal of resources from these funds vary and, in some cases, are not clearly specified. The scope for withdrawals from the fund to finance the budget adds a stabilization element beyond the main saving objective.

Financing funds, in contrast to the funds discussed above, have flexible operational mechanisms aligned with overall fiscal balances. Their operational objective is to finance the budget: the fund accumulates budget surpluses and finances budget deficits. Operationally, the fund receives all resource

revenue, and finances the budget's nonresource deficit by way of a reverse transfer.

Therefore, unlike the funds discussed above, these funds do not try to “discipline” expenditure through the removal of resources from the budget. The flows in and out of the fund depend on resource revenue and policy decisions embodied in the nonresource fiscal stance. Moreover, these funds have no spending authority: all expenditure is on budget. They also provide an explicit and transparent link between fiscal policy and asset accumulation and address fungibility issues, because the mechanism rules out financing the accumulation of assets in the fund through borrowing or running down other assets. Only a handful of RRCs have financing funds: Chile, Norway and Timor Leste. Interestingly, these examples encompass a broad range of levels of development.

1. Selected international experience

The implementation of stabilization and savings funds with rigid rules has often been based at least partly on political economy considerations. There is frequently the expectation that the removal of “high” resource revenue (RR) relative to some benchmark, or of a share of such revenues from the budget, will stabilize and/or moderate public expenditure, thereby reducing discretion in fiscal policy, and encourage savings. It is important to note, however, that resource funds do not affect public spending directly except in very specific circumstances.

- At a **technical level**, if there are strong liquidity constraints, and if the fund rules are binding and they are observed, the requirement to place assets in the fund would force spending reductions or tax increases compared to the alternative without a fund. But if the government is running surpluses, removing some resources from the budget would not necessarily entail a need for reductions in expenditure even if there are liquidity constraints.
- In the absence of liquidity constraints, even if the government is not running a surplus, it can borrow or run down other financial assets to increase spending and make the required deposits in the fund because money is fungible (easily shifted between different uses). What is the advantage of putting money into a fund according to some arbitrary rule unrelated to optimal risk and liquidity management while borrowing at the same time and at higher cost? Alternatively, the government can simply ignore the fund rules.
- This would still leave open possible **political economy** arguments for rigid fund rules: even if the government is running a surplus or there are no liquidity constraints, rules that mandate deposits into a fund can influence the political process in the direction of moderating spending. The evidence suggests, however, that the political economy advantages of removing resources from the budget are often unclear, that when pressures are brought to bear the funds' rules can be changed, bypassed, temporarily suspended or ignored, and that the results seem to be very country-specific.
- On the other hand, rigid fund rules can have significant fiscal costs in terms of suboptimal asset and liability management (ALM). This will be discussed below.

In practice, tensions have frequently arisen between funds with rigid rules, fiscal policy, and asset and liability management. Fund rules prompted by possibly valid political economy concerns about excessive or inappropriate spending have often led to inconsistency and sometimes threatened the achievement of broader objectives. This has happened especially in situations of significant exogenous shocks, changes in policy priorities, mounting spending pressures, and conflicting objectives between the fund, fiscal policy, and asset management. The rules may not be appropriate for the specific circumstances.

Suboptimal fund rules can create dilemmas for policymakers. For example: the fund's accumulation rules may require that deposits be made to the fund; but if the budget is in deficit, the government has to borrow or run down other assets or cut spending to make the deposits, which may not be the best course of action. In some cases, fund rules that turned out not to be appropriate to the particular circumstances were complied with, but this led to inefficiencies and suboptimal results. In many cases, though, when significant conflicts between policy objectives arose, funds with rigid rules either had their rules modified frequently, suspended or ignored, or in some extreme cases the fund was eliminated.

Country evidence shows that it has been difficult to set trigger resource prices or revenues in contingent funds. It is very difficult to set average long-term prices as triggers with any degree of confidence, or to determine *ex-ante* whether a given shock will be transitory or long-lasting, which could lead to the unsustainability of the fund. Resource price volatility and shock persistence also imply that long

backward-looking moving average formulas to set triggers are likely to deviate markedly and during long periods from actual prices, testing the liquidity and robustness of the fund to changing environments.

A number of stabilization funds have undergone frequent changes in the trigger prices or in the revenue base for the calculation of deposits, often due to the tensions that arose between fund rules and fiscal policy. Changes to the rules have often been made in response to changes in international prices, expenditure pressures or shifting policy priorities (Algeria, Kazakhstan, Venezuela, Russia). In some cases the fund's assets ran out (Mexico, stabilization fund 2002).

Savings funds have also had changes in their operational rules. In the 1980s and 1990s the rules of funds in Alaska, Alberta, Oman, Papua New Guinea, and other countries were changed, in some cases several times, to accommodate exogenous changes or expenditure pressures. In more recent years, the rules of funds in Ecuador, Kazakhstan, and other countries were changed.

In view of the inconsistencies between fund rules and other policy objectives that can arise, some countries opted for not complying with the deposit rules or temporarily suspending their application. Examples include Alberta, Gabon, Iran, Sudan and Venezuela. And some countries, including Chad, Ecuador, Nigeria and Papua New Guinea, found their funds operationally or politically unworkable and abolished them.

Specific country experience can illustrate these issues in more detail:

- Venezuela was only able to deposit the resources required by its stabilization fund rule in certain years by issuing debt at higher interest rates than the returns on the fund's assets, given the overall stance of fiscal policies; this led to temporary suspensions of the operations of the fund.
- Algeria frequently made deposits into its fund while issuing debt that was serviced by the fund itself.
- Gabon made deposits into its savings fund with low returns while at the same time paying significantly higher interest rates on its public external debt.
- In Chad, Ecuador and Sudan, in contexts of extensive revenue earmarking and fragmentation of cashflow management, compliance with fund deposit rules took place at times while payment arrears were incurred.
- In Alaska, deposits were sometimes made into the fund, and dividends paid from the fund to the population (which over time came to be considered as entitlements), while the state was borrowing outside of the fund. Appendix 2 provides a discussion of the issues surrounding the direct distribution of RR to the population.

Stabilization funds with rigid rules aimed at stabilizing budget revenue have until recently been more resilient, but some new funds with formula-based trigger prices are facing difficulties. These funds can complicate asset and liability management. If revenues come higher than budgeted but the budget is in deficit, a paradoxical situation arises: having to borrow to make the required deposits into the fund, with associated financial costs. This happened in several countries, including recently in Ghana, Mongolia and Nigeria (see below). These funds can also provide incentives for the strategic setting of the resource price or revenue in the budget if those are not set by formula. Setting a "high" price in the budget raises the probability that resources can be withdrawn from the fund during budget execution. More broadly, expenditure can still be increased during the year even if the required transfers are made to the fund. Finally, if annual budget expenditures are prudently determined within a Medium-Term Expenditure Note (MTEF) and there are reasonable liquidity cushions that can be used flexibly in case of downturns as recommended above, an arbitrary and mechanistic arrangement that shifts money away from the budget if resource revenue is higher than budgeted or provides money to the budget if it is lower would be redundant.

Some new funds with rigid rules are showing coordination problems with fiscal policy and asset management after only a few years of operation. In all these cases requirements to make deposits into the

funds without regard to the overall fiscal positions are causing complications. Box 1 provides examples.

Box 1. Early Signs of Stress in New Resource Funds with Rigid Rules

Ghana. As oil revenues started to flow, the Petroleum Revenue Management Act (PRMA) of 2011 established an elaborate system of oil revenue allocations, oil funds and earmarking. All oil revenues are received by a Petroleum Holding Fund, which then disburses them according to formulas to the budget and to two oil funds, the Stabilization Fund and the Heritage Fund. A "petroleum benchmark revenue" is defined based on a backward-looking 5-year moving average of oil prices. The budget receives an annual budget funding amount (ABFA) from oil revenue which cannot exceed 70 percent of the petroleum benchmark revenue. Seventy percent of the ABFA annually is earmarked to public investment. The two oil funds receive all revenues in excess of the ABFA according to specified shares.

After two and a half years of implementation of the PRMA, the Ministry of Finance and other stakeholders identified inconsistencies and operational and administrative challenges of the system that in their view needed to be addressed (Ghana 2013). Notably, the petroleum benchmark revenue formula consistently led to an underestimation of petroleum prices and volumes, leading to misaligned and inconsistent transfers into the ABFA and the two oil funds. In recent years, transfers were made to the funds while the central government was running large deficits. In 2013, the Stabilization Fund alone received higher transfers than the ABFA while the government's deficit was on the order of 10 percent of GDP. The government is currently reviewing the PRMA.

Mongolia. A Fiscal Stability Law (FSL) was enacted in 2010 to manage rapidly growing mining revenues and improve fiscal stability and discipline. The FSL set up three fiscal rules and a Stabilization and Savings Fund. The fiscal rules comprise ceilings on the structural budget deficit, expenditure growth and the public debt. The structural deficit is defined as the difference between structural revenues and spending, where mineral structural revenues are defined as a 16-year backward and forward moving average of past mineral prices and futures prices. The rules became effective in 2013, and can be recalibrated every four years.

The Stabilization and Savings Fund receives transfers from the budget when actual mining revenues exceed structural revenues as defined. The difference between the two is allocated to the fund. This requirement applies even if there is an overall fiscal deficit. In recent years transfers to the fund had to be made because mining revenues exceeded structural revenues, while the government was running deficits of 11-13 percent of GDP. The transfers were financed from government borrowing, and no net financial wealth was accumulated.

2. Resource funds with authority to spend and Public Financial Management (PFM) systems

A number of funds have been set up as separate entities with authority to undertake off-budget spending or commit public resources. About half of the funds looked at have, or have had, the authority to spend or invest assets domestically separately from the budget. It is useful to clarify the different justifications that are put forth for these arrangements.

- One is to "get around" weak PFM systems and an inefficient or corrupt budget system, and to deliver through a fund with separate procedures and controls the desired spending policies more effectively and efficiently than the budget (the "islands of excellence" argument).
- Another is the notion that potential overspending or rent capture might be prevented by keeping resources off budget and managed by a separate entity.
- Some countries have considered that the fund should support development by undertaking public investment projects in infrastructure or social infrastructure or delivering public services. Sometimes these fund activities may be motivated, at least in part, by political economy considerations – showing that the RR is being put "to good use."

- Some funds have been allowed, or encouraged, to invest in domestic financial assets, with a variety of objectives including development and asset management aims.

A fund can spend or commit public resources in various ways.

- The fund may spend directly off budget.
- It may be required by law or regulation to make earmarked transfers to the budget for “priority” spending categories.
- It may provide off-budget subsidies or domestic loans to public enterprises or the private sector.
- It may undertake equity investment in private domestic companies.
- It may participate in special purpose vehicles (SPVs) co-financed by the private sector.
- And it may provide guarantees to SPVs, public enterprises or private companies, generating contingent liabilities.

Resource fund spending raises some fundamental PFM questions.

- How will overall spending priorities be set?
- Which expenditures will be financed by the budget and which by the fund, and why?
- Will all expenditures, including those made by the fund, pass the tests of contestability and prioritization?
- Will fund spending be included in a consolidated budget submitted for legislative approval?
- If the fund receives volatile and unpredictable revenues, how will its expenditures be protected from the volatility and what will ensure that they are not pro-cyclical (reinforce the business cycle)?
- What expenditure commitment and procurement systems will be used?
- Will the expenditures by the fund and its contingent liabilities be subject to adequate control, accounting, reporting, audit, and disclosure mechanisms?
- How will excessive risk taking by the fund be avoided?
- How will political capture risks, the danger of "picking winners" in domestic investment, and governance concerns be addressed?

Domestic use of the fund's resources entails risks:

- **Stabilization.** Spending or investing fund assets domestically could transmit resource revenue volatility to the economy and be procyclical: investing in "good times," and drawing down investments in "bad times". It could also trigger sterilization costs and conflict with monetary policy objectives. If the fund is to function as a financial buffer, the assets cannot be held domestically, because the buffer should vary without affecting the rest of the economy.
- **Competitiveness of non-resource exports.** Using fund resources domestically adds to spending pressures, and could contribute to the appreciation of the currency in real terms, which constrains economic diversification.
- **Dual budget.** If the fund is used to undertake domestic public spending, a parallel budget would be created, weakening the standing of the standard budget as the main fiscal management tool.
- **Governance and rent-seeking.** In countries with weak governance and fiscal transparency, a perception that fund resources are available for domestic uses, including investing in companies and "picking winners," could create or intensify incentives for political capture and rent-seeking - which might extend to the fund's other asset portfolios - and make the fund prone to abuse.

The authority to spend domestically by the fund, has led to problems in a number of RRCs. Difficulties encountered include: expenditure coordination and control problems (such as duplication of expenditure, or capital spending decisions made without taking into account their impact on future recurrent spending); dual budgets; fragmentation of policymaking; inefficiency in the allocation of resources; governance issues; fiscal risks; and loss of overall fiscal control. These problems can be more acute in RRCs than in other countries because of the volatile nature of resource revenue and the political economy of spending resource rents. Box 2 provides some examples of what can go wrong.

Box 2. Resource Funds and Extra-budgetary Spending

In Nigeria in the 1990s off-budget funds financed by oil revenues undertook large extra-budgetary spending with lack of coordination with, and duplication of, existing line ministry projects. Project selection criteria and procedures were lax and capacity to manage investment inadequate. End-year accounts were not produced, or produced very late. The accounts were not subject to scrutiny by the Auditor General. As a result, a number of large investment projects subsequently required costly financing and had low rates of return. In the end, the funds were abolished.

The Venezuelan Investment Fund was set up to act as the repository of the oil windfall in the 1970s. Its resources were soon diverted toward equity participation in public enterprises, many of which turned out to be loss-makers, and to provide cash injections to the electricity sector to help finance its losses.

In its initial period, Alberta's Heritage Savings Trust Fund provided low-interest financing to state firms, undertook off-budget economic development and social investments, and granted loans to priority sectors. The poor results achieved – many loans had to be written off – led to a radical overhaul of the fund.

The Libyan Investment Authority undertook substantial extra-budgetary spending and is reported to have suffered financial losses on its investments abroad. These can be ascribed, at least in part, to lack of technical expertise, governance problems and the absence of suitable fiscal transparency mechanisms.

In practice, there is insufficient evidence to support claims that resource fund spending is superior to budget spending and that the "islands of excellence" argument holds in RRCs. Indeed, in a number of cases, lack of transparency of fund expenditure and other operations has hampered legitimacy and

undermined public support over time for the fiscal policy objectives related to the fund's operations. A number of funds fell at times under intense lobbying pressures to capture their expenditures and pressures to increase expenditures outside of the budget. In some cases, the limited expertise in the delivery of public services and accountability of resource funds has raised serious concerns about the effectiveness, prioritization and probity of such spending. Furthermore, bypassing the budget can have a negative impact on the development of the PFM system: scarce resources are diverted to the fund, and there may be less scrutiny of the core budget.

The desire for the resource fund to "support development" by investing or spending domestically is sometimes proposed for new resource funds or when new resource revenue comes on stream. This needs to be clarified because some of the arguments put forth arise from a misunderstanding of the role of the fund and a partial and fragmented view of public finance.

- Decisions on the use of resource and other revenues for public consumption and investment are independent of whether a fund is in place. The existence of a fund - an *institutional* issue - is not relevant to the strategic *policy* issue of how to use public resources to support development.
- The argument to use the fund for developmental objectives often rests on the notion that the new resource revenue (RR) or the fund's resources are in some way "special" or different from other government resources and therefore should be protected and treated and used differently. But once RR enters the treasury, it becomes part of a total pool of resources available for various uses – RR may be volatile, but the resources are fungible. It is not clear why development spending should be compartmentalized into different pockets of spending, or why the fund should carry out some of this spending, when all government activities are in fact financed from one and the same pool of resources and should be subject to a unified policy approach. If there is a desire to support development with increased public spending because revenues have increased, this can be done from the budget – which would show more clearly that spending has increased – with a correspondingly lower transfer to the fund, other things being equal.

The assignment of spending or investment responsibilities to the resource fund can lead to confusion about potentially competing fund objectives and complications in ex-post assessments of fund performance. An emphasis on, or requirement to undertake, domestic spending or investment may stand in the way of achieving an acceptable risk-adjusted rate of return on the fund's assets or holding an adequate level of precautionary liquid assets. It can also hamper accountability, as fund managements can claim that financial results are due in part to policy-oriented noncommercial requirements imposed on them.

2.1. Investment in domestic financial assets

Some governments have allowed or encouraged their funds – be it nonresource SWFs or resource funds – to invest in domestic financial assets. Domestic financial investment may be carried out purely on commercial grounds, as part of asset management strategies aimed at achieving diversification of fund assets and adequate financial returns, subject to limits on risk taking incorporated in the fund's mandate. Other objectives may include the desire to support the development of the private sector (for example, by investing in domestic equity) and the domestic capital market, and to crowd in foreign investment.

Domestic financial investment modalities are varied. Sometimes they are financial investments in traded securities, but more often they are made in private equity and greenfield projects including infrastructure. These investments can be fully commercial, or quasi-commercial, or "strategic," selected with a degree of home bias.

The use of SWFs – and among them, resource funds – for domestic financial investment is hotly debated.

- On the one hand, it is argued that poor, capital-scarce countries should be able to reap potentially higher returns from investing at home than by investing on global financial markets, and that in the long run such countries should not maintain traditional SWFs other than for stabilization purposes.
- On the other hand, there is concern over the potential quality and return on domestic financial assets, because the owner of the fund – the government – may be the same entity promoting the

investments, potentially generating fundamental conflicts of interest, and there may also be political capture risk.

Resource funds taking this direction may risk moving down a slippery slope. In particular, they could be used to bypass constraints on budget spending, and an increasing share of their portfolio could become inappropriate for a resource fund. Their domestic financial activities could also contribute to unsustainable spending booms rather than a sustainable growth trajectory. Central issues are the relationship of fund financing to the budget process and the establishment of appropriate benchmarks and safeguards to ensure the integrity of financial investment decisions.

The differences between resource funds and non-resource SWFs should be borne in mind. Non-resource funds derive their funding from non-resource wealth, such as pension contributions. Several large non-resource SWFs, including Temasek and the New Zealand Superannuation Fund, have a significant share of domestic assets on their portfolios. Many public pension funds tend to be heavily invested in the domestic economy. Resource funds, however, face stronger spending pressures than other publicly-owned funds with clearly defined maximization of asset value objectives. They are not accountable to a strong stakeholder group such as pension contributors or taxpayers, and do not need to raise capital in financial markets. Resource funds are therefore more vulnerable to political interference or elite capture.

The risk of policy amplifying booms and busts extends to domestic financial investment by resource funds. During RR downturns, if the budget comes under pressure, the resource fund might be called upon to help finance the budget, forcing it to sell domestic financial assets at a time when their price is already low.

There are ways to contain risks when funds undertake domestic activities. Essentially, those activities should be limited to commercial or “near-commercial” undertakings.

- Domestic investments made by the fund must be considered in the context of the public investment plan and the overall macroeconomic framework, and be sustainably phased to avoid boom-bust episodes.
- The fund should not invest in projects that are justified primarily by their economic or social externalities; those projects should be in the budget. Fund-financed projects should not compete with or duplicate budget-financed investment.
- Instead, fund investments should be limited to commercial or quasi-commercial undertakings with market or close-to-market financial returns. This would preserve an intergenerational wealth transfer function for the fund, whereas investments not warranted on commercial grounds would complicate the measurement of performance and accountability of the fund, as explained above.
- Allocations for domestic investment should not be fixed at a certain portfolio share, but rather determined on the basis of competition with foreign assets. In periods of low domestic returns, or when there are indications of asset bubbles, investments would be channeled abroad. If the investment project has a clearly defined development objective, it would still be benchmarked against the financial return on foreign assets, but allowances could be made under a set of rigorous and predefined criteria for a limited mark-down from the benchmark rate.
- The fund should only undertake direct or portfolio domestic investments as a minority shareholder with no controlling stakes, leveraging private investment to bring in expertise and share project risk.
- Strong external and internal governance and transparent reporting are crucial prerequisites. The authors spell out in detail the demanding institutional mechanisms and arrangements that a fund allowed to invest domestically according to the principles set out above would have to meet.

3. Institutional arrangements for the fund

The establishment of a fund entails decisions about how it is going to be integrated with the fiscal framework, the budget process, and asset and liability management. This has implications for institutional arrangements.

Countries have implemented a variety of institutional designs for their resource funds. The fund may be managed centrally by the ministry of finance. It may be managed by a relevant line ministry – in the case of RRCs the ministry of energy or similar, or other line ministries for development funds. Many funds have been set up as autonomous agencies with various mandates and varying degrees of autonomy and vertical accountability.

Funds should be integrated within the budget process in a coherent manner. Depending on its institutional design and mandate, a resource fund may help or hinder the budget system in meeting its basic objectives. Proper integration of the budget and the fund helps maintain a unified control of fiscal policy. It also facilitates a consistent prioritization across government operations.

The existence of a fund need not imply the creation of a new institutional mechanism. A "fund" may be a fund in name only. This accounting-only design is referred to as a "virtual" fund, because there is no separate institutional structure for the management of the fund, and all revenues and expenditures are on-budget. Certain resources would be identified as belonging to the fund, and could be held in the government's main account or in a separate government account with the central bank.

A virtual fund arrangement does not hamper fiscal and asset management and preserves the integration of the fund with the budget. It could strengthen the political feasibility and support for saving RR and help foster the incorporation of sound economic principles within the budget process, by focusing attention on the non-resource primary balance and by highlighting that RR are different from other revenues.

Many funds have been set up as separate public institutions. Many resource funds are extra-budgetary funds with their own managements, specific procedures, and accounts. In all cases where funds are separate institutions, good practice principles include the following:

- The operations of the fund should be fully incorporated in the fiscal policy formulation process, to preserve macroeconomic stability.
- Detailed accounts and other information on fund operations should be included in budget documentation to foster fiscal transparency; the requirements for the classification of fund revenue and expenditure, accounting and reporting should be consistent with budget systems.
- Projections for the fund should be presented to the legislature as part of the budget process.

Funds that spend or invest domestically for public policy purposes may be distinguished from funds that invest in domestic financial assets for commercial and asset management reasons. This concerns, in particular, independence of fund managements and the degree of budget integration.

Resource funds that spend or invest domestically to carry out public policies should be closely integrated with the budget. Funds with public policy purposes undertake noncommercial activities that could be replicated through the budget's tax and expenditure policies. For example, the public investment carried out by a fund could, under an alternative set up, be on budget. These funds should operate in a manner that supports resource allocation, overall fiscal policy and asset management. Given the quasi-fiscal nature of the operations of these funds, close integration with the budget process is required to avoid expenditure fragmentation and preserve unified fiscal control. In addition to the points above this should involve, at least, the following:

- Budget formulation, Medium-Term Expenditure Frameworks (MTEFs), and fiscal reporting should focus on a consolidated presentation (including the operations of the fund), to provide an accurate and comprehensive picture of public finances for fiscal policy formulation and assessment.

- All fund expenditures should be executed by the treasury (to avoid duplicate procurement processes).

Resource funds managed on a statutory and demonstrated commercial basis may be granted greater independence subject to strong reporting and audit requirements. The managements of funds that invest part of their financial assets domestically on purely commercial grounds for portfolio management and asset value maximization purposes would exercise independence of investment decisions, free from political interference, under the mandate provided by the government. In these cases, only the overall domestic financial investment envelope should be coordinated with the budget (for macroeconomic management purposes). A consolidated presentation of the budget and the fund would not be required. The fund would need to have transparent and independent reporting of results, with internal and external audits.

The differentiation between commercially-oriented resource funds and other funds can be complex. In practice, distinguishing the operations of funds with commercial and asset value maximization objectives from funds that carry out public policy-oriented activities may not be easy. A key issue is the ability to assess the purpose and nature of fund operations. Moreover, the character of those operations or of fund orientation may evolve with time as circumstances or politics change.

- For example, some investments that turn out to be profitable may have been initially undertaken because of policy motives.
- Conversely, funds initially set to be managed on commercial and asset value maximization principles may subsequently succumb to political pressures for directed financial investment, public spending or lending for noncommercial purposes.
- Accountability for resource use may be enhanced and broadened by having RR go through the budget, with allocations to the fund as budget transfers.

In all cases, strong governance, transparency, audit and accountability mechanisms are key to safeguard public resources held by the fund. These are discussed below.

There is growing international recognition of the importance of good integration between the fund and the budget. For example, the Santiago Principles for SWFs agreed by the International Working Group of Sovereign Wealth Funds (IWGS), call for the activities of funds that have significant direct domestic macroeconomic implications to be closely coordinated with the fiscal and monetary authorities to ensure overall policy consistency.

In a number of cases, governments have made efforts in recent years to improve their funds. Reforms have tried to integrate better the funds with budget systems and fiscal policy frameworks, and to strengthen fiscal transparency. Examples include Alberta, Algeria, Azerbaijan, Chile, Kazakhstan, Mexico and Russia.

4. Asset and liability management

A resource fund can hold a significant share of the public sector's financial resources. Therefore, the fund can be an important element of the government's overall asset and liability management (ALM) structure.

An asset management strategy should be defined for the fund. This includes, at a minimum, the following elements:

- long-term strategic investment guidelines. These should be issued by the ministry of finance, made public and, given their importance, presented to the legislature to ensure political support for investment choices that are key for public sector liquidity and solvency and the development of the country.

- The ministry of finance can benefit from external advice on the design of the investment guidelines regarding eligible financial assets and desired strategic asset allocations given various policy objectives such as liquidity, tolerable risk, and expected returns.
- The investment guidelines should define a desired asset composition for the portfolio in terms of type of instruments such as fixed-income and equity, as well as currency composition, regional allocation of assets, maximum ownership shares in companies (if relevant), and duration of fixed-income portfolio.
- an operational management arrangement with the agency that will manage the fund's assets, whether this is outsourced outside of the ministry of finance or not, such as the central bank, a government asset management agency, or a specialized external financial institution. The agreement should have a clear allocation of responsibilities to ensure that those who manage and those who oversee the operations of the fund are held accountable.
- a procedure for frequent reviews of fund performance against benchmarks.
- reporting requirements and audit procedures for the fund.

The resource fund's asset management strategy should be consistent with the main objectives of the fund and the government's broader policy objectives and asset/liability strategy. Any strategy has to take into account the consolidated financial portfolio of the government. A composition of fund assets that might in some sense be optimal if the fund holds all the government's financial assets would not necessarily be optimal if the government holds significant financial assets outside of the fund. Particularly in cases where the government holds large financial assets, it is the liquidity/risk/expected return profile of the entire asset portfolio that should be targeted, rather than the profile of one of the components of the portfolio. Notably, the covariance of the fund's portfolio with other government assets should be taken into account.

This said, funds with mainly short-run stabilization objectives that might have to make transfers to the budget at short notice may invest more heavily in liquid short-term assets. It was estimated that in 2011 stabilization funds held on average more than 90 percent of their assets in fixed income instruments. Savings funds, on the other hand, were more heavily invested in equities (56 percent), reflecting different objectives, higher estimated risk, and higher expected returns.

The fund should not invest in the government's own domestic or foreign liabilities. Such a strategy would make little sense and could hamper transparency. The fund should not be permitted to borrow: these operations should be centralized at the ministry of finance. The fund's capital should not be used as collateral for government borrowing. If the fund is allowed to issue guarantees, these should be approved at least by the Ministry of Finance; in a number of countries, the issue of government guarantees is subject to explicit limits and/or requires approval from the legislature, on the grounds that guarantees are risk expenditures that can burden future budgets. Guarantees issued should be disclosed in financial statements, budget documents and fiscal reports (such as fiscal risk statements).

In RRCs with limited capacity, the option of initially outsourcing the management of fund assets to external asset managers of high reputation can be considered. This should be supported by a long-term strategy to gradually develop such capacity in the government or the central bank. The criteria and principles for the outsourcing should be clearly and transparently defined, as well as the reporting requirements placed on the external manager. Important criteria for choosing an asset manager include competence, the complexity of the chosen investment strategy, costs, and control. In some cases, the central bank as manager could itself outsource part of asset management to an external manager.

5. Governance, transparency and accountability

Lessons from experience and best practice suggest that good governance of a fund and strong transparency are important for the achievement of sound fiscal policy objectives. Good governance

and transparency are key to:

- Garner public support for the fund and its objectives. Society is more likely to support arrangements for the accumulation of potentially significant country assets when it is provided with reliable information about the management and evolution of those assets and when it can exert pressure for good asset management. Lack of transparency can hamper legitimacy and fetter public support for the fund.
- Prevent mismanagement, corruption and abuse, given the magnitude of the resources controlled by the fund that may be at stake.

Strong vertical and horizontal accountability and transparency will enhance the effectiveness and efficiency of the fund:

- **Vertical accountability:** the fund's management is subject to hierarchical oversight and is answerable to higher authority, which in turn is answerable to elected higher authority. This involves clear lines of responsibility and regular reporting.
- **Horizontal accountability:** the operations and performance of the fund are overseen by other government agencies (including audit) and are reported to civil society.

Against this background, and more specifically:

- The framework for the resource fund should be set up and supported by legislation.
- There should be clear lines of responsibility and accountability between the owner (usually the ministry of finance) and the manager of the fund.
 - the owner of the fund should have overall responsibility and, as discussed above, should set out strategic investment guidelines and evaluate operational management.
 - the manager of the fund should implement the investment strategy set out by the owner, manage risk within the permitted parameters, and ensure proper accounting and reporting according to the regulations.
- Openness is critical. It involves the public disclosure of fund objectives, regulations, investment strategies and accountability structure, as well as periodic and timely public reports on fund performance and disclosure of fund assets.
- Control and evaluation mechanisms should include parliamentary oversight, performance assessment, and independent internal and external audit.

6. Recommendations for resource fund design and supporting PFM systems

The rationale for a resource fund should be carefully considered on a case-by-case basis. What would the fund help do better than established budget and asset management systems? Do the potential benefits outweigh the potential costs?

Funds with rigid operational rules would best be avoided. While the advantages of these funds in stabilizing expenditure or promoting saving are uncertain because money is fungible, they are not conducive to effective fiscal management and often entail costs.

Financing funds with flexible rules should be preferred. These funds do not impose inefficiencies and rigidities on fiscal policy. They devolve the focus of fiscal policy design and implementation to the budget. They can also help highlight the importance of the NRB for fiscal programming. Good integration with budget systems and fiscal policy frameworks would best be achieved by ensuring that the fund operates as a government account rather than as a separate institution, that it does not interfere with PFM processes, and that it ensures coherent asset and liability management. A consolidated presentation of the budget and the fund should be included in budget documents.

In RRCs, the first-best approach is not to grant spending authority to the fund and preserve the integrity of the budget. This recommendation arises from sound PFM principles, consideration of the nature of RR, political economy issues, and the evidence from country experience. Existing PFM shortcomings should be tackled head on, rather than attempting to bypass them through a spending fund.

Institutional funds with authority to spend for public policy purposes should be closely integrated with the budget process. For these funds, close coordination with the budget is critical to ensure holistic expenditure prioritization, avoid policy fragmentation, and preserve unified fiscal control. The fund should be included in a consolidated budget submitted to the legislature, and its operations and plans should be discussed in budget documents. This is needed for an informed consideration of the overall fiscal position.

Funds with authority to invest domestically on commercial principles as part of asset management strategies should be allowed to carry out their mandates independently and required to transparently report their operations. Fund managements charged with the maximization of fund asset value subject to tolerable risk should be independent of political interference. At the same time, they should be held accountable for fund results, which should be subject to strong reporting requirements. The operations of the fund should be reported in budget documents.

An asset management strategy should be transparently defined. It should include strategic investment guidelines and a management agreement with the asset manager, systems for performance review, and reporting and audit requirements.

The operations of the fund should be reported and audited. Fund operations and financial assets and liabilities should be reported regularly to government, disclosed in fund and government financial statements, and subject to internal and external audit.

Stringent mechanisms to ensure transparency, governance and accountability are key requirements for resource funds. Rigorous procedures should be in place to help prevent misuse of public resources and provide assurance that government assets are properly and prudently managed.

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