PROGRAM IMPACT ASSESSMENT

I. Summary

1. The objective of the Encouraging Investment through Capital Market Reforms (EICMR) Program is to deepen the capital markets in the Philippines through a comprehensive set of reforms aimed at stimulating productivity enhancements. The Program has three main outputs: (i) Government bond market depth and liquidity enhanced; (ii) long-term savings and investments encouraged; and (iii) market depth and diversity increased. The EICMR will deliver substantial economic benefits through a number of different channels. The aggregate benefit to the economy outweighs the compliance costs and other short-term transition costs associated with some of the reform measures.

2. The recurrent quantifiable benefits of the EICMR are estimated to have a present value of $1.2 billion, under conservative discounting assumptions. Of this, approximately $890 million flows to the Government from more efficient use of liquid assets. A further $290 million is expected to flow to the corporate sector from improvements to the corporate bond market, and individuals are expected to benefit from a $50 million efficiency improvement in the insurance market. In addition to these recurrent benefits, better retirement incomes policies are expected to lift individual wealth by $143 million over ten years. Significant, if unquantifiable, benefits are expected to flow from greater efficiency in the non-life insurance sector and from initiatives to deepen the markets in investment vehicles, such as exchange-traded funds.

3. There are no readily quantifiable costs as the reforms are essentially administrative. Of the unquantifiable costs, redistribution of income through the tax system is the most significant. Tax-preferred retirement income vehicles that are being promoted under the EICMR will reduce the tax base and so impose on those taxpayers who do not have retirement savings. These costs are expected to be more than fully offset by benefits that flow to the Government from other capital market reforms under the EICMR.

4. **Benefits.** The reforms aimed at improving the government bond market (Output 1) will have direct benefits in terms of savings resulting from improved cash management. Over the longer term, these reforms are also expected to generate significant benefits to the government's fiscal position through efficiency gains and improved pricing of government debt.

5. The benefits to the corporate sector under the three outputs are more diverse. The financial sector will share the benefits generated under Output 1, as the improvement in pricing will lead to more efficient cash management. Only a handful of borrowers can currently access the bond market. Reforms aimed at enhancing market depth and diversity (Output 3) will increase access to cheaper funding for a wider range of borrowers, thereby benefiting the corporate sector.

6. Individuals will benefit directly from the reforms that encourage long-term savings and investments opportunities (Output 2). The EICMR includes a number of reforms which deliver access to a tax-deferred, long-term savings platform and a wider variety of investment products. These benefits can be summarized in terms of the difference between the rates of return on current retail products and those that would be earned on higher yielding investment products expected to be result from the Program.

7. **Costs.** The main potential cost of EICMR is that it exposes market participants to a higher, and less familiar, degree of financial market volatility. Experience of other countries

suggests that this risk becomes manageable as markets become more liquid. Nonetheless, the transition can sometimes be unsteady, and capital market structures can misprice capital during the adjustment phase.

8. Some redistribution of income through the tax system is also likely under the reforms. In addition, some of the tax reforms that have already been enacted have transferred significant carry benefits from the banking sector to the government and ultimately the tax payers. The reforms will result in the rationalization of trading platforms in wholesale securities markets, and they may cause some job losses in less competitive intermediaries.

9. Finally, other costs related to the EICMR are operational in nature and lower-order in macroeconomic terms. They include the costs of establishing new financial infrastructure and enhancing public sector financial management and the (ongoing) compliance costs that would accompany any improvements to corporate government regimes.

II. Development Problem and Constraints

10. The Philippines economy has posted impressive growth performance in recent years. The average annual growth rate during 2010-2014 was 6.2%, and at 6.1%, the growth rate in 2014 was among the highest in the region. Economic growth has been driven in largely part by household consumption, which in turn has been supported by higher employment levels and remittances from overseas Filipinos. In 2014, the contribution of household consumption to GDP growth was 62%, followed by net exports (44%), investment (4.1%), and government expenditure 3.2%.

11. Despite some improvements in recent years, the investment rate in the Philippines at 20% of GDP lags those of sub-regional peers such as Indonesia (32%), Malaysia (25%) and Thailand (24%). Investment in infrastructure likewise has lagged, though recent measures by the Government to boost public and private investment in infrastructure is helping to narrow the gap.

12. Among the key impediments to investments, especially investment in infrastructure is the absence of a developed capital market that effectively intermediates long-term savings into productive investments. The financial sector in the Philippines is dominated by the banking system, accounting for over 80% of total financial sector assets. The banking sector itself is heavily concentrated with the five largest banks accounting for 51% of total banking assets. Seven of the 10 largest banks belong to conglomerates. The nonbank financial sector, and in particular, the capital market does not play a meaningful role in financial intermediation. The local currency debt market currently represents about 39% of GDP, compared to more advanced countries in the region where local currency debt markers exceed 70% of GDP, and their local currency corporate debt markets are 3-8 times the size of the Philippines market.

13. **Limited Depth and Liquidity of Government Bond Market**. Government accounts are highly fragmented with over 500 different accounts and the transfers of tax revenues from collection points to the public accounts are slow and irregular. Forecasting system cash requirements under these circumstances is difficult. To offset this, the government maintains a volume of liquid short dated funds - Special Deposit Accounts (SDAs) by commercial banks – which earn administered interest rates. Maintaining SDAs impose significant costs, approximately the difference between the rate that they earn and the money market clearing rate. Another manifestation of the absence of an effective money market is the government's excessive reliance on the bond sinking fund (BSF) - a sizable reserve amounting to roughly 8%

of GDP-to cover the possibility of a shortfall of system liquidity. The cost of carry to the Government from the BSF is significant. In addition to imposing fiscal costs, the underdevelopment of the government bond market and the resultant absence of a benchmark risk-free yield curve is a fundamental constraint to the development of the corporate bond market in the Philippines.

14. **Absence of Long-Term Savings and Investment Instruments.** There are currently 110 insurance companies in the Philippines, of which 29 are life, 76 are nonlife, and 4 are a composite. The number of insured individuals has continued to increase, yielding a 24% coverage ratio. However, the insurance sector remains small with premiums amounting to only about 1.8% of GDP. The development of the insurance sector has in large been part constrained by restrictive investment allocation guidelines which require approval of the Insurance Commissioner for individual investments. There are restrictions on expanding the range of insurance providers, as well as micro-insurers introducing nonlife products. The nonlife sector, unlike the life sector, is dominated by small locally owned insurance companies which do not produce sustainable levels of premium income. Tax distortions also hamper development efforts, as premium taxes applied to non-life policies are among the highest in the regions. Furthermore, the state-owned Government Services Insurance System competes directly with the private market.

15. Likewise, efforts to encourage long term savings through legislation in 2008 - the personal equity retirement act or "PERA" - have not yet yielded results. This is largely due to weak implementation, partly caused by the lack of IT infrastructure to effectively administer the PERA system.

16. **Need to Expand Market Depth and Diversity.** At the policy level, the Philippines Securities Exchange Commission is an active member of the Association of Southeast Asian Nations (ASEAN) Capital Market Integration Forum (ACMF) that is part of the ASEAN Finance Ministers' Meeting (AFMM) process. The Philippines is also part of the ASEAN Corporate Governance Scorecard and the Working Group on Cross Border Dispute Resolution and Enforcement Mechanism. However, the Philippines is the only ASEAN 6 member that is not a signatory to the IOSCO Multilateral MOU (MMOU) Concerning Consultation and Cooperation and Exchange of Information. Established in 2002, the MMOU provides securities regulators with the tools for combating the cross-border fraud and misconduct that can weaken global markets and undermine investor confidence. Being a signatory to the MMOU is a pre-requisite for participating in the ACMF initiatives, including cross-border public offerings of debt and equity.

III. The Reform Program

17. The EICMR is aligned with the Philippine Development Plan, 2011–2016 and will contribute to meeting the government's targeted investment rate, including public and private spending on infrastructure. The outcome will be a deeper nonbank finance sector, measured by an increase in corporate bonds relative to GDP, participation in the ASEAN cross-border initiatives, and growth in contractual and long-term retirement savings.

18. **Output 1: Liquidity in the Government Bond Market Enhanced.** In subprogram 1, the government has implemented fundamental reforms to lay the groundwork for increased trading volumes and liquidity in the government debt market. BTr improved cash flow forecasts by consolidating cash into a single account. This will enable the issuance of short-term money market treasury notes, and lower costs of issuance overall. Outstanding bond issues have been

selectively consolidated, hedging instruments introduced, and trading between taxable and tax-exempt segments enabled leading to an increase in trading volumes around key bond tenors. BTr's technical and operational capacity has been strengthened. In subprogram 2, the government will build on these reforms to transform higher trading volumes into a risk-free government yield curve. The number of auction participants will be reduced and a primary dealer system will be launched, further increasing secondary trading volumes. Cash-flow forecasting will be further enhanced, and hedging mechanisms will be institutionalized, allowing the development of two-way markets.

19. **Output 2: Long-term Savings and Investments Encouraged.** In subprogram 1, the government implemented measures to encourage more domestic participation in the finance sector, with an emphasis on contractual savings. Legal and regulatory changes authorized a wider diversity of investments and increased the range of investment strategies. A tax-deferred long-term retirement savings platform—Personal Equity and Retirement Account (PERA)—was prepared for launch. The government also selectively reduced the cost of key financial transactions such as repurchase agreements. In subprogram 2, the government will continue to operationalize these reforms through the regulatory framework and will launch products (e.g., PERA) that are designed to encourage long-term savings and investment. Efforts to reduce the financial costs of capital market transactions will continue.

20. **Output 3: Market Depth and Diversity Increased.** In subprogram 1, the government introduced reforms to encourage greater investment from a more diversified group of investors. Under the ASEAN Economic Blueprint, the government will reduce barriers to entry by allowing foreign participation in all financial market subsectors. An application for admittance to the International Organization of Securities Commissions' Annex A will position the government for deeper participation in ASEAN cross-border investment initiatives while corporate governance of Publically listed companies is concurrently strengthened. In subprogram 2, compliance with the International Organization of Securities Commissions' principles will enable direct participation in ASEAN cross-border investment initiatives, buttressed by a corporate governance blueprint.

IV. Estimations of the Benefits and Costs of the Reforms

21. The following table summarizes the main features of the reforms that staff identified for EICMR. These benefits are not exhaustive, but provide an indication of the key aims. The reforms are estimated to produce recurrent annual benefits of at least $123 million. A further large uplift in financial wealth, of around $143 million, is estimated to become available to elderly Filipinos after ten years.

Table 1

	Enabling Outputs			**Summary of economic benefit**
Name of reform	**Output 1**	**Output 2**	**Output 3**	
Reduction of bond sinking fund	*			Savings to the government of $85 million per annum, achieved through a reduction in the cost of holding a large pool of Government-controlled contingent liquidity.

Money market reform	*			Conservatively estimated savings of $4 million per annum by reducing dependence on Special Deposit Accounts – a vehicle for maintaining excessive and low-yielding liquidity.
Life Insurance reform		*	*	Savings through economic efficiencies (potential) of around $5 million per annum though better premium investment practices.
Non-life insurance reform		*	*	Greater income security for individuals, brought about through greater protection of individual physical assets.
PERA accounts		*		Conservatively estimated at $143 million (after 10 years). The main channel is though stronger retirement incomes for individuals, with wealth increments defined by the difference between market rates of return and those on current products, chiefly deposits.
ETFs		*	*	Stronger incomes for individuals, with savings defined by the difference between market rates of return and those on current products, chiefly deposits.
ASEAN market integration	*		*	A prospective increase in yield on corporate bonds of $29 million per annum as integration with regional corporate bond markets enlarges issuance and improves investor access to higher yields.

A. Benefits

22. Under Output 1, the estimated benefits are $89 million per annum. The quantifiable benefits accrue largely from efficiencies arising from improved liquidity in the government bond market. The cost that SDAs impose is approximately the difference between the rate that they earn and the market clearing rate, with the incidence of cost depending on whether the SDA rate lies above or below the “true” short-term money market clearing rate. When the money market rate is above the SDA rate, banks incur an opportunity cost, because SDA funds could be better placed in the market. When the spread changes sign, the costs are borne by the government. The relevant spread for approximating the gains from reducing SDA volumes is the overnight FX swap rate. The spread between this rate and the SDA rate is currently positive (around 15bps) but is more frequently negative and has commonly traded at between 150 to 200 bps. At prevailing spreads to the FX swap rate, the removal of SDAs would generate a return to the banks of around $4.3 million per annum. At discount rates of 5 and 10 per cent, that implies a present value for the reforms of around $87 million, and $44 million respectively.

23. The cost of holding the bond sinking fund is approximately equal to the ten-year government bond rate of 4 per cent. Since EICMR is targeting a reduction in the BSF of 20 per cent, the prospective gains from this refrom can be measured as a straightforward 20% reduction in the cost of carry. Using IMF estimates which place that cost at $425 million, EICMR's target implies a recurrent annual saving of around $85 million. At a discount rate of 5 per cent, the present value for the reform would be around $1.7 billion. Even at a much higher discount rate of 10%, the present value of the reform is still $850 million.

24. Not all benefits of the reforms proposed under Output 1 are immediate and quantifiable. One of the more important longer term benefits is the support that reforms would provide to the corporate bond market by helping establish a risk-free yield curve.

25. Under Output 2, quantifiable recurrent benefits are estimated at $5 million per annum. One of the main channels for benefits is the potential improvements in the investment incomes of Philippines insurers. In 2012, the rate return on investment income of life insurers was approximately 7.8%, which compares unfavorably with both the return on domestic stock market as well as other regional performers. Even a marginal improvement in the performance of Philippine insurers would translate into a significant nominal efficiency gain. Using the 2012 stock of assets under management, an improvement to Singaporean rates would return almost $5 million per annum. In present value terms (with discounting at 5 per cent), that represents a gain of $100 million.

26. Output 2 also supports the creation of up to 100,000 PERA accounts, the benefits of which will arise from higher retirement income of individuals. Some scenarios can help to frame the likely increase in wealth. The table below assumes that the target number of accounts is reached immediately and does not increase. Contributions to those accounts occur at the maximum tax free rate for an unmarried domestic citizen of the Philippines. Finally, assumptions about the performance of funds invested are necessary. In this example, funds can be split between a low volatility asset returning the government bond rate of 4 per cent and an equity index whose return is unknown. Based on the scenarios, the stock of assets after ten years can be conservatively estimated at $393 million.[1] After deducting the contributions required to generate these assets, a net benefit of $143 million is implied.

Table 2. Scenario Analysis: PERA System Balances (USD millions after ten years)[a]

		Proportion of portfolio held in equities		
		100%	**75%**	**50%**
Annual growth rate of equity prices	**20%**[b]	1847	1479	1110
	5%	412	402	393
	2%	305	322	339

[a] Contributions of $250 million are assumed.

[b] Estimated annual appreciation rate in the PSEI over the last five years.

[1] These projections are rich with assumptions. For example, the calculations suppose no withdrawals over the period. The system penalises early withdrawals heavily, but it is probable that a proportion of the population will reach age 55 and be eligible to withdraw funds during a ten-year interval. To that extent, system assets at the end of ten years may be lower than projected here. Second, account size in the example is limited to that of an unmarried citizen.

27. One of the less quantifiable benefits under Output 2 is a stronger market in exchange traded funds (ETFs). ETFs offer a cost-effective way for fund managers and individuals to reap the returns on a wide range of securities. They collect a portfolio of (usually similar) assets, which generate a return and can be traded.

28. Under Output 3, quantifiable benefits are estimated at $29 million. The benefits arise from improved market depth and diversification through regional integration. In principle, both borrowers and lenders can potentially benefit: borrowers should be able to raise funds at a cost that is more competitive than bank debt, while still generating returns to investors that are higher than returns on bank products.

29. The regional character of the reforms proposed under output 3 makes it possible to assess these gains. If the Philippines corporate bond market were genuinely accessible, its corporate bond market should be of comparable size to the markets of its regional peers, and (with a little less certainty) it should be operating with similar spreads. A useful benchmark for the benefits that might be generated is therefore to suppose that, after appropriate reform and market development, the Philippine corporate market stands in the same proportion to the government bond market as is the case in other leading ASEAN nations. The average ratio of corporate to government debt outstanding across Malaysia, Thailand and Singapore is 56 per cent. If that were the ratio for the Philippines, at current government stocks, the corporate bond market size would be approximately $49 billion. The returns which investors could make on this stock could be approximated as a 60 basis point margin over the government bond rate.[2] In other words, investors could be earning an extra 60 basis points on $49 billion, which equates to a recurrent benefit of approximately $29 million per annum.

B. Costs from Reforms

30. The reforms will entail some costs that will partially offset the benefits. Foremost among them is the cost to taxpayers of concessionary tax treatment on retirement savings (PERA) accounts. Specifically, PERA accounts are deducted from pre-tax salary, they are exempt from taxes on earnings, and workers and employers can engage in legal tax arbitrage via tax exempt employer contributions to the PERA accounts of their employees. In addition, the government has elected to decouple earnings on PERA accounts from eligibility for age-related social security, such that age-related welfare entitlements are not affected by private wealth and income. The assumptions for the benefit forecasting imply a cost of foregone tax revenue equal to $80 million.

31. Most other costs relate to providing support for Government agencies as they make necessary changes to enabling legislation, and as they develop infrastructure. Although these costs are not inexpensive in themselves, they are small relative to the prospective benefits for this particular Program.

[2] Sixty basis points is the margin by which corporate bond funds in the region return more than the government bond rate.

Table 3. Summary Program Impact Assessment

Channel of Effect		Impact on the Sector/Economy		Estimated benefits, beneficiaries and benefactors
General	**Specific**	**Short to medium Term**	**Long Run**	
Improved cash management	Established treasury account, reduced bond sinking fund, better issuances of debt to develop yield curve etc	Savings to government and taxpayers from more efficient management of surplus liquidity.	More efficient management of government debt leads to better pricing of risk free assets and to better scope for a wider range of products. The community generally will benefit from having surplus liquidity redirected to more productive purposes.	There are no significant long run costs to this initiative. It involves a more effective use of assets that are currently being deployed inefficiently. Taxpayers are the immediate beneficiaries, and over a longer horizon benefits from better public sector debt management accrue to all who participate in financial markets. Savings of $90million per annum are expected.
Insurance reform	Reforms to both life and non-life sectors	Benefits under this reform should be immediate, and they accrue mainly to policyholders.	Greater wealth accrues from better management of assets in the life sector. In the non-life sector, greater efficiency leads to better access for	Policy-holders and shareholders will both benefit from more efficient management of premium income in the life sector. In the non-life sector, better industry performance leads to greater accessibility for protection of physical assets. Recurrent benefits of $5million are expected
A better retirement income system.	Activation of PERA accounts.	Loss of tax revenue as funds are redirected into tax-preferred investment vehicles	Greater financial security for the elderly.	The initiative will deliver financial security for the elderly, where little exists at present. The costs in terms of tax revenue foregone should be seen in the context of offsetting gains to taxpayers from other reforms. Benefits are likely to be very large over the long term, but are difficult to quantify.
Stronger private capital markets	Creation of ETFs and better international capital market integration.	Wealth management gains from the stock market are more widely shared through the creation of ETFs. Internationally integrated private bond markets attract both creditworthy issuers and investors.	Deeper private capital markets encourage participation from a wider range of investors – both domestic and international – and are conducive to better asset pricing. This benefits issuers of products and investors alike.	Both issuers and investors benefit from stronger private capital markets. Gains from the integration of bond markets have been estimated at $29million per annum.

ADB = Asian Development Bank.