PROGRAM IMPACT ASSESSMENT

1. Summary

The Promoting Innovative Financial Inclusion Program (PIFIP) augments ADB’s lending program in Indonesia by supporting the development of a more modern and inclusive financial system. The program will reduce the degree of financial exclusion, particularly among regions, women, youth, and the critical micro, small, and medium enterprises (MSMEs). It provides $500 million in ADB lending to enhance tools and infrastructure, dedicated focused efforts to facilitate financial service delivery, and to provide consumer education and stronger governance mechanisms to promote responsible financial inclusion. It also supports Indonesia’s rapidly emerging financial technology (fintech) sector and digital financial services (DFS).

2. Background

2.1. Macroeconomic Context

Prior to the coronavirus disease (COVID-19), economic growth had been steady at around 5% per annum. Though it was below the medium-term government targets of 7% to 8%, it still contributed to poverty reduction. As elsewhere, due to the COVID-19 pandemic, growth fell sharply in 2020, to under 3% in the first quarter and a contraction of 5.3% in the second quarter. Government spending coupled with a sharp contraction in the current account deficit, have so far been insufficient to offset reduced contributions from private fixed investment and consumption.

In the short-term, monetary developments may cushion the economy against the very worst effects of the downturn. Inflation has dropped to only 2.7%, and monetary policy has eased by around 150 basis points since the middle of 2019. The nominal exchange rate has depreciated by around 9 per cent against the dollar since the start of the year, and these favourable financial conditions are likely to support Indonesia’s trade dependent economy through the early phases of the global downturn. Yet, over a medium-term horizon, any stimulus from monetary factors will wane. An acceleration of structural reform and fresh sources of productivity will be needed to restore growth.

2.2. Sector Context

The reforms in this subprogram are targeted at the development of the finance sector, focusing on financial inclusion as a means to promote economic development and growth. Indonesia’s finance sector is dominated by intermediated lending disbursed by traditional banks. Distribution of wealth and insurance products likewise is dominated by a bancassurance model (International Monetary Fund [IMF], 2018). Bank assets account for about three quarters of the finance sector and are equal to more than half of GDP. Insurance assets account for only 12% of assets but are growing at around 20% per annum. Mutual funds, pension funds and microfinance entities remain small but are growing quickly.

This model of financial intermediation is inefficient. Domestic credit to the private sector is only 38% of GDP. As Table 1 shows, this is low by standards of Indonesia’s regional peers, and its distribution is characterised by a high degree of financial exclusion. According to the latest Global Findex survey, Indonesia was one of seven countries which collectively accounted for half of the 1.7 billion adults worldwide who are unbanked.

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1 World Bank and IMF, Financial Sector Assessment, Republic of Indonesia, June 2017, (p 9, para 5).
6. The physical accessibility of financial services is a significant contributor to the number of unbanked. Although Indonesia has 16 bank branches per 100,000 people – a rate which is comparable to that of higher-income countries – the density of physical banking is low after accounting for the geographical obstacles represented by the country’s 17,500 islands. Around a third of those Indonesians who do not have an account cite the physical distance of financial service providers as a reason for being unbanked.

7. The cost of financial services is also high. Approximately one-third of Indonesians who do not have an account report that the costs of financial services are prohibitive, and 72% of the same group cite an insufficiency of funds as a further limitation on service accessibility (Global Findex). The high cost of financial services may explain the comparatively high dependence of Indonesians (among Association of Southeast Asian Nations (ASEAN) peers) for borrowing and saving on informal intermediation channels. International evidence suggests that these channels are usually expensive.²

8. The legal and regulatory framework is a further source of difficulty. The IMF (2018) has noted shortcomings with conflict resolution in relation to consumer protection and the application of market standards. These stem partly from the financial regulator’s objectives of market development and consumer protection, and the relevant laws do not identify the protection of consumers as a primary legislative objective. They are also due to the fragmented nature of alternative dispute resolution schemes.

9. Digital banking does not yet compensate fully for the limitations of the physical banking system. Although internet usage is difficult to measure, it is reportedly growing quickly, and 43% of mobile phone users now have smartphones. Yet the application of the internet to financial services has been slow. According to the last Global Findex survey, only 4% of adults had used the internet in 2017 to pay bills, and only 35% reported making or receiving a digital payment in 2017. This compares with 70% of Malaysians and 90% of Singaporeans.

10. Deficiencies in Indonesia’s physical infrastructure are one reason for the economy’s low dependence on digital financial services. Indonesia’s electricity and telephony infrastructure is ranked 77th of 137 countries in the most recent World Economic Forum (WEF) survey. Estimates of its internet usage vary considerably but, according to the WEF, only 25% of the adult population uses the internet, leaving Indonesia as the 109th ranked country in the survey on that criterion. Internet bandwidth is low, at an average of around 24kbs per second, and the number of fixed broadband internet subscriptions is equivalent to only 1.9% of the population.

11. Trust and security have also impeded the growth of digital finance. In 2018, Indonesia experienced over 200 million cyber-attacks, and its economy remains lightly defended by legislation against this threat. There are only two laws relating to cyber security, and both are

² See references in Askar et al (2020).

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### Table 1: Credit as a Proportion of GDP in 2019 (%)

<table>
<thead>
<tr>
<th>Country</th>
<th>Credit as % of GDP</th>
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<tbody>
<tr>
<td>Malaysia</td>
<td>121</td>
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<tr>
<td>Singapore</td>
<td>121</td>
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<tr>
<td>Indonesia</td>
<td>38</td>
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<tr>
<td>Philippines*</td>
<td>48</td>
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<tr>
<td>Cambodia*</td>
<td>99</td>
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<tr>
<td>Vietnam</td>
<td>138</td>
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<tr>
<td>Thailand</td>
<td>143</td>
</tr>
<tr>
<td>Brunei-Darussalam</td>
<td>36</td>
</tr>
</tbody>
</table>

*data available up to 2018

Source: World Development Indicators, World Bank

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at least several years old, and neither have provisions for e-commerce. The IMF (2018) has specifically identified cyber risk as a growing and significant risk for the insurance sector.

3. **Rationale for Reform**

3.1. **Demographic Motivations**

12. The reforms in this subprogram target the poor, youth, and women. One of the primary causes of low rates of financial inclusion across all three of these demographic partitions is financial literacy. Although general literacy in Indonesia is now almost universal, financial literacy remains low. Only 14% of Indonesian adults were financially literate in 2016, and only 15% were aware of mobile money services (Financial Inclusion Insight, 2017).\(^3\) Not surprisingly, financial literacy is a dominant reason for the financial exclusion of the poor. Only 36% of the poorest 40% have an account, compared with 57% of the richest 60% (Global Findex Database 2017).

3. Younger Indonesians are also vulnerable to financial exclusion. As elsewhere, they manifest greater financial literacy and are more capable of accessing financial services (particularly digital banking) than earlier generations. Yet there is still evidence of credit rationing against them. Borrowing to start, operating or expanding a farm or business in the last year was reported for only 1% of young adults, compared with 7% for older Indonesians. On many measures, the access of young Indonesians to capital markets also appears weak compared to regional peers. Borrowing to start or operate businesses by young people is less common in Indonesia than in any of its lower-middle income ASEAN peers. Engagement with digital financial services also appears constrained. Only 9% of those in the age bracket of 15–34 have checked their account balance online in the last year. This compares with 68% in Singapore and 48% in Malaysia.

14. Improving the access of younger entrepreneurs would lift Indonesia’s economic growth. The country’s overall demographic profile is young. Over 25% of the population is below the age of 14, and the median age of the population is just 30.\(^5\) Encouragingly, this demographic partition also has entrepreneurial aspirations. Around 21% of young adult Indonesians had saved for the purpose of building a business or farm. This is above the average of Indonesia’s ASEAN peers.

15. Women represent another segment of the population requiring greater financial inclusion. Although survey evidence suggests that their access to financial services – particularly digital services – is at least as good as that of men, evidence of a reverse gender gap can be misleading. An IFC study found that 40% of women managing SMEs perceived bank procedures for the extension of credit as too complicated, whereas only 28% of male managers did.\(^6\) This is borne out by data on female financial literacy, with Financial Services Authority (OJK) reporting lower scores in its Baseline Financial Literacy Survey in 2013. Furthermore, there appears to be an adverse association between poverty and gender parity

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\(^5\) https://worldpopulationreview.com/countries/indonesia-population/

\(^6\) IFC 2016 “Women-owned SMEs in Indonesia: A Golden Opportunity for Local Financial Institutions”.
in terms of access to mobile communications. The Financial Inclusion Insights Survey for 2017 found that women below the poverty line had significantly weaker access to mobile services than did males. This result indicates that while gender disparities may not be pronounced in population data, they are prevalent in the lower-income segments which the program aims to support.

3.2. Sectoral Motivations

16. In sectoral terms, the reforms sponsored by the subprogram are designed to benefit MSMEs. These firms are critical to Indonesia’s economic performance, but they are underbanked. Around 40% of deposit accounts of non-financial corporations are held by SMEs and 19% of banking system credit is extended to them. Yet MSMEs account for 99.9% of Indonesia’s 58 million business units. They are also responsible for 97% of employment, and they contribute 57% of GDP.

17. The disparity between MSMEs’ contribution to GDP and their employment of labor indicates that they are deeply undercapitalized, and that economic growth could be stimulated by improving their access to funding. This prospect has already encouraged a large number of government programs and legislative initiatives, and the subprogram will build on them. Indonesian banks are now required to set aside 20% of their lending to smaller enterprises, and risk weights have been lowered for SMEs. OJK has also encouraged peer-to-peer (P2P) lending, relaxed accounting requirements for small firms, and it has improved access to equity raising. While welcoming these initiatives, the OECD has observed that many are needs-based and that reforms would be more valuable if they lead to productivity growth.

18. Initiatives to encourage fintech firms show promise in this regard. In addition to lowering the costs of intermediation, fintech firms are likely to extend the access of the MSME sector to capital. On this point, the ADB has estimated that “…the effects of leveraging digital technology to bank the unbanked could boost GDP by 2% to 3% in markets like Indonesia”. Improving the financial prospects of the MSME sector is not only consistent with economic growth targets; it also supports the demographic targets of the subprogram. Around 93% of Indonesia’s SMEs are lower income family units, and 74% of MSMEs have no access to credit. The need to target women is also consistent with the subprogram’s MSME focus, since approximately 46% of SMEs in Indonesia are run by females. According to the OECD, both younger workers and women are overrepresented within informal MSME sector employment.

4. Program Design

19. The program consists of three interlocking reform areas.

20. **Tools and infrastructure for financial inclusion.** This reform area provides political and administrative support for the rollout of the program. It features the rollout of strategy and information gathering initiatives, and it includes ministries which represent the key demographics, as well as the financial services regulator. Separately, the reform area also sponsors pilot technology projects, which will facilitate the rollout of banking and other financial services to under-serviced segments of the population. In addition, the reform area supports Bank Indonesia’s payments system reform plan for 2025. The payments system is the platform on which all other banking initiatives rest.

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21. **Access to finance by MSMEs and marginalized groups including women and youth.** This reform area more specifically targets the demographic segments of society which are the subject of the program. It also features initiatives which build shared infrastructure for fintech providers. The creation of shared databases and regulatory credit scoring techniques are the most important projects in this regard to facilitate access to finance for MSMEs. Finally, the reform area covers strategic initiatives which stress across ministries and are designed to ensure financial inclusion.

22. **Supervision and consumer protection measures for responsible financial inclusion.** Initiatives in this reform area reinforce the regulatory infrastructure needed for expanding the reach of financial services. They feature provision for a degree of self-regulation, as well as measures (by the financial regulator) to improve financial literacy. The reform area also rationalises the dispute resolution process.

5. **Capacity and Constraints**

23. This program is challenged by the need to preserve balance between financial inclusion and prudential rigor. The growth of non-traditional service providers and the emergence of new customer segments carry the risk of poor financial product origination or servicing practices, and the chances of widespread mis-selling to uninformed customers could be high without proper controls. These risks are accentuated by the sometimes-conflicting mandates of the financial services regulator, which is obliged to pursue financial inclusion, financial stability, and consumer protection. There is no clear priority structure for these mandates in legislation. Nor is there clear and strong legal protection for regulatory staff. There is therefore a risk that the rollout of new services will proceed too rapidly or to customers who are not yet ready for the emerging services.

24. The initiatives in the subprogram recognise and resolve this problem in several ways. First, they integrate different arms of government in the provision of services, and they distribute responsibility for outcomes across a number of government agencies. Although this raises slightly the risk of diffuse accountability, it delivers representation for agencies which are charged with the welfare of target customer groups. Second, the high emphasis on research and strategic process throughout the program is conducive to financial development which is both swift and sound. Finally, the subprogram strikes a balance in the nature of the projects being funded. It not only includes measures for building financial inclusion, but also has some objectives – such as enhanced financial literacy and conflict resolution management – which are targeted at consumer protection.

25. The private sector will also play a key role in mitigating risks to outcomes. Service delivery by fintech firms has been expanding quickly, albeit from a low base, and it is already reaching target groups. Peer-to-peer lending has increased by around 225% over the last year. This rate of growth establishes the in-principle viability of the overall objectives for the subprogram, while demonstrating the effectiveness of private sector service providers in securing outcomes.

26. A separate capacity issue for Indonesia at this time concerns ceilings on government borrowing. Indonesia’s public sector borrowing requirement has a constitutional ceiling of 6.27%. Without external low-cost funding for the reforms in this program, and with heavy demands on government likely to follow from COVID-19, the ceiling might either prevent the reforms being implemented, or it may cause the reforms to displace other worthwhile activity.

6. **Transmission Mechanisms**

27. The overall potential gains from building digital finance and closing Indonesia’s credit gap are substantial. An ADB study has estimated a potential uplift in GDP at approximately
9%, and a corresponding uplift in the income of the poor of around 10%. The subprogram focuses on a number of the reforms that were the focus of this study.

28. An uplift in financial literacy is the most basic prerequisite for realizing these potential gains. Financial illiteracy is known to be associated with low income, but the inter-dependence of poverty and illiteracy can complicate the design of remedies. Recent research for a substantial sample of Indonesians has identified a causal relationship between levels of financial literacy and measures of welfare such as consumption (Askar et al 2020). This validates the design of reforms dedicated to literacy.

29. Improvements to the physical infrastructure supporting financial services are also critical. Without adequate mobile telephony services, improving the geographical reach of the financial system will be difficult. By developing applications that support Indonesia’s large workforce of mobile branchless agents, the financial system will be able to contact a much wider range of remote and under-serviced customers.

30. If complemented with other reforms, the technological uplift will also support the emerging fintech sector. Indonesia’s natural geography means that fintech will be more important to its retail financial development than in many other countries, and providers in the nascent sector will be more able to capitalise on improved technology than more conventional Indonesian service providers. This is because fintech origination channels can operate with smaller transactions and product balances, and they can more readily cope with poorly documented customers.

31. But to realize these advantages, fintech providers will need more support than improved connectivity with their customer base. Indonesia has a history of instability in its banking system, and there are obvious risks in accelerating the roll-out of services to inexperienced users via an equally new set of providers. The development of e-KYC processes, as well as shared databases and algorithms, will be important to ensuring that the new lending takes place on a rational basis and that customers and their suppliers are mutually well informed. The development of auxiliary methods of self-regulation and streamlined dispute resolution procedures are also critical success factors.

32. A final transmission mechanism involves the consistency in the targeting of financially excluded groups and economic sectors. The benefits which accrue to MSMEs also accrue in large measure to target demographic groups. MSMEs are frequently small and operated by marginalised workers. This is strongly implied, at a macro level, in the disparity between their contribution to GDP and their contribution to employment. The difference between MSMEs’ high absorption of employment and their lower contribution to value-added (i.e. GDP) implies that workers in the sector have lower productivity and therefore generally earn less than workers in larger enterprises.

7. Program Impact

7.1. Benefits of the Program

33. The benefits of the subprogram accrue in terms of productive efficiency and reduced income inequality. These themes are broadly related.

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7.1.1 Productive Efficiency

34. A key plank of the program is to provide services that would not have been provided autonomously by the private sector. This is prevalent in the initiatives under Reform Area 2, and it includes the development of data repositories, and the adoption of a regulatory framework on alternative credit scoring for fintech providers.

35. Initiatives to improve the quality of regulation are also included in Reform Area 3. The creation of AFTECH by the government will impose a degree of self-regulation. AFTECH has over 360 fintech and financial services members, and it has been mandated with a degree of self-regulation. This will help to ensure that the rollout of financial services to the unbanked proceeds with integrity and due care.

36. The subprogram also has a strong governing theme of research and strategic preparation. Notwithstanding early success in outreach to under-banked sectors, the needs of the target customer base are not yet as well understood as the needs of established users of the financial system. Strategic preparation and outreach initiatives in reform areas 1 and 2 provide essential direction for later subprograms and other government initiatives.

37. Improvements to the wider financial infrastructure also feature in the program. Bank Indonesia’s blueprint for reform of the payments system includes measures to increase the use of digital transactions by lowering National Clearing System transaction cost by 40% for banks, reducing the upper limit of fund transfer fee charged to consumers by 30%, and increasing the frequency of settlement cycles of fund transfer services. This will lower the cost and increase access for the use of fintech which in turn promotes financial inclusion.

38. Other, similarly themed, technology improvements within the subprogram include the e-KYC provisions under Reform Area 2. These allow MSMEs and other unbanked and underbanked segments to access services including opening bank accounts faster without the need to visit a branch.

39. The e-KYC reforms themselves are being underwritten by several other initiatives geared toward fintech providers. Reforms targeted at improving shared data (PUSDAFIL in Reform Area 2) and the new guidelines for credit assessment supply fintech providers with tools for evaluating creditworthiness within an essentially new economic sector. They also reduce the risk of fraud and over-borrowing, and they will begin to furnish the unbanked with a credit history over time.

40. Technology initiatives in Reform Area 1 complement these aims. They contribute to the productivity of existing resourcing with funding for a geospatial tool that will allow individuals to locate the 350,000 branchless banking agents who facilitate financial service origination in three-quarters of the Indonesian archipelago.

41. These measures are supported by alternative lending guidelines and regulations. A significant problem for unbanked and underbanked individuals and MSMEs is that the nature of data which they can give to financial service providers is intrinsically different to that of mainstream customers. In Reform Area 2, provision has been made for new prudential standards for institutions which serve customers with these characteristics. There is also allowance within the reform area for stronger and different modes of self-regulation.

42. There is clear evidence of success for the reforms that have already been undertaken. On most measures, fintech is growing quickly from its low base and that it is interacting with the MSME sector. Indonesian press reports indicate that peer to peer fintech lending from
Java grew by around 66% in the first half of 2019, whereas loans to the less developed regions beyond Java increased by 106%.\textsuperscript{12}

### 7.1.2 Income Inequality

43. The finding that well-targeted financial literacy programs stimulate income and expenditure growth is important in raising income equality. Indonesian economic inequality, as measured by the Gini coefficient, is high by regional standards. Measures which dampen it by raising the income of the poor are important to social welfare and cohesion.

44. The Financial Inclusion Insights Survey (Reform Area 1) reveals more precisely the financial service needs of the population. It represents a continuation of a series, such that time series data is now available on several financial inclusion measures for a scientifically determined cross-section of the population. It identifies specific geographies in need, and highlights subtle but significant gender disparities in terms of access to mobile telephony services. Finally, the survey also demonstrates rising financial awareness among target demographics and, in that way, validates earlier outreach efforts by the authorities.

45. The theme of identifying needs more effectively is extended in Reform Area 1 with funding for the Financial Access Map piloted by the government. This piloted tool provides greater resolution over access to financial services according to geography. In this way, it can be used to target more effectively and specifically those with limited access to financial institutions.

46. Evidence of the subprogram’s effect on income inequality is also evident in the increase in the number of accounts. Fintech lending in the first half of last year increased by around 69%, while the number of those loans increased by 124% over the same period. Taken together with the small size of the fintech sector, the increase in borrowing accounts relative to loan volume, suggests a pattern of disbursement to smaller and possibly more marginalized borrowers.

47. There are also provisions in Reform Area 3 for conflict resolution. Indonesia’s current arrangements feature multiple agencies dealing with conflict resolution. As part of the subprogram, and with a view to providing certainty for both customers and service providers, the prudential regulation authorities will be seeking to streamlines these arrangements.

### 7.2. Costs of the Program

48. The costs of the program are limited to direct funding costs. There is no economic dislocation, other than the taxes needed to service the debt financing. In the case of some reforms, and at the level of subprogram 1, these are minor. Furthermore, and to the extent of progressivity in the tax system, the incidence of taxation costs is on wealthier Indonesian taxpayers. The poor benefit from programs which wealthier Indonesians ultimately finance.

49. The costs vary significantly across the subprogram. All three reform areas include a number of high-profile but inexpensive initiatives that involve strategic planning. These are necessary for the success of later phases. A second class of reforms has more immediate impacts in terms of both costs and benefits. These larger and more direct projects include the piloting of e-KYC programs, and the geospatial financial services application.

7.3. Longevity of Benefits

50. The benefits of the program have been targeted for their durability. On the demand side of the financial services market, financial literacy has lasting benefits on behaviour, and these benefits are likely to become self-reinforcing, as beneficiaries gain experience with products. On the supply side of the markets the regulatory and infrastructure reforms are conducive to more intense competition among financial service providers. This increased competition should improve both the pricing and product features available to targeted demographic groups.