

INTERNATIONAL MONETARY FUND

IMF Country Report No. 19/199

THE BAHAMAS

FINANCIAL SYSTEM STABILITY ASSESSMENT

July 2019

This Financial System Stability Assessment on The Bahamas was prepared by a staff team of the International Monetary Fund. It is based on the information available at the time it was completed on May 16, 2019.

Copies of this report are available to the public from

International Monetary Fund • Publication Services
PO Box 92780 • Washington, D.C. 20090
Telephone: (202) 623-7430 • Fax: (202) 623-7201
E-mail: publications@imf.org Web: http://www.imf.org

Price: \$18.00 per printed copy

International Monetary Fund Washington, D.C.



INTERNATIONAL MONETARY FUND

THE BAHAMAS

FINANCIAL SYSTEM STABILITY ASSESSMENT

May 16, 2019

KEY ISSUES

Context: The Bahamian financial system is dominated by banks focused on mortgage and personal lending in a highly cyclical tourism-driven economy. More frequent and more destructive hurricanes pose a risk to both economic growth and the financial sector. Nonperforming loans (NPLs) in the small, illiquidity-prone housing market are high and lending activity has fallen during the prolonged post-GFC slowdown. The authorities have made progress in the implementation of the 2013 FSAP recommendations, particularly in strengthening financial system oversight, although important work remains. The offshore financial system has shrunk significantly over the last five years, contemporaneous with the global push for greater transparency in such activities. The Bahamas has been listed by the Financial Action Task Force (FATF) as a country with strategic deficiencies in the anti-money laundering/combating the financing of terrorism (AML/CFT) framework.

Findings: The Bahamian financial system appears to be resilient to current threats to its stability. High aggregate capital and liquidity ratios reflect strong buffers against systemic shocks, but some individual banks have high levels of NPLs and restructured loans that leave them vulnerable. Banking supervision is effective overall; however, practices need improvement in some macro-critical areas. Recent recapitalizations of a state-controlled financial institution highlight the need for improving bank recovery and resolution procedures. The offshore sector has very limited domestic linkages, but it creates reputational risks. The Bahamas is taking steps to address its FATF listing.

Policies: The Bahamian authorities need to take action against potential weaknesses—especially those stemming from the declining but still large stock of problem assets. The further strengthening of supervision of credit underwriting and timely resolution of NPLs are key objectives. The legislative reform of crisis management, resolution, and the safety net needs to be completed, and the Deposit Insurance Corporation needs additional funding. Operationalizing the consumer credit bureau and establishing a real estate price index will provide better macro-financial monitoring capabilities and enhance supervision. Authorities should focus on further improving the effectiveness of the AML/CFT regime and monitor pressures on correspondent banking relationships. Improving financial inclusion would increase consumer welfare and diversify bank balance sheets.

Approved By
James Morsink and
Aasim M. Husain
Prepared By
Monetary and Capital
Markets Department

This report is based on the work of the Financial Sector Assessment Program (FSAP) mission that visited The Bahamas in January 2019. The FSAP findings were discussed with the authorities during the Article IV consultation mission in April 2019. The FSAP team was led by Charles Cohen (mission chief) and included Claudio Visconti (deputy mission chief), Ljubica Dordevic, and Kalin Tintchev (all MCM, IMF); Francisca Fernando (LEG, IMF); Atsushi Oshima (WHD, IMF); Holti Banka and Ivor Istuk (both World Bank); and Tim Clark, Geraldine Low, and Vern McKinley (all external experts). The mission met with Deputy Prime Minister and Minister of Finance Hon. Kevin Peter Turnguest; Minister of Financial Services Hon. Theodore Symonette; Central Bank of The Bahamas Governor John Rolle; Attorney-General and Minister of Legal Affairs Senator Hon. Carl W. Bethel; Insurance Commission of The Bahamas Superintendent Michele Fields; Securities Commission of The Bahamas Executive Director Christina Rolle, as well as senior management and staff of these agencies. The mission also met with commercial banks, the Bahamas International Securities Exchange, insurance companies, legal and accounting companies, and other private sector representatives.

- FSAPs assess the stability of the financial system as a whole and not that of individual
 institutions. They are intended to help countries identify key sources of systemic risk in the
 financial sector and implement policies to enhance its resilience to shocks and contagion.
 Certain categories of risk affecting financial institutions, such as operational or legal risk, or risk
 related to fraud, are not covered in FSAPs.
- This report was prepared by Charles Cohen and Claudio Visconti, with contributions from members of the FSAP team. It is based on the information available at the time it was completed in April 2019.

CONTENTS

Glossary	5
EXECUTIVE SUMMARY	6
TABLE OF MAIN RECOMMENDATIONS	8
MACROFINANCIAL BACKGROUND	9
A. Macrofinancial Setting	9
B. Financial System	10
FINANCIAL STABILITY ANALYSIS	11
A. Vulnerabilities and Risks	11
B. Stress Testing and Interconnectedness	
FINANCIAL SYSTEM OVERSIGHT	17
A. Regulation and Supervision	17
B. Macroprudential Policy	
C. AML/CFT Framework	
CRISIS PREPAREDNESS AND FINANCIAL SAFETY NETS	21
A. Crisis Management	21
B. Deposit Insurance	
OTHER ISSUES	22
BOX	
1. Hurricanes and Financial Stability in The Bahamas	13
FIGURES	
Domestic Financial Sector Structure	
2. Evolution of Bank Capital Adequacy	
3. Bank Profitability	26
4. Composition of Bank Assets and Liabilities	
5. Credit Quality of Domestic Banks and Credit Unions	
6. Maturity Profile of Bank Assets and Liabilities	
7. Offshore Financial Sector Structure	
Sank Claims and Liabilities vis-à-vis Nonresidents	ادع۱ 22

THE BAHAMAS

TABLES

1. Selected Economic Indicators	33
2. Structure of the Financial System	34
3. Financial Soundness Indicators	35
4. FSAP Risk Assessment Matrix	36
APPENDICES	
I. Banking Sector Stress Testing Matrix (STeM)	37
II. Stress Test Tables	40
III. Offshore Financial Sector	48
IV. The Case of Bank of The Bahamas	52
V. Financial Inclusion	53
VI Implementation of 2013 FSAP Recommendations	54

Glossary

ACH Automated Clearing House
AMC Asset Management Company

AML/CFT Anti-Money Laundering/Combating the Financing of Terrorism

BOB Bank of The Bahamas
BSD Bahamian Dollar

CBOB Central Bank of The Bahamas

CBR Correspondent Banking Relationship

CET1 Common Equity Tier 1

DIC Deposit Insurance Corporation

DNFBP Designated Non-Financial Businesses and Professions

DSIB Domestic Systemically Important Bank

DTI Debt-to-Income

FATF Financial Action Task Force

FCMC Financial Crisis Management Committee FSAP Financial Sector Assessment Program

FX Foreign Exchange

GDP Gross Domestic Product

ICAAP Internal Capital Adequacy Assessment Process

ICB Insurance Commission of The Bahamas
IFRS International Financial Reporting Standards

LTV Loan-to-Value

MCM Monetary and Capital Markets Department

MOF Ministry of Finance

MOU Memorandum of Understanding

NIB National Insurance Board
NPL Nonperforming Loan
ROA Return on Assets

SCB Securities Commission of The Bahamas

SFI Supervised Financial Institution

STEM Stress Testing Matrix
WEO World Economic Outlook

EXECUTIVE SUMMARY

The Bahamas appears to be resilient to current threats to its financial stability, but action is needed to safeguard against potential weaknesses. There is a large stock of problem assets that needs to be dealt with from a variety of perspectives: systemic risk monitoring, banking supervision, and crisis management. Vulnerabilities to natural disasters and external economic contagion heighten this need.

The banking sector dominates the financial system and has focused on residential mortgages and consumer loans during a long period of economic stagnation. Despite poor growth the sector has remained profitable. However, the small domestic residential property market backing most secured lending is prone to shocks and illiquidity. This has historically led to high and persistent levels of nonperforming loans (NPLs), which significantly increase uncertainty and fragility in the banking system.

High aggregate capital and liquidity ratios serve as strong buffers against systemic shocks, but some individual banks have large amounts of problem assets that leave them vulnerable.

Despite capital levels well above regulatory minima, commercial banks with large NPL stocks are potentially weak under severe stress conditions. An innovative model developed for this FSAP shows hurricanes can amplify NPL losses in recession scenarios, leading to significant capital impairment. Credit unions, although small systemically, are vulnerable to these shocks and have many small depositors. Funding and interconnection risks are muted.

The offshore sector has very limited domestic linkages, but it creates reputational risks.

Offshore banking is well segregated from the domestic economy through the currency regime. It poses low stability-related risks due to its concentration in private banking and treasury services with little credit creation or maturity transformation. The sector has shrunk greatly over the last five years contemporaneously with the global push for greater transparency in offshore activities. Supervision of the sector is being appropriately focused on anti-money laundering/combating the financing of terrorism (AML/CFT). The new licensing regime announced in December 2018 should be carefully monitored to ensure that no new risks develop.

Systemic risk oversight should be strengthened to address potential buildup of vulnerabilities. The authorities should consider implementing a macroprudential capital buffer for banks. Limited visibility into the household sector would be improved by the proposed consumer credit bureau. A real estate price index and the collection of loan-level data would assist in market monitoring and future implementation of loan-to-value (LTV) and debt-to-income (DTI)-based lending standards. Interagency coordination on systemic matters should be improved, and the Central Bank of The Bahamas (CBOB) should have the authority to recommend regulatory policy regarding lending standards in NBFIs.

Banking supervision is effective overall, but CBOB needs to improve practices in some macrocritical areas. Given the key importance of NPLs, supervisors should continue strengthening industry practices in credit risk management, assessment of problem assets, loan loss provisioning,

and internal assessments of capital adequacy. Bank supervisors' assessments of boards, senior management and internal audits need to be enhanced. Banking supervisory staffing resources need to be increased to implement enhanced offsite surveillance and onsite inspections.

The legislative reform of crisis management, resolution, and safety net needs to be completed. Recent recapitalizations of a majority state-owned bank highlight the critical need to improve recovery and resolution procedures. Legislation should also improve the governance and transparency of any public asset management companies. A crisis management committee (such as the proposed cross-cutting Financial Crisis Management Committee, FCMC) is needed to improve agency coordination and implement proposed reforms in these areas. The Deposit Insurance Corporation needs additional funding to maintain depositors' confidence.

Governance arrangements for state-controlled financial institutions should be strengthened to ensure operational independence and support effective supervision. It is crucial that such institutions continue to enjoy full operational autonomy to achieve their defined objectives, the government as a shareholder does not redefine their objectives in a non-transparent manner, and that their boards are nominated using a well-structured, merit-based and transparent process.

The Bahamas is taking steps to address its identification by the Financial Action Task Force (FATF) as a country with strategic AML/CFT deficiencies. They have made progress in addressing some technical compliance deficiencies. Authorities should now focus on further improving the effectiveness of the AML/CFT regime. They should continue to strengthen risk-based supervision of financial institutions and designated non-financial businesses and professions, and implement measures to enhance entity transparency, in line with the FATF action plan. These efforts are also relevant given pressures in correspondent banking relationships. Authorities should monitor and mitigate possible money laundering risks related to Fintech initiatives and the Economic Permanent Residency Program.

Improvements to financial inclusion would increase consumer welfare and diversify bank balance sheets. The FSAP assessed developments in financial inclusion for individuals and enterprises (SME finance), and retail payments. The main recommendations included opening access to the Automated Clearing House to regulated and supervised non-bank financial institutions and the Treasury, modernizing the electronic payment infrastructure, promoting the digitization of government payments, and improving operations and coordination of public empowerment funds targeting SMEs.

TABLE OF MAIN RECOMMENDATIONS

Recommendations	Time *
Banking Supervision	
Strengthen assessments of credit underwriting and enhance credit risk management and	1
ICAAP reviews. Update guidelines on impaired assets and other asset classifications.	
Ensure strong governance arrangements for state-controlled financial institutions.	ST
Strengthen effectiveness assessments of bank boards of directors, senior management, and	ST
internal audits.	
Increase staffing to support critical functions, including analytics and on-site examinations.	ST
Financial Crisis Management and Safety Nets	
Enact bank resolution legislation, including guidance for public AMCs.	l
Create a Crisis Management Committee to improve coordination and operationalize reforms.	l
Increase DIC funding to reach 2 percent of insurable deposits. Establish a pre-arranged	ST
emergency funding facility.	
Issue Resolve financial statements and asset sales information, and commission a third-party	I/ST
comprehensive review of its operations.	
Financial Stability Analysis and Stress Testing	
Operationalize the proposed Consumer Credit Bureau.	I
Improve data collection and analytical capacity for assessing solvency and liquidity risks;	ST
strengthen focus on key systemic and macroeconomic risks.	
Develop a real estate price index.	ST
Systemic Risk Oversight and Macroprudential Policy	
Introduce a macroprudential capital buffer above a core common equity requirement.	ST
Collect loan-level data for potential implementation of LTV/DTI mortgage lending standards.	ST
Introduce CBOB recommendations regarding lending standards in NBFIs.	ST
Strengthen the role of the Group of Financial Services Regulators in systemic risk surveillance	1
and oversight.	
Anti-Money Laundering / Countering the Financing of Terrorism (AML/CFT)	
Continue to strengthen AML/CFT risk-based supervision of FIs and DNFBPs by enhancing risk	I
analysis, dedicating resources, and using enforcement actions.	
Assess potential ML/TF risks related to Fintech initiatives.	I
Prevent pressure on correspondent banking relationships, including by ensuring availability	ST
of accurate beneficial ownership information.	
Developmental Recommendations: Financial Inclusion – Payment Systems and SMEs	
Open the ACH to regulated and supervised non-bank financial institutions and modernize	ST
the electronic payment infrastructure. Differentiate debit and credit merchant discount rates.	
Promote digitizing government payments and allow Treasury participation in the ACH.	ST
Improve operations and coordination of public empowerment funds targeting SMEs.	I

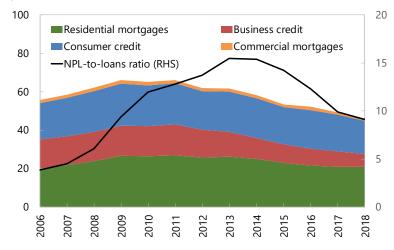
^{*} I (immediate) = within one year; ST (short term) = 1–3 years

MACROFINANCIAL BACKGROUND

A. Macrofinancial Setting¹

- 1. The Bahamian economy has returned to moderate growth after a period of stagnation, but long-term prospects are more muted. After a decline in real GDP from 2013–2015, growth in this tourism-driven economy is projected to have risen to about 2.3 percent in 2018, supported by a major new resort and a stronger U.S. economy. Longer-term annual growth projections of 1.5 percent reflect economic bottlenecks. Public debt-to-GDP has risen to 55 percent in FY2017, from 38 percent in FY2012.² In response, the government has taken measures to maintain debt sustainability.
- 2. External vulnerabilities are large due to the economy's small size and dependence on tourism and FDI. As tourism accounts for 45 percent of GDP, growth is vulnerable to downturns in the United States (the largest source of tourism demand). Real estate investment and construction are also important economic drivers, representing about 22 percent of GDP.
- **3. Frequent and increasing hurricanes amplify the risks to growth.** Over the last 20 years, The Bahamas has been hit by 11 hurricanes with an average cost of 4.3 percent of GDP. In contrast, during the 20 years prior there were only 4 hurricanes at an average cost of 3 percent of GDP.
- **4. The Bahamas has a fixed exchange rate and capital controls.** The Bahamian dollar is pegged to the U.S. dollar at parity and residents have limited access to foreign exchange. Capital controls afford some scope for monetary policy independence, but policy transmission is weak.
- 5. Credit creation is anemic and focuses on the household sector, as investment is mostly FDI financed. Commercial business lending was substantially reduced (from a low base) during the recent stagnation (Text Chart).

Credit to the Private Sector (percent of GDP, unless otherwise indicated)



Sources: CBOB, and IMF staff estimates.

¹ The GDP figures used in this document are based on the October 2018 World Economic Outlook (WEO) vintage. Estimates of GDP and other economic indicators as of May 2019 are shown in Table 1.

² The fiscal year ends in June.

B. Financial System

- 6. The domestic financial system is of moderate size and dominated by banks (Figure 1, Table 2). Seven banks are domiciled in The Bahamas; four are foreign-owned and account for roughly three-quarters of banking assets.³ All seven are deemed systemically important by the authorities and rely on deposits for funding. With limited commercial lending opportunities due to the weak economy, bank portfolios are concentrated in residential mortgages and consumer credit.
- 7. The banking sector has strong aggregate capital and liquidity ratios (Figure 2, Table 3), although there is significant dispersion at the individual bank level. As of September 2018, the system-wide capital adequacy ratio (CAR) stood at 32 percent, well above the 17 percent regulatory target.⁴ The aggregate level is raised by a large foreign bank with over 50 percent CAR. The ratio of liquid to total assets was 30 percent as of June 2018.
- 8. Despite the poor growth environment, the sector has remained profitable (Figure 3). System-wide return on assets (ROA) has remained in the 2.2–2.5 percent range over the last three years, supported by higher fees, stable lending rates, and lower deposit rates. Assets grew only 1.9 percent annually from 2007–2017, 0.2 percentage points above inflation, driven by credit to the central government. The share of credit to the public sector (including securities) in banks' domestic assets has increased to 27.2 percent in 2018 from 21.1 percent in 2013.
- **9. NPLs have historically spiked during slowdowns and persisted for extended periods.** The ratio remains high at 9 percent, after peaking at 15.3 percent in 2013. The situation varies significantly across banks, with three institutions owning 61 percent of all NPLs. The large stock of restructured loans is at increased risk of falling back into nonperforming status.
- **10. Excess liquidity permeates the banking sector (Figure 4).** The financial system operates under weak monetary policy transmission with an underdeveloped securities market, common features in small open economies with pegged exchange rates and strong capital controls. This condition does not seem to pose a threat to financial stability in The Bahamas. Through the Exchange Control, the CBOB has maintained the foreign reserve cover at about twice the statutory requirement.
- 11. In 2014 and 2017, the majority state-owned Bank of The Bahamas (BOB) was recapitalized by the government (Appendix IV). In the process, portions of its NPLs were transferred at gross book value to a government-owned asset management company (AMC), helping lower the banking system NPL ratio by about 3 percentage points in the period. BOB held approximately 7 percent of total bank assets as of June 2018. NPLs remain high at 26 percent.

_

³ Excludes one foreign bank with significant branch presence.

⁴ There is a 17 percent CAR target ratio and 14 percent trigger ratio. Breaching the 14 percent threshold prompts supervisory actions including dividend restrictions and production of a recovery plan.

12. The Bahamas hosts a large offshore financial sector with very limited links to the domestic financial system. Offshore assets total US\$256 billion as of June 2018 (approximately 20 times GDP), a 40 percent drop since the 2013 FSAP. Banks dominate the sector with US\$168 billion in assets; they concentrate in private banking and treasury services with little credit creation or maturity transformation. The investment fund space (US\$86 billion in assets) includes few traditional collective investment vehicles; most assets are in non-standard funds aimed at qualified investors. The offshore sector is well segregated from the domestic economy through the currency regime. Its activities pose low financial stability risks, but create reputational risks. For details see Appendix III.

FINANCIAL STABILITY ANALYSIS

A. Vulnerabilities and Risks

- **13.** The banking system has seen declining investment portfolios and persistently high NPLs since the global financial crisis. Despite reductions in NPLs, weaknesses persist in residential mortgage portfolios (Figure 5). Two of the seven domestic banks (about 15 percent of the seven domestic banks' assets) and the two largest credit unions have NPL ratios significantly above 10 percent, making them vulnerable to further write-offs. Following substantial provisioning in 2014 bank profits dropped sharply, but then recovered. As of June 2018, all banks but one were profitable. Reduced lending helped increase the risk-weighted capital ratio to 32 percent in September 2018 from 28.6 percent in December 2016. Low private sector credit reflects strained borrowers' debt-servicing capacity. The absence of a credit bureau and of a strong businesses book-keeping make assessment of borrowers' creditworthiness challenging. 6
- 14. Banks rely heavily on potentially hard-to-value collateral to mitigate losses to their residential mortgage portfolio. The real-estate market is small and properties are sometimes challenging to value given a lack of comparable sales, limited transaction disclosure requirements, and no housing price index. Historically properties have become illiquid under significant shocks, leading to prolonged NPLs and significant write-downs.
- **15. Credit risk dominates interest rate risk in a largely floating rate environment.** Under rising interest rates debt servicing capacity will fall, potentially boosting NPLs and lowering earnings. Maturity mismatches are small given the prevalence of variable rate loans and deposits (Figure 6).
- **16. Risks from regional financial interconnections seem low.** Despite significant foreign bank presence, domestic banks' interconnections with regional banks, sovereigns and insurers are on average small relative to capital, and potential cross-border spillovers are low.⁷

⁵ Specific provisions cover about 58 percent of NPLs. The ratio of NPLs net of specific provisions to capital was about 10 percent as of September 2018.

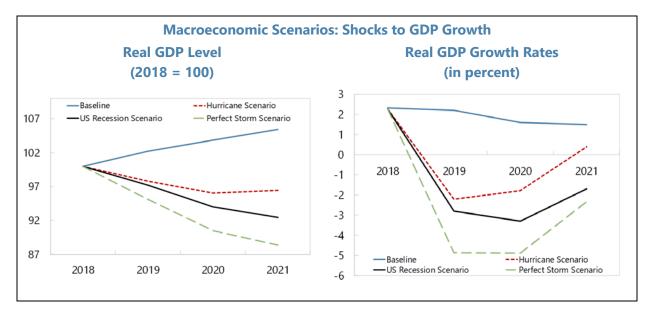
⁶ In January 2019, the CBOB selected a credit bureau service provider, but the credit bureau will take time to become fully operational.

⁷ Four subsidiaries of major Canadian groups account for roughly three-quarters of banking system assets.

B. Stress Testing and Interconnectedness

Onshore Stress Testing

- 17. Top-down stress tests scenarios were developed using local risks and vulnerabilities to assess solvency, liquidity, and contagion risks at domestic banks and the two largest credit unions, which cover about 97 percent of all credit institution assets. The main sources of risks emanate from contagion from severe U.S. and/or regional recessions, and from natural disasters. Other potentially important risks stem from severe real estate price corrections and tighter global financial conditions (where transmission channels would be very similar to the contagion from a severe U.S. recession), and CBR pressures on offshore banks (which would likely result primarily in liquidity risks in line with those tested in our liquidity analysis) (Risk Assessment Matrix Table 4).
- **18.** Three scenarios test banks' resilience to key financial stability threats (Appendix II Table 1). The October 2018 World Economic Outlook (WEO) is used as a baseline. A *natural disaster* scenario models the risk of a major hurricane negatively impacting tourism, employment, and bank asset quality.⁸ A *U.S. recession* scenario leads to significant bank losses in mortgages and consumer loans. Finally, a "perfect storm" scenario assumes simultaneous shocks from a U.S. recession and a major hurricane, leading to an extreme-but-plausible cumulative GDP decline of 2-standard deviations (Text Chart). An innovative model developed for this FSAP shows that hurricanes can amplify NPL losses in recession scenarios, leading to significant capital impairment (Box 1).



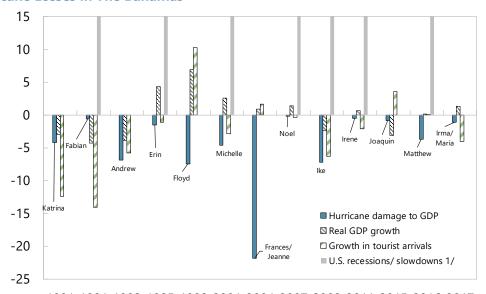
_

⁸ The tail end of the distribution of hurricane losses corresponds to 22 percent of GDP and occurred in 2004 after damage from hurricanes Jeanne and Frances. GDP growth in The Bahamas exhibits significant volatility; its 2-year cumulative standard deviation is about 6.5 percent from 1978–2017.

Box 1. Hurricanes and Financial Stability in The Bahamas

An innovative model incorporates hurricane risks into solvency stress testing. A small dynamic stochastic general equilibrium model (DSGE) is calibrated using historical hurricane damage data. Given that banks typically require catastrophic risk insurance, and domestic insurance companies reinsure abroad, growth and employment are the main channels through which hurricanes affect the banking system. Banks' direct credit exposure to tourism companies appear small, mitigating the risk of large business loans losses, though hotel and infrastructure damage can lead to unemployment and bank losses on mortgages and consumer loans. The overall impact depends on the damage magnitude and could be long-lasting, especially if those affected choose not to rebuild—in 2016 Hurricane Matthew led to closure of several resorts that were already facing a severe demand slump. A regression analysis of 2002–15 NPLs revealed that the effect of hurricanes on bank NPLs is nonlinear: when growth is weak, the interaction of recessions and hurricanes amplifies the increase in NPLs.

Hurricane Losses in The Bahamas

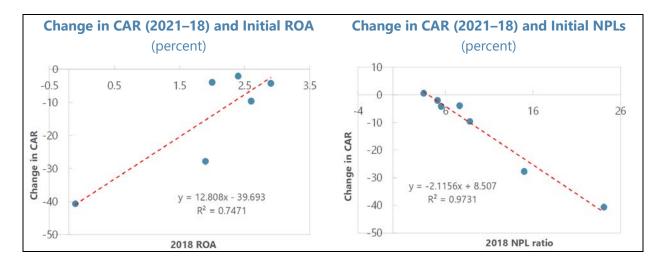


1981 1991 1992 1995 1999 2001 2004 2007 2008 2011 2015 2016 2017

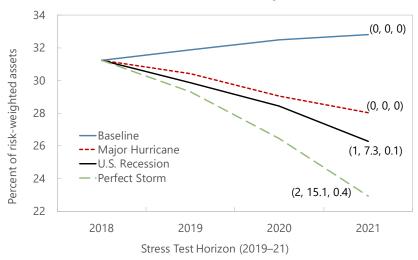
Sources: Azevedo (2016), EM-DAT, and U.S. National Hurricane Center. 1/ U.S. slowdowns are defined as growth declines of at least about 1 percentage point or more relative to the previous year.

19. Solvency stress tests suggest the overall banking system is resilient to a range of adverse scenarios, but weaknesses widen under severe stress (Appendix II Table 2).

Weaknesses are driven by high NPLs and low ROA (Text Chart). While a short period of stress caused by a major hurricane would weaken banks' performance (but not below the 17 percent target capital ratio), a U.S. recession scenario would cause one bank with large NPLs and weak profitability to become undercapitalized (Text Chart). ^{9, 10} Under the combined shock, the system-wide CAR would decline to 23 percent and two banks (15 percent of banking assets), would need additional capital. ¹¹ Sensitivity tests for credit risk broadly confirm these results (Appendix II Table 3).



Macroeconomic Scenario Results: System-wide CAR 1/



1/ Numbers in parenthesis show for 2021, respectively, the number of banks with stressed CARs below 14 percent, the percentage of the system's assets they represent, and the potential recapitalization needs in percent of nominal GDP.

⁹ The stress tests were conducted on total regulatory CAR using a hurdle rate of 14 percent.

¹⁰ These shocks imply aggregate NPL increases of about 70 percent and 120 percent, respectively.

¹¹ Implying an aggregate NPL increase of about 150 percent.

- **20.** The banking system shows resilience to market risk, while liquidity tests reveal a shortfall in one bank. With small asset-liability mismatches, banks' CARs remain well above the trigger and target ratios after a large interest rate shock (Appendix II Table 4), while small net open foreign exchange (FX) positions limit the impact of exchange rate shocks. The bank affected by a sustained funding shock has lower liquid assets and large long-term loans (Appendix II Table 5).
- 21. Sensitivity tests for the two largest credit unions reveal significant vulnerability to credit risk. They become undercapitalized under moderate stress due to current weak capital buffers (one credit union is broadly compliant; the other is currently under the 10 percent unweighted capital requirement and CBOB should impose corrective actions) and NPLs above 10 percent (Appendix II Table 6).¹³ The credit unions are more resilient to credit concentration and interest rate risks than banks given their larger exposure to short-term consumer loans.

Offshore Stress Testing

22. Stress tests on offshore banks suggest that traditional banking risks in the sector are broadly contained. Of the ten large offshore institutions covered by the stress tests, six engage primarily in private banking, and two in wholesale banking (mainly intra-group treasury operations). Therefore, final stress test results include the remaining two banks engaged in more traditional banking (Appendix II Table 7). These institutions lend mainly to corporates and do not become undercapitalized even in the event of a 15 percent deterioration in loan quality (Appendix II Table 8). Credit concentration risk is more relevant for one institution, which would see its capital to asset ratio approach the 5 percent hurdle rate in the event of a default of its five largest borrowers. Maturity mismatches are small and sensitivity to interest rate risk is low.

¹² The impact of the interest rate shocks on banks' net interest income was measured over a 1-year horizon, using granular data on the time-to-maturity profile of bank assets and liabilities up to 1 year.

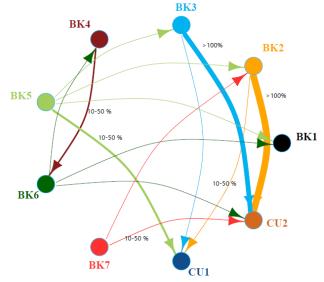
¹³ This risk-weighted threshold is indicative given that credit unions currently do not have to comply with risk-weighted capital requirements.

¹⁴ The ten large offshore institutions include the top-five by balance sheet assets and the top-five by fiduciary assets.

¹⁵ Tests were conducted on the unweighted CAR and used a hurdle rate of 5 percent given some data limitations.

Interconnectedness Analysis

bilateral linkages of banks and insurers appears limited. Seven onshore banks, the two largest credit unions, eight large offshore banks, and the ten largest domestic insurers were analyzed. ¹⁶ Contagion simulation shows that only one credit union is vulnerable to potential counterparty default, as each of its deposits with two banks exceed its capital (Text Chart). Given the credit union's small size, associated financial stability risks are low.



Data as of September 2018.

Arrows point from the institution source of the exposure (liability issuer) to the institution carrying the exposure (liability holder). Arrow thickness in proportional to the size of the exposure relative to the lender's capital. Unmarked lines show exposures below 10 percent of the lenders' capital.

Sources: Central Bank of The Bahamas, and IMF staff estimates.

Data Issues

24. Data for financial stability analysis and stress testing could be improved in several

areas. Expanding the granularity of bank-level data by loan classifications, provisions, collateral, and restructured loans could help enhance credit risk monitoring. Developing a real estate price index would strengthen monitoring of housing price trends and collateral valuations. A direct stress test of the impact of a decline in local housing prices is not possible at present given data limitations. Data on household leverage and loan-level loan-to-value and debt-to-income ratios would improve monitoring of risks in mortgage portfolios. Expanding data collection for credit unions and offshore financial institutions could help integrate them in the stress testing exercises conducted by CBOB.

¹⁶ The network analysis was based on Espinosa-Vega, M. A. and J. Solé, 2010, "Cross-Border Financial Surveillance: A Network Perspective," IMF Working Paper WP/10/105.

FINANCIAL SYSTEM OVERSIGHT

A. Regulation and Supervision

- 25. CBOB has a generally effective supervisory program given the size and complexity of the banking system. It utilizes a principles-based approach and maintains wide discretionary powers over required corrective measures, which will be strengthened with the proposed resolution regime. Several initiatives have strengthened the overall regulatory and supervisory framework of banks. CBOB, together with the Ministry of Finance (MOF), has introduced or updated several key pieces of the legislation and regulations on AML/CFT and issued guidance or consultation proposals for Basel II/III regulatory reforms. CBOB has enhanced its risk-based supervision regime on AML both in offsite surveillance and onsite examinations.
- 26. CBOB has been heavily engaged in the recovery efforts of one of its largest domestic banks, which is majority state-owned. Although it has successfully made use of several corrective measures over the past 10 years pertaining to this supervised financial institution (SFI), state ownership of the bank may have hindered the operational independence of the CBOB in the past.
- 27. Risk-based supervision could be more effectively targeted, and increased resources are likely needed. Domestic and international SFIs are subject to the same risk-based supervisory framework, with emphasis on the largest SFIs. Supervisors should conduct more frequent onsite examinations of domestic systemically important banks' (DSIBs) corporate governance, risk management and internal controls, and carry out in-depth reviews of material risks. Resources will also be needed to support offsite analytic practices and CBOB's current legislative initiatives.
- 28. CBOB supervision would benefit from greater interaction with banks and more use of thematic onsite examinations. The supervision program places significant emphasis on the roles of the board and senior management. Given supervisory reliance on auditors and board attestations, the CBOB should require, in case of material errors, a third party or supervisory review of all aspects of the certification. Boards should obtain "reasonable assurance" qualifications if external auditors/consultants are used for such work.
- 29. CBOB should undertake more direct assessments of the effectiveness of boards of directors and senior management with respect to their specific responsibilities. The latter has gained emphasis in CBOB's updated Guidelines for Corporate Governance (2013), in line with the Basel Core Principles. However, CBOB's current principles-based assessment of corporate governance, largely in the context of specific risk areas, may attenuate the ability to hold accountable those with key responsibilities.
- 30. In line with OECD guidelines for corporate governance of SOEs, governance of state controlled financial institutions should be improved to ensure that (1) such institutions continue to enjoy full operational autonomy to achieve their defined objectives, (2) the government as a shareholder does not redefine their objectives in a non-transparent manner, and (3) boards are nominated using a well-structured, merit-based and transparent process.

- **31. CBOB** has updated its capital regime and it is now largely in line with the key aspects of Basel II standards. Current required regulatory capital ratios are super-equivalent to Basel, with DSIBs being required to meet a 17 percent target for capital and the 14 percent trigger for supervisors to escalate coverage of the SFIs. Credit, operational, and market risks are now all captured in capital requirements and CBOB issued guidelines on Internal Capital Adequacy Assessment Process (ICAAP) in 2016 to address risks not well captured by the regulatory regime. Accordingly, more supervisory attention should be placed on ICAAP reviews.
- 32. CBOB should undertake a deeper review of credit risk management practices at its largest SFIs, including the treatment of NPLs and impaired assets. CBOB has improved engagement with the largest SFIs to address lingering NPL problems. However, guidelines allow SFIs to follow a variety of credit risk methodologies for NPLs and provisioning. This could lead to inconsistent asset classification, collateral valuation, and loss provisioning practices (particularly for residential mortgages), resulting in errors in reported financial data and underestimation of credit risk. As CBOB has conducted only five in-depth DSIB credit reviews since 2015, it is imperative that CBOB ensures that credit risk management practices by banks are in place and effective, and that NPL are accurately identified and provisioned. With IFRS 9 implementation effective January 2018, further guidance is needed regarding the validation of expected credit loss models. Credit risk management guidance should be updated immediately.
- **33. CBOB should continue its enhanced supervisory oversight of SFIs' compliance with AML/CFT requirements.** CBOB has made a concerted effort to review SFIs' board policies and procedures pertaining to AML/CFT and has undertaken focused onsite reviews of about twenty percent of all SFIs. To ensure any needed remediation efforts are carried out on a timely basis, it is essential CBOB takes timely corrective measures when discovering AML/CFT compliance gaps. It is recommended that CBOB undertakes a review of the compliance of Credit Unions with the AML/CFT requirements.
- **34. Direct linkages between banks' onshore and offshore banking operations are relatively small,** given the regulatory requirements for specific licensing and separation of offshore and onshore banking activities. The new licensing regime announced in December 2018 which allows financial institutions to serve both international and domestic clients—subject to exchange controls—should be carefully monitored to ensure that no new risks develop.

B. Macroprudential Policy

35. While CBOB acts as a macroprudential policy (MPP) authority, there is no formal MPP framework in place, nor a specific MPP toolkit to counter systemic risks. The reduced scope for monetary policy, in the context of a small economy with an exchange rate peg and a large share of foreign banks, puts a premium on macroprudential policy. This is particularly relevant considering the potentially volatile real estate sector and the limited ability of the official sector to monitor this market.

- **36.** The Group of Financial Services Regulators should meet regularly to share information on and coordinate responses to emerging systemic risks. While recently this group has mostly focused on AML/CFT coordination across the agencies, it also provides a natural forum for systemic risk discussion and coordination.
- **37. A macroprudential framework should be formalized.** This should include a clear assignment of the MPP mandate to the CBOB, setting out the objectives of the MPP body in law, and specifying decision-making arrangements for macroprudential actions. The framework would allow the CBOB to successfully implement (and release) the proposed macroprudential buffer (discussed below) and to operationalize initiatives to close data gaps (see below). The framework should ensure that the CBOB has sufficient powers to recommend regulatory policy actions across the financial system (i.e. including banks and nonbanks), in particular to ensure uniform lending standards—notably to mortgages by insurance companies (regulated by the ICB) and mortgages and personal loans by non-financial firms (lightly regulated by the SCB).
- 38. CBOB should prepare for future implementation of LTV and DTI-based mortgage lending standards. The mission explored the use of macroprudential policies to increase resilience of borrowers. To Given the high capital ratios of most banks, more uniform lending standards and the use of prudential ratios to guide lending exposure would be the most effective way of implementing counter-cyclical measures. This would also increase resilience of (mortgage) borrowers to adverse events, including hurricanes. In this context, the main policy measures would include both higher equity requirements and repayment capacity. While this is not a pressing issue given subdued current market conditions, data collection and analytical tools should be developed in anticipation of future use of such measures.
- **39.** Data gaps that inhibit systemic risk analysis or MPP implementation should be identified and addressed. Currently the authorities have little ability to track household indebtedness. There is also no reliable source of data on the critical housing sector.
- The establishment of the credit bureau should be given highest priority to support appropriate calibration and enforcement of any debt-to-income limits.
- A residential real estate price index should be established to enhance market monitoring, collateral valuation, and the setting of lending standards.¹⁸
- Loan-level data should be collected to enable the use of macroprudential lending standards.
- The CBOB's Financial Stability Report (FSR) should strengthen its analysis of key MPP statistics, such as the credit-to-GDP gap.

¹⁷ CBOB already imposes an LTV of 85 percent on personal loans and a total debt service ratio of 40–45 percent of ordinary monthly income.

¹⁸ Crucial underlying administrative data on property sales must be developed.

40. CBOB should consider introducing a macroprudential capital buffer above a core CET1 requirement. CBOB is moving to a Basel III compliant capital standard. The FSAP recommends a fixed macroprudential capital buffer instead of a dynamic counter-cyclical capital buffer (CCyB). A CCyB designed to counter time-varying systemic risks would be difficult to implement given the complex analytical and data requirements associated with its calibration. A static capital buffer (beyond the international minima) would require less timely data and analytical effort and would be relaxed only in the event of a significant shock.

C. AML/CFT Framework

- 41. The Bahamas is addressing its identification by the FATF as a country with strategic AML/CFT deficiencies and should continue to implement measures agreed with the FATF. Besides this identification in October 2018, the FATF also noted The Bahamas as providing political commitment to address deficiencies through an action plan. Authorities have made progress in addressing technical compliance deficiencies what resulted in recent upgrades in the context of CFATF's follow-up process. Authorities must focus on improving the effectiveness of the AML/CFT framework at mitigating key risks.
- **42.** The authorities should continue to strengthen AML/CFT supervision of Financial Institutions (FIs) and Designated Non-Financial Businesses and Professions (DNFBPs). Efforts are ongoing to strengthen AML/CFT supervision and authorities should also focus on undertaking risk-based supervision of DNFBPs. Authorities should use the full range of enforcement actions available to them in addressing AML/CFT deficiencies of FIs and DNFBPs, in view of the lack of administrative fines and sanctions imposed to date. Authorities should also focus on measures to enhance entity transparency, including by building upon the recently enacted Register of Beneficial Ownership Act.
- 43. The authorities should pay attention to other potential high-risk areas, such as Fintech Initiatives and the Economic Permanent Residency Program (EPRP). The EPRP should continue to be monitored to ensure measures are in place to prevent the risk of its misuse, including through appropriate due diligence on applicant's source of funds. On March 1, 2019 authorities selected a provider to design and implement a central bank digital fiat currency system. Authorities should assess the potential ML/TF risks related to Fintech initiatives and ensure that effective AML/CFT measures will be implemented in line with FATF Recommendations.
- **44. Efforts to address these deficiencies should help alleviate concerns with pressures in correspondent banking relationships (CBRs).** Offshore banks, in particular "home" offshore banks (i.e., those without a foreign parent financial group), have reported restrictions and terminations in their CBRs. These pressures result from correspondent banks' perceptions of ML/TF risks, including reputational risks associated with the offshore sector. While the impact on the broader economy appears limited to date, it is important to monitor ongoing pressures.

CRISIS PREPAREDNESS AND FINANCIAL SAFETY NETS

A. Crisis Management

- 45. The framework for crisis management, resolution, and safety net is undergoing an ambitious legal reform to bring it in line with international best practices. Vulnerabilities in the existing framework were exposed in the context of the near failure of BOB (Appendix IV) and indicated that implementation approaches for deposit insurance, asset management, and recovery and resolution planning should be addressed in parallel with proposed legal reforms. They should be finalized, approved, and implemented without delay.
- 46. The amendments represent a major improvement to the bank resolution framework. The proposal follows an administrative approach to bank resolution (i.e. a special resolution regime), under which CBOB may appoint a statutory administrator with broad powers to resolve a failing bank, and a liquidator to wind up the bank without recourse to the courts. Provisions requiring recovery plans and granting CBOB the power to develop resolution plans are also included. Amendments to emergency liquidity assistance provisions clarify the purpose of such lending and address solvency tests, collateral mandates, penalty rates, and maturity limits.
- The legal framework and operations of the current resolution regime lack provisions 47. underlying the creation of an AMC. Additional provisions should define features of AMCs—such as establishment, governance, accountability, strategy, and sunset—and should be set forth in the primary law. The framework should also impose control over the selection, appointment, and qualifications of an AMC's management. Presently, the operations and management of Resolve, the existing AMC, are opaque, as the guiding legal infrastructure is lacking (Appendix IV). It has no clear accountability as information regarding its activities are not available to the public, the CBOB or the Deposit Insurance Corporation (DIC). Resolve should run its operations on a commercial basis, with an explicit mandate to maximize the value of the assets it holds.
- Any bank with excessively high NPL levels and a potentially challenged business model should submit a restructuring plan to the CBOB. Any such institution needs to ensure its viability on a forward-looking basis or be resolved if a path to viability cannot be found. High capital levels across the banking sector, in combination with the above-mentioned reforms to the crisis management framework, mean that any needed restructurings should be undertaken during the current period when they can likely be accomplished with minimal disruption to the financial system.
- 49. CBOB is considering the creation of a coordinating committee to facilitate information exchange and coordinate crisis preparedness and management. The CBOB would like to create a Financial Crisis Management Committee (FCMC) consisting of the Group of Financial Services Regulators and the MOF. The FCMC should play an important coordinating role in assuring the legal amendments under consideration are operationalized by the appropriate regulators and that a crisis management plan consistent with the legal framework is drafted and approved.

B. Deposit Insurance

- **50. Recent experience has demonstrated the insufficiency of the DIC fund to absorb the failure of a mid-sized institution.** The fund is at B\$56 million as of year-end 2018 with a target balance of B\$88.5 million; the DIC Board is considering raising the target to B\$125 million (2 percent of insurable deposits), a level sufficient to fund resolution of the largest medium-sized bank. ¹⁹ The levy should be increased to meet this target, as based on DIC's projections it would take about a decade to reach B\$125 million at the current premium of 5 basis points.
- **51.** The target fund should be reassessed for a range of realistic crisis scenarios. The DIC should produce financial projections based on alternative scenarios of future bank failures. The mission recommended targeting a level of at least 2 percent of insurable deposits in the near term and increasing this to closer to 4 percent over the longer term.²⁰
- **52. Caution is suggested in expanding DIC coverage to credit unions.** This should only be done when DIC has enough resources to cover its obligations. CBOB needs to ensure that credit unions are sufficiently capitalized and effectively supervised in a manner commensurate with current DIC members.
- 53. Amendments proposed to the Protection of Depositors Act (PDA) establish CBOB as the resolution authority and transfer to it part of the DIC current resolution powers. Currently, the DIC has a "paybox plus mandate" since the PDA allows it to provide financial assistance to a troubled member institution. The proposed amendments also empower the DIC to contribute to purchase and assumption transactions on a least-cost basis.
- 54. The DIC has the authority to borrow, but there is no specified source for this stand-by line of credit if needed on an emergency basis. To prevent delays in payment of insured depositors, expedited procedures should be developed regarding access backstop financing, which should be available primarily from the MOF.

OTHER ISSUES

55. The authorities are undergoing a revamping of their sovereign debt institutional arrangements, issuance strategy, and market infrastructure. Their goal is to promote domestic debt market development by establishing a debt management office within the MOF. Increasing domestic sovereign debt issuance is an important long-term goal for improving the risk profile of the sovereign, and would also benefit domestic pension and insurance companies, which have few sources of long-duration assets in a small closed financial system. Increasing issuance may be challenging in the short-term given a lack of scale. The Bahamian presence in the Eurobond market

¹⁹ Eligible (insurable) deposits are those that meet the legal criteria for insurance under the DIC Act, including amounts above the insurance limit.

²⁰ Combined with the envisaged borrowing capacity from the government, a 2.0 percent fund would allow for any one of the medium-sized banks to be paid out by the deposit insurance scheme.

should also be maintained. The authorities may wish to explore increased access to the Eurobond market for domestic investors, provided this does not materially impact the balance of payments.

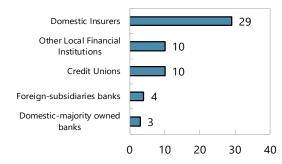
CBOB considers increased financial inclusion as a critical reform area. The FSAP 56. provided recommendations for improvements in financial inclusion for individuals and enterprises (SME finance), and retail payments. The main recommendations aimed at increasing competition and financial inclusion through the expansion and modernization of the existing retail clearinghouse services, facilitating the shift away from cash and towards electronic payments by Government initiatives, and reducing demand and supply constraints to SME access to finance (Appendix V).

Figure 1. The Bahamas: Domestic Financial Sector Structure

The domestic financial sector has a smaller number of players...

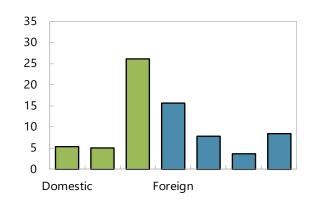
Domestic Financial Sector 1/

(Number)



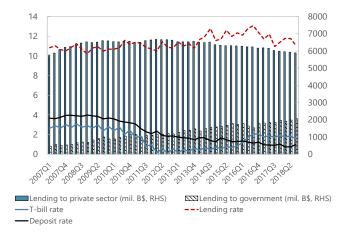
Two domestic banks out of the 7 have NPLs above 10 percent.

NPL Ratio by Bank, June 2018



...supported by an increase in interest rate spread.

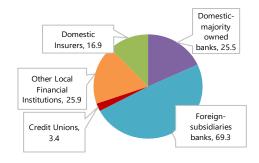
Bank Lending



...with assets estimated at US\$18 billion in June 2018.

Domestic Sector's Assets 1/

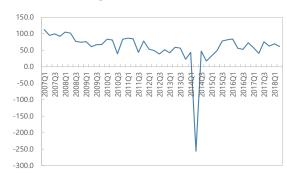
(Percent of GDP)



Income in domestic banking sector has been stable despite the credit contraction...

Net Income in Banking Sector

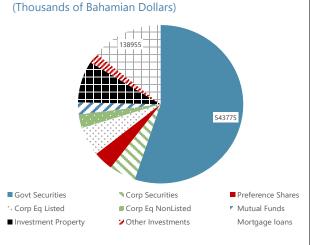
(Index, 2017 average = 100)



Note: The sharp decline in 2014Q2 was driven by a one-off expense

Investments in the central government and the mortgage by the domestic insurance sector are non-trivial.

Domestic Insurance Sector: Investment Portfolio, 2017

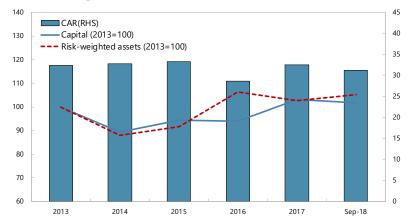


Sources: Central Bank of The Bahamas, Insurance Commission of The Bahamas, and IMF staff calculations. 1/ Includes only domestic-majority owned banks and subsidiaries of foreign banks.

Figure 2. The Bahamas: Evolution of Bank Capital Adequacy

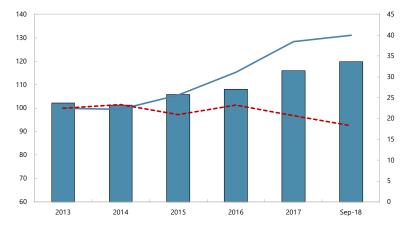
The banking sector's CAR has held steady...

Domestic Banking Sector



... as CARs of banks with resident operations increased after receiving fresh capital and reducing risk exposure...

Banks with Resident Operations



...while CARs of banks with resident and nonresident operations decreased slightly due to stronger growth in risk assets.

Banks with Nonresident Operations

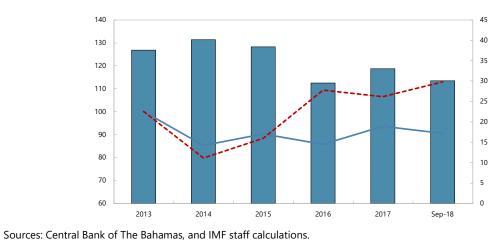
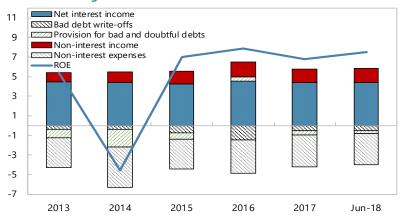


Figure 3. The Bahamas: Bank Profitability

(In percent of average assets, annualized quarterly figures)

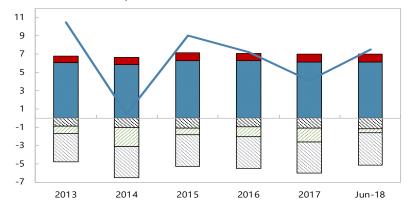
Bank profitability has recovered following large loan-loss provisions and write-offs...

Domestic Banking Sector



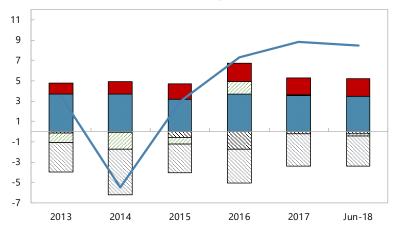
...supported by steady interest income at banks with resident operations...

Banks with Resident Operations



...and increased noninterest income at banks with both resident and nonresident operations.

Banks with Resident and Nonresident Operations



Sources: Central Bank of The Bahamas, and IMF staff calculations.

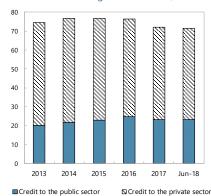
Figure 4. The Bahamas: Composition of Bank Assets and Liabilities

The share of credit to the public sector in domestic credit increased...

...while bank deposits remained stable but fixed deposits declined.

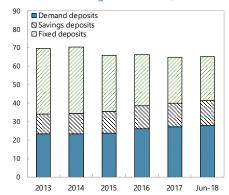
Domestic Credit

(In percent of total banking sector assets)



Composition of Bank Funding

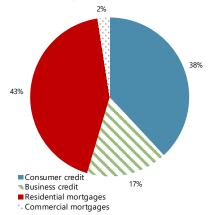
(In percent of total banking sector assets)



Ample liquidity and limited lending opportunities boosted banks' liquid assets and free reserves...

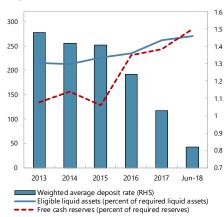
Sectoral Composition of Credit, June 2018

(Percent of credit to the private sector)



Banking Sector Liquidity

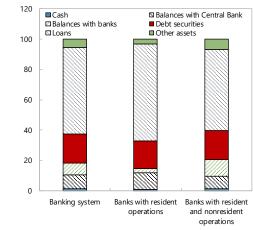
(In percent)



Balance sheet structures are similar across domestic peer groups with resident and resident/nonresident operations.

Asset Composition

(In percent of total assets



Sources: Central Bank of The Bahamas, and IMF staff calculations.

Liability Composition

(In percent of total liabilities and capital)

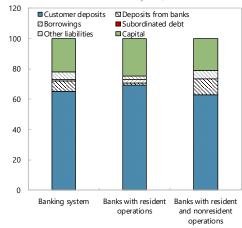
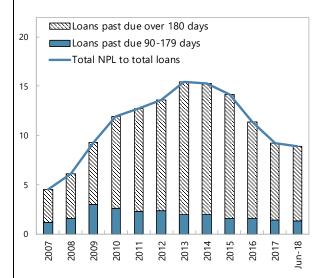


Figure 5. The Bahamas: Credit Quality of Domestic Banks and Credit Unions

NPLs tend to spike in slowdowns and persist for extended periods...

Domestic Banking Sector NPLs

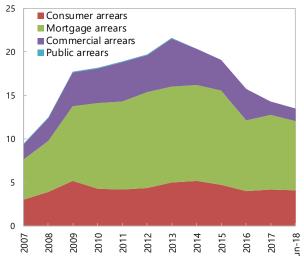
(In percent of total loans)



 $... and \ are \ concentrated \ in \ residential \ mortgages.$

Domestic Banking Sector: Total Arrears

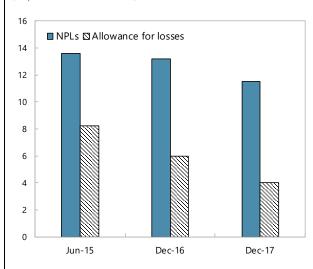
(past due over 30 days, in percent of total loans)



Credit unions have higher NPLs and lower provisions...

Large Credit Unions: Credit Quality 1/

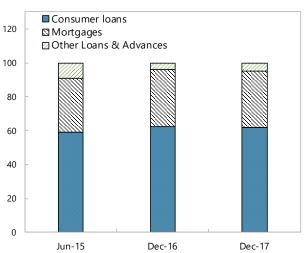
(In percent of total loans)



...with credit portfolios concentrated in consumer loans.

Large Credit Unions: Credit Composition 1/

(In percent of total loans)



Sources: Central Bank of The Bahamas, and IMF staff calculations.

1/ The sample covers the two largest credit unions, representing about 65 percent of credit unions' assets at end-2017.

Figure 6. The Bahamas: Maturity Profile of Bank Assets and Liabilities

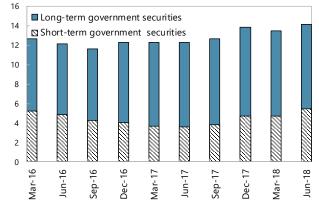
(In billions of Bahamian dollars unless indicated otherwise)

Banks' exposure to government securities, albeit moderate, is increasing...

...but bank maturity mismatches are not large due to predominantly adjustable rate loans.

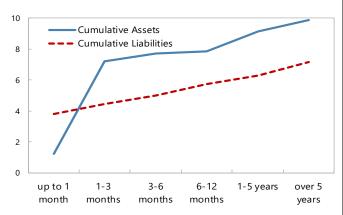
Domestic Government Securities

(Percent of banking sector assets)



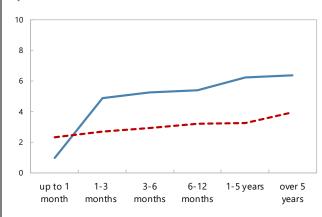
Banks with nonresident operations are more exposed to interest rate risk...

Maturity Profile: Domestic Banking Sector, June 2018

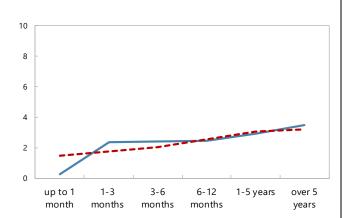


...while maturity mismatches are smaller in banks with resident operations...

Maturity Profile: Banks with Resident and Nonresident Operations, June 2018



Maturity Profile: Banks with Resident Operations, June 2018



Sources: Central Bank of The Bahamas, and IMF staff calculations.

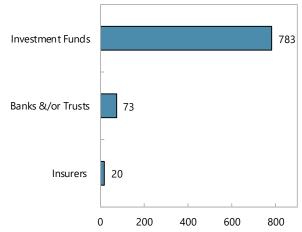
Figure 7. The Bahamas: Offshore Financial Sector Structure

The offshore sector comprises a diverse and large number of ...with players...

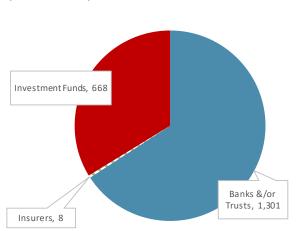
...with assets estimated at US\$256 billion in June 2018.

Offshore Financial Sector

(Number)



Offshore Sector's Assets 1/ (Percent of GDP)

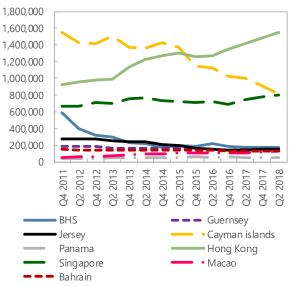


Offshore banking sector has been shrinking in the Bahamas and similar jurisdictions...

...with total offshore banking and investment funds assets in the Bahamas down by 39 percent since last FSAP.

Cross-border Claims on "Offshore Centers" by BIS Classification

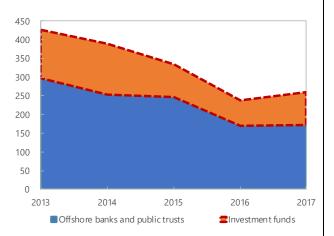
(U.S. dollars)



Sources: BIS locational banking statistics. Cross-border positions reported by banking offices located in the specified country regardless of the nationality of the controlling parent.

Offshore Assets

(Billions of U.S. dollars)



Note: Insurance sector assets are omitted, as they account for a stable US\$1 billion in total assets. The definition of assets for investment funds is net asset value (market value of assets minus liabilities). The variable is not strictly comparable with other institutions' on-balance sheet total assets. Citibank assets have been included in the offshore banking sector, due to its predominantly offshore activities.

Sources: Central Bank of The Bahamas, Bank for International Settlements, and IMF staff calculations.

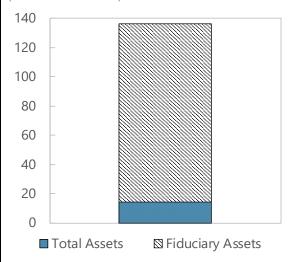
1/ The latest available observations for insurance companies is from end-2016 and for investment funds from end-2017.

Figure 8. The Bahamas: Offshore Banking Sector Composition of Assets and Liabilities (September 2018)

Most private banking assets are held in fiduciary trusts for clients...

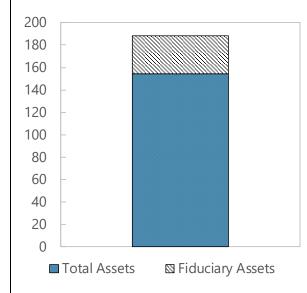
Private Banking Assets

(Billions of U.S. dollars)



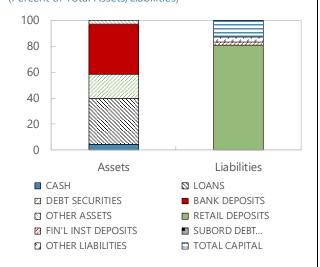
Treasury management assets are mostly on balance sheet...

Treasury Management Assets (Billions of U.S. dollars)



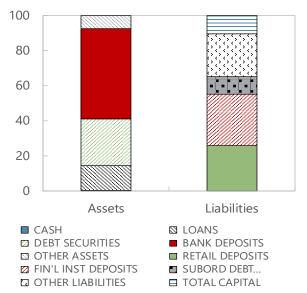
...whereas on-balance sheet activities are mainly cash management funded by retail deposits.

Largest Private Banking Offshore institutions (Percent of Total Assets/Liabilities)



...with most assets held as balances with other banks and in debt securities.

Largest Treasury Management Offshore Institutions (Percent of Total Assets/Liabilities)



Sources: Central Bank of The Bahamas, Bank for International Settlements, and IMF staff calculations.

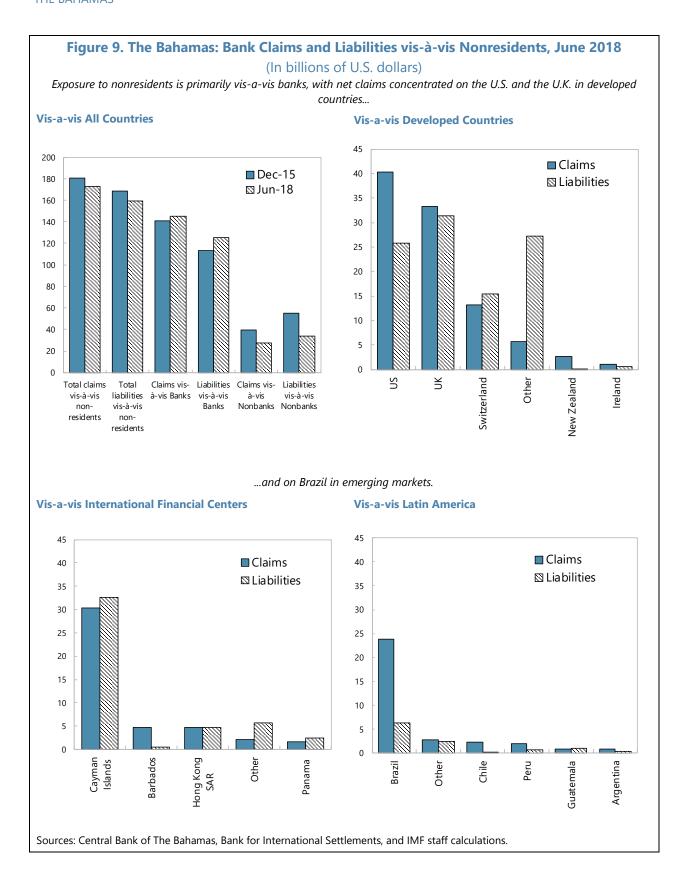


Table 1. The Bahamas: Selected Economic Indicators

I. Social Indicators

GDP (US\$ millions), 2018 12,425 Poverty rate (percent), 2013 12.8 GDP per capita (US\$), 2018 32,997 Unemployment rate (percent), Nov 2018 10.7 Population (thousands), 2018 377 Infant mortality rate (per 1,000 live births), 2016 9 Life expectancy at birth (years), 2018 75.7 Human development index (rank), 2018 54 Adult literacy rate, 15 & up (percent), 2007 96

II. Economic Indicators

		II. Ec	onomic	Indicato	ors							
	Average Projections											
	1991-2018	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
			(Annual p	ercenta	ge chan	ges, unle	ss other	wise ind	icated)		
Real sector												
Real GDP	1.3	0.7	0.6	0.4	0.1	1.6	1.8	1.7	1.5	1.5	1.5	1.5
Nominal GDP	3.3	3.3	7.7	1.6	1.8	2.3	2.4	3.6	3.3	3.4	3.4	3.4
GDP deflator	1.9	2.6	7.0	1.1	1.7	0.7	0.6	1.8	1.8	1.8	1.8	1.9
Consumer price index (annual average)	2.1	1.2	1.9	-0.3	1.6	2.2	1.6	2.4	2.3	2.3	2.3	2.2
Consumer price index (end of period)	2.0	0.2	2.0	0.8	1.8	2.0	2.4	2.4	2.3	2.3	2.2	2.2
Unemployment rate (in percent)	11.1	14.6	13.4	12.2	10.1	10.7	9.0	9.0	8.9	8.8	8.7	8.6
Saving rate (percent of GDP)	19.8	16.2	14.1	20.5	13.4	7.5	10.9	12.5	14.5	15.9	17.6	18.9
Investment rate (percent of GDP)	28.1	33.6	26.2	26.4	26.3	23.9	23.0	22.9	23.5	23.7	23.8	23.9
Financial sector												
Credit to the nonfinancial public sector	10.4	4.0	7.7	12.3	-3.8	6.6	5.3	2.5	0.8	0.4	0.3	0.3
Credit to the private sector	4.9	-2.8	-1.1	-2.0	-3.0	-1.5	1.0	1.5	2.0	2.5	3.0	3.0
Broad money	5.6	1.2	-0.3	8.7	1.5	-0.8	2.4	3.6	3.3	3.4	3.4	3.4
External sector												
Exports of goods and services	3.6	-1.4	-8.7	18.9	-1.4	11.8	8.2	6.4	5.3	5.0	5.0	5.0
Of which: Travel receipts (gross)	3.8	1.0	3.0	29.3	-2.6	12.0	8.5	5.5	4.7	4.5	4.3	4.0
Imports of goods and services	4.9	5.0	-16.0	5.6	11.5	11.5	2.0	2.2	2.3	2.4	2.5	2.5
				(In p	ercent o	of GDP, u	inless ot	herwise	indicate	d)		
Central government 1/												
Revenue and grants	13.3	13.5	15.0	16.3	17.2	16.6	19.4	19.7	19.8	19.8	19.9	19.9
Expenditure	15.7	17.9	18.8	18.9	22.7	20.0	21.7	21.1	20.6	20.4	20.4	20.4
Expense	13.9	15.6	16.3	17.3	19.4	17.7	19.6	19.0	18.4	18.2	18.1	18.1
Net acquisition of nonfinancial assets	1.8	2.3	2.4	1.6	3.3	2.3	2.1	2.2	2.2	2.3	2.3	2.3
Overall balance	-2.4	-4.4	-3.8	-2.6	-5.5	-3.4	-2.3	-1.5	-0.8	-0.6	-0.5	-0.5
Primary balance	-0.7	-2.5	-1.7	-0.3	-3.3	-0.8	0.4	1.1	1.7	1.9	1.9	1.8
Central government debt	29.2	48.1	49.7	50.4	54.4	63.3	63.1	61.9	60.0	58.5	57.0	55.7
External sector												
Current account balance	-5.7	-17.4	-12.0	-6.0	-12.9	-16.4	-12.2	-10.3	-9.0	-7.7	-6.2	-5.0
Change in NIR (increase -) 2/	-0.4	-0.4	-0.2	-0.8	-4.2	1.8	-0.4	-0.2	-0.9	-0.7	-0.3	-0.1
Central government external debt	16.1	14.4	14.0	14.6	21.5	20.9	21.3	20.8	20.3	19.8	19.2	18.8
Memorandum items												
Gross international reserves												
(End of period; millions of U.S. dollars)	552	788	812	904	1,417	1,196	1,250	1,275	1,399	1,500	1,546	1,559
(In months of next year's G&S imports)	1.7	2.2	2.2	2.2	3.1	2.5	2.6	2.6	2.8	2.8	2.9	2.9
External debt-service ratio												
(in percent of exports of G&S)	6.4	15.9	5.7	9.7	20.5	9.1	19.5	8.9	6.6	9.2	5.2	8.8
GDP (in millions of Bahamian dollars)		10,913	11,752	11,938	12,150	12,425	12,724	13,178	13,618	14,075	14,550	15,046
Output gap (percent)		-1.1	-1.0	-1.1	-1.8	-1.1	-0.4	0.0	0.0	0.0	0.0	0.0

Sources: Central Bank of The Bahamas; Department of Statistics; Ministry of Finance; UNDP Human Development Report; and Fund staff

^{1/} The data refer to fiscal years ending on June 30.

^{2/} Net International Reserves.

Table 2. The Bahamas: Structure of the Financial System

	Number of institutions			Assets	(B\$ billion)		Assets (Percent of GDP)		
	2013	2016	June 2018	2013	2016	June 2018	2013	2016	June 2018
Domestic Financial Institutions	52	54	57	17.5	17.6	18.3	164.5	148.6	141.4
Domestic Commercial Banks 1/	7	7	7	12.0	11.9	12.3	112.6	100.4	94.8
Domestic-majority owned	3	3	3	2.8	3.1	3.3	26.6	26.0	25.5
Foreign subsidiaries	4	4	4	9.1	8.8	9.0	86.0	74.4	69.3
Development Banks	1	1	1	0.1	0.1	0.1	0.6	0.5	0.4
Credit Unions	9	10	10	0.3	0.4	0.4	3.1	3.3	3.4
Other Local Financial Institutions	8	8	10	3.6	2.9	3.3	33.5	24.9	25.9
Domestic Insurers 2/	27	28	29	1.6	2.3	2.2	14.7	19.5	16.9
Life and Health	11	11	11	1.1	1.4	1.4	10.7	11.5	10.9
Property and Liability	16	17	18	0.4	0.9	0.8	4.1	7.9	5.9
International Financial Sector	1019	1107	1011	426.5	239.3	255.6	4,012.7	2,021.2	1,976.9
Banks &/or Trusts	246	227	208	297.6	169.0	168.2	2,800.5	1,427.1	1,301.3
Banks, Banks & Trust companies 1/	78	72	59	297.6	168.9	168.2	2,800.1	1,426.7	1,300.9
Public Trusts	16	10	14	0.04	0.04	0.05	0.4	0.3	0.4
Restricted Banks and Trusts	20	14	14						
Nominee Trusts	132	131	121						
External Insurers 2/	20	21	20	0.8	1.0	1.0	7.2	8.8	8.1
Captive Insurers	17	17	16	8.0	0.4	0.4	7.2	3.0	2.8
Noncaptive Insurers	3	4	4	0.0	0.7	0.7	0.0	5.8	5.3
Investment Funds 2/ 3/	753	859	783	128.1	69.3	86.3	1,205.0	585.3	667.5
Standard	41	35	39	4.5	1.2	3.4	42.8	10.5	26.2
Professional	226	221	219	43.8	14.2	16.2	412.0	120.3	125.1
Recognized Foreign Funds	53	35	31	59.2	42.6	45.4	556.9	360.0	351.1
SMART Funds	433	568	494	20.5	11.2	21.3	193.3	94.5	165.1
Memo Item 4/									
Nominal GDP				10.6	11.8	12.9			

Sources: Central Bank of The Bahamas and IMF staff calculations.

^{1/} Citibank is included as a bank from the international financial sector due to its large nonresident activities.

^{2/} End-2017. The latest available observations for external insurers' assets are as of end-2016.

^{3/} The definition of assets is net asset value (market value of assets minus liabilites). The variable is not strictly comparable with other institutions' on-balance sheet assets.

^{4/} Annual projection for 2018 based on October 2018 IMF WEO.

Table 3. The Bahamas: Financial Soundness Indicators (In percent, unless otherwise indicated)

	2012	2012	2011	2017	2015		
	2012	2013	2014	2015	2016	2017	June 2018
Capital Adequacy							
Regulatory capital to risk-weighted assets	29.1	31.1	32.8	33.3	28.6	32.5	32.5
Regulatory Tier I capital to risk-weighted assets					27.0	31.0	31.0
Capital to assets	26.3	26.5	25.9	27.0	26.0	26.5	25.6
Credit to economic sectors 1/							
Nonfinancial corporations	24.3	22.5	19.0	18.0	17.2	15.5	16.5
Households	73.3	73.7	75.6	75.6	75.3	77.5	76.6
Financial institutions	0.3	0.3	0.3	0.3	0.3	0.3	0.3
Government	2.1	3.6	5.1	6.0	7.3	6.7	6.5
Asset Quality ^{2/}							
Nonperforming loans to total gross loans	13.6	15.3	15.3	14.2	11.4	9.2	8.9
Nonperforming loans net of provisions to capital	27.8	32.5	29.3	22.8	15.5	12.0	10.2
Specific provisions to nonperforming loans ^{3/}	33.0	29.5	41.1	47.5	56.0	52.0	58.1
Profitability							
Return on assets ^{3/}	1.5	1.4	-1.2	1.9	2.0	1.8	1.0
Return on equity ^{3/}	5.9	5.4	-4.6	7.0	7.9	6.8	3.8
Noninterest expenses to gross income	40.8	47.1	66.3	47.4	48.4	52.1	51.0
Personnel expenses to noninterest expenses	51.2	50.3	34.8	46.8	44.0	40.8	41.3
Liquidity ^{2/}							
Liquid asset to total assets	20.2	21.8	22.6	24.1	25.9	29.0	30.1
Liquid asset to short-term liabilities 4/	31.2	34.0	34.4	37.0	37.8	42.7	44.3
Memo items ^{2/}							
Total private sector credit to GDP	61.8	61.6	58.1	53.4	52.1	49.2	
Spread between domestic lending and deposit rates	8.9	9.4	10.4	10.9	11.3	10.8	10.5
Loans to assets	74.0	72.8	72.2	70.6	69.1	64.8	63.7

Sources: Central Bank of The Bahamas, and IMF staff calculations.

^{1/} In percent of total credit.

 $^{^{2/}}$ Includes the two largest credit unions.

^{3/} 2018 figures are not annualized.

^{4/} Short-term liabilities are defined as resident deposits.

		Table 4. FSAP Risk Asse	ssme	ent Matrix 1/
So	urces of risks	Relative likelihood		Impact and transmission channels
co	severe price prrection in the eal estate market.	Medium	•	High. This could lead to significant losses on bank's residential mortgage portfolios and potential liquidity issues due to difficulty in disposing of nonperforming assets.
m ec	ontagion from a ajor regional conomic downturn r banking crisis.	Medium	•	Medium. This could impair the banking system, either through losses in crossborder holdings, lack of resolution planning for multi-jurisdiction banks, or a strategic retreat by one or more key offshore banks.
re a :	ontagion to the cal economy from severe U.S.	Medium	•	High. This could trigger a severe local slowdown and lead to significant bank losses in mortgages and consumer loans.
fir	ghter global nancial onditions.	High	•	High. An abrupt change in global risk appetite could lead to sudden, sharp increases in interest rates and reduced FDI inflows, impacting tourism, employment, and debt service capacity of borrowers.
• Na	atural disasters.	High	•	High. A hurricane may cause a severe degradation of domestic infrastructure and impact tourism, employment, and debt service capacity of borrowers.
	urther pressure on BRs.	Medium	•	Low/Medium. Could affect the profitability and liquidity of banks that are not part of reputable international bank groups. The former could also see a business migration towards the latter group.

1/ The Risk Assessment Matrix (RAM) shows events that could materially alter the baseline path (the scenario most likely to materialize in the view of IMF staff). The relative likelihood is the staff's subjective assessment of the risks surrounding the baseline ("low" is meant to indicate a probability below 10 percent, "medium" a probability between 10 and 30 percent, and "high" a probability of 30 percent or more). The RAM reflects staff views on the source of risks and overall level of concern as of the time of discussions with the authorities. Non-mutually exclusive risks may interact and materialize jointly.

Appendix I. Banking Sector Stress Testing Matrix (STeM)

_		Assumptions
Doi	main	Top-down by FSAP Team
	BANKING SECTOR	R: SOLVENCY RISK
1. Institutional Perimeter	Institutions included	 All 7 domestic banks and 2 largest credit unions 10 large offshore banks (results reported for 2 banks with more traditional banking business).
	Market share	About 97 percent of total banking assets.65 percent of credit union assets.61 percent of offshore banking assets.
	Data and baseline date	Supervisory data as of September 2018.
2. Channels of Risk	Methodology	IMF stress testing framework.
Propagation	Satellite models for macro-financial linkages	 Small dynamic stochastic general equilibrium macro-financial model. Satellite panel regressions for NPLs, ROA and credit growth.
	Stress test horizon	3 years (annual frequency).
3. Tail Shocks	Scenario analysis	 Macro scenarios include baseline and three adverse scenarios. Macro-financial variables include tourist arrivals, real GDP growth, consumer inflation, nominal and real short-term rates, nominal and real credit growth, real U.S. GDP growth, U.S. property prices, and hurricane losses as a percent of GDP. Baseline: Variables follow the IMF WEO October 2018 projections. Adverse (hurricane): A major hurricane leads to a degradation of hotels and key infrastructure, negatively impacting tourism and bank asset quality. The scenario leads to a cumulative decline of real GDP relative to the baseline equivalent to 1 std. Adverse (U.S. recession): A severe recession in the U.S. reduces demand for tourism and real estate investment in The Bahamas, triggering a local slowdown. The scenario results in a cumulative decline of real GDP relative to the baseline equivalent to 1.5 std. Adverse ("perfect storm") scenario: simulates the simultaneous effects of a U.S. recession and a major hurricane. The hurricane amplifies the recession through the degradation of hotels and other key infrastructure, negatively impacting tourism, employment, and bank asset quality. The scenario leads to a cumulative real GDP decline relative to the baseline equivalent to 2 std.

_		Assumptions
Dor	nain	Top-down by FSAP Team
	Sensitivity analysis	 Credit Risk An increase in NPLs: Proportional to existing NPLs: by 50, 100, 150 and 200 percent. Proportional to total loans: by 3, 5 and 10 percent of total loans. An increase in NPLs in the following sectors: Mortgages (150 percent). Commercial loans (150 percent). Consumer loans (150 percent). Defaults of largest 1, 3, 5 borrowers. Interest Rate Risk Income Effect Parallel shifts in interest rates in domestic/foreign currency of 300 and 500 bps. Currency Risk currency devaluation of 15 and 25 percent.
4. Risks and Buffers	Risks/factors assessed	 currency revaluation of 15 and 25 percent. Sovereign Risk Sovereign bond haircuts of up to 30 percent. Total credit losses, credit growth, profits, repricing gap, shocks to the credit quality of sectoral and large exposures, losses from maturity and currency mismatches, direct/indirect FX risk, counterparty risk.
5. Regulatory and Market-based Standards and Parameters	Behavioral adjustments Calibration of risk parameters	 Assumptions for credit growth in scenarios as well as dividend payout ratios. Projections of macro variables based on a macro model, projections of bank-by-bank NPL ratios and profits based on satellite panel regressions, in combination with balance sheet methods, regulatory information and behavioral assumptions to project banks' solvency positions in each scenario.
6. Reporting Format for Results	Regulatory/Accounting and Market-Based Standards	 Country-specific minimum CAR (trigger ratio). Capital to asset ratio for offshore banks and for credit unions.

Dor	main	Assumptions				
DOI	IIdiii	Top-down by FSAP Team				
	BANKING SECTO	OR: LIQUIDITY RISK				
1. Institutional Perimeter	Institutions included	All 7 domestic banks.				
	Market share	Approximately 97 percent of total banking assets.				
	Data and baseline date	Supervisory data as of September 2018.				
2. Channels of Risk Methodology Propagation		Cash-flow-based (contractual maturity ladder).				
3. Risks and Buffers Risks		Funding liquidity shock.Market liquidity shock.				
	Buffers	Counterbalancing capacity.				
4. Tail Shocks	Size of the shock	 Assumptions for run-off rates on funding sources and roll-off rates on assets to estimate the funding gap. 				
5. Regulatory and Market-based Standards and Parameters	Regulatory standards	 Hurdle metrics: funding gap, survival period. Local regulatory requirements. 				
6. Reporting Format for Results	Output presentation	Survival period in days by bank.Number of banks that are liquid/illiquid.				

		Assumptions
Dor	main	'
		Top-down by FSAP Team
	BANKING SECTOR	: CONTAGION RISK
1. Institutional Perimeter	Institutions included	 All 7 domestic banks and 2 largest credit unions. 8 large offshore financial institutions. 10 largest domestic insurance companies.
	Market share	 7 domestic banks and 2 largest credit unions constitute approximately 97 percent of domestic credit institutions' assets. 8 large offshore banks constitute around 35 percent of offshore banking assets excluding foreign branches. 10 largest insurance companies constitute approximately 93 percent of aggregate assets in the domestic insurance sector.
	Data and baseline date	 Supervisory data as of September 2018.
2. Channels of Risk Propagation	Methodology	Espinosa-Sole (2010) interbank network model.
3. Tail Shocks	Size of the shock	 Default of institutions. The test assumes LGD of 100 percent and that the funding from a failed bank is not rolled over and borrower banks have to replace it by selling assets with a haircut of 30 percent.
4. Reporting Format for Results	Output presentation	Failed capital as a percentage of aggregate capital in the network.

Appendix II. Stress Test Tables

Appendix II Table 1. Macroeconomic Scenarios Key Projections and Assumptions (In percent unless indicated otherwise)

		Paths in	Stress Period	
	2018	2019	2020	2021
Real GDP growth*				
Baseline ¹	2.3	2.1	1.6	1.5
Major hurricane	2.3	-2.2	-1.8	0.4
U.S. recession	2.3	-2.8	-3.3	-1.7
Perfect storm scenario	2.3	-4.9	-4.9	-2.3
Inflation*				
Baseline ¹	2.5	2.4	2.3	2.1
Major hurricane	2.5	2.4	1.3	0.6
U.S. recession	2.5	2.4	1.1	0.1
Perfect storm scenario	2.5	2.4	0.7	-0.6
Short-term interest rate* ²				
Baseline ¹	1.6	2.1	2.0	1.9
Major hurricane	1.6	2.1	1.4	1.0
U.S. recession	1.6	2.1	1.4	0.8
Perfect storm scenario	1.6	2.1	1.1	0.3
Tourist arrivals*				
Baseline ¹	2.9	4.9	3.4	3.2
Major hurricane	2.9	-2.2	0.2	3.2
U.S. recession	2.9	-7.1	-3.9	0.1
Perfect storm scenario	2.9	-10.3	-5.3	0.1
U.S. real GDP growth **				
Baseline ¹	2.9	2.5	1.8	1.7
Major hurricane	2.9	2.5	1.8	1.7
U.S. recession	2.9	-3.0	-1.5	0.5
Perfect storm scenario	2.9	-3.0	-1.5	0.5
Change in U.S. housing prices** 3				
Baseline ¹	8.0	6.0	4.0	3.0
Major hurricane	8.0	6.0	4.0	3.0
U.S. recession	8.0	-15.0	-10.0	-5.0
Perfect storm scenario	8.0	-15.0	-10.0	-5.0
System-wide NPL ratio***				
Baseline ¹	8.7	9.4	10.0	10.7
Major hurricane	8.7	10.7	13.1	15.0
U.S. recession	8.7	11.1	14.8	18.8
Perfect storm scenario	8.7	12.0	17.1	22.4
Adj. system-wide NPL ratio*** 4				
Baseline ¹	9.8	11.2	11.9	12.9
Major hurricane	9.8	12.4	15.1	17.4
U.S. recession	9.8	13.4	17.8	22.5
Perfect storm scenario	9.8	13.8	19.7	25.8

Note: (*) DSGE model projection; (**) Historical experience/standard assumptions; (***) Panel regression projections.

 $^{^{\}rm 1}$ Based on the October 2018 IMF World Economic Outlook.

² T-hill rate

 $^{^{3}}$ Residential housing prices in the Florida market.

 $^{^{\}rm 4}$ Includes assumptions for restructured loans falling back into NPLs.

Appendix II Table 2. Macroeconomic Scenarios Summary Results

(In percent unless indicated otherwise)

_	Regulatory capital ratio (CAR)			Number of banks with CAR below 14 percent ¹			Bank assets with CAR below 14 percent (percent of the system's assets) ¹			Potential recapitalization needs (percent of GDP) ²		
	System	Domestic	Foreign	System	Domestic	Foreign	System	Domestic	Foreign	System	Domestic	Foreign
Initial position (Sept. 2018)	31.2	33.6	30.1	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
Adj. position ³	30.6	32.7	29.6	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
Baseline												
2019	31.9	33.8	30.9	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
2020	32.5	33.9	31.8	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
2021	32.8	33.6	32.4	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
Major Hurricane												
2019	30.4	31.3	30.0	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
2020	29.0	28.2	29.5	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
2021	28.0	25.9	29.1	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
U.S. Recession												
2019	29.9	30.1	29.8	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
2020	28.4	26.9	29.2	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
2021	26.3	23.0	27.9	1	1	0	7.3	7.3	0.0	0.1	0.1	0.0
Perfect Storm												
2019	29.3	29.3	29.3	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
2020	26.5	24.1	27.6	0	0	0	0.0	0.0	0.0	0.0	0.0	0.0
2021	22.9	18.4	25.1	2	2	0	15.1	15.1	0.0	0.4	0.4	0.0

Sources: Central Bank of The Bahamas and IMF staff estimates.

Note: "Domestic" banks are defined as banks with resident operations only, "foreign" banks are banks with resident and nonresident operations. Under this classification, there are 4 domestic and 3 foreign banks, representing 35 and 65 percent of banking assets, respectively.

 $^{^{\}rm 1}\,\textsc{Based}$ on a domestic regulatory threshold (trigger CAR ratio) of 14 percent.

² The recapitalization amount is estimated as the capital injection needed to restore CAR to 14 percent. Projected nominal GDP based on the October 2018 IMF World Economic Outlook.

³ The initial adjustment to CAR assumes that 10 percent of restructured loans in 2018 become nonperforming by the end of the year.

Appendix II Table 3. Sensitivity Tests for Credit Risk

(In percent unless indicated otherwise)

_	Regulatory capital ratio (CAR)				mber of banks R below 14 percent	1	Bank assets with CAR below 14 percent (percent of the system's assets) ¹		
	All Banks	Domestic	Foreign	All Banks	Domestic	Foreign	All Banks	Domestic	Foreign
Initial position (Sept. 2018)	31.2	33.6	30.1	0	0	0	0.0	0.0	0.0
Adj. position ²	30.6	32.7	29.6	0	0	0	0.0	0.0	0.0
Increase in NPLs ³									
(i) Proportional to existing NPLs									
50 percent	27.6	27.7	27.6	0	0	0	0.0	0.0	0.0
100 percent	24.7	22.6	25.7	0	0	0	0.0	0.0	0.0
150 percent	21.7	17.6	23.7	2	2	0	15.1	15.1	0.0
200 percent	18.7	12.6	21.8	3	2	1	41.4	15.1	26.4
(ii) Proportional to total loans									
3 percent	28.8	30.3	28.0	0	0	0	0.0	0.0	0.0
5 percent	27.5	28.7	26.9	0	0	0	0.0	0.0	0.0
10 percent	24.5	24.8	24.3	0	0	0	0.0	0.0	0.0
Large borrower defaults ³									
1st largest borrower	28.8	32.3	27.0	0	0	0	0.0	0.0	0.0
3 largest borrowers	27.0	31.5	24.8	0	0	0	0.0	0.0	0.0
5 largest borrowers	25.9	30.9	23.5	0	0	0	0.0	0.0	0.0
Sectoral credit shocks ⁴									
Shock to commercial loans	28.5	28.4	28.5	0	0	0	0.0	0.0	0.0
Shock to consumer loans	28.0	27.8	28.1	0	0	0	0.0	0.0	0.0
Shock to mortgage loans	23.1	18.9	25.2	1	1	0	7.3	7.3	0.0

Sources: Central Bank of The Bahamas, and IMF staff estimates.

Note: Domestic banks are defined as banks with resident operations only, foreign banks are banks with both resident and nonresident operations.

¹ Based on a domestic regulatory threshold (trigger CAR ratio) of 14 percent.

² The initial adjustment to CAR assumes that 10 percent of restructured loans become nonperforming.

³ Assuming LGD of 70 percent.

⁴ This test assumes an increase in sectoral NPLs of 150 percent and LGD of 100 percent.

_	Regulato	ry capital ratio	(CAR)		ımber of banks R below 14 perc	ent ¹	Banks with CAR below 14 percent (percent of the system's assets) ¹		
	All Banks	Domestic	Foreign	All Banks	Domestic	Foreign	All Banks	Domestic	Foreign
Initial position (Sept. 2018)	31.2	33.6	30.1	0	0	0	0.0	0.0	0.0
Adj. position ²	30.6	32.7	29.6	0	0	0	0.0	0.0	0.0
Interest rate shock									
-300 basis points	29.8	32.6	28.5	0	0	0	0.0	0.0	0.0
-500 basis points	29.3	32.5	27.8	0	0	0	0.0	0.0	0.0
+300 basis points	31.3	32.8	30.6	0	0	0	0.0	0.0	0.0
+500 basis points	31.8	32.9	31.3	0	0	0	0.0	0.0	0.0
Exchange rate shock									
15 percent devaluation	30.6	32.7	29.6	0	0	0	0.0	0.0	0.0
25 percent devaluation	30.6	32.7	29.6	0	0	0	0.0	0.0	0.0
Sovereign risk shock ³									
Nominal haircut									
10 percent	28.2	30.3	27.1	0	0	0	0.0	0.0	0.0
20 percent	25.8	27.9	24.7	0	0	0	0.0	0.0	0.0
30 percent	23.3	25.5	22.3	1	0	1	19.8	0.0	19.8

Sources: Central Bank of The Bahamas, and IMF staff estimates.

Note: Domestic banks are defined as banks with resident operations only, foreign banks are banks with both resident and nonresident operations.

¹ Based on a domestic regulatory threshold (trigger CAR ratio) of 14 percent.

² The initial adjustment to CAR assumes that 10 percent of restructured loans become nonperforming.

³ The "haircuts" are applied on the outstanding nominal value of banks' government securities.

Appendix II Table 5. Liquidity Stress Test

(In percent unless indicated otherwise)

	Number of I	oanks that fail th	e test	Share of illiquid banks in the system's assets				
	System	Domestic	Foreign	System	Domestic	Foreign		
0–30 days	0	0	0	0.0	0.0	0.0		
30–60 days	0	0	0	0.0	0.0	0.0		
60–90 days	0	0	0	0.0	0.0	0.0		
90–180 days	1	1	0	7.7	7.7	0.0		

Sources: Central Bank of The Bahamas, and IMF staff estimates.

Note: The stress test is based on a maturity ladder contractual cash flow analysis. It assumes that 25 percent of total non-equity funding is withdrawn within a year, with 21 percent of it withdrawn in the first 90 days.

Appendix II Table 6. Sensitivity Tests for Credit Unions 1/

(In percent unless indicated otherwise)

	Risk-weighted capital ratio (CAR) ¹	Number of CUs with CAR below 14 percent	Share in total	Capital to asset ratio (CA)	Number of CUs with CA below 10 percent	Share in total assets ²
Initial position (Sept. 2018)	16.3	0	0.0	9.8	2	100.0
Increase in NPLs ³						
(i) Proportional to existing NPLs						
50 percent	13.1	2	100.0	7.9	2	100.0
100 percent	10.0	2	100.0	6.0	2	100.0
150 percent	6.8	2	100.0	4.0	2	100.0
(ii) Proportional to total loans						
3 percent	14.7	1	24.4	8.8	2	100.0
5 percent	13.8	1	24.4	8.2	2	100.0
10 percent	11.2	2	100.0	6.5	2	100.0
Large borrower defaults ³						
1st largest borrower	15.9	1	24.4	9.5	2	100.0
3 largest borrowers	15.3	1	24.4	9.2	2	100.0
5 largest borrowers	14.8	1	24.4	8.9	2	100.0
Interest rate shock						
-300 basis points	16.0	0	0.0	9.6	1	75.6
-500 basis points	15.7	0	0.0	9.4	1	75.6
+300 basis points	16.7	0	0.0	10.0	0.0	0.0
+500 basis points	16.9	0	0.0	10.1	0.0	0.0
Memo items						
Number and share of total assets	S	2	100.0		2	100.0

Sources: Central Bank of The Bahamas, and IMF staff estimates.

Note: The stress tests cover the two largest credit unions representing about 65 percent of the credit union sector's total assets.

¹ Risk-weighted CARs were estimated on a pro-forma basis because of the absence of a binding CAR requirement.

 $^{^{\}rm 2}$ Total assets of the two credit unions.

³ Assuming LGD of 70 percent.

Appendix II Table 7. Offshore Banks Balance Sheet Structure

THE BAHAMAS

(In percent unless indicated otherwise)

_	Treasury	<u>, </u>			Private Ban	king			Traditional Banks		
	Bank 1	Bank 3	Bank 2	Bank 5	Bank 6	Bank 8	Bank 9	Bank 10	Bank 4	Bank 7	
Assets (\$US million)	47,566	35,869	9,146	1,043	990	491	367	1,443	1,162	964	
CAR			18.3	15.6	30.2	20.0	27.5	100.4	11.9	25.4	
Capital to asset ratio	10.6	6.1	16.3	6.9	15.2	7.9	16.8	76.5	9.5	21.6	
Assets											
Cash	0.0	0.0	3.5	0.0	0.1	0.0	0.0	0.0	19.5	0.0	
Balances with CBOB	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
Balances with other banks	40.8	68.6	43.6	60.0	73.9	64.5	49.2	32.3	1.9	6.4	
Debt securities	33.0	14.9	38.9	0.3	0.1	3.8	2.7	30.2	38.0	47.9	
Interbank loans	1.0	11.3	0.0	0.0	0.0	0.0	0.0	0.0	6.7	1.2	
Loans	12.4	3.4	12.2	38.5	21.7	30.2	47.5	37.5	31.0	40.1	
Other assets	12.9	1.7	1.8	0.8	4.2	1.2	0.4	0.0	1.6	3.5	
Total assets	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	
Liabilities											
Customer deposits	42.0	5.7	22.9	84.3	77.4	90.1	76.5	7.7	89.7	67.4	
Deposits from banks	24.3	29.5	56.8	8.1	0.6	0.7	5.7	12.0		0.3	
Borrowings	•••		0.0		0.9			3.7		10.0	
Subordinated debt	•••	26.5									
Accrued taxes	0.5	0.0	0.2	0.1	0.0	0.0	0.0	0.0	0.3	0.4	
Other liabilities	22.6	32.2	3.8	0.6	5.9	1.3	1.0	0.0	0.5	0.4	
Total liabilities	89.4	93.9	83.7	93.1	84.8	92.1	83.2	23.5	90.5	78.4	
Total capital	10.6	6.1	16.3	6.9	15.2	7.9	16.8	76.5	9.5	21.6	
Total liabilities and capital	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	

Source: Central Bank of The Bahamas, and IMF staff estimates.

Appendix II Table 8. Summary Sensitivity Tests for Large Offshore Banks 1/ (In percent unless indicated otherwise)

	Capital to assets ratio (CA) ¹	Number of banks with CA below 5 percent	Asset share of banks with CA below 5 percent	
Initial position (Sept. 2018)	15.0	0		
Adj. position ²	14.9	0	0.0	
Increase in NPLs ³				
(i) Proportional to existing NPLs ⁴				
50 percent	14.8	0	0.0	
100 percent	14.6	0	0.0	
150 percent	14.5	0	0.0	
(ii) Proportional to total loans				
3 percent	14.1	0	0.0	
5 percent	13.7	0	0.0	
10 percent	12.4	0	0.0	
Default of large borrowers ³				
1st largest borrower	14.0	0	0.0	
3 largest borrowers	12.5	0	0.0	
5 largest borrowers	11.3	0	0.0	
Sectoral credit risk ⁵				
Shock to commercial loans	11.2	0	0.0	
Shock to consumer loans	14.9	0	0.0	
Shock to mortgage loans	14.9	0	0.0	
Interest rate risk ⁴				
-300 basis points	14.7	0	0.0	
-500 basis points	14.6	0	0.0	
+300 basis points	15.1	0	0.0	
+500 basis points	15.2	0	0.0	

Sources: Central Bank of The Bahamas, and IMF staff estimates.

Note: The tests were conducted on 10 institutions (61 percent of international banking assets), the reported results cover two banks with more traditional banking business models).

¹ The tests are conducted on banks' capital to asset ratio (not risk-weighted) and based on a hurdle rate of 5 percent.

 $^{^{\}mathrm{2}}$ The initial adjustment to CAR assumes that 10 percent of restructured loans become nonperforming.

³ Assuming LGD of 70 percent.

⁴ Based on available data for one of the two banks.

⁵ The tests assume that 15 percent of total loans in a particular sector become nonperforming and LGD of 100 percent.

Appendix III. Offshore Financial Sector

Structure and Business Model

- 1. Total assets of the offshore sector have declined significantly since the last FSAP in 2013, in the context of ongoing global efforts to strengthen AML/CFT and tax transparency standards. Assets have dropped to US\$256 billion in June 2018, from US\$427 billion at the end of 2013, at a time of increased cooperation between the Bahamian authorities and OECD countries, as well as various tax amnesties offered in multiple jurisdictions. Similar asset declines have also been observed in Cayman Islands, Guernsey and Jersey, all jurisdictions that have traditionally competed with The Bahamas in offshore banking activities (Figure 7).
- 2. The offshore financial sector comprises a diverse and large number of players, including banks, investment funds and insurance companies. Banks dominate the sector with US\$168 billion in assets. Investment funds hold US\$86 billion in assets, whereas the insurance sector holds a relatively small US\$1 billion.¹
- 3. The international banking business model has shifted towards wealth preservation and legacy planning for clients seeking geographic diversification. In recent years the client base has become increasingly concentrated in Latin America (particularly Brazil) due to the time zone, physical proximity and historical presence of group affiliates in the region. Strong legal and economic institutions, political stability, and flexible regulation are often cited as reasons to hold assets or structure lending operations in The Bahamas.
- 4. Strict exchange controls keep the local economy insulated from the international sector, and historically offshore banks have been unable to offer their services to domestic residents.² Banks with an Authorized Dealer Exchange Control designation can deal in all currencies, including Bahamian dollars, while a Resident status allows banks to offer services in the BSD market. Offshore banks, on other hand, may operate freely in foreign currencies but require an initial Exchange Control authorization to operate an External Bahamian dollar account. Foreign currency position regulations of onshore banks significantly limit the magnitude of foreign currency exposures they can undertake.³

¹ Non-financial International Business Corporations (IBCs) are excluded from this analysis.

² Under regulatory changes announced in December 2018 there may be opportunities for offshore banks to offer services to domestic residents, however this will likely only be for non-BSD accounts.

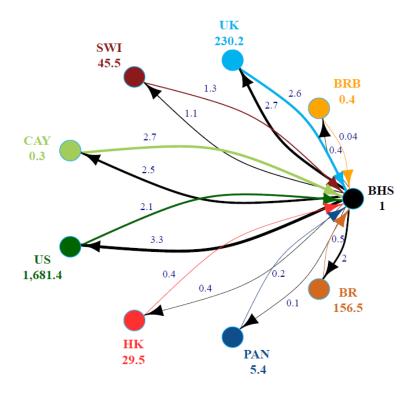
³ The larger of the sum of net short or long positions in all foreign currencies, including all on and off-balance sheet assets and liabilities of an onshore bank cannot exceed the minimum of 5 percent of its Tier 1 capital and B\$5 million. The onshore banks are also subject to regulatory capital requirements of 17 percent, which constrains expansion of banks' balance sheet using foreign funding.

Offshore Banks

- 5. Offshore banks primarily offer either private banking and trust services or conduct treasury operations on behalf of affiliated institutions. Neither of these activities involve significant amounts of traditional banking activities such as term lending or liquidity transformation.
- **6. Private banking institutions hold substantial off-balance sheet fiduciary assets on behalf of international clients.** They also hold relatively smaller amounts of mostly liquid on-balance sheet assets (Figure 8). Banks focus on asset management services for high- and ultra-high net-worth individuals, with fees representing 75 percent of income for the five largest banks. On-balance sheet assets are mainly held for cash management purposes in highly-liquid securities or as balances with related financial institutions. As client assets are held in individual accounts there are no redemption risks such as might arise from collective investment vehicles.
- 7. Lending in private banking consists primarily of margin lending against investment portfolios. With clients posting initial margin and variation margin based on daily mark-to-market adjustments, these activities do not entail the same credit risks associated with traditional bank lending. A few banks also offer mortgage loans to clients, in some cases for high-end Bahamian real estate, but these loans are small in number and total magnitude.⁴
- 8. The offshore entities conducting treasury operations do so mostly for affiliated banks, and they hold 91 percent of offshore banking on-balance assets. They predominantly perform consolidated treasury functions for related entities, investing aggregated surplus cash in bulk. There are also branches focused on intra-group treasury management operations, with funding provided by wholesale clients booked in the Bahamian entity and passed on to clients in other jurisdictions. Some branches offer limited global booking services for offshore financial operations, including a small amount of structured notes issuance.
- 9. BIS data on locational bank statistics indicates that banks' cross-border financial linkages are primarily with related banks. At end-June 2018, about two thirds of total claims and liabilities of banks to nonresidents were vis-à-vis banks, of which 70 percent were intragroup (Figure 9). Claims were mainly on advanced economies, offshore centers, and Latin America, whereas the advanced economies were predominantly net suppliers of funds (Text Chart).

-

⁴ Any lending facility offered to nonresidents and secured by pledged B\$ assets is subject to explicit authorization by CBOB.



Note 1: Data as of June 2018.

Note 2: Node numbers show the absolute size of the country's GDP relative to GDP of The Bahamas.

Arrows point from the country size of the exposure (liability issuer) to the country carrying the exposure (liability holder).

Arrow numbers show the absolute size of the exposure relative to the GDP of The Bahamas.

Arrow thickness is proportional to the size of the exposure relative to GDP of The Bahamas.

Sources: Central Bank of The Bahamas, BIS, World Economic Outlook database, and IMF staff estimates.

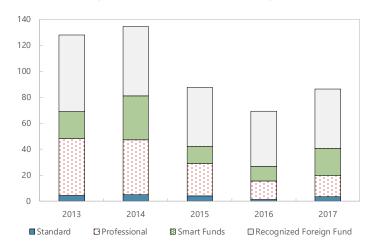
Investment Funds

10. The investment fund space seems to include few traditional collective investment

vehicles. Most assets are held in non-standard funds such as Specific Mandate Alternative Regulatory Test (SMART) Funds and "Professional" Funds, which are aimed at qualified investors (Text Chart). SMART Funds are primarily used as wealth management vehicles for single individuals or families. This class of funds has been increasing in popularity, with a 14 percent growth in the number of entities since the last FSAP and net asset value (NAV) around B\$21 billion in

Investment Funds Licensed or Registered: Net Asset Values, 2013–2017

(Billions of Bahamian dollars)



2017. The Professional Funds, which are typically restricted to qualified investors, have seen assets declining by over sixty percent since 2013 to around B\$16 billion (NAV) in 2017. There are very few standard funds open to the general public, with NAV of around B\$3.4 billion in 2017. Recognized Foreign Funds are not licensed in The Bahamas, but they are registered due to their Bahamas-based service providers.

External Insurers

11. The offshore insurance sector is small and populated by captive and non-captive insurers. The total assets in the sector grew by around 37 percent between 2013 and 2016 to a figure of roughly B\$1 billion, one third of which is composed of captive insurers (Table 2).

Vulnerabilities and Risks

- **12.** The business models of offshore institutions limit risks associated with traditional banking activities. The sector does not appear to engage in a significant degree of credit creation, or maturity and liquidity transformation. The main risks to the domestic financial system appear to be reputational, including adverse impacts on correspondent banking relationships (CBRs) (see AML/CFT discussion). This seems to be particularly important for so-called home institutions (i.e., those without a foreign parent financial group), which are not subject to group-level risk management frameworks and are at the same time dependent on CBRs. As these banks are only regulated in The Bahamas, they likely deserve more scrutiny from a risk-based supervisory approach.
- **13.** Shocks to the offshore financial sector seem to have relatively small potential macrofinancial implications. Exchange controls effectively separate the operations of the onshore and the offshore sectors. Despite its size, the sector's contribution to the economy is small. Estimates indicate the offshore financial sector contributes less than 3 percent to GDP, and less than 1 percent to government revenue. However, the authorities emphasize the importance of the sector as a source of middle-class employment.

Appendix IV. The Case of Bank of The Bahamas

- 1. The bank is the only case of significant instability in the banking system the past 15 years. The government of The Bahamas and the National Insurance Board (NIB) controlled 65 percent of BOB before its instability, with private individuals holding the rest. BOB's difficulties began to build as revealed in 2011 when the CBOB discovered material operational weaknesses. A subsequent examination noted an outsized level of lending to politically exposed persons, among other deep problems in commercial lending. Negative publicity led to liquidity tightness in late 2012 and early 2013, with large depositors withdrawing their funds.
- 2. The intervention by the authorities was a two-staged bailout of BOB. During October 2014, the government announced a bailout for BOB, with the creation of Resolve, a state-owned asset management company. Nonperforming assets of B\$100 million were transferred to Resolve in exchange for an equivalent amount of government promissory notes backed by a governmentissued 'Letter of Support' (Resolve #1). After the restructuring, the share of regulatory capital increased to about 47 percent of risk-weighted assets and government control went from 65 percent to 79 percent. Justifications for the bailout were the potential for instability (BOB is a DSIB), the lack of funding in the DIC to cover insured depositors (B\$120 million in insured deposits with less than B\$40 million in the DIC), and the large government deposits placed at BOB. A second transfer of B\$176 million in gross book value of problem assets (purchasing distressed assets at gross book value is not in line with good international practice) was initiated in August 2017 (Resolve #2), similar in terms to Resolve #1. About this time the promissory notes issued during 2014 were redeemed by the government. Although audits of Resolve are mandated yearly, the first such audit is only anticipated to be completed in 2019. This should improve Resolve's currently opaque status and enhance its accountability. As of September 2018, BOB's NPLs stood at about B\$102 million (or 26 percent of total loans). In addition, BOB had about B\$105 million in restructured loans. NPLs net of specific provisions represented about 25 percent of capital.

Appendix V. Financial Inclusion

- 1. Consideration should be given to steps that would support more competition and financial inclusion. In particular, access to retail clearinghouse services through the Automated Clearing House Limited (ACH), jointly owned and operated by all commercial banks, should be extended to regulated and supervised nonbanks such as credit unions and e-money issuers. Banks should also complete migration to chip-based cards and apply differentiated fees to debit and credit card merchant discount rates. Moreover, the introduction of new payment systems such as Instant Payments could reduce transaction costs for individuals and merchants.
- 2. The government should facilitate the shift away from cash and cheques and towards electronic payments. The CBOB should actively promote the establishment of an effective and sound payment network by the private sector via its role as a catalyst in retail payments, and should also put in place an action plan to reduce the use of cheques.³ Government payments (especially on the collection side) should move toward digitization. The Treasury should join the ACH and implement an Integrated Financial Management System. CBOB should work with commercial banks to introduce a "basic" account with lower-than-existing opening/maintenance fees for those that have never held a bank account.
- 3. SME access to finance faces constraints on both credit demand and supply. Needed reforms include introducing an official SME policy and a uniform SME definition to serve as a reference point. CBOB should start collecting data on SMEs lending from all supervised entities. Legal and regulatory reforms should modernize collateral registration process, enable seamless offering of various alternative financial products, and reduce information asymmetry in the market. Diversification and increased of private sector financing should be supported through investments and risk-sharing activities of improved public economic empowerment funds.

¹ This is anticipated in the draft new Central Bank Act.

² Chip-based cards are part of the targeted modernization of the payments system.

³ The authorities envisage a cash-use reduction strategy in the context of the next phase of the payments system modernization, to include the digital BSD currency.

Recommendations	Timeframe	Compliance
Banking sector		
Recruit additional staff with emphasis on specialists.	Near term	Completed.
Amend legislation so that if Governor is removed, reasons would be publicly disclosed.	Near term	Provisions have been drafted and are under review.
Implement, as planned, draft guidance on bank responsibilities for managing operational, interest rate, and market risk.	Near term	Completed.
Develop guidelines on the scope and methods of consolidated supervision.	Near term	In progress. A first draft guideline has been developed however, it has been held in abeyance pending legislative amendments, which are under consideration.
Insurance and Pensions		
Introduce a standard methodology for the valuation of long-term insurer liabilities.	Near term	Guideline on minimum standards in place.
Implement fully the 3-year plan towards risk-based supervision (RBS). Onsite comprehensive examinations should be initiated without delay.	Medium term	Completed.
Develop support for consumer complaint handling. Consider establishing ombudsman.	Medium term	Complaints filing process has been strengthened and an independent arbitration process was introduced in 2017.
Amend legislation to specifically require intermediaries to establish a premium payment trust account separate from the intermediary's account.	Near term	The Insurance Act mandates a separate trust account.
Introduce staggered terms for Insurance Commission of The Bahamas (ICB) Board and publish reasons for removal of Board members or the Superintendent.	Near term	Drafting amendments to the Insurance Act.
Develop regulations for appropriate group supervision, corporate governance and risk management standards, processes and procedures and conduct onsite reviews in accordance with Insurance Core Principle (ICP) 23.	Near term	No regulations; ICB cooperates with other regulators under MOU's and colleges
Promulgate regulation for new pension fund legislation without delay.	Near term	Pending.

Appendix VI. Implementation of 2013 FSAP Recommendations

Capital Markets		
Replace current Investment Funds Act 2003 (IFA) and its regulations.	Near term	Draft bill under consultation. IFA is expected to be approved in 2018.
Delete the exclusion in the Securities Industry Act 2011 (SIA) which permits selling investment fund shares to clients without a license if that is the only securities business a person undertakes.	Near term	Pending; addressed as part of IFA overhaul.
Subject all locally resident related parties to full due diligence check in licensing investment fund. Subject managers/advisers, operators and custodians to ongoing oversight.	Near term	Pending; addressed as part of IFA overhaul.
Consider appointing a public interest oversight body for the auditing profession and The Bahamas Institute of Chartered Accountants (BICA), possibly giving the role to the Securities Commission of The Bahamas (SCB).	Near term	Not started.
Develop a plan, possibly as part of the NFCMP, to deal with the failure of a licensee.	Near term	Not started.
Safety Net and Crisis Management		
Prepare crisis management plan draft for Ministry of Finance (MoF).	Near term	Stalled pending enactment of legislation.
Implement crisis management plan.	Medium term	Not started.
Develop a category of 'systemic banks' narrowed to those eligible for solvency support or extraordinary intervention, consistent with international practice.	Near term	Completed.
Develop a target ratio for Deposit Insurance Corporation (DIC) equity capital and determine primary and secondary borrowing sources.	Near term	In progress. A 2017 assessment of the DIC Fund resulted in an increase in the 2013 minimum target ratio from 100 basis points to 150 fifty basis points of insurable deposits. During 2019, discussions will be arranged between the DIC and Ministry of Finance to formalize a government borrowing line of credit. In addition, the Board will be requested to approve, a change to a differential risk-based premium, an increase in the annual base premium and an increase in the fund target ratio over a specified timeframe.