Incorporating SIMI identification into Fund Surveillance

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Financial crisis highlighted the need to focus on systemic risk

- **Unprecedented reach of the financial crisis:**
  - The interconnectedness of financial institutions, markets and systems
  - The potential systemic risk posed by instruments, entities and markets that were either weakly regulated or fell outside the regulatory perimeter
- **Genesis of the crisis also highlighted:**
  - Rapid financial innovation that outpaced risk management and supervisory practices
  - Incentives for regulatory arbitrage
  - Failure of market discipline
- **Redesign will require**
  - A macro-prudential orientation for financial stability policy
  - Need to focus on the sources of systemic risk.

National and international initiatives

- **IMF/BIS/FSB Guidelines to identify Systemically Important Institutions, Markets and Instruments**
  - Requested by G20 leaders April 2009
  - Presented to the Finance Ministers and Central Bank Governors November 2009
- **FSB and standard setters**
  - Capital charges for systemic risk (Basel Committee, others)
  - Leveling the regulatory playing field between banking, insurance and securities (Joint Forum)
  - Extending the perimeter of regulation
  - Crisis management frameworks
- **National authorities**
  - Systemic risk monitoring –e.g. Oversight Council, US/UK; Syster Board, EU.

What is systemic risk?

Definition

- **Negative Externalities**
  - Risks that are not internalized and can significantly impact the financial system
- **Disruption to the flow of financial services**
- **Significant spillovers to the real economy**

What should be covered?

- **Financial institutions**
  - Credit intermediation, savings, risk management, payment services, supporting primary and secondary markets
- **Financial markets and instruments**
  - Funding channels, liquidity, risk management
  - Financial infrastructure for clearing and settlement, trading, pricing
- **All types of financial intermediaries or markets are potentially systemic to some extent.**

Identifying systemically important entities, markets or instruments

- **Systemic importance will be graduated and not binary, reflecting the potential systemic impact**
- **Time varying, conditioned by the economic environment**
  - Under weak economic conditions
    - Higher correlation of losses
    - Higher risks of contagion from otherwise unimportant elements
- **Conditioned by the structure of the financial system**
  - Robustness of other elements to withstand shocks
  - And the frameworks to deal with financial institution and market failures
- **Conditioned by geographical context**
  - National, regional or international
- **High degree of judgment needed founded on a detailed knowledge of the financial system**
  - Cannot be based simply on quantitative indicators
  - Qualitative analysis will require a system wide approach

Assessment Criteria

Primary indicators related to:

Size – the amount of services provided by the component

- Important but even more so when linked with:
  - Interconnectedness;
  - Complex business models and group structures
- Relevant in assessing clusters of institutions that may be individually small but are exposed to common risk factors.

Lack of Substitutability – difficulty of other components to provide the same services

Interconnectedness – financial distress in one institution or market raises the likelihood of distress in others through provision of funds and services, funding or confidence factors.

Contributing Factors:

- **Vulnerabilities:** Leverage, Liquidity and maturity mismatches, complexity
- **Institutional framework that can mitigate systemic risk**
  - Robustness of clearing and settlements and technical infrastructure to withstand failures and shocks
  - Crisis management framework and capacity to resolve failing institutions and transfer their activities quickly to other entities

Quantitative Analysis

- **Use of indicators**
  - Simpler, draws on readily available information;
  - Useful when systemic importance is relatively stable
  - Better at capturing some aspects (size) than others (substitutability, interconnectedness)
  - Less useful in capturing emerging trends or handling unregulated entities
- **Models**

  Network Analysis
    - Used to analyze the degree of interconnectedness
    - Effect of spillovers from a shock to one institution on the system can be simulated
    - Draw back is the limited availability of date on bilateral exposures and which can change rapidly

  Portfolio models of risk based on market data
    - Used to identify common risk factors or to track how distress in one institution may affect others
    - Advantage -- based on publicly available information, but disadvantage -- market perceptions vary greatly between normal and crisis times

  Stress testing and scenario analysis
    - Help to address the state-contingent nature of systemic importance
- **Scoring techniques**
  - Practical way of integrating diverse elements of the assessment

Implications

- Need a framework to conduct system wide assessments and update them on a regular basis:
  - Institutional arrangements;
  - Methodologies
  - Data collection and sharing etc.
- Need to calibrate the nature and scope of regulation to reflect systemic relevance
- Need to adopt a functional approach to regulation rather than one based on type of institutions
- Potential need to extend the perimeter of regulation
- Potential need to update the design and coverage of contingency plans, safety nets and crisis management arrangements

Implications for IMF Surveillance

- Assessments of systemic importance should be at the base of Fund assessments of financial stability:
  - Prioritize assessments to reflect systemic importance (countries, institutions, regulatory frameworks)
  - Assessments should extend beyond those entities traditionally viewed as important
  - Encompass issues of size, complexity, interconnectedness, limited substitutability, as well as vulnerabilities and crisis management.
  - Incorporate regional and international connections and potential cross border spillovers
  - Explore techniques and methodologies that help identify SIMI
- While primary responsibility for SIMI assessments rests with national authorities, the IMF has a role in developing further the assessment guidelines and helping countries through its surveillance and TA to implement them (*Executive Board discussion on the SIMI)* ;
- Collect the data necessary, and engage with SIMIs, to assess spillovers through global financial networks and their implications for macro-financial stability (*Executive Board discussion on modernizing surveillance*)

Practical considerations for Fund Assessments

- Recognition that country approaches vary widely
- No set of best practice methodologies; application of specific methodologies constrained by data;
- But some common elements drawing on the guidelines:
  - Need to have an assessment framework, that would take account of system wide developments and have the authority to collect the necessary information and capacity to assess it;
  - Recognition of the state dependent nature of the assessments, with the capacity to adjust the scope and frequency of assessments;
  - Importance of exercising judgment and avoiding overly prescriptive approaches that could aggravate moral hazard;
  - Need to fill information gaps (bilateral exposures, unregulated entities);
  - Incorporating assessments of the adequacy of crisis management frameworks to handle failures should they occur;
  - Need for cross border collaboration in assessment of globally or regionally important groups.

Contributions from IMF Surveillance/TA

- **Technical Advice**
  - **Institutional arrangements for SIMI assessment using IMF/BIS/FSB Guidelines;**
  - **Methodologies, information and assessment framework to identify SIMI**
  - **Range of policy responses to address SIMI as international policies/standards evolve:**
    - Systemic risk charges;
    - Expanding the perimeter of regulation;
    - Updating crisis management arrangements

- **Conduct assessments focused on identifying and mitigating systemic risks:**
  - Prioritizing assessments to reflect systemic importance;
  - Designing stress testing modules and scenarios to capture SIMIs
  - Targeting codes and standards assessments and updates on sy risks.

Contributions from IMF Surveillance/TA

- **Complement national assessments of financial stability with analysis of globally important SIMIs**
  - Collaboration in developing sources of information on global networks;
  - Engaging with SIMIs on global exposures and potential spill over's;

- **Contribute to filling critical information gaps**
  - G20 recommendations on leverage, maturity mismatches etc.
  - On-going identification of information gaps

- **Advance methodological approaches on measuring systemic risk**
  - GFSR analysis of networks etc

- **Training on the development of macro-prudential frameworks a measurement techniques**