INTERNATIONAL MONETARY FUND AND THE WORLD BANK

Report to the Executive Boards of the IMF and the World Bank on the New CPSS-IOSCO Principles for Financial Market Infrastructures

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Glossary

CCP	Central Counterparty
CGFS	Committee on the Global Financial System
CPSIPS	Core Principles for Systemically Important Payment Systems
CPSS	Committee on Payment and Settlement Systems
CSD	Central Securities Depository
FMI	Financial Market Infrastructure
FSAP	Financial Sector Assessment Program
FSB	Financial Stability Board
IOSCO	International Organization of Securities Commissions
OTC	Over-the-counter
PS	Payment System
RCCP	Recommendations for Central Counterparties
ROSC	Report on the Observance of Standards and Codes
RSSS	Recommendations for Securities Settlement Systems
TA	Technical assistance
TR	Trade repository

I. INTRODUCTION

1. **New and revised international standards for safe and efficient Financial Market Infrastructures (FMIs) were published in April 2012.**[1] The Committee on Payment and Settlement Systems (CPSS) and the International Organization of Securities Commissions (IOSCO) reviewed the existing sets of standards for FMIs[2] and replaced them by one new set of *Principles for Financial Market Infrastructures*. Appendix I outlines the 24 new Principles for FMIs as well as the 5 responsibilities for authorities.[3] FMIs facilitate the clearing, settlement, and recording of monetary and other financial transactions, such as payments, securities and derivatives contracts. The term FMI refers to payment systems (PSs) that are systemically important, central securities depositories (CSDs), securities settlement systems (SSSs), and central counterparties (CCPs). The revised standards also incorporate additional guidance for over-the-counter (OTC) derivatives CCPs and trade repositories (TRs).

2. **The new Principles for FMIs reflect market and regulatory developments over the last decade, taking account of the lessons learnt from the financial crisis in 2008/2009.** They also accommodate the G20/FSB recommendations to strengthen core financial infrastructure and markets. Although FMIs performed well during the recent financial crisis, events highlighted important lessons for effective risk management. While safe and efficient FMIs contribute to maintaining and promoting financial stability and economic growth, FMIs also concentrate risk. If not properly managed, FMIs can be sources of financial shocks, such as liquidity dislocations and credit losses, or a major channel through which these shocks are transmitted across domestic and international financial markets.

3. **The assessment methodology and the disclosure framework for financial market infrastructures are expected to be finalized later in 2012.** The CPSS and IOSCO have published for consultation the proposed assessment methodology and disclosure framework and expect to finalize them in the second half of 2012. The assessment methodology was produced by a CPSS-IOSCO working group under the leadership of the World Bank (Bank) and the IMF (Fund). Pilots have taken place to verify the usefulness of the draft assessment

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[1] See http://www.bis.org/press/p120416.htm.

[2] The old sets of standards were the CPSS Core Principles for Systemically Important Payment Systems (2001), the CPSS-IOSCO Recommendations for Securities Settlement Systems (2001) and the CPSS-IOSCO Recommendations for Central Counterparties (2004). In 2010 CPSS and IOSCO issued for consultation Guidance on the application of the 2004 CPSS-IOSCO Recommendations for Central Counterparties to OTC CCPs and Considerations for trade repositories in OTC derivatives markets. The Board of the Fund has previously endorsed the use of the CPSS Core Principles for Systemically Important Payment Systems as well as the CPSS-IOSCO Recommendations for Securities Settlement Systems. There's no indication that the Board has endorsed the CPSS-IOSCO Recommendations for Central Counterparties. Nevertheless, the Fund has used these recommendations during FSAPs, ROSCs and TA missions since 2004.

[3] Central banks, market regulators, and other relevant authorities for FMIs.

methodology, for example during the FSAP assessment in Brazil. Furthermore, the CPSS and IOSCO are engaged in additional work on the resolution of FMIs. This work aims to provide guidance for designing recovery and resolution regimes for FMIs consistent with the FSB's *Key attributes of effective resolution regimes for financial institutions* while taking account of the special characteristics of FMIs.

4. **It is proposed that the existing sets of standards for FMIs be replaced by the new Principles for FMIs in assessing the safety and efficiency of FMIs under the Financial Sector Assessment Program (FSAP) and the Reports on Observance of Standards and Codes (ROSCs).** The Bank and the Fund intend to use the new Principles in upcoming assessments starting on or after January 1, 2013. In the interim, the new Principles will be used only upon explicit request of the authorities; otherwise the existing standards will be used. For assessments starting on or after January 1, 2013, only the new Principles will be used, since all CPSS and IOSCO members have committed to endorse the updated standards in their jurisdictions by the end of 2012. Also, the G20 requested to have regulation for OTC derivatives clearing in place by the end of 2012.

5. **The purpose of this note is to inform the Executive Boards of the Bank and the Fund of the main changes in the Principles for FMIs, as well as the intended approach in case of resource constraints.** Due to differences in internal procedures and practices, this Note is being submitted by the Bank staff to its Board for information purposes only. In the case of the Fund, Fund staff is also seeking the endorsement of the Board for the use of the revised Principles for future assessments.

II. Overview of Main Changes

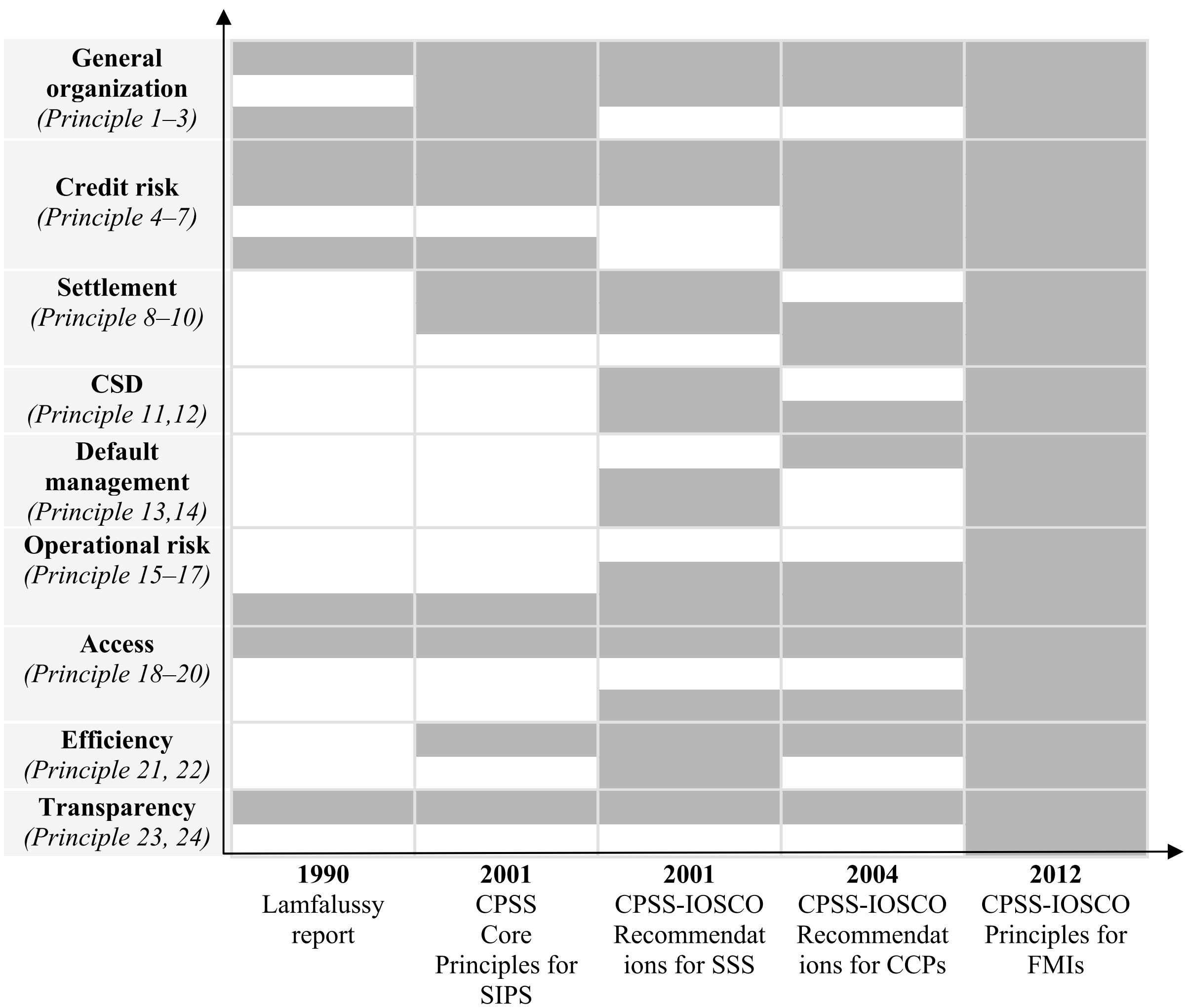
6. **The revised set of standards offers harmonized and, where appropriate, stronger standards for FMIs.** The three existing sets of standards have been reviewed and harmonized into one new set. Appendix 2 maps the existing sets of standards to the new standards. The main differences between the old sets and the new set of principles are:

- standards are stronger, in particular on different components of the risk management of FMIs;
- new distinct standards have been introduced on liquidity and credit risks, on default procedures and segregation and portability and general business risk; and
- the number of areas covered by the standards has increased as illustrated by Figure 1.

7. **Of particular importance for financial stability are the new requirements and guidance related to FMI measures to facilitate their recovery and orderly wind-down; access to FMIs; tiered participation arrangements; and interdependencies and interoperability.**

8. **The new Principles identify a number of measures that FMIs should take to prepare for and facilitate the implementation of their own recovery or orderly wind-down plans, if needed.** Given the systemic importance of the FMIs the disorderly failure of an FMI would likely lead to systemic disruption to its members, the markets it supports, linked FMIs, and to the financial system more broadly. Depending on the specific situation and the powers and tools available to authorities, these actions may be implemented by the FMI itself, by the relevant authorities, or by a combination of both. Specific resolution regimes for FMIs, including the powers and tools for authorities, will be the focus of separate CPSS-IOSCO work.

Figure 1. The Increased Coverage of Number of Areas by the Standards (since 1990)



9. **The new Principles provide guidance on access and participation requirements, which is in particular important to CCPs in light of the 2009 G20 commitment to centrally clear all standardized OTC derivatives by the end of 2012.** The Committee on

the Global Financial System (CGFS) considered potential implications of alternative access arrangements in its November 2011 report.[4] The Principles for FMIs focuses on the identification, monitoring, mitigation and management of risks posed to the FMI by different arrangements (Principles 18, 19 and 20).

10. **Interdependencies between FMIs, including interoperability,[5] are addressed in various Principles.** The combination of these Principles should achieve a strong and balanced approach to interoperability. The new Principles for FMIs also provide guidance on how an FMI should address risks arising from tiered participations arrangements.[6] The dependencies and risk exposures inherent to tiered arrangements can, however, threaten the smooth functioning of the FMI, its participants and the broader financial markets.

11. **The Bank and Fund staffs participated actively in the production and are supportive of these revised standards.** The revisions strengthen the safety and efficiency of FMIs and subsequently of its members and the markets served, thereby contributing to overall financial stability. Regular review and updating by the standard setters help ensure the continued relevance of international best practices by keeping pace with dynamic market developments. As mentioned, the Bank and Fund staffs are leading the work on the development of the assessment methodology.

III. Use of Principles in Financial Surveillance and Technical Assistance

12. **The Bank and the Fund intend to use the new Principles as benchmarks for assessments either in the context of FSAPs or in stand-alone ROSCs with effect from January 1, 2013.** For assessments of compliance planned to be conducted before such date, the authorities will be given the option to be assessed either on the previous or the new standards. The new standards will be used as benchmarks for both voluntary and mandatory FSAPs. ROSCs using FMIs will continue to be voluntary in the context of the FSAs.

13. **The new Principles may generate additional requests for technical assistance (TA) from member jurisdictions.** The revised standards have raised the bar in terms of the depth of requirements and as a consequence jurisdictions might need assistance to improve their capabilities to identify and monitor risks and enhance efficiency. In the absence of adequate Bank and Fund resources available to respond to such TA requests, it will be important for the other members of CPSS and IOSCO to assist in these areas.

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[4] See CGFS, The macrofinancial implications of alternative configurations for access to Central counterparties in OTC derivatives, November 2011.

[5] Interoperability relates to links between FMIs to facilitate cross-FMI servicing of participants.

[6] Tiered participation arrangements occur when some firms rely on the services provided by other firms to use the FMI’s central payment, clearing, settlement, or recording facilities.

14. **The Bank and the Fund have encouraged standard setters to reach out to a broader range of Bank-Fund member countries to increase awareness of the new Principles for FMIs.** In the coming months, the CPSS and IOSCO will conduct outreach activities to inform FMIs, authorities and the general public about the Principles. The Bank and the Fund are collaborating with such effort, in some cases in a leading role.

IV. Resource Implications of the Use of the Revised Standards by the World Bank and the Fund

15. **The size and complexity of the assessments and the depth of review expected of assessors is higher under the new Principles, potentially requiring additional resources for full assessments of FMIs in a country.** Table 1 illustrates the increase in the number of Principles per FMI. CSDs are considered as distinct FMIs, next to SSSs. In addition, TRs will be part of the scope of FSAPs in addition to PSs, CSDs, SSSs and CCPs. It is anticipated that the new assessment methodology will be more comprehensive and detailed than the existing one, also requiring additional resources. Careful allocation of resources is needed to continue performing assessments of high quality in the context of FSAPs and TA and to ensure the proper identification and monitoring of issues that could potentially jeopardize the safety and efficiency of FMIs.

Table 1. Expanded Number of Principles and Responsibilities

FMI/Authority	*Existing version*	*New version*	*Remarks*
PS	10 Principles	18 Principles	
CSDs	-	15 Principles	Existing standards consider CSDs as part of SSS.
SSSs	19 Recommendations	20 Principles	
CCPs	15 Recommendations	22 Principles	
TRs	-	12 Principles	There are no existing standards for TRs yet.
Authorities	4 Responsibilities	5 Responsibilities	

16. **It is anticipated that, when an FSAP includes an FMI component, a flexible approach be adopted in terms of the scope of the assessment, dependent on the available resources.** When an FSAP assessment of FMIs and their supervision is seemed appropriate, the assessment would cover the five responsibilities of the authorities, and full assessments of the most systemically important FMIs would also be conducted. However, if resources are limited, a layered approach can be adopted, with the Bank and/or Fund

assessing the authorities and the authorities assessing the FMIs. In that case the assessment of the Bank and/or Fund would comprise at least the five responsibilities of authorities and the main FMI. Dependent on the resources, the Bank and/or Fund may identify, in addition to the five responsibilities and the main FMI, a selection of FMIs and/or Principles in close cooperation with the country. The proposed flexible approach to the scope of assessment is consistent with the risk-based approach for all ROSCs[7] endorsed at the 2011 Review of the Standards and Codes Initiative (SM/11/33).

[7] With the exception of the Anti Money Laundering /Combating the Financing of Terrorism component.

V. PROPOSED DECISION

The following decision is proposed for adoption by the Executive Board:

1. The Executive Board takes note of the new Principles for Financial Market Infrastructures ("FMIs"), as published by the Committee on Payment and Settlement Systems (CPSS) and the International Organization of Securities Commissions (IOSCO) on April 16, 2012 and endorses these as the standards under which assessments initiated on or after January 1, 2013 will be conducted.

2. For assessments initiated before January 1, 2013 the revised Principles referred to in paragraph 1 may be used at the request of the member.

Appendix I. Overview of New Principles and Responsibilities

Principles for financial market infrastructures

General organization

Principle 1: Legal basis

An FMI should have a well-founded, clear, transparent, and enforceable legal basis for each material aspect of its activities in all relevant jurisdictions.

Principle 2: Governance

An FMI should have governance arrangements that are clear and transparent, promote the safety and efficiency of the FMI, and support the stability of the broader financial system, other relevant public interest considerations, and the objectives of relevant stakeholders.

Principle 3: Framework for the comprehensive management of risks

An FMI should have a sound risk-management framework for comprehensively managing legal, credit, liquidity, operational, and other risks.

Credit and liquidity risk management

Principle 4: Credit risk

An FMI should effectively measure, monitor, and manage its credit exposures to participants and those arising from its payment, clearing, and settlement processes. An FMI should maintain sufficient financial resources to cover its credit exposure to each participant fully with a high degree of confidence. In addition, a CCP that is involved in activities with a more-complex risk profile or that is systemically important in multiple jurisdictions should maintain additional financial resources sufficient to cover a wide range of potential stress scenarios that should include, but not be limited to, the default of the two participants and their affiliates that would potentially cause the largest aggregate credit exposure to the CCP in extreme but plausible market conditions. All other CCPs should maintain additional financial resources sufficient to cover a wide range of potential stress scenarios that should include, but not be limited to, the default of the participant and its affiliates that would potentially cause the largest aggregate credit exposure to the CCP in extreme but plausible market conditions.

Principle 5: Collateral

An FMI that requires collateral to manage its or its participants' credit exposure should accept collateral with low credit, liquidity, and market risks. An FMI should also set and enforce appropriately conservative haircuts and concentration limits.

Principle 6: Margin

A CCP should cover its credit exposures to its participants for all products through an effective margin system that is risk-based and regularly reviewed.

Principle 7: Liquidity risk

An FMI should effectively measure, monitor, and manage its liquidity risk. An FMI should maintain sufficient liquid resources in all relevant currencies to effect same-day and, where appropriate, intraday and multiday settlement of payment obligations with a high degree of confidence under a wide range of potential stress scenarios that should include, but not be limited to, the default of the participant and its affiliates that would generate the largest aggregate liquidity obligation for the FMI in extreme but plausible market conditions.

Settlement

Principle 8: Settlement finality

An FMI should provide clear and certain final settlement, at a minimum by the end of the value date. Where necessary or preferable, an FMI should provide final settlement intraday or in real time.

Principle 9: Money settlements

An FMI should conduct its money settlements in central bank money where practical and available. If central bank money is not used, an FMI should minimize and strictly control the credit and liquidity risk arising from the use of commercial bank money.

Principle 10: Physical deliveries

An FMI should clearly state its obligations with respect to the delivery of physical instruments or commodities and should identify, monitor, and manage the risks associated with such physical deliveries.

Central securities depositories and exchange-of-value settlement systems

Principle 11: Central securities depositories

A CSD should have appropriate rules and procedures to help ensure the integrity of securities issues and minimize and manage the risks associated with the safekeeping and transfer of securities. A CSD should maintain securities in an immobilized or dematerialized form for their transfer by book entry.

Principle 12: Exchange-of-value settlement systems

If an FMI settles transactions that involve the settlement of two linked obligations (for example, securities or foreign exchange transactions), it should eliminate principal risk by conditioning the final settlement of one obligation upon the final settlement of the other.

Default management

Principle 13: Participant-default rules and procedures

An FMI should have effective and clearly defined rules and procedures to manage a participant default. These rules and procedures should be designed to ensure that the FMI can take timely action to contain losses and liquidity pressures and continue to meet its obligations.

Principle 14: Segregation and portability

A CCP should have rules and procedures that enable the segregation and portability of positions of a participant's customers and the collateral provided to the CCP with respect to those positions.

General business and operational risk management

Principle 15: General business risk

An FMI should identify, monitor, and manage its general business risk and hold sufficient liquid net assets funded by equity to cover potential general business losses so that it can continue operations and services as a going concern if those losses materialize. Further, liquid net assets should at all times be sufficient to ensure a recovery or orderly wind-down of critical operations and services.

Principle 16: Custody and investment risks

An FMI should safeguard its own and its participants' assets and minimize the risk of loss on and delay in access to these assets. An FMI's investments should be in instruments with minimal credit, market, and liquidity risks.

Principle 17: Operational risk

An FMI should identify the plausible sources of operational risk, both internal and external, and mitigate their impact through the use of appropriate systems, policies, procedures, and controls. Systems should be designed to ensure a high degree of security and operational reliability and should have adequate, scalable capacity. Business continuity management should aim for timely recovery of operations and fulfillment of the FMI's obligations, including in the event of a wide-scale or major disruption.

Access

Principle 18: Access and participation requirements

An FMI should have objective, risk-based, and publicly disclosed criteria for participation, which permit fair and open access.

Principle 19: Tiered participation arrangements

An FMI should identify, monitor, and manage the material risks to the FMI arising from tiered participation arrangements.

Principle 20: FMI links

An FMI that establishes a link with one or more FMIs should identify, monitor, and manage link-related risks.

Efficiency

Principle 21: Efficiency and effectiveness

An FMI should be efficient and effective in meeting the requirements of its participants and the markets it serves.

Principle 22: Communication procedures and standards

An FMI should use, or at a minimum accommodate, relevant internationally accepted communication procedures and standards in order to facilitate efficient payment, clearing, settlement, and recording.

Transparency

Principle 23: Disclosure of rules, key procedures, and market data

An FMI should have clear and comprehensive rules and procedures and should provide sufficient information to enable participants to have an accurate understanding of the risks, fees, and other material costs they incur by participating in the FMI. All relevant rules and key procedures should be publicly disclosed.

Principle 24: Disclosure of market data by trade repositories

A TR should provide timely and accurate data to relevant authorities and the public in line with their respective needs.

Responsibilities of central banks, market regulators, and other relevant authorities for financial market infrastructures

Responsibility A: Regulation, supervision, and oversight of FMIs

FMIs should be subject to appropriate and effective regulation, supervision, and oversight by a central bank, market regulator, or other relevant authority.

Responsibility B: Regulatory, supervisory, and oversight powers and resources

Central banks, market regulators, and other relevant authorities should have the powers and resources to carry out effectively their responsibilities in regulating, supervising, and overseeing FMIs.

Responsibility C: Disclosure of policies with respect to FMIs

Central banks, market regulators, and other relevant authorities should clearly define and disclose their regulatory, supervisory, and oversight policies with respect to FMIs.

Responsibility D: Application of the principles for FMIs

Central banks, market regulators, and other relevant authorities should adopt the CPSS-IOSCO *Principles for financial market infrastructures* and apply them consistently.

Responsibility E: Cooperation with other authorities

Central banks, market regulators, and other relevant authorities should cooperate with each other, both domestically and internationally, as appropriate, in promoting the safety and efficiency of FMIs.

Appendix II. Mapping of the New Standards to the Existing Standards

New Principles for FMIs		CPSIPS	RSSS	RCCP
Principle 1:	Legal basis	1	1	1
Principle 2:	Governance	10	13	13
Principle 3:	Framework for the comprehensive management of risks	3	–	–
Principle 4:	Credit risk	3, 5	9	3, 5
Principle 5:	Collateral	5	9	4, 5
Principle 6:	Margin	–	–	4, 5
Principle 7:	Liquidity risk	3, 5	9	5
Principle 8:	Settlement finality	4	8	–
Principle 9:	Money settlements	6	10	9
Principle 10:	Physical deliveries	–	–	10
Principle 11:	Central securities depositories	–	6, 11, 12	–
Principle 12:	Exchange-of-value settlement systems	–	7	10
Principle 13:	Participant-default rules and procedures	–	–	6
Principle 14:	Segregation and portability	–	12	–
Principle 15:	General business risk	–	–	–
Principle 16:	Custody and investment risks	–	12	7
Principle 17:	Operational risk	7	11	8
Principle 18:	Access and participation requirements	9	14	2
Principle 19:	Tiered participation arrangements	–	–	–
Principle 20:	FMI links	–	19	11
Principle 21:	Efficiency and effectiveness	8	15	12
Principle 22:	Communication procedures and standards	–	16	–
Principle 23:	Disclosure of rules, key procedures, and market data	2	17	14
Principle 24:	Disclosure of market data by trade repositories	–	–	–

New Responsibilities of Central Banks, Market Regulators, and Other Relevant Authorities for FMIs		CPSIPS	RSSS	RCCP
Responsibility A:	Regulation, supervision, and oversight of FMIs	A	18	15
Responsibility B:	Regulatory, supervisory and oversight powers and resources	C	18	15
Responsibility C:	Disclosure of objectives and policies	A	18	15
Responsibility D:	Application of the principles for FMIs	B, C	–	–
Responsibility E:	Cooperation with other authorities	D	18	15
Source: CPSS-IOSCO Principles for financial market infrastructures, April 2012.				