WP/03/94

IMF Working Paper

Cross-Country and Cross-Sector Analysis of Transparency of Monetary and Financial Policies

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INTERNATIONAL MONETARY FUND

 WP/03/94

IMF Working Paper

Monetary and Exchange Affairs Department

Cross-Country and Cross-Sector Analysis of Transparency of Monetary and Financial Policies[1]

Prepared by V. Sundararajan, Udaibir S. Das, and Plamen Yossifov

May 2003

Abstract

In this paper we construct indices of transparency of monetary and financial policies, based on self-evaluations carried out by 135 IMF member countries in 1999, and use them to identify transparency patterns across different policies and country groups. We find that across all countries, transparency is highest in the formulation and conduct of monetary policy and lowest in insurance supervision and deposit-insurance oversight. Across country groups having similar political/economic characteristics, the average degree of transparency is highest in advanced countries and lowest in developing ones for both monetary policy and those financial policies for which there are differences between country group means.

JEL Classification Numbers: E58, G38

Keywords: transparency, international financial architecture, standards and codes

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[1] The authors are members of an IMF staff team that has helped develop and disseminate the IMF Code of Good Practices on Transparency in Monetary and Financial Policies. The paper has greatly benefited from material prepared by the team members as well as from discussions held with them.

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I. Introduction

The growing integration of financial markets and recent experience of crises associated with capital flow volatility have led to much reflection and analysis on ways to strengthen financial systems. Within this broad context, the role of enhanced transparency and public disclosure practices has gained prominence. The notion of transparency itself has attracted greater public attention, with increasing calls by legislatures, the media, markets, and the general public for the official sector (in this context central banks, supervisory agencies, and relevant governmental units) to become more open about policies and practices. Recent high-profile corporate bankruptcies have also revealed risks and potential systemic issues stemming from accounting and corporate governance practices on the global and national levels, highlighting the need for improved transparency and disclosure by financial intermediaries and other nonfinancial constituents in financial markets.

While the IMF has taken the lead in promoting transparency and public disclosure practices of the *policy framework* relating to the financial system and its functioning, international standard setters, such as the Basel Committee, the International Organization of Securities Commissions (IOSCO), the International Association of Insurance Supervisors (IAIS), and the International Accounting Standards Board (IASB), have been devising guidance relating to disclosure and transparency for financial transactions and financial institutions. There is widespread recognition that, as the complexity of financial systems and their oversight grows, the general public needs to be provided with easy-to-understand and timely information on financial performance and risk exposures based on well-accepted practices.

While transparency has achieved the status of "golden rule" of the new international financial system and theoretical arguments in favor of greater transparency abound, empirical investigations in this area have been hampered by lack of comparable cross-country data. In this paper, we present a comprehensive analysis of transparency patterns across different policies and country groups, based on indices of observance of the Code of Good Practices on Transparency in Monetary and Financial Policies (MFP Transparency Code) constructed from self-evaluations by 135 IMF member countries completed in 1999.

Section II defines transparency of monetary and financial policies and presents the main policy and theoretical arguments in its favor. Section III discusses recent trends in transparency practices around the world drawing from the formal assessments of the MFP Transparency Code carried out under the joint IMF-World Bank Financial Sector Assessment Program (FSAP). Section IV analyzes transparency patterns across different policies and country groups, based on indices of observance of the MFP Transparency Code. The paper concludes with a summary of the main findings.

II. Transparency: Its Meaning and Relevance

A. Definition and Relevance

Monetary and financial policy transparency refers to an environment in which the objectives of the policy; its legal, institutional, and economic framework; policy decisions and their rationale; data and information related to monetary and financial policies; and the accountability of the policymaking body are provided to the public in an understandable, accessible and timely basis. As part of the *microprudential* policy framework, transparency consists of public disclosure of prudential regulations, market-conduct rules, reporting requirements, supervisory practices, internal control and governance arrangements, thus helping to maintain depositor and investor confidence. Transparency is also an element of the *macroprudential policy* framework (Sundararajan et al., 2002). It helps shape expectations and improve the robustness of linkages across institutions and markets by improving the recognition of risks and clarifying the transmission mechanism from policies to objectives. Just as inadequate information about the state of the economy and the financial markets can make it difficult for monetary and financial sector policymakers to formulate consistent policies, uncertainty about the policy framework and its intent could itself contribute to abrupt and destabilizing market behavior (Das and Quintyn, 2002).

Transparent monetary and financial policies enhance the efficiency of financial markets and the real sector by anchoring market participants' expectations and alleviating the problems of adverse selection and moral hazard in the relationship between supervised entities and their clients. Lack of transparency in policy decision making and unsystematic public disclosure of information relevant for the formation of rational expectations result in frequent revisions of private agents' expectations that raise the variability of asset prices, consumption, and investment, thereby increasing the riskiness of investments in financial and physical assets.[2] The latter translates into higher risk-premiums demanded on investments, which increases the rate of interest. The possibility for adverse selection and moral hazard in the relationship between supervised entities and their clients also results in higher risk-premiums and interest rates that prevent firms from pursuing otherwise economically viable investment projects (Box 1). Public disclosure of information on supervised banks, nonbank financial institutions, and securities markets, can lower the costs of identifying the riskiness of investment projects and foster reputational concerns on the side of borrowers (or issuers of stock), thus mitigating market inefficiencies created by adverse selection and moral hazard in financial markets.

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[2] In dynamic intertemporal optimization models under uncertainty and rational expectations, equilibrium asset prices, level of consumption and investment are forward looking variables that depend on private agents' expectations about the future realizations of variables that are outside their control (e.g. growth in money supply, taxes, etc.). See Abel (1991), Hall (1978), Lucas (1978), Hansen and Singleton (1983), Hayashi (1982), Craine (1989).

Box 1. Adverse Selection and Moral Hazard in Financial Markets

Adverse selection.[1] In financial markets, borrowers of funds (or issuers of stock) typically know more about the quality of their investment opportunities than potential lenders (or shareholders) due to the high cost of collecting information on the riskiness of projects by investors. In the case of markets of borrowed funds, potential lenders cannot distinguish high-risk from low-risk projects and they demand a risk premium above the risk-free rate of return on all their investments that corresponds to the average risk of all projects.[2] Intuitively, the excess risk premium imposed on high-quality borrowers offsets the losses incurred in funding high-risk investment projects. As a result, the highest quality borrowers are priced out of the market, which lowers market efficiency.

Moral hazard.[1] Once external financing is secured, borrowers (or issuers of stock) have an incentive to break the terms of their contracts with investors and use the funds for riskier projects than agreed upon. In the case of markets of borrowed funds, moral hazard comes into play when the amount of external financing exceeds the value of firm's own capital. Because for the borrower, the potential loss from the investment is bounded by the value of his own capital, there is a positive discrepancy between the expected private payoff from the project that accrues to him and the expected social payoff that accrues to all parties involved.[3] As a result, the debtor will always prefer to invest in projects with high expected private payoff, even though their social payoffs might be lower than the social payoff of an alternative low-risk project. Knowing this, the lenders would require an additional risk-premium on the cost of their funds to compensate them for the risks associated with moral hazard. The higher interest rates in the presence of moral hazard prevent firms from pursuing otherwise economically viable investment projects.[4]

Sources: Fazzari, Hubbard, and Petersen (1988); Hirshleifer and Riley (1979); and Akerlof (1970).

[1] In the presence of asymmetric information on the side of borrowers (or shareholders) and creditors (or equity issuers), *adverse selection* could arise *prior* to the act of borrowing (or investing), whereas *moral hazard* could arise *following* the act of borrowing (or investing).

[2] In the case of stock markets, potential shareholders value all firms at the stock market's average valuation. The implications are similar to the ones described above in the case of markets for borrowed funds. High quality firms withdraw from the market and resort to alternative means of financing, or raise less capital, which constrains their ability to pursue economically viable investment opportunities.

[3] The expected private payoff is the weighted average (with weights equal to the expected probabilities of the two realizations) of the payoff in case of success and the loss incurred by the borrower, which is bounded by the value of his own capital, in case of failure. The expected social payoff is the weighted average of the payoff in case of success and the loss (up to the full amount invested) in case of failure.

[4] In stock markets, the moral hazard problem is even more acute as the managers of publicly traded companies typically own a much smaller fraction of firms' own capital. Consequently, the discrepancy between the private and social payoff of the investments they make is larger than in the case of borrowed funds.

Transparency is also an important component of good regulatory governance in its own right and by reinforcing the independence, accountability, and integrity of financial sector regulators (Box 2). As a "good" in itself, transparency has become a powerful vehicle for removing flawed practices and policies. Increased transparency also supports the achievement of other components of regulatory governance, and as such supports credibility. First, it directly supports accountability by making the actions of the agency clear to the outside world (government and markets). Second, it protects the independence of the agency by demonstrating when and under which form interference is taking place. Finally, transparency may limit self-interest on the part the supervisors.

Box 2. Components of Good Regulatory Governance

Regulatory governance applies to those institutions that possess legal powers to regulate, supervise and/or intervene in the financial sector (i.e., financial sector regulatory and supervisory agencies) and encompasses several factors, including (1) their capacity to manage resources efficiently and to formulate, implement and enforce sound policies and regulations; (2) the respect of citizens and the state for the regulatory and supervisory agencies—abstention of industry capture and political interference; and (3) the respect of the regulatory and supervisory agencies for the broader goals and policies of the (elected) legislature. There are four distinct components of good regulatory governance: independence, accountability, transparency, and integrity of financial sector regulatory and supervisory agencies:

Independence. There is a growing consensus worldwide that regulatory governance can best be achieved by giving financial sector regulatory and supervisory agencies a fair degree of independence—that is, independence from the political sphere and from the supervised entities. Two main arguments have been offered in favor of delegating to independent agencies (as opposed to a government agency, a specific ministry or a local body) the tasks related to economic and social regulation. The first argument is the advantage of relying on dedicated and highly specialized expertise, particularly when responses are needed in complex situations. The second argument is the advantage of potentially shielding market interventions from political interference and improving transparency and stability of operations. Agency independence increases the possibility of making credible policy commitments.

Accountability. It has also been increasingly recognized in theory (but not always implemented in practice) that independence goes hand in hand with accountability. Accountability is essential for regulatory and supervisory agencies to justify their actions against the background of the mandate given to them. Independent agencies should be accountable not only to those who delegated the responsibility (the government and legislative bodies) but also to those who fall under their realm of competency and the public at large.

Integrity. This component reflects the mechanisms that ensure that staff of the agencies can pursue the institution's goal without compromising these goals because of their own behavior, or their own positions. Integrity affects staff of regulatory agencies at various levels. First, procedures for appointment of agency officials, their terms of office and criteria for removal should be such that their integrity is safeguarded. Second, the integrity of the agency's operations should be ensured. Internal governance implies that internal audit arrangements are in place to ensure that the agency's objectives are set and met, that decisions are made, and the accountability is maintained. Thus, ensuring the quality of the agency's operations will maintain the integrity of the institution and strengthen its credibility. Third, integrity also implies that there are standards for the conduct of personal affairs of officials and staff to prevent exploitation of conflicts of interest. Fourth, integrity also implies that the staff of the agency enjoys legal protection which discharging their duties. Without such legal protection, staff would be prone to bribery and the overall effectiveness and credibility of the institution would suffer greatly.

Transparency. See text above for definition and relevance to regulatory governance.

Source: Das and Quintyn (2002).

B. Areas of Policy Transparency

A good policy transparency framework in the monetary and financial sectors should therefore consist of three basic elements: (i) clear and consistent policy objectives and periodic explanation of its rationale and performance; (ii) a well-founded legal, institutional, and economic basis; and (iii) provision of data and information to create an informed view of the state of monetary and financial policies that is likely to affect individual's and firm's financial choices. These have been codified in the International Monetary Fund's Code of Good Practices on Transparency in Monetary and Financial Policies (MFP Transparency Code), which was developed in 1999, as part of the international momentum to strengthen domestic governance and reporting framework relating to fiscal and monetary affairs. Patterned on the IMF's Fiscal Transparency Code (IMF, 1999a) and linked to the IMF's Data Dissemination Standards, the MFP Transparency Code is extensive (containing 37 main practices supplemented by 45 subsidiary ones), and covers both monetary and financial policy formulation and implementation. The premise underlying this approach is that in the context of financial stability, monetary and financial policies are interrelated and often mutually reinforcing. The good transparency practices for monetary and financial policies are each grouped into four categories (IMF, 1999b):

Clarity of roles, responsibilities, and objectives of agencies for monetary/financial policies—includes practices relating to definition and disclosure of (i) the ultimate objectives and institutional framework of monetary and financial policy; and (ii) the institutional relationship between monetary and fiscal operations, as well as between financial agencies.

Open process for formulating and reporting monetary/financial policies: This area covers practices that govern public disclosure and explanation of (i) the framework, instruments, and any targets used to pursue monetary objectives; (ii) the regulatory framework and operating procedures governing the conduct of financial policies; (iii) changes in settings of monetary policy instruments and in financial policies; (iv) progress toward achieving monetary policy objectives, as well as prospects for achieving them; and (v) regulations on data reporting.

Public availability of information on monetary/financial policies: This section covers disclosure and publication practices relating to (i) presentations and releases of central bank data according to data dissemination standards; (ii) balance sheet and annual reports of the central banks and, where applicable, by financial agencies; (iii) major developments in the banking, securities, and insurance sectors and aggregate data relating to institutions in these sectors; and (iv) deposit protection schemes, policy holder guarantees, and client asset protection schemes.

Accountability and assurances of integrity by agencies: This segment includes specific accountability arrangements such as (i) appearances by officials of central banks and financial agencies before designated public authorities to report on the conduct of policies; (ii) availability of audited financial statements; (iii) internal governance procedures to ensure the integrity of operations; and (iv) standards of conduct and legal protection for officials.

C. Dimensions of Transparency

There are four broad dimensions of disclosure that underlie credible transparency: (i) means of disclosure, (ii) timeliness of disclosure, (iii) periodicity of disclosure, and (iv) quality and content of disclosure. Tables 1 and 2 present a taxonomy of the dimensions of transparency addressed by each of the individual practices of the MFP Transparency Code.

Means of disclosure

There are a variety of means and methods of communicating with the public, which can be grouped in four broad categories: (i) disclosure via official public documents; (ii) disclosure to media or representative public bodies; (iii) direct disclosure to the general public, and (iv) other means of disclosure.

In many instances, use of more than one of these forms of disclosure may be necessary if a central bank or financial agency seeks to achieve effective transparency. Depending on the extent that a central bank or financial agency desires to broaden public understanding of aspects of its institutional mandate, for example, the legislation or regulation could be supplemented and detailed in several ways: (i) by a publicly released and readily available mission statement; (ii) through recurring discussion and explanation in the institution's publications, public statements and public appearances; and posting on the central bank's or financial agency's website. Similarly, for other practices of the MFP Transparency Code, central banks and financial agencies can practice transparency by utilizing more than one form of disclosure.

Timeliness of disclosure

Timeliness of disclosure refers to the elapsed time between the occurrence of an event and the public release of information on it. Timeliness is paramount for effective transparency. In the area of data disclosure, which is an important aspect of the MFP Transparency Code, the guidelines and procedures of the IMF data dissemination standards and other standards developed by different international organizations and associations call for presenting readily accessible data on an orderly and timely basis, with an emphasis on reliability. Regarding the various statements and reports called for in the MFP Transparency Code, these need to contain meaningful and relevant information issued on a timely basis.

Table 1. Dimensions of Transparency Addressed by Individual Practices of the MFP Transparency Code for Monetary Policy

MFP Transparency Code Practice	Dimensions of Transparency			
	Means of Disclosure	Timeliness	Periodicity	Form and Content of Disclosure
1.1				X
1.1.1	X			X
1.1.2	X			X
1.1.3	X			X
1.1.4	X			X
1.1.5	X			X
1.1.6	X			X
1.1.7	X			X
1.2	X			X
1.2.1	X			
1.2.2	X			
1.2.3	X			
1.2.4	X			X
1.2.5	X			
1.3				X
1.3.1	X			
1.3.2	X			
2.1	X			
2.1.1	X			
2.1.2	X			
2.2	X			
2.2.1	X			
2.3	X	X		
2.3.1	X	X		
2.4	X		X	
2.4.1	X		X	
2.4.2	X		X	
2.5				X
2.6	X			
3.1				X
3.2	X	X	X	
3.2.1	X		X	
3.2.2	X		X	X
3.2.3	X	X		
3.2.4	X		X	
3.3				X
3.3.1				X
3.3.2	X			X
3.4	X			
4.1			X	X
4.2	X	X	X	
4.2.1				X
4.2.2	X			
4.3	X		X	
4.4	X			
4.4.1	X			

Source: IMF.

Table 2. Dimensions of Transparency Addressed by Individual Practices of the MFP Transparency Code for Financial Policies

MFP Transparency Code Practice	Dimensions of Transparency			
	Means of Disclosure	Timeliness	Periodicity	Form and Content of Disclosure
5.1				X
5.1.1	X			
5.1.2	X			
5.1.3	X			
5.1.4	X			
5.2	X			
5.3	X			
5.3.1	X			
5.4	X			
5.5				X
6.1.1	X			
6.1.2	X			
6.1.3	X			
6.1.4	X			
6.1.5	X			
6.2	X	X		
6.3	X		X	
6.4				X
7.1	X		X	X
7.2	X		X	
7.3	X	X	X	
7.3.1	X	X		
7.4				X
7.4.1		X	X	X
7.4.2	X			X
7.5	X			
7.6	X			
7.7	X			
8.1			X	X
8.2	X	X	X	
8.2.1				X
8.2.2	X			
8.3	X		X	
8.4	X			
8.4.1	X			

Source: IMF.

Periodicity of disclosure

Periodicity of disclosure refers to the frequency of public release of information on a particular event/issue. Publication and data release schedules, once established, should be honored. Not applying transparency practices consistently (e.g., reversals of previously applied transparency practices when developments are unfavorable) would go against the spirit and intent of transparency and could weaken credibility.

Quality and content of disclosure

The focus of transparency practices should be on the materiality and relevance of the information that is being provided to the public. The objective of transparency would not be met by releasing reports that offer contradictory assessments. Transparency would also not be met by issuing multiple regulations (particularly if earlier-issued and dated regulations are not revoked and withdrawn), or if regulations are written in highly technical or arcane language. Quality and content of disclosure refers to specific requirements related to the form and content of publicly released information explicitly set forth in the MFP Transparency Code practices.

III. Recent Developments in Transparency Practices

International efforts to enhance transparency have been wide-ranging and are targeting both the public and private sectors. The IMF has taken steps toward enhancing the transparency of its policies and country programs,[3] and—given its mandate to promote international financial stability through sound national macroeconomic and financial policies—has undertaken special efforts to promote transparency in macroeconomic policies. Transparency of monetary and financial policies, including the institutional and legal framework, has a close relationship with the other key standards relating to macroeconomic policy, data and fiscal policy transparency, and financial regulation and supervision.

Transparency also involves collaborative endeavors by the agencies across financial sectors, along with the private sector as appropriate. Various standard-setting agencies have also striven to promote greater transparency in the areas of their expertise. Some of the initiatives currently under way involve improving practices relating to market information, disclosure and transparency to strengthen market discipline, maintain investor confidence, and public accountability.[4] [5] As shifts take place from a compliance-oriented supervisory approach to

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[3] See *Transparency at the IMF* at http://www.imf.org/external/np/exr/facts/transpar.htm.

[4] The core supervisory principles for banking, insurance and securities sectors embrace several common principles relating to the clarity and transparency of the supervisory process, and the information disclosure and transparency requirements applicable to regulated entities. With regard to financial conglomerates, the *Joint Forum (Basel Committee on Banking Supervision, International Association of Insurance Supervisors, and the International Organization of Securities Commissions)* is studying corporate governance and transparency, including what information about the regulated entity is needed and how opaque structures can impair effective supervision.

risk-based supervision, the role of enhanced standards of transparency becomes critical (see IMF 2002a). The new Basel Capital Accord (Basel II) therefore emphasizes elements of disclosure and market discipline.

The International Association of Insurance Supervisors and the Committee on Payment and Settlement Systems have formally recognized the transparency framework recommended the MFP Transparency Code as being relevant to the effective implementation of the core principles relating to insurance supervision and systemically important payment systems. In the case of banking supervision, the need for enhancing governance and transparency standards for banks and banking supervisors has been emphasized by the IMF staff when a new generation of Basel Core Principles are developed.[6] Within the IMF, guidelines relating to Foreign Exchange Reserves Management, Public Debt Management, and Strengthening Safeguards on the Use of Fund Resources have also recognized the value of transparency and disclosure as a key operational component (IMF, 2001b; IMF and World Bank, 2001; IMF, 2002b).

A systematic approach toward enhanced disclosure and transparency by central banks and financial policy agencies is however a relatively recent phenomenon. The scope, practicality, and efficacy of these practices are still evolving. In developed countries and emerging market economies, increasing emphasis is being given by central banks and financial agencies to public consultations, public disclosure of aggregate data, and modalities of accountability and reporting in order to account for their performance and operations. Changes in the policy and regulatory structure are also providing impetus to increased transparency. The creation of a multinational central bank arrangement in Europe and the formation of composite financial regulatory agencies in a number of countries have required these agencies to focus on the role and form of transparency in the conduct of their affairs (Abrams and Taylor, 2000).[7]

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[5] For information on a broad range of transparency and market conduct, and disclosure-related initiatives under way, including offshore financial centers and highly leveraged institutions, see Financial Stability Forum (2002).

[6] After the recent high profile corporate failures, the IOSCO has devised high-level principles for regulators and supervisors in the areas of audit profession oversight and independence, and disclosure and transparency. The Organization for Economic Cooperation and Development (OECD) is also revising its Principles of Corporate Governance, which will also emphasize the accounting and disclosure requirements. The current efforts are for greater international coherence in the accounting, auditing and corporate governance areas, with country level agreements on these principles as a first step toward greater coherence (Financial Stability Forum, 2002).

[7] See report on Euro Area's Observance of MFP Transparency Code at www.imf.org/external/pubs/ft/scr/2001/cr01195.pdf; BIS (2000) for an account of credibility and transparency issues facing the Eurosystem.

The assessments of country observance with the MFP Transparency Code began in the Spring of 1999 and are currently conducted mostly under the joint IMF-World Bank Financial Sector Assessment Program (FSAP). Some are published as ROSCs (www.imf.org/external/np/rosc/rosc.asp). To date, MFP Transparency Code assessments under the FSAP have been conducted in 61 countries (Table 3).

Table 3. Countries in Which the *MFP Transparency Code* was Assessed Under the Completed and Ongoing FSAPs, as of mid-January, 2002

Countries [1]	MFP Transparency Code					
	Banking Supervision	Deposit Insurance Oversight	Insurance Regulation	Monetary Policy	Payment System Oversight	Securities Regulation
Total	59	28	42	57	50	47
Advanced	13	9	13	10	13	13
Transitional	15	8	13	15	13	13
Developing	31	11	16	32	24	21
Of which,						
Completed [2]	42	21	28	40	32	32
Advanced	8	6	8	5	8	8
Transitional	12	6	10	12	10	10
Developing	22	9	10	23	14	14
Ongoing	17	7	14	17	18	15
Advanced	5	3	5	5	5	5
Transitional	3	2	3	3	3	3
Developing	9	2	6	9	10	7

Source: IMF.

[1] Country groupings according to the IMF, 2001a.
[2] Refers to those country assessments that have been submitted to the Board of the IMF for discussion.

Transparency practices of the assessed central banks and financial agencies, illustrate the diversity of central bank and financial agency experiences. While some countries are promoting transparency on the full range of practices, others are more selective and advancing some practices and not others. The general trend is toward broadening the public understanding of the policy and operational framework, focusing on the materiality and relevance of the information being disclosed and improving the timeliness and accessibility of data and information disclosed. Some countries have initiated greater public dialogue in determining ways of improving the form and content of transparency.

The assessments of country transparency practices relating to monetary and financial policies carried out by the IMF-World Bank reveal that monetary policy transparency practices relating to the clarity of roles, responsibilities and objectives of central banks for monetary policy are fairly well established in the countries reviewed. Increasingly central banks are expanding the channels of communication to the press, markets and the public. Across all financial sectors, transparency is strongest in public availability of information on financial policies using different forms of communication strategies. Nevertheless, there remains room for significant improvement in the overall content and form of transparency. For both monetary and financial policies, transparency appears weakest in the areas of accountability and assurances of integrity by central banks and financial agencies. Those requiring strengthening include: (i) transparency of the central bank relations with the government, (ii) disclosure practices relating to inflation targeting frameworks, (iii) communicating the formal information sharing arrangements among financial agencies, and (iv) public disclosure of internal governance procedures for insuring integrity of operations. Improvements are also needed in the form, content, and quality of disclosure. In monetary policy, further efforts should be directed towards improving disclosure and explanation of the monetary policy framework and procedures. In the case of financial policy transparency, greater public disclosure of relationships between financial agencies and increased frequency of data reporting are emerging as areas requiring strengthening.

Countries have pointed out several factors limiting the acceptance of transparency as an essential component of policymaking and policy implementation. These limiting factors include: a lack of understanding of the role and relevance of transparency in the country; institutional and legal factors; and the stage of development of the financial system. In some cases, the ability to adopt transparency practices is hindered by legislative requirements. Budgetary factors also restrict the use of multiple disclosure channels for effective communication.

IV. Cross-Country and Cross-Sector Analysis of Transparency Practices

The indices of transparency in monetary and financial policies used in this paper measure the degree of observance of the MFP Transparency Code by IMF member countries in the areas of monetary policy formulation and implementation, and financial sector regulation and supervision. Separate indices of transparency are calculated for monetary policy, banking supervision, deposit insurance oversight, insurance regulation, payment systems oversight, and securities regulation.

The data used in the construction of these transparency indices comes from a survey on the implementation of the MFP Transparency Code by IMF member countries. The survey was conducted for the purposes of the Supporting Document to the MFP Transparency Code (IMF, 2000), which was developed by IMF staff as an implementation guide. In July 1999, a comprehensive questionnaire, covering all transparency practices of the MFP Transparency Code, was mailed to 160 central banks and 159 government agencies[8] from 178 IMF member

[8] These agencies had supervisory authority in such areas as deposit insurance, insurance regulation, payment systems oversight, securities regulation, banking supervision, nonbank financial institutions, asset management, debt restructuring, and pension funds oversight.

countries.[9] Most responses were received in September 1999, with a few follow-up revisions and late replies arriving in the following months. The participation rate in the survey was particularly high, with 75 percent of the central banks and 91 percent[10] of the other government agencies submitting responses from a total of 135 countries. The countries in our sample are representative of each category of the analytical country groupings most commonly used in policy research—political/economic, and by stage of economic development (Figure 1). This makes the cross-country analysis of transparency practices presented below representative of the world patterns in transparency in monetary and financial policies at the end of 1999. In this paper, we examine countries' overall observance of the MFP Transparency Code, as well as their observance of transparency practices from each of the constituting sections of the MFP Transparency Code for both monetary and financial policies.

The value of each transparency index for a given country is computed as the unweighted average of the overall scores assigned to the country's implementation of the four dimensions of transparency in the area of the respective monetary/financial policy: (1) means of disclosure, (2) timeliness of disclosure, (3) periodicity of disclosure, and (4) observance of requirements related to the form and content of disclosure set forth in the MFP Transparency Code. These overall scores, in effect auxiliary indices, are estimated as unweighted averages of the scores on the respective dimension of transparency for each relevant practice[11] of the MFP Transparency Code. Details of the construction of the auxiliary indices are presented in Appendices I and II.

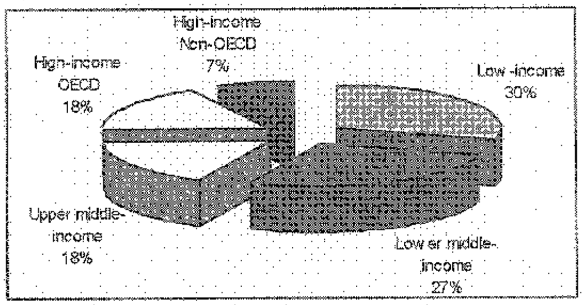
[9] At the time of the mailing of the questionnaire, the total IMF membership was 182 countries. The voting rights of The Democratic Republic of the Congo and Sudan had been suspended effective June 2, 1994 and August 9, 1993, respectively. The other two countries excluded from the survey were Afghanistan and Somalia, for which no official government contact information was available at the time of mailing of the questionnaires.

[10] The participation rate of government agencies has an upward bias, in that in a number of cases responses were submitted by agencies that were not part of the initial sample of respondents, but received the questionnaire through government channels in their countries.

[11] It is clear from Tables 1 and 2 that not all dimensions of transparency are applicable for all practices of the MFP Transparency Code. For example, periodicity of disclosure is not relevant for the implementation of practice 1.1, which asks for the ultimate objective(s) of monetary policy to be specified in legislation and publicly disclosed and explained.

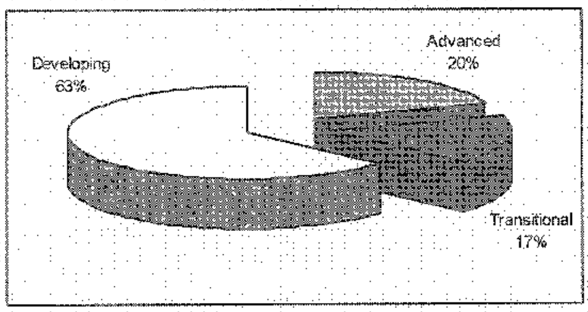
Figure 1. Analytical Groupings of the 135 Countries that Responded to the Survey [1/]

A. By Stage of Economic Development



Source: World Bank, 2001.

B. Political/Economic Classification



Source: IMF, 2001a.

[1/] Not all countries provided responses for each area of monetary/financial policies.

Before proceeding with the cross-country analysis of transparency practices, however, a word of caution is appropriate. The transparency indices developed in this paper are based on self-assessments done by national authorities and as such are potentially vulnerable to the usual problems associated with survey data. Misinterpretation of the questions by respondents could affect the answers provided resulting in underestimating or overstating the degree of policy transparency. This can also occur if respondents answer only questions that refer to transparency practices, with which they have strong experience (since the construction of the transparency indices does not penalize respondents who do not reply to individual questions).[12]

[12] This was done on purpose because some transparency practices do not apply to particular supervisory policies, in which case many respondents have skipped the associated questions instead of explicitly stating that they are not applicable.

A. Cross-Sectoral Analysis of Transparency Practices

Across all countries, transparency is highest[13] in the formulation and conduct of monetary policy and lowest in the areas of insurance supervision and deposit insurance (see first row of each panel in Table 4). Transparency practices in insurance supervision are most deficient in the areas of accountability and assurances of integrity by supervisory agencies, and in the public availability of information on financial policies. Transparency of deposit insurance oversight is most lacking in the areas of public availability of information on financial policies and in the open process for formulating and reporting financial policy decisions.

B. Transparency Patterns Across Countries at Different Stages of Economic Development

The average degree of overall observance of the MFP Transparency Code in monetary policies is substantially higher in high-income OECD countries than in any other country group by stage of economic development, including high-income non-OECD countries (Table 4).[14] The average degree of transparency in banking supervision is also highest in high-income OECD countries. Low-income countries lag substantially in the implementation of transparency practices in the areas of accountability and assurances of integrity by supervisory agencies, as well as in the open process for formulating and reporting financial policy decisions.

For securities regulation, insurance supervision, payment systems oversight, and deposit insurance, there are no significant differences in the average degree of observance of the MFP Transparency Code among countries at different stages of economic development.

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[13] Comparisons of the average values of different variables are based on paired-samples t-tests of the equality of the respective means. The use of terms "higher," "lower" and similar descriptives imply that our statistical analysis has shown that the difference in the means of the referred variables is statistically significant at the 95 percent level of confidence.

[14] The differences in group means of variables are based on One-way Analysis of Variance supplemented with Least-significant difference tests of the pairwise equality of group means. The use of terms "higher," "lower" and similar descriptives imply that our statistical analysis has shown that the reported differences in group means are statistically significant at the 95 percent level of confidence.

Table 4. Country Group Means by Stage of Economic Development[1/] of the Overall Index of Observance of the MFP Transparency Code and the Indices of Observance of Its Constituting Sections for Monetary and Financial Policies

	All mon./fin. policy transp. practices of the Code	Clarity of roles, responsibilities and objectives of agencies for mon./fin. policy	Open process for formulating and reporting mon./fin. policy decisions	Public availability of information on mon./fin. policy	Accountability and assurances of integrity by agencies
Monetary Policy					
All countries	*77.6*	*83.3*	*65.3*	*68.6*	*59.8*
Low-income	72	80.9	58.6	60.2	59.6
Lower middle-income	74.6	81	59.9	66.4	57.8
Upper middle-income	78	82.1	63.9	72.4	56.2
High-income non-OECD	73.9	86.9	57.1	61.9	58.2
High-income OECD	92.1	90.3	88.6	84.6	66.7
Banking Supervision					
All countries	*71*	*80.5*	*62.1*	*61.2*	*46*
Low-income	65.4	84.2	47.7	55.8	35.9
Lower middle-income	70.5	78.4	62	60.1	47
Upper middle-income	71.2	83.4	64.2	61.3	48.3
High-income non-OECD	68.6	72.7	62.5	58.8	42.4
High-income OECD	78.4	79.3	75.7	68.9	55.5
Deposit Insurance					
All countries	*68.7*	*84.5*	*57.5*	*51*	*53.2*
Low-income	73.1	93.9	64.3	56.3	53.9
Lower middle-income	71.2	82	52.8	53.8	59.8
Upper middle-income	64.7	82.9	47.9	44.3	50.1
High-income non-OECD	64.9	80.6	69	44.2	38.2
High-income OECD	69.2	85.2	60.4	53.2	53.6
Insurance Regulation					
All countries	*67.1*	*81.4*	*59.9*	*54.2*	*44.7*
Low-income	68.5	75.7	57.3	56	51.1
Lower middle-income	63.2	78.2	57.4	51.8	38.4
Upper middle-income	64.9	84.8	53.6	54.1	40.7
High-income non-OECD	62.3	85	62.5	43.4	42.4
High-income OECD	72.4	84.4	66.6	58.3	49.5
Payment Systems Oversight					
All countries	*75.4*	*77.2*	*63.7*	*69.4*	*53.7*
Low-income	71.8	79.8	66.4	64	57.9
Lower middle-income	71.4	70.9	70.3	70.6	53.3
Upper middle-income	72.4	70.5	62.3	69.5	52.4
High-income non-OECD	76.1	73	63.4	73.1	62.2
High-income OECD	81.9	84	59.1	71.1	50.1
Securities Regulation					
All countries	*74.4*	*86.8*	*66.2*	*61*	*50.8*
Low-income	72.3	79.6	65.1	59.8	55
Lower middle-income	78.8	91.5	71.6	66.7	50.2
Upper middle-income	66.6	84.6	54.3	54.7	44.4
High-income non-OECD	70.8	89.4	69.5	58.6	42.7
High-income OECD	79	88.1	71.7	63	55.7

Sources: National authorities' responses to the Survey on Implementation of the MFP Transparency Code and authors' estimates.

[1/] Country classification as in World Bank, 2001.

C. Transparency Patterns Across Countries with Different Political/Economic Characteristics

The average degree of overall observance of the MFP Transparency Code in monetary policies is highest in advanced countries and lowest in developing countries (Table 5). In advanced countries, transparency practices in the area of public availability of information on monetary policies are particularly strong relative to other countries. In developing countries, transparency is most deficient in the area of the open process for formulating and reporting monetary policy decisions.

For all supervisory areas in which differences between country group means exist, the average degree of transparency is highest in advanced countries and lowest in the developing ones. A notable exception is the area of securities regulation, in which the transitional countries are the laggards due to their poor performance in the area of accountability and assurances of integrity by supervisory agencies. In the area of banking supervision, significant deficiencies in transparency practices in the area of open process for formulating and reporting financial policy decisions exist in developing countries.

Despite the fact that advanced countries have the highest average degree of overall observance of the MFP Transparency Code in the area of payment systems oversight, they lag behind the other two country groups in the area of open process for formulating and reporting financial policy decisions.

For deposit insurance, there are no significant differences in the average degree of observance of the MFP Transparency Code among countries with different political/economic characteristics.

Appendix III presents detailed crosstabulations of indices of observance of the MFP Transparency Code for monetary and financial policies transformed in quartile ranks and World Economic Outlook (WEO) country groups.

Table 5. Country Group Means by Political/Economic Characteristics [1/] of the Overall Index of Observance of the MFP Transparency Code and the Indices of Observance of Its Constituting Sections for Monetary and Financial Policies

	All mon./fin. policy transp. practices of the Code	Clarity of roles, responsibilities and objectives of agencies for mon./fin. policy	Open process for formulating and reporting mon./fin. policy decisions	Public availability of information on mon./fin. policy	Accountability and assurances of integrity by agencies
Monetary policy					
All countries	*77.6*	*83.3*	*65.3*	*68.6*	*59.8*
Advanced	90.4	90.2	85	82.5	66.1
Developing	72.6	80.4	55.6	64.7	57.5
Transitional	81.3	85.8	78.5	66.7	60.2
Banking supervision					
All countries	*71*	*80.5*	*62.1*	*61.2*	*46*
Advanced	78.5	80	75.6	69	54.5
Developing	67.1	79.9	54.3	56.9	41.7
Transitional	75.4	85.2	73.2	66.5	49.4
Deposit insurance					
All countries	*68.7*	*84.5*	*57.5*	*51*	*53.2*
Advanced	69.2	85.2	60.4	53.2	53.6
Developing	69	82.9	56.3	49.2	53.7
Transitional	66.8	85.9	51.8	49.7	51.4
Insurance regulation					
All countries	*67.1*	*81.4*	*59.9*	*54.2*	*44.7*
Advanced	72.6	85	67.5	58.9	49.8
Developing	64.8	79.7	55.3	52.7	43.3
Transitional	61.9	79.3	59.5	47.8	35.3
Payment systems oversight					
All countries	*75.4*	*77.2*	*63.7*	*69.4*	*53.7*
Advanced	81.6	84.2	59.9	71.1	50.4
Developing	70.8	71.8	62	68	56.5
Transitional	76.5	78.9	75.7	69.4	53.5
Securities regulation					
All countries	*74.4*	*86.8*	*66.2*	*61*	*50.8*
Advanced	78.9	88.2	71.8	63.4	55.7
Developing	73.4	84.9	60.8	60.9	52.3
Transitional	68.5	89.1	70	56.9	38

Sources: National authorities responses to the Survey on Implementation of the *MFP Transparency Code* and authors' estimates.

[1/] Country classification as in IMF, 2001a.

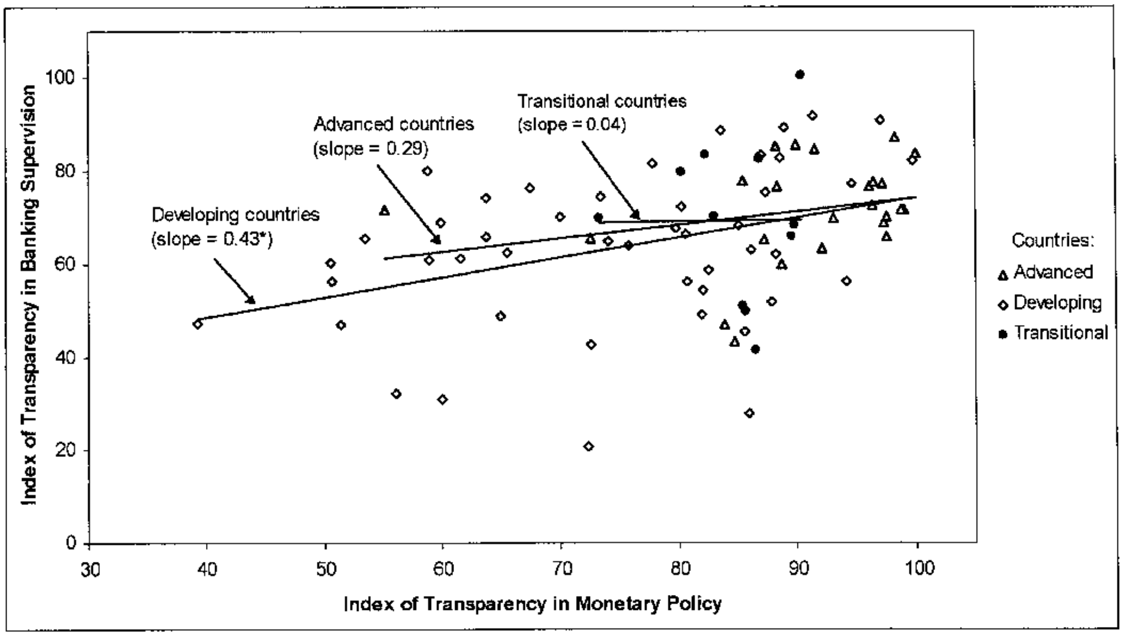
D. Interdeterminacy of Country Transparency Practices in Monetary and Financial Policies

The relationship between monetary policy transparency and transparency in banking supervision policy is determined by, among other things, the state of development of the banking system and whether the supervisory policy is carried out by a single agency or multiple agencies. Transparency practices in monetary policy and in banking supervision policy are broadly complementary. These two policy areas are interrelated and mutually reinforcing, with the health of the banking system affecting conduct of monetary policy and vice versa. Therefore, the effectiveness of monetary policy can be strengthened by transparency in banking supervision policy, as the latter can sharpen the public perception of monetary policy transmission, thereby reducing uncertainty. In addition, the degree of transparency of both policy areas is likely to be similarly affected, particularly when the two functions are performed in a single institution (the central bank). For these reasons, one would generally expect a positive association between transparency of monetary policy and that of banking supervisory policy.

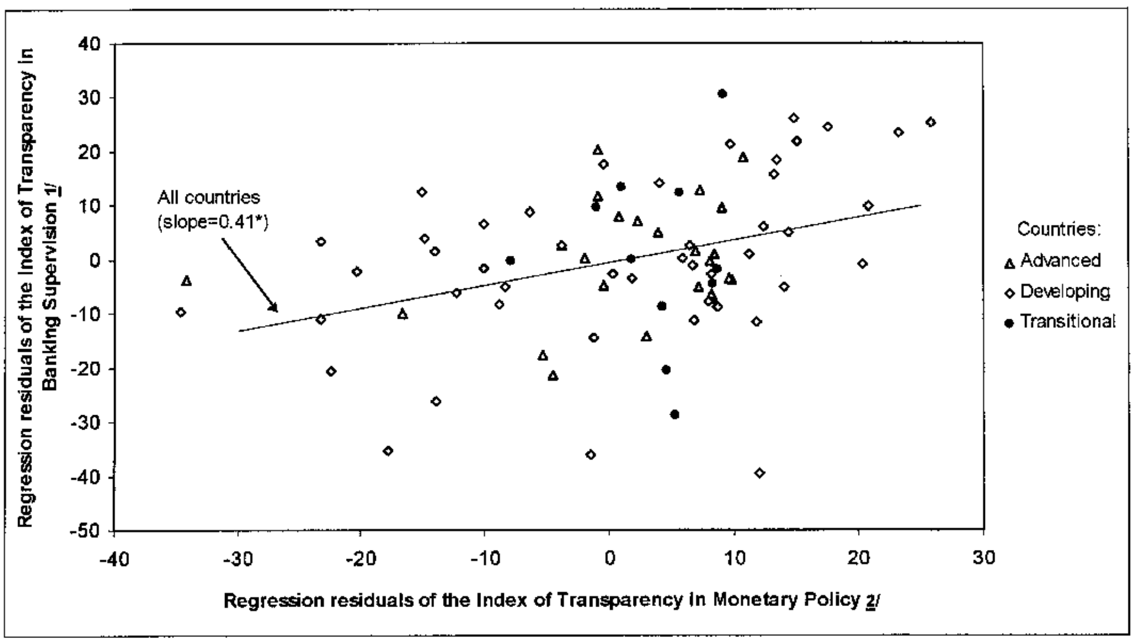
Figure 2A presents a scatter plot of the scores of advanced, developing, and transitional countries on the indices of transparency in monetary policy and banking supervision. The coefficient of correlation between countries' scores on the two indices is 0.39 and is statistically significant at the 95 percent level of confidence. As seen from the regression lines fitted to the data in Figure 2A, this positive association is strong and statistically significant for developing countries, weaker and statistically insignificant for advanced countries, and roughly zero among transitional countries. The strong overall positive association is preserved, even after adjusting for differences in the level of development and the types of institutional arrangements (that is, whether banking supervision is within or outside the central bank or the central bank shares supervisory policy responsibilities) (Figure 2B).

Figure 2. Interdependence of Country Transparency Indices in Monetary Policy and Banking Supervision

A. Raw Data



B. Controlling for WEO country group and institutional arrangements



Source: Authors' estimates.

1/ Residuals from linear regression of the index of transparency in banking supervision on two sets of dummy variables that control for: (1) WEO country group, and (2) whether the central bank participates in banking supervision. The latter set consists of two dummy variables—the first receives a value of one if banking supervision in a country is exercised solely by the central bank, zero otherwise; the second receives a value of one if banking supervision is exercised jointly by the central bank and an outside agency, zero otherwise.
2/ Residuals from linear regression of the index of transparency in monetary policy on a set of dummy variables that control for WEO country group.
* Statistically significant at the 95 percent level of confidence.

V. CONCLUSION

We have analyzed transparency patterns across different policies and countries at different stages of economic development and political/economic characteristics, based on indices of observance of the MFP Transparency Code constructed from self-evaluations by 135 IMF member countries done in 1999. We have found that across all countries, transparency is highest in the formulation and conduct of monetary policy and lowest in insurance supervision and deposit insurance. The average degree of overall observance of the MFP Transparency Code in monetary policies is substantially higher in high-income OECD countries than in any other country group at any stage of economic development, including high-income non-OECD countries. The average degree of transparency in banking supervision is also highest in high-income OECD countries. Low-income countries lag substantially in the implementation of transparency practices in accountability and assurances of integrity by supervisory agencies, and in the process for formulating and reporting policy decisions in banking supervision. Across country groups by similar political/economic characteristics, the average degree of transparency is highest in advanced countries and lowest in the developing ones for both monetary policy and those financial policies for which differences between country group means exist.

Construction of Indices of Observance of the MFP Transparency Code for Monetary and Financial Policies

The value of each transparency index for a given country is computed as the unweighted average of the overall scores assigned to the country's implementation of the four dimensions of transparency in the area of the respective monetary/financial policy: (1) means of disclosure, (2) timeliness of disclosure, (3) periodicity of disclosure, and (4) observance of requirements related to the form and content of disclosure set forth in the MFP Transparency Code. These overall scores, in effect auxiliary indices, are estimated as unweighted averages of the scores on the respective dimension of transparency for each relevant practice[15] of the MFP Transparency Code. The construction of the auxiliary indices proceeded as follows:

1. For each practice of the MFP Transparency Code, we identified the survey questions that elicit information on the implementation of each of the dimensions of transparency relevant to that practice (see examples in Appendix Table 1).

2. The answers from the answer sets to the questions identified in Step 1 were topcoded (i.e., mapped to a smaller set of response categories) in broader categories (Appendix Table 2).

3. Country responses to individual questions were represented by a single topcoded category or a combination of topcoded categories of answers.[16]

4. Different scores (Appendix Table 3) were assigned to each topcoded category of answers and each combination of such categories, using the following criteria:

- Means of disclosure–highest score assigned to countries that use the widest range of disclosure channels;
- Timeliness of disclosure–the shorter the period between a policy action and its disclosure, the higher the score;

[15] It is clear from Tables 1 and 2 in the main text that not all dimensions of transparency are applicable for all practices of the MFP Transparency Code. For example, periodicity of disclosure is not relevant for the implementation of practice 1.1, which asks for the ultimate objective(s) of monetary policy to be specified in legislation and publicly disclosed and explained.

[16] To ensure sufficient level of detail of questionnaire responses, the design of the survey allowed respondents to make multiple selections from the answer set of each transparency related question (except in cases, in which the question required a "Yes/No" answer). Therefore, in terms of the set of topcoded categories of answers, each response to a particular question could be expressed either by one stand-alone category or a combination of such categories.

- Periodicity of disclosure–the higher the frequency of public release of information, the higher the score;
- Form and content of disclosure–highest score assigned to countries that fully observe requirements on the form and content of disclosure set in the MFP Transparency Code.

5. A country's score on each relevant dimension of transparency for a given practice of the MFP Transparency Code was estimated as follows:

- *Case 1. Only one question elicits information on the particular dimension of transparency for the given practice of the MFP Transparency Code (e.g., practice 4.2 in Appendix Table 1)*–the score assigned to the category or the combination of categories that represent the country's response to that question constitutes the score on the respective dimension of transparency received by the country for the given practice of the *MFP Transparency Code*.

- *Case 2. More than one question elicits information on the particular dimension of transparency for the given practice of the MFP Transparency Code (e.g., practice 1.3.1 in Appendix Table 1)*–the score on the respective dimension of transparency received by the country for the given practice of the MFP Transparency Code was estimated as the unweighted average of the scores assigned to the country responses[17] to each such question.

6. The overall score assigned to a country in a given area of monetary/financial policy on each auxiliary index was then estimated as the unweighted average of the valid scores[18] on the respective dimension of transparency for each relevant practice of the MFP Transparency Code. Details on the construction of the auxiliary index of means of disclosure usage in MFP Transparency Code implementation can be found in Appendix II.

The value of the transparency index assigned to a country in a given area of monetary/ financial policy was then computed as unweighted average of the overall scores on each auxiliary index. In addition, we constructed separate (sub)indices of observance of transparency practices in the four broad areas of transparency in which the practices of the

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[17] Only valid responses were used in the estimation of the unweighted average score of a country (e.g., questions that were not answered by the country or were marked as not being applicable were not included in the set of questions used in the estimation of the unweighted average score of that country).

[18] Excluding "No answer" and "Not applicable" scores that arise when all of the questions that elicit information on the particular dimension of transparency for a given practice of the MFP Transparency Code were respectively not answered by the country or were marked as not being applicable.

MFP Transparency Code were logically grouped:[19] (1) clarity of roles, responsibilities and objectives of agencies for monetary/financial policies; (2) open process for formulating and reporting monetary/financial policy decisions; (3) public availability of information on monetary/financial policies; (4) accountability and assurances of integrity by agencies.

The construction of the indices of observance of the MFP Transparency Code for monetary and financial policies for countries that participate in economic unions, in which the responsibilities for monetary policy, and regulation and supervision of some sectors of the financial system is delegated to supranational body (either partially or completely) proceeded as follows:

- European Union[20]

  Countries members of the Eurosystem[21]—the indices of observance of the MFP Transparency Code in the areas of monetary policy, banking supervision, and payment systems were constructed as the unweighted average of their sovereign indices and the corresponding indices of observance of the MFP Transparency Code by the Eurosystem. For the other areas of financial sector supervision and regulation, the indices comprise only of the sovereign indices of observance of the MFP Transparency Code.

  Countries that were not members of the Eurosystem[22]—the indices comprised only the sovereign indices of observance of the MFP Transparency Code for monetary and all financial policies.

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[19] Corresponding to different chapters of the MFP Transparency Code.

[20] Separate responses to the survey were received from the European Central Bank and the member countries of the European Union. The responses of countries members of the Eurosystem for monetary policy, banking supervision, and payment systems were based on the responses submitted by the European Central Bank, with additions reflecting country-specific transparency practices.

[21] The Eurosystem is composed of the European Central Bank and the national central banks of the member states of the European Union that participate in the European Economic and Monetary Union (at the time the questionnaire responses were completed: Austria, Belgium, Finland, France, Germany, Ireland, Italy, Luxembourg, Netherlands, Portugal, and Spain).

[22] At the time questionnaire responses were completed: Greece, Denmark, Sweden, and the United Kingdom.

- Central African Monetary Union—indices of observance of the MFP Transparency Code by Banque des Etats de l'Afrique Centrale and Commission Bancaire de l'Afrique Centrale, handling respectively monetary policy and banking supervision in the union, were assigned to member countries of the Central African Monetary Union.

- West African Monetary Union—indices of observance of the MFP Transparency Code by Banque Centrale des Etats de l'Afrique de l'Ouest and Commission Bancaire de l'UMOA, handling respectively monetary policy and banking supervision in the union, were assigned to member countries of the West African Monetary Union.

Table 1. Examples of Questions from the Survey on Implementation of the MFP Transparency Code used in the Construction of the Indices of Observance of the MFP Transparency Code for Monetary and Financial Policies

MFP Transparency Code Practice	Question Used in Construction of Index	Dimension of Transparency
1.1.1 The ultimate objective(s) of monetary policy should be specified in legislation and publicly disclosed and explained.	Are ultimate objectives of monetary policy specified in: a) Legislation; b) Regulation; c) Other documents or practices.	Form and content of disclosure
	How are the ultimate objectives publicly disclosed and explained?	Means of disclosure
1.3.1 Responsibilities, if any, of the central bank in (i) the management of domestic and external public debt and foreign exchange reserves, (ii) as banker to the government, (iii) as fiscal agent of the government, and (iv) as advisor on economic and financial policies and in the field of international cooperation, should be publicly disclosed.	If the central bank acts as the manager of domestic and external public debt, how is this responsibility defined and publicly disclosed?	Means of disclosure
	If the central bank acts as the manager of foreign exchange reserves, how is this responsibility defined and publicly disclosed?	Means of disclosure
	If the central bank acts as banker to the government, how is this responsibility defined and publicly disclosed?	Means of disclosure
	If the central bank acts as fiscal agent of the government, how is this responsibility defined and publicly disclosed?	Means of disclosure
	If the central bank acts as advisor on economic and financial policies and in the field of international cooperation, how is this responsibility defined and publicly disclosed?	Means of disclosure
4.1 Officials of the central bank should be available to appear before a designated public authority to report on the conduct of monetary policy, explain the policy objective(s) of their institution, describe their performance in achieving their objective(s), and, as appropriate, exchange views on the state of the economy and the financial system.	Are officials of the central bank available to appear before a designated public authority?	Form and content of disclosure

Table 1. Examples of Questions from the Survey on Implementation of the MFP Transparency Code used in the Construction of the Indices of Observance of the MFP Transparency Code for Monetary and Financial Policies (concl'd)

MFP Transparency Code Practice	MFP Transparency Code Practice	MFP Transparency Code Practice
	If Yes, how frequently do they appear before designated public authority?	Periodicity
4.2 The central bank should publicly disclose audited financial statements of its operations on a preannounced schedule.	If Yes, how frequently does the central bank publicly disclose audited financial statements?	Periodicity
	If Yes, what is the delay between the end of the financial period and the disclosure of the audited financial statements?	Timeliness
	If Yes, how is the public provided access to the audited financial statements?	Means of disclosure
6.2 Significant changes in financial policies should be publicly announced and explained in a timely manner.	If Yes, how are significant changes in financial policies publicly announced and explained?	Means of disclosure
	If Yes, how soon after the decision to change policy is the change announced and explained?	Timeliness
7.1 Financial agencies should issue a periodic public report on the major developments of the sector(s) of the financial system for which they carry designated responsibility.	Does the financial agency issue a periodic public report on the major developments of the sector(s) of the financial system for which they carry designated responsibility?	Form and content of disclosure
	If Yes, what is the frequency of these reports?	Periodicity
	If Yes, how does the financial agency issue a periodic public report on the major developments of the sector(s) of the financial system for which they carry designated responsibility?	Means of disclosure
7.3 Where applicable, financial agencies should publicly disclose their balance sheets on a preannounced schedule and, after a predetermined interval, publicly disclose information on aggregate market transactions.	If Yes, what is the schedule?	Periodicity
	If Yes, how are the balance sheets of the financial agency publicly disclosed?	Means of disclosure
	If Yes, what is the interval?	Timeliness
	If Yes, how do financial agencies publicly disclose, after a predetermined interval, information on aggregate market transactions?	Means of disclosure
	If Yes, what is the schedule?	Periodicity
7.4.1 Financial agencies should have a publications program, including a periodic public report on their principal activities, issued at least annually.	(a) Does the financial agency have a publications program?	Form and content of disclosure
	Does the financial agency issue a periodic report on their principal activities?	Form and content of disclosure
	If Yes, how frequently does the financial agency issue the report?	Periodicity
	If Yes, how soon after the end of the relevant reporting period is the report issued?	Timeliness

Source: Questionnaire used in the Survey on Implementation of the MFP Transparency Code and authors' classification of questions.

Table 2. Topcoding of Answers from Answer Sets to Questions on the Four Dimensions of Transparency in the Survey on Implementation of the *MFP Transparency Code*

Topcoded Categories by Dimension of Transparency	Answers from Original Answer Sets
1. Means of disclosure questions	
D1 Disclosure via official public documents	Legislation Regulation Memorandum of understanding
D2 Disclosure to media or representative public bodies	Public appearances by officials before Legislature Public release to media Written reports submitted to Legislature
D3 Direct disclosure to public	Hard copies available at headquarters Public release of financial statements Public release through website Publication in official government publication, gazette, or register Published reports in Annual Report Published reports in Official bulletin or Review
D4 Other means of disclosure	Charter Compact Contract Mission statement or descriptive document Convention, precedent, or some other informal arrangement Executive order or directive from government minis Other—please specify:
2. Periodicity of disclosure questions	
P1 Daily, weekly, or monthly	Daily Weekly Monthly
P2 Quarterly or semi-annually	Quarterly Semi-annually
P3 Annually	Annually
P4 Variable	Variable periodicity
3. Timeliness of disclosure questions	
T1 Immediately or up to 2 weeks	Immediately after decision One week No more than 2 weeks
T2 Between 2 weeks and 1 month	Between 2 weeks and 1 month One week One month Less than 1 month Prior to the next scheduled meeting of the policymaking committee

Table 2. Topcoding of Answers from Answer Sets to Questions on the Four Dimensions of Transparency in the Survey on Implementation of the MFP Transparency Code (concl'd)

Topcoded Categories by Dimension of Transparency	Answers from Original Answer Sets
T3 More than 1 month	Between 1 and 3 months Between 3 months and 6 months Between 6 months and 1 year More than 3 months More than 6 months One quarter One year Within the next six scheduled meetings of the policymaking committee Within the next three scheduled meetings of the policymaking committee Within the next two scheduled meetings of the policymaking committee Under 3 months Three months Six months
T4 Variable	Variable timeliness
4. Questions on the form and content of disclosure	
O1 Full observance	Yes (i.e., for content) Legislation (i.e., for form)
O2 Partial observance	Regulation (i.e., for form)

Source: Questionnaire used in the Survey on Implementation of the MFP Transparency Code and authors' topcoding of answers.

Table 3. Schemes for Assigning Scores to Individual Topcoded Categories and Each Combination of Such Categories [1/]

Dimension of Transparency	Scheme for Assigning Scores to Country Responses			
	Country Transparency Practice [2/]	First Topcoded Category Applicable	First Topcoded Category Not Applicable [3/]	Comment
1. Means of disclosure	D123	100.00	-	Highest score assigned to countries
	D12, D13, D23	66.67	100	that use the widest range of
	D1, D2, D3	33.33	50	disclosure channels.
	D4 [4/]	16.67	25	
2. Timeliness of disclosure	T123, T12, T13, T1	100.00	-	The shorter the period between a
	T23, T2	66.67	100	policy action and its disclosure, the
	T3	33.33	50	higher the score.
	T4 [4/]	16.67	25	
3. Periodicity of disclosure	P123, P12, P13, P1	100.00	-	The higher the frequency of public
	P23, P2	66.67	100	release of information, the higher the
	P3	33.33	50	score.
	P4 [4/]	16.67	25	
4. Observance of requirements on the form and content of disclosure set in the MFP Transparency Code	O12,[5/] O1	100.00	n.a.	Highest score assigned to countries that fully observe requirements on the form and content of disclosure set in the MFP Transparency Code.
	O2	33.33	n.a.	

Source: Author's proposal is based on Table 2.

[1/] Used in the construction of subsidiary indices of observance of different dimensions of transparency.
[2/] To ensure sufficient level of detail of questionnaire responses, the design of the survey allowed respondents to make multiple selections from the answer set of each transparency related question (except in cases, in which it required an "Yes/No" answer). Therefore, in terms of the set of topcoded categories defined in Appendix Table 2, each response to a particular question could be expressed either by a single category or a combination of such categories. The following notation is used to refer to a particular combination of topcoded categories: (1) Means of disclosure: D123—Joint use of D1, D2, and D3; D12—Joint use of D1 and D2; D13—Joint use of D1 and D3; D23—Joint use of D2 and D3; (2) Timeliness of disclosure: T123—Joint use of T1, T2, and T3; T12—Joint use of T1 and T2; T13—Joint use of T1 and T3; T23 – Joint use of T2 and T3; (3) Periodicity of disclosure: P123—Joint use of P1, P2, and P3; P12—Joint use of P1 and P2; P13—Joint use of P1 and P3; P23—Joint use of P2 and P3; (4) Form and content of disclosure: O12—Joint use of O1 and O2 (where applicable).
[3/] For some of the practices of the *MFP Transparency Code, the* first topcoded category of the answers to questions pertaining to the means, timeliness and periodicity of disclosure (D1, T1, and P1, respectively) is not applicable (e.g., D1 and respectively D123, D12, and D13 are not applicable in the implementation of practice 2.2.1). This requires the use of two alternative set of scores.
[4/] Residual category covering all answers that do not fall in any other stand-alone category. It is considered less effective in fostering transparency than the other stand-alone categories and as such its use is recognized only when no other stand-alone category is being used and then it is assigned a lower score.
[5/] Except in cases, in which questions required a "Yes/No" answer.

Detailed Description of Construction of the Auxiliary Index of the Use of Means of Disclosure in the Implementation of the MFP Transparency Code

1. For most practices of the MFP Transparency Code, at least one question in the questionnaire asks about specific means of disclosure used in the implementation of the practice (Appendix Table 1).[23] In the case of a composite practice (e.g., practice 1.3.1), there is one such question for each aspect of transparency covered by it.

2. The replies to these "means of disclosure" questions were grouped in four broad disclosure channels (topcoded categories of answers): **D1**—Disclosure via official public documents; **D2**—Disclosure to media or representative public bodies; **D3**—Direct disclosure to public; **D4**—Other means of disclosure (Appendix Table 2).

3. In the case of practices that have only one "means of disclosure" question associated with them, each agency response is transformed into a set of dummy variables, indicating whether a particular disclosure channel or a combination of disclosure channels is used in the implementation of the practice. The channel **D4—Other means of disclosure** is considered less effective in fostering transparency than the other channels, and as such is not included in the set of all possible combinations of disclosure channels. Its use is recognized only when no other means of disclosure have been checked. The following examples illustrate the logic of the transformation:

Example 1. If the respondent has checked one or more means of **Disclosure via official public documents,** one or more means of **Disclosure to media or representative public bodies,** one or more means of **Direct disclosure to public,** and one or more means of **Other means of disclosure** the transformed answer to the question is:

D123	1
D12	0
D13	0
D23	0
D1	0
D2	0
D3	0
D4	0

Example 2. If the respondent has checked one or more means of **Disclosure via official public documents** and one or more means of **Disclosure to**

[23] Respondents can make multiple selections from a set of provided answers or give different ones in free text.

media or representative public bodies, the transformed answer to the question is:

D123	0
D12	1
D13	0
D23	0
D1	0
D2	0
D3	0
D4	0

Example 3. If the respondent has checked one or more means of **Other means of disclosure** only, the transformed answer to the question is:

D123	0
D12	0
D13	0
D23	0
D1	0
D2	0
D3	0
D4	1

4. A special case of the transformation arises when the channel **Disclosure via official public documents** is not appropriate in the implementation of a given practice, as is the case for most practices in Sections III and IV, and VII and VIII. In these cases, combinations involving this channel are not achievable, so the respective dummy variables assume "N/A" values:

Example 4. Combinations involving **Disclosure via official public documents** not attainable and the respondent has checked one or more means of **Disclosure to media or representative public bodies** and one or more means of **Direct disclosure to public**:

D123	N/A
D12	N/A
D13	N/A
D23	1
D1	N/A
D2	0
D3	0
D4	0

5. The cases of no response to the "means of disclosure" question deserve further attention. Consider practice 1.2.1:

Example 5. If the respondent has indicated that while credits, advances, or overdrafts to the government by the central bank **are permitted** in his country, the conditions under which they are given are not publicly disclosed, then all dummy variables assume zero values:

D123	0
D12	0
D13	0
D23	0
D1	0
D2	0
D3	0
D4	0

Example 6. If the respondent has indicated that credits, advances, or overdrafts to the government by the central bank **are not permitted** in his country, then the disclosure requirements set by the practice are not applicable and all dummy variables assume "N/A" values:

D123	N/A
D12	N/A
D13	N/A
D23	N/A
D1	N/A
D2	N/A
D3	N/A
D4	N/A

6. In the case of practices (e.g., practice 1.3.1) that have several "means of disclosure" questions associated with them, the responses to each question are first transformed as described above. Then, we create a set of variables that indicate the average use of the respective combinations of disclosure channels in implementing the transparency aspects covered by the practice:

Example 7. Respondent provides answers to **all** "means of disclosure" questions

Transparency aspects covered by practice 1.3.1								Average use of discl. channels	
1.3.1(i)		**1.3.1(ii)**		**1.3.1(iii)**		**1.3.1(iv)**		**1.3.1**	
D123	0	D123	1	D123	0	D123	0	D123	0.25
D12	0	D12	0	D12	0	D12	0	D12	0
D13	1	D13	0	D13	1	D13	0	D13	0.5
D23	0	D23	0	D23	0	D23	0	D23	0
D1	0	D1	0	D1	0	D1	0	D1	0
D2	0	D2	0	D2	0	D2	1	D2	0.25
D3	0	D3	0	D3	0	D3	0	D3	0
D4	0	D4	0	D4	0	D4	0	D4	0

Example 8. Respondent provides answers to **some** "means of disclosure" questions

Transparency aspects covered by practice 1.3.1								Average use of discl. channels	
1.3.1(i)		**1.3.1(ii)**		**1.3.1(iii)**		**1.3.1(iv)**		**1.3.1**	
D123	N/A	D123	1	D123	0	D123	0	D123	0.33
D12	N/A	D12	0	D12	0	D12	0	D12	0
D13	N/A	D13	0	D13	1	D13	0	D13	0.33
D23	N/A	D23	0	D23	0	D23	0	D23	0
D1	N/A	D1	0	D1	0	D1	0	D1	0
D2	N/A	D2	0	D2	0	D2	1	D2	0.33
D3	N/A	D3	0	D3	0	D3	0	D3	0
D4	N/A	D4	0	D4	0	D4	0	D4	0

7. Once the responses to the "means of disclosure" questions for all practices have been transformed in terms of use of the various combinations of disclosure channels, we calculate for each respondent the average use of these combinations of disclosure channels for the MFP Transparency Code as a whole. To do this, for each combination of disclosure channels we sum all "non N/A" values of the respective variable (dummy variable for practices with only one means-of-disclosure question and average-use-on-practice-level variable for practices covered in (6)) for all practices and divide by the number of variables with "non N/A" entries:

Example 9. Calculation of the average use of the different combinations of disclosure channels for the hypothetical section X of the MFP Transparency Code.

Transparency practices in Section X								Average use of discl. channels	
X.1.1		**X.1.2**		**X.3.1**		**X.3.2**		**Section X**	
D123	N/A	D123	1	D123	1	D123	0	D123	0.67
D12	N/A	D12	0	D12	0	D12	0	D12	0
D13	N/A	D13	0	D13	0	D13	1	D13	0.33
D23	1	D23	0	D23	0	D23	0	D23	0.25
D1	N/A	D1	0	D1	0	D1	0	D1	0
D2	0	D2	0	D2	0	D2	0	D2	0
D3	0	D3	0	D3	0	D3	0	D3	0
D4	0	D4	0	D4	0	D4	0	D4	0

8. The average shares of usage of each stand-alone disclosure channel/combination of disclosure channels in the implementation of the transparency practices of **Section X** does not necessarily add-up to 1, due to the presence of "N/A" entries for some of the combinations of disclosure channels. These "N/A" entries are due to the fact that the channel **D1- Disclosure via official public documents** is not applicable in the implementation of a number of transparency practices in Sections III and IV, and VII and VIII of the Code (as in X.1.1 in the example above).

Cross tabulation of Indices of Observance of the MFP Transparency Code for Monetary and Financial Policies Transformed in Quartile Ranks and WEO Country Groups

Table 4. Quartile Cut-off Points for Indices of Observance of the MFP Transparency Code for Monetary and Financial Policies

Quartile Cut-off Points (lower bound of range)	TI_MON	TI_DEP	TI_INS	TI_PAY	TI_SEC	TI_SUP
1st	0.0	0.0	0.0	0.0	0.0	0.0
2nd	68.4	56.1	58.4	71.4	66.3	59.0
3rd	82.2	71.9	67.6	77.2	74.5	72.2
4th	88.3	80.4	75.6	85.3	83.1	81.3

Sources: Survey on Implementation of the MFP Transparency Code and authors' estimates.

Notes:

TI_MON—Index of observance of MFP Transparency Code in the area of monetary policy.

TI_DEP—Index of observance of MFP Transparency Code in the area of deposit insurance oversight.

TI_INS—Index of observance of MFP Transparency Code in the area of insurance regulation.

TI_PAY—Index of observance of MFP Transparency Code in the area of payment systems oversight.

TI_SEC—Index of observance of MFP Transparency Code in the area of securities regulation.

TI_SUP—Index of observance of MFP Transparency Code in the area of banking supervision.

Table 5. Cross Tabulation of TI_MON in Quartile Ranks and WEO Country Groups [1/]

			TI_MON Quartiles [2/]				Total
			1	2	3	4	
WEO	Advanced	Count	1	2	5	18	26
		Percent within WEO	3.8	7.7	19.2	69.2	100.0
		Percent within TI_MON	3.1	6.3	15.2	56.3	20.2
	Transitional	Count	1	7	9	4	21
		Percent within WEO	4.8	33.3	42.9	19.0	100.0
		Percent within TI_MON	3.1	21.9	27.3	12.5	16.3
	Developing	Count	30	23	19	10	82
		Percent within WEO	36.6	28.0	23.2	12.2	100.0
		Percent within TI_MON	93.8	71.9	57.6	31.3	63.6
	All countries	Count	32	32	33	32	129
		Percent within WEO	24.8	24.8	25.6	24.8	100.0
		Percent within TI_MON	100.0	100.0	100.0	100.0	100.0

Sources: Survey on Implementation of the MFP Transparency Code and authors' estimates.

[1/] WEO country groups—country classification as in IMF, 2001a.

[2/] Quartile ranks: 4—top quartile (highest degree of observance), ..., 1—bottom quartile (lowest degree of observance).

Table 6. Cross Tabulation of TI_DEP in Quartile Ranks and WEO Country Groups [1/]

			TI_DEP Quartiles [2/]				Total
			1	2	3	4	
WEO	Advanced	Count	4	3	4	4	15
		Percent within WEO	26.7	20.0	26.7	26.7	100.0
		Percent within TI_DEP	50.0	33.3	44.4%	44.4	42.9
	Transitional	Count	1	4	1	1	7
		Percent within WEO	14.3	57.1	14.3	14.3	100.0
		Percent within TI_DEP	12.5	44.4	11.1	11.1	20.0
	Developing	Count	3	2	4	4	13
		Percent within WEO	23.1	15.4	30.8	30.8	100.0
		Percent within TI_DEP	37.5	22.2	44.4	44.4	37.1
	All countries	Count	8	9	9	9	35
		Percent within WEO	22.9	25.7	25.7	25.7	100.0
		Percent within TI_DEP	100.0	100.0	100.0	100.0	100.0

Sources: Survey on Implementation of the MFP Transparency Code and authors' estimates.

[1/] WEO country groups—country classification as in IMF, 2001a.
[2/] Quartile ranks: 4—top quartile (highest degree of observance), ..., 1—bottom quartile (lowest degree of observance).

Table 7. Cross Tabulation of TI_INS in Quartile Ranks and WEO Country Groups [1/]

			TI_INS Quartiles [2/]				Total
			1	2	3	4	
WEO	Advanced	Count	3	2	7	8	20
		Percent within WEO	15.0	10.0	35.0	40.0	100.0
		Percent within TI_INS	20.0	13.3	46.7	53.3	33.3
	Transitional	Count	3	3	0	1	7
		Percent within WEO	42.9	42.9	0	14.3	100.0
		Percent within TI_INS	20.0	20.0	0	6.7	11.7
	Developing	Count	9	10	8	6	33
		Percent within WEO	27.3	30.3	24.2	18.2	100.0
		Percent within TI_INS	60.0	66.7	53.3	40.0	55.0
	All countries	Count	15	15	15	15	60
		Percent within WEO	25.0	25.0	25.0	25.0	100.0
		Percent within TI_INS	100.0	100.0	100.0	100.0	100.0

Sources: Survey on Implementation of the MFP Transparency Code and authors' estimates.

[1/] WEO country groups—country classification as in IMF, 2001a.
[2/] Quartile ranks: 4—top quartile (highest degree of observance), ..., 1—bottom quartile (lowest degree of observance).

Table 8. Cross Tabulation of TI_PAY in Quartile Ranks and WEO Country Groups [1/]

		TI_PAY Quartiles [2/]				Total
		1	2	3	4	
WEO Advanced	Count	1	3	9	7	20
	Percent within WEO	5.0	15.0	45.0	35.0	100.0
	Percent within TI_PAY	7.1	20.0	60.0	46.7	33.9
Transitional	Count	2	3	1	4	10
	Percent within WEO	20.0	30.0	10.0	40.0	100.0
	Percent within TI_PAY	14.3	20.0	6.7	26.7	16.9
Developing	Count	11	9	5	4	29
	Percent within WEO	37.9	31.0	17.2	13.8	100.0
	Percent within TI_PAY	78.6	60.0	33.3	26.7	49.2
All countries	Count	14	15	15	15	59
	Percent within WEO	23.7	25.4	25.4	25.4	100.0
	Percent within TI_PAY	100.0	100.0	100.0	100.0	100.0

Sources: Survey on Implementation of the MFP Transparency Code and authors' estimates.

[1/] WEO country groups—country classification as in IMF, 2001a.
[2/] Quartile ranks: 4—top quartile (highest degree of observance), ..., 1—bottom quartile (lowest degree of observance).

Table 9. Cross Tabulation of TI_SEC in Quartile Ranks and WEO Country Groups [1/]

		TI_SEC Quartiles [2/]				Total
		1	2	3	4	
WEO Advanced	Count	2	3	10	7	22
	Percent within WEO	9.1	13.6	45.5	31.8	100.0
	Percent within TI_SEC	12.5	18.8	58.8	43.8	33.8
Transitional	Count	5	5	0	2	12
	Percent within WEO	41.7	41.7	0	16.7	100.0
	Percent within TI_SEC	31.3	31.3	0	12.5	18.5
Developing	Count	9	8	7	7	31
	Percent within WEO	29.0	25.8	22.6	22.6	100.0
	Percent within TI_SEC	56.3	50.0	41.2	43.8	47.7
All countries	Count	16	16	17	16	65
	Percent within WEO	24.6	24.6	26.2	24.6	100.0
	Percent within TI_SEC	100.0	100.0	100.0	100.0	100.0

Sources: Survey on Implementation of the MFP Transparency Code and authors' estimates.

[1/] WEO country groups—country classification as in IMF, 2001a.
[2/] Quartile ranks: 4—top quartile (highest degree of observance), ..., 1—bottom quartile (lowest degree of observance).

Table 10. Cross Tabulation of TI_SUP in Quartile Ranks and WEO Country Groups [1/]

		TI_SUP Quartiles [2/]				Total
		1	2	3	4	
WEO Advanced	Count	2	2	9	12	25
	Percent within WEO	8.0	8.0	36.0	48.0	100.0
	Percent within TI_SUP	8.3	8.3	37.5	50.0	26.0
Transitional	Count	1	2	4	4	11
	Percent within WEO	9.1	18.2	36.4	36.4	100.0
	Percent within TI_SUP	4.2	8.3%	16.7	16.7	11.5
Developing	Count	21	20	11	8	60
	Percent within WEO	35.0	33.3	18.3	13.3	100.0
	Percent within TI_SUP	87.5	83.3	45.8%	33.3	62.5
All countries	Count	24	24	24	24	96
	Percent within WEO	25.0	25.0	25.0	25.0	100.0
	Percent within TI_SUP	100.0	100.0	100.0	100.0	100.0

Sources: Survey on Implementation of the MFP Transparency Code and authors' estimates.

[1/] WEO country groups—country classification as in IMF, 2001a.

[2/] Quartile ranks: 4—top quartile (highest degree of observance), …, 1—bottom quartile (lowest degree of observance).

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