

# Do More Transparent Governments Govern Better?

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This paper explores the link between information flows and governance or institutional quality. Economic theory expounds on the importance of information on economic outcomes either through its direct effect on prices and quantities or through its effect on other factors such as institutions and the quality of governance. This paper shows that countries with better information flows also govern better. The indicators used to assess better information flows are of two kinds. One index is based on the existence of freedom of information laws. A second index is constructed called the “transparency” index which measures the frequency with which economic data are published in countries around the world. Empirical analysis shows that countries which have better information flows as measured by both indicators have better quality governance.

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Information is a critical ingredient in efficient, well-functioning markets, both economic and political. More information allows better analysis, and better monitoring and evaluation of events which are significant for people's economic and social well-being. It allows economic and political decision-makers to evaluate opportunities and manage risks better. It allows for the possibility that decisions in economic and political markets will enhance social welfare. The importance of information in markets for different types of goods and services has long been recognised in theory (Akerlof, 1970, Stigler, 1961, Stiglitz with Rothschild, 1976, Stiglitz with Grossman, 1980, Stiglitz and Weiss, 1981, Braverman and Stiglitz, 1986, Stiglitz, 1984, 1987a, 1987b, 1987c, 1988, 1989, 2002, among others). Modern macroeconomics as well as microeconomics and finance are based on theories of how expectations are formed using the information available to decision-makers and how these expectations translate into actions which affect future outcomes. These theories focus not only on how much information there is but also on how people use that information. A plethora of authors have investigated the effects of information on stock markets and on bank loans and interest rates. In the aftermath of the recent financial crises around the world several empirical papers have looked at how information might be used to predict crises and/or adapt policy to prevent crises (Wirjanto, 1989, Chote ed., 1998, and Chowdhry and Goyal, 2000). Jappelli and Pagano (1993 and 2001), Galindo and Miller (2001), Faukenheim & Powell (forthcoming), and Barron & Staten (2003) are among those that consider how information provided by credit rating agencies/bureaus affects how markets function.

More recently, papers have looked at the empirical evidence linking the responsiveness of governments as well as private actors to better information provided by the media (Islam 2002, World Bank, 2002). For example, Besley and Burgess (2001, 2002) find that regions in India where the media are more active are also regions which are the least likely to suffer from famines during droughts. This is because regions where the media have a greater reach are also the areas where voters are more informed about political choices and able to cast votes accordingly. Political leaders knowing that their performance can be monitored and may affect re-election possibilities are more accountable to voters. Dyck and Zingales (2002), find that a more active media as proxied by a media which has a greater circulation can be a powerful influence on the corporate governance environment. The media provides information that affects the reputation of corporate managers and thus their incentives to behave in a certain manner. Shiller (2002) and Herman (2002) discuss how media influence may in fact distort economic reality or provide a biased version of the "truth".

There is a tremendous range of information that is potentially valuable in making economic decisions: to give some examples, it can range from simple price information, to the disclosure of government processes and laws, to disclosure of private company accounts. Information is thought to be critical in affecting how a country is governed and how accountable private business is to its customers and shareholders. Yet what information is produced, disseminated, and analysed depends on the incentives of public and private agents to do so. Stiglitz (2002) discusses the incentives of governments to restrict the flow of information. Governments play a critical role since they can restrict or facilitate information flow. Many of the institutions (laws, regulations, organs of the state) that governments design are created to manage the flow of information in an economy. For much of the information relevant to decision-makers in political and economic markets, government is in fact the sole repository (and producer).

Djankov et. al (2001) demonstrate that who provides information has a strong influence on what information is transmitted. They show that media ownership affects economic and political outcomes by influencing the nature of the information transmitted. Specifically, they focus on the issue of state ownership of the media and the impact on social and economic outcomes. Private business owners will produce, analyse and disseminate information if it is profitable to do so, or if it enables them to influence public opinion in a way that increases their non financial gains, such as social stature. Demetz and Lehn (1985, 1988) hypothesize that this effect which they call the “amenity potential” is quite high. Grossman and Hart (1988) refer to the non-financial benefits as the “private benefits of control”.

What about those that demand information? Consumers and citizens will only demand information if it is perceived as useful and will only pay for it if they cannot get it otherwise.<sup>2</sup> Similarly for private business. Countries are often cited to have or not have a “culture” of openness. In other words citizens either do not see value in having certain kinds of information being made public or, put another way, do not have strong enough incentives to pressure governments or private agents to make such information available. Or sometimes they do not have strong enough coalitions to support their desire for greater openness and/or the transactions cost of forming coalitions is too high.

This paper extends the empirical work on information and economic and political markets. It examines how the availability of information may affect governance. Specifically, it looks at (a) how the availability of basic economic data affects governance and (b) how the legal framework governing access to information might affect the quality of governance. I ask, is better knowledge about economic performance in terms of the timely availability of economic data associated with better economic and political outcomes? Second, I examine how restrictions on the use of information can affect the quality of governance. In particular, how restrictions on the media may affect information flows and therefore governance. Mass media provide consumers and producers with information that they use to make decisions in economic and political markets. The specific restriction I consider is the presence of a Freedom of Information Act or Law (FOIA). FOIs determine the modalities by which citizens or private bodies can obtain information which resides with public entities.

It is clear how economic data helps economic markets function better. Investors, consumers and producers can make better business decisions by better assessing market conditions for their products. For example, price and inflation data help determine consumers’

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<sup>2</sup> Information being a public good suffers from the classical problems.

expenditure patterns both between products and over time. Why might we expect a greater availability of economic data to be associated with better quality government? For a number of reasons more widely available data can help governments govern better. For one, the public can judge their governments' ability to make sound policy by looking at such data. The ability to judge leaders according to how they perform in the economic sphere can affect the level of support the government has and determines how long they stay in power. In countries where different constituents are able to gauge economic performance, and where citizens are well informed, people are more likely to demand governments that govern better and governments have more of an incentive to do well. That is governments become more accountable to their people. Even in non-democratic countries policymakers may feel bound to produce better economic policy because they are monitored more effectively and they care about their reputations. They will be more wary of making large mistakes.

Second, data can help better coordination between members of government. For example, the budgetary process can benefit from data on outcomes related to fiscal expenditures. Third, the use of data to design policy can improve policymaking, help identify goals and evaluate alternative policies; and it can help policymakers to understand the relative magnitudes of the issues for which they may have had only a qualitative feel. A better understanding of the effects of policies can lead to a change in the nature of the policies adopted. For these reasons, the provision of timely and good quality economic data can improve governance.

Countries which produce economic data on a timely basis and promote their dissemination are also likely to be countries which support better information flows all around. In other words, economic data can be thought of as a proxy for other kinds of data. It is of course an imperfect proxy since experience clearly shows that governments may on occasion divulge economic data but not political data.

Aside from access to regular economic data people need information on a variety of issues related to public sector activity. They need timely information on decisions related to various aspects of government activity, on how these decisions will be implemented, information on the consequences of these decisions and the process through which they are reached. Yet in many countries access to this type of information is very limited either because of the laws or regulations which restrict access, or simply because the administrative capacity to organize and disseminate information does not exist. Laws facilitating access to information held by the public sector can play an important role in increasing information flow and facilitating the monitoring government. This paper examines how the presence of Freedom of Information (FOI) laws may affect how countries govern. Of course, the extent to which better information will affect choices of course depends on how people can act upon their choices- many other laws affect this ability (e.g. insult and defamation laws). I focus on only one of the several possible relevant laws.

## **Data**

### The Transparency Index

In order to investigate the relevance of widely available economic data for the quality of governance, I created an index which I call the “transparency” index. I take 11 representative variables from 4 sectors: the real, fiscal, financial and external sectors for a total of 169

countries, among which 145 are developing and 24 developed, using the World Bank definition of developed and developing.<sup>3</sup> The 11 representative variables are: gross domestic product (Q, line 99b in IFS<sup>4</sup>), unemployment (Q, line 67c in IFS), the consumer price index (M, IFS line 64), exports (M, line 70 in IFS), imports (M, line 71 in IFS), foreign direct investment (Q, line 78bed), the exchange rate (M, exchange rate at the end of period national currency units, line ae in IFS), government revenue (Y, IFS line 81, central government fiscal revenue), government expenditure (Y, IFS line 82, central government fiscal expenditure), money supply-M2 (M, sum of IFS line 34 and 35) and the deposit interest rate<sup>5</sup> (M, IFS line 60l). These indicators are certainly not an exhaustive list of economic data that might be considered important for monitoring and judging economic policy outcomes, but they do represent the indicators that all countries should have to some degree.

For each of these variables, I determined the “desirable” frequency level. This level was determined by observing the actual frequency level with which the data are published in most of the industrialized/high income countries and taking the most frequent level as being something that is both achievable and desirable. A “Q” indicates that the data is expected to be available on a quarterly basis, the “M” indicates its availability on a monthly basis and a “Y” its availability on a yearly basis. In other words GDP numbers can be and are produced on a quarterly basis in some, mostly richer countries. These countries are assigned the highest score (or a 1) in terms of “transparency” with respect to GDP as long as they are also available on a timely basis. As Table 1 explains, both the frequency and the date for which the latest data are available are counted in formulating the index.

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<sup>3</sup> Developed countries are those classified as “high income” or having gross national income equal to or greater than US\$9,206 per capita. Countries with lower per capita income are classified as developing.

<sup>4</sup> IFS refers to the International Financial Statistics – a publication of the International Monetary Fund.

<sup>5</sup> Generally this is a 3-month deposit rate.

**Table 1. Data Coding**

Cut off points are based on the examining data at end-June 2002 and in mid- November 2002<sup>6</sup>:

	M	Q	Y
1	3 months lag: 2002/7	6 months lag: 2002/1q	1 year lag: 2001
2	6 months lag: 2002/4	12 months lag: 2001/3q	1.5 year lag: 2000
3	with longer lag	with longer lag	longer lag
4	lower frequency, reasonably up to date (2002/1q for M, 2001 for Q)		
5	lower frequency, longer lag		
6	not available from WDI, IFS, or any other official websites		

For example, if I search for the CPI data in middle November 2002, and if the data are available for July 2002 or for more recent months, it is assigned a score of “1”. If monthly data are available, not for July or later, but at least up to April 2002, then the score is “2”. If the monthly data are only available for March 2002 or are even older, the score is “3”. If the data are reported in lower frequency, for example, they are quarterly or annual and if the data are reasonably up to date (for data such as the CPI which are “desired” on a monthly basis, the requirement is that if it is reported as quarterly data, it should be available at least for the first quarter of 2002 or if annual data, then it needs to be available at least for the year 2001), then the score is “4”. If the data are both produced at a lower frequency and is older than required a score of “4”, or “5” will be assigned. If the data are not available from any of the four sources (WDI, IFS, IMF or WB external websites or official websites of the countries), a “6” is assigned. The scores for each country on all indicators are averaged.

For GDP data, quarterly data are “desired”, if the data are available for the first quarter of 2002 or for a more recent quarter, the country gets a score of “1” on this measure. If quarterly

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<sup>6</sup> Some additional countries were added in November 2002; the table is based on the observations in November.



data are available but only for the third quarter of 2001 or later, but not for the first quarter of 2002, the score assigned is “2”. If the quarterly data are only available for the second quarter of 2001 or are even older, the score is a “3”. If the data are reported at a lower frequency, for example, they are annual, then in order to get a “4”, the data need to be available for at least up to the year 2001. Otherwise it will be assigned a “5”. Again, “6” will be assigned if none of the sources checked have the data.

For annual data, such as government revenue or expenditure, if the data are available up to the year 2001, it is assigned a “1”; “2” is assigned if the most recent data are for the year 2000. Otherwise the score is “3”. Using this methodology, the United States is assigned a value of 1 for the consumer price index because the CPI for September 2002 is available in the IFS November 2002 edition. Uruguay is assigned a value of 2 because the most recent CPI is for June 2002. And Zambia is assigned a value of 5 because the most recent CPI was reported for 1997.<sup>7</sup>

For a couple of countries the coding was not followed exactly. Two countries got a better score for having higher than “desirable” reporting frequency though their scores would have been lower since the lag in data was longer than the optimum or desired lag. Armenia has GDP figures up to October 2001 and Luxembourg has FDI data up to April 2001; both are of monthly frequency. The former could only score a “2” and the latter a “3”, by considering the lags. But they receive “1” and “2”, respectively, since the data are available at a higher than “desired” frequency.<sup>8</sup>

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<sup>7</sup> Note that for some of the countries the index was prepared looking at end-June publications. The index was then broadened to cover 40 more countries, but the end-date for these is November. This discrepancy has not made much of a difference since countries that tend not to report on a timely basis would have the same tendency whether one looks at their numbers in June or in November.

<sup>8</sup> For these two countries the cut-off point was June; they were in the first group investigated.

I define “available” by checking the following sources: the World Development Indicators published by the World Bank, the International Financial Statistics published by the International Monetary Fund (November 2002) and the internet (official websites of the government, such as Central Banks, statistical agencies, the Ministry of Finance, etc). Some of the internet sources and the WB/IMF publications are based on national publications.

In addition, when coding information from a web site of the Central Bank and/or the statistics agency, in cases where there were no actual statistics on the site but it was indicated that the relevant data were available in a publication, the country received a score that reflected the most recently published issue of the printed publication. E.g. for the end-June cut-off date, if the web site indicated that there was a report containing the data published in April, then the country received a 1 for that data. If the last issue available was that of January 2002, the score was a 2 and so on. These decisions were particularly relevant for statistical information published by the national statistics agencies in several middle income or rich countries, especially Brazil, Cyprus, Greece and Germany.

In cases where the web site was inaccessible after two attempts, the information was considered as NOT being available from this source. Countries affected include Costa Rica, Guatemala, Honduras, and Benin. The code for each data type is then added together to create an index of transparency in economic activities and they are averaged. The best score for “transparency” is thus 1, and the worst possible is 6 (if a country scores 6 on all 11 indicators).

It is important to note two things: even if the internet site is accessible, many individuals with interest in the data may not have easy access or any access to the internet. In cases where there are national publications, interested people may not be able to purchase it in a bookstore or the cost may be exorbitantly high. A mitigating factor may be that as long as some key

individuals or organizations (such as researchers, and the media) have access to this information, there is some chance that others who are interested in key variables will be able to obtain the necessary information. Despite this fact, the measure of availability used in this paper almost surely overstates how much information on common economic data is easily available in practice.

The index, thus constructed is used to assess the importance of information/transparency on institutional quality or governance. It is likely that countries that produce timely data on these indicators are more likely, on average, to produce more timely economic data of other kinds.

The transparency index indicates how much information governments are willing to disclose – but the FOI law gives access to more than just economic data.

#### A) Access to Information Index

Even when governments publish simple economic data, the people they govern may not have sufficient information to judge outcomes and monitor performance. Information on a wide variety of activities that is not immediately encapsulated in the type of economic data discussed above, can be very important in ensuring accountability of government. Information on how decisions are made, as well as the immediate inputs into, and outcomes of, these decisions are critical for monitoring purposes. A key question is how does society get information on what it wants and needs to know about its government? In many countries there are clear rules or laws which define the rights of individuals and private entities – often defined in general terms in the constitution and defined in more detail in Freedom of Information (FOI) laws. The adoption of FOI laws is quite recent in the case of most countries. As citizens around the world have become progressively more aware of their rights and have learned the value of adopting such laws from their neighbours, they have adopted FOIs. FOI laws may vary in both content and scope from

country to country. Some laws are very detailed regarding what information may be kept secret and under what circumstances and some are quite general.<sup>9</sup>

Regulations and laws governing access to information and the ability of people to disseminate information freely may be covered in other related laws as well. Press and media laws may determine how much information is circulated. Restrictive practices such as requiring journalists or newspapers to be licensed by the state may limit the flow of information, either by restricting entry or by inducing media personnel to censor information dissemination for fear of reprisal from government. These restrictions also vary in kind and scope between countries. In Austria there is no requirement on journalists or newspapers to be licensed.<sup>10</sup> In the Czech Republic journalists are not required to be licensed or accredited but newspapers are required to be licensed. However, an amended Press Law in 1990 has changed the former licensing requirements of any publishing activity into a simple registration. All periodical press is registered with the Ministry of Culture.<sup>11</sup>

In Ethiopia, journalists are not required to be licensed or accredited; however, newspaper licenses are issued by the Ministry of Information and Culture and are annual, being renewed upon payment of the prescribed annual fee.<sup>12</sup> There is a fee of US \$1,185 for renewal of a license; and prospective and existing newspapers are required to maintain bank balances of US \$1250 as a bond against potential offenses that journalists might commit. Publications that fail to demonstrate at least this degree of solvency whenever required by the Ministry of Information

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<sup>9</sup> See Martin and Feldman (2003), Transparency International website.

<sup>10</sup> (<http://www.austriaemb.org.au/media.htm>, and [www.hrcr.org/safrica/expression/telesystem\\_austria.html](http://www.hrcr.org/safrica/expression/telesystem_austria.html)).

<sup>11</sup> Law #81/1966 (“On periodical printings” regulates the publications of the press and other mass media.

<sup>12</sup> Proclamation 34/1992, Art. 7). According to the website [ijnet.org/Archive/2001/8/17-10268.html](http://ijnet.org/Archive/2001/8/17-10268.html), an editor of the sports newspaper Kicker, failed to renew its license and was sentenced to one month in prison.

and Culture may have their licenses revoked.<sup>13</sup> The fee, compared to Ethiopia's per capita GDP is high- GDP per capita being \$122.1 in 2001.<sup>14</sup>

The purpose of all such laws is to define a framework for the sharing of information. Sometimes just the act of adopting a law can signify a reduction in the restrictions imposed on information flow. Sometimes the adoption of a law can make people more aware of the value of information (Chongkittavorn, 2002). Such laws are one important element in the whole institutional environment affecting information flow.

Adopting a FOI is clearly not enough to ensure that it is effective. Government agencies must be required to publish information and there must be some implementing mechanism for the FOI. For example, in some countries a central commission is charged with ensuring that information gets out to the public as in the case of the Information Commission in Ireland, the Data Protection Inspectorate in Estonia and the Office of the Official Information Board in Thailand,<sup>15</sup> while in Georgia, Bulgaria and Finland this is not the case. Countries vary greatly in the time it takes to satisfy requests for information. In Estonia, Hong Kong, China, and Hungary, the laws specify that responses to requests must be made before or by the 15th day. In South Africa, the limit specified is 30 days and in Thailand the limit is not specified though it must be within a "reasonable period".

In case requests for information are denied, in most cases, the nature of the appeals process is also specified. Generally, the courts are responsible for oversight: in Canada the final appeal goes to the Federal court. In Ireland there is a review by an Information Commissioner

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<sup>13</sup> [www.cpj.org/attacks00/africa00/Ethiopia.html](http://www.cpj.org/attacks00/africa00/Ethiopia.html) and [www.cpj.org/protests/01ltrs/Ethiopia31Oct01pl.html](http://www.cpj.org/protests/01ltrs/Ethiopia31Oct01pl.html)

<sup>14</sup> World Bank data.

<sup>15</sup> Various sources: 1) Information Commissioner in Ireland – Freedom of Information Act 1997, Part IV, article 33; obtained from: [www.humanrightsinitiative.org](http://www.humanrightsinitiative.org) 2) Data Protection Inspectorate in Estonia – Public Information Act, RT1 2000, 92, 597, Chapter VI, article 44; obtained from: IJNET 3) Office of the Official Information Board – Official Information Act, B.E. 2540 1997, Section 6; obtained from: [www.humanrightsinitiative.org](http://www.humanrightsinitiative.org);

and then an Appeal to the High Court. In Thailand, appeals are made to the Information Disclosure Tribunal, and in Hong Kong, China, to the Ombudsman. It is clear that several institutional features need to be developed to ensure there is effective implementation of FOIs. A survey by the Bulgarian Access to Information Programme Foundation in 2000, found that one year after the country adopted a freedom of information law, only 42% of the Bulgarian public administration had implemented it effectively. A study by the Romanian Academic Society showed that while “while 68 percent of Romanian institutions had an office in charge of informing citizens about what they do, only 16 percent had the required list of data informing the public.” (Reuters, Dec 17).<sup>16</sup> Despite these caveats, however, it is possible to say that a country with an FOI law is more likely to be more open having taken an important step towards allowing better information flows from the public sector to the private sector.

Not only are FOI laws a relatively recent phenomenon on the scene (see Table 2) with only 50 countries having adopted one as of **May 2002** and **54 as of end 2002**, but many countries are still trying to work out how to implement them effectively. Precisely because the adoption of such laws is relatively recent, in some countries it might be difficult to argue that they have had a substantial effect on governance. Yet, even in these cases it might be argued that adoption of a FOI act may be taken as one of the acts a government takes in an ongoing process to improve transparency: it is rarely the first act. Thus the existence of an act may be an indicator for a general move towards ensuring greater access to information.

#### B) Other Data

I use two sets of governance/or institutional quality indicators to study the relationship between transparency and governance. The first set is developed by (Kaufmann, Kraay and Zoido-Lobodan, KKZ, 1999). The second set is composed of the ICRG indicators. The KKZ indicators

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<sup>16</sup> This is taken from an article by Antonia Oprita “Romania must shape up laws to get into EU”

are taken from the years 1997-98. The ICRG indicators used span several years from 1984 to 1997. The former indicators measure aspects of governance such as: graft, government effectiveness, regulatory burden, the rule of law, political instability and violence, and voice and accountability. The latter indicators measure corruption, the extent to which the rule of law is respected, bureaucratic quality, contract repudiation and expropriation risk.

Other variables used in this paper are: an indicator for the freedom of the press, 1999, from Freedom House which ranges between 1 and 100, a variable indicating the extent of state ownership of the press (poss) and television (toss) both taken from Djankov et al (2001), newspaper circulation (circu) defined as circulation per 1000 people, 1996 – from the United Nations Educational, Scientific, and Cultural Organisation, Statistical Yearbook. All three of these variables have been shown to be associated with institutional quality (Djankov et al, 2001, Besley, Burgess and Pratt, 2002 ). The GNP per capita figures are an average of the years 1992-96 in the regressions with the KKZ variables and 1979-83 for the ICRG measures. They are taken from the World Development Indicators, 2000, World Bank. Many of the regressions control for the legal origin of the country – whether English, French, Scandinavian or German. How long a country has been in existence as an independent nation can be expected to have an effect on institutional quality since institutions develop slowly over time. This variable is also used to assess the robustness of the transparency variable. Finally, a dummy variable which distinguishes between countries that have a FOI law and those that do not is used as a controlling variable. This indicator is composed from data held by [Article 19](#) of International Center and Censorship, (ICC,1993) and World Bank research and shown in Table 2.<sup>17</sup>

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<sup>17</sup> Author's compilation.

**Table 2. Countries with FOIA**

Country	Year of Introduction	Name of the Law
Albania	1999	Law on the right of information over official documents
Argentina	1998	FOI law
Australia	1982	FOIA
Austria	1986	Obligation to Information law - it is not FOIA
Belgium	1991-2001	series of laws and decrees
Belize	1994	FOIA
Bosnia-Herzegovina	2001	FOIA
Bulgaria	2000	Access to Information Act
Canada	1983	Access to Information Act
Chile	1999	Law on Administrative Documents
Colombia	1888, 1985	
Czech Republic	1999	Law on free access to information
Denmark	1985	The Public Information Law
EU	2001	Regulation regarding public access to European Parliament, Council and Commission documents
Estonia	2000	Public Information Act
Finland	1951, 1999	Act on the Openness of Government Activities
France	1978	Freedom of access to the administrative documents
Georgia		Freedom of Information (chapter 3)
Ghana	1999	Right to Information Bill
Greece	1986, 1999	Administrative Proceedings Code
Hong Kong	1995	Code on Access to Information
Hungary	1992	Data Protection Law
Kyrgyz R	2001	Law on the Guarantees and Freedom of Access to Information
Iceland	1996	Information Act
Ireland	1997	Freedom of Information Act
Israel	1998	Freedom of Information Law (5758-1998)
Japan	1999	Law concerning the Disclosure of Information held by administrative organs
Latvia	1998	Freedom of Information Law
Lithuania	1996	Law on Provision of Information to the Public
Mexico	2002	Freedom of Information Act
Moldova	2000	Law on Access to Information
Netherlands	1991	Law on Official Information
New Zealand	1982	Official Information Act
Nigeria	1999	Freedom of Information Bill
Norway	1971	Freedom of Information Act
Panama	2002	Law on Free Access to Public Records
Poland	2001	Freedom of Information Act
Portugal	1993	Law on Access to Administrative Documents
Romania	2001	Law regarding the free access to the information of the public interest
Russian Federation	1995	Law on Information, Informatization and Protection of Information; Law on State Secrets
Slovakia	2000	Act on free access to information
South Africa	2000	Promotion of Access to information act
South Korea	1996	Act on Disclosure of Information by Public Agencies
Spain	1992	Legal regime of the public administrations and the common administrative procedure
Sweden	1766	Freedom of the Press Act
Thailand	1997	Official Information Act

**Descriptive Statistics**

Table 3 shows the transparency index for selected countries. Aggregating and averaging the transparency indicator among countries of different income levels shows that rich countries are more than twice as “transparent” (Table 4). What is interesting though is that some high



income countries, half of which are oil producers, have very low transparency ratings. These are the United Arab Emirates, Qatar, Kuwait, New Caledonia, Brunei, the Bahamas, and Slovenia. The variation among high income countries is the highest among the three groups. For the low income countries not only is the average transparency lower but the variation between countries is also smaller.

**Table 3. Transparency Indicator for Selected Countries**

Country	Transparency	Country	Transparency	Country	Transparency
Afghanistan	6	France	1	New Zealand	1.36
Albania	2.18	Gabon	4.09	Nigeria	3.91
Algeria	2.45	Georgia	3.18	Norway	1
Angola	3.45	Germany	1	Oman	1.6
Argentina	1.36	Ghana	3.82	Pakistan	2.64
Armenia	2	Greece	1.45	Panama	1.91
Australia	1	Guatemala	2.27	Paraguay	3.82
Austria	1	Guinea	4.36	Peru	1
Bahamas, The	2.45	Guyana	3.09	Philippines	1.18
Bahrain	2.55	Haiti	2.45	Portugal	1
Bangladesh	3	Honduras	2.64	Qatar	3.09
Barbados	1.64	Hong Kong, China,	1	Romania	1.09
Belgium	1.27	Hungary	1	Russian Federation	1
Belize	2.82	Iceland	1.36	Rwanda	2.73
Benin	3.91	India	1.91	Saudi Arabia	2.64
Bolivia	2.09	Indonesia	2.82	Senegal	4
Bosnia and Herzegovina	3.45	Iran, Islamic Rep.	3	Sierra Leone	3.09
Botswana	2.82	Iraq	5.27	Singapore	1
Brazil	1	Israel	1.36	Slovenia	3.09
Brunei	5.91	Italy	1	Somalia	5.91
Bulgaria	1.45	Jamaica	2.73	South Africa	1.09
Cambodia	2.73	Japan	1	Spain	1
Cameroon	3.73	Kazakhstan	1.18	Sri Lanka	2.36
Canada	1	Kenya	2.64	Suriname	3.45
Cape Verde	3.55	Korea, Dem. Rep.	6	Swaziland	2.55
Central African Republic	4.27	Korea, Rep.	1	Sweden	1.09
Chad	2.73	Kuwait	2.73	Switzerland	1
Chile	1	Latvia	1	Tajikistan	4.91
China	2.45	Lebanon	2.7	Tanzania	2.73
Colombia	1	Lesotho	3.18	Thailand	1
Congo, Rep.	4.82	Liberia	3.3	Trinidad and Tobago	5.55
Costa Rica	2.09	Libya	2.86	Tunisia	1.55
Cote d'Ivoire	3	Lithuania	1.55	Turkey	1
Croatia	1.09	Madagascar	3.73	Uganda	2.73
Cuba	5.36	Malawi	3	United Arab Emirates	2.09
Cyprus	1	Malaysia	1	United Kingdom	1
Denmark	1	Malta	1.91	United States	1
Djibouti	3.45	Mauritania	4	Uzbekistan	5.3
Dominica	4	Mexico	1.18	Vanuatu	4
Ecuador	1.18	Mongolia	3.18	Venezuela, RB	2.36
Egypt, Arab Rep.	2.73	Mozambique	4.18	Vietnam	3.27
Equatorial Guinea	3.64	Namibia	3.36	Yemen, Rep.	2.27
Estonia	1	Nepal	2.82	Yugoslavia, Fed. Rep.	1.64
Fiji	3.45	Netherlands	1.18	Zambia	3.91
Finland	1	New Caledonia	5.09	Zimbabwe	3.64

**Table 4. Descriptive Statistics: Transparency Relative to Income Levels**

Income Level	Number of Countries	Mean	Std. Dev.	Min	Max
Low	59	3.44	1.04	1.73	6
Middle	77	2.26	1.13	1	5.55
High	34	1.6	1.17	1	5.91
High (only North America and European)	27	1.11	0.2	1	1.81

As Table 5 shows, high income countries are much more likely to have FOI laws but many still do not have them (just under 50%). Among the low income countries, countries such as Moldova and the Kyrgyz Republic have a FOI law but neither India nor Bangladesh does. Yet on freedom of the press ratings, Freedom house rates India and Bangladesh higher than the Kyrgyz Republic. The freedom of the press rating for India, Bangladesh, and the Kyrgyz Rep are: 63, 41, and 36, respectively. The difference is probably due to two facts: first information can be “free” without the FOI, and second the press can be free but not have access to reliable information. Moreover, the FOI act has relevance for other actors beside the press: business interests for example.

**Table 5. FOIA Distribution in High-Middle-Low Income Countries**

Income	Obs	Percentage	Std. Dev.	Min	Max
Low	61	11%	0.32	0	1
Middle	85	23%	0.42	0	1
High	34	56%	0.5	0	1

The correlation between transparency and other freedom of media (information) variables are quite high and significant as might be expected. Djankov et al (2001) have shown that in countries where state ownership of the media is high, the press is less free. The transparency

indicator constructed in this paper is significantly correlated with variables that have been used in the literature to indicate how freely information flows in an economy, particularly information provided by the media. Table 6 below shows that countries in which transparency is lower, freedom of the press is lower, state ownership of the press also tends to be higher, there is less chance of finding a freedom of information law and television also tends to be dominated by government.

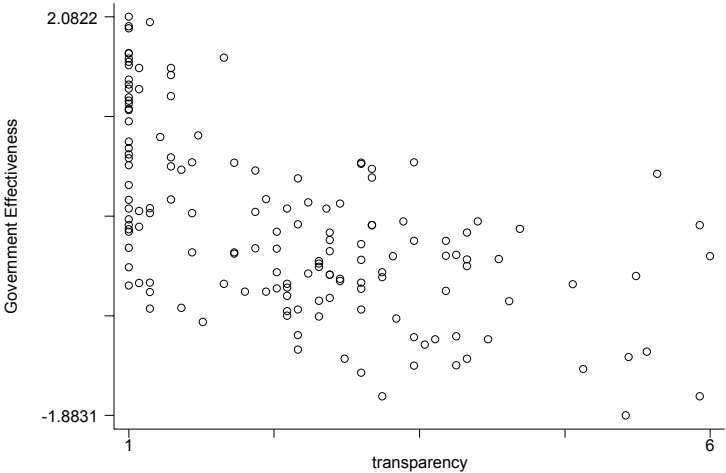
**Table 6. Correlation of the Freedom of Media Variables**

	Freedom of Press	FOI	Circulation	State Ownership of Press	Transparency	State Ownership of TV
Freedom of Press	1					
FOI	0.3720***	1				
Circulation	0.5600***	0.4533***	1			
State Ownership of Press	-0.6486***	-0.4946***	-0.6117***	1		
Transparency	-0.5338***	-0.4089***	-0.64***	0.6424***	1	
State Ownership of TV	-0.4833 ***	-0.4295***	-0.43***	0.8914***	0.4777***	1.0000

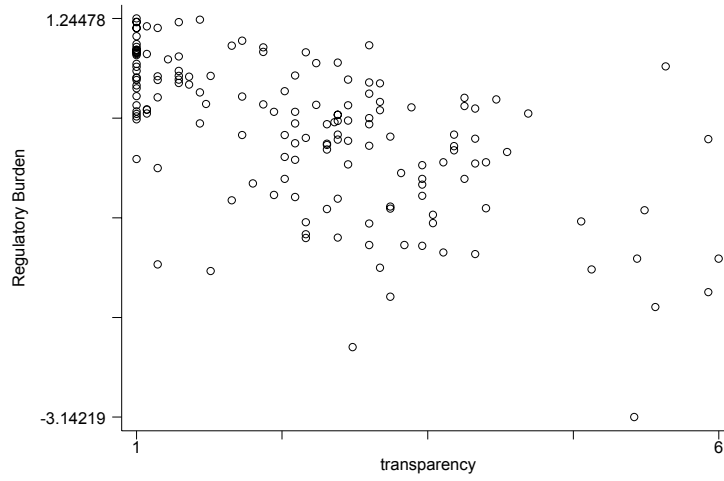
*Note: three asterisks means the correlation is significant at 0.01 level..*

A graphical representation of the transparency index with the governance indicators tells an interesting story. Figures 1-6 shows the index plotted against three of the KKZ indicators and 3 of the ICRG indicators.

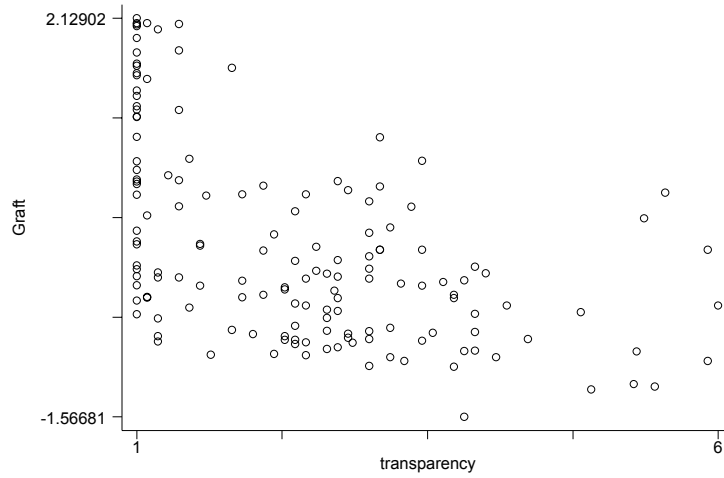
**Figure 1. Transparency Index and Government effectiveness (KKZ)**



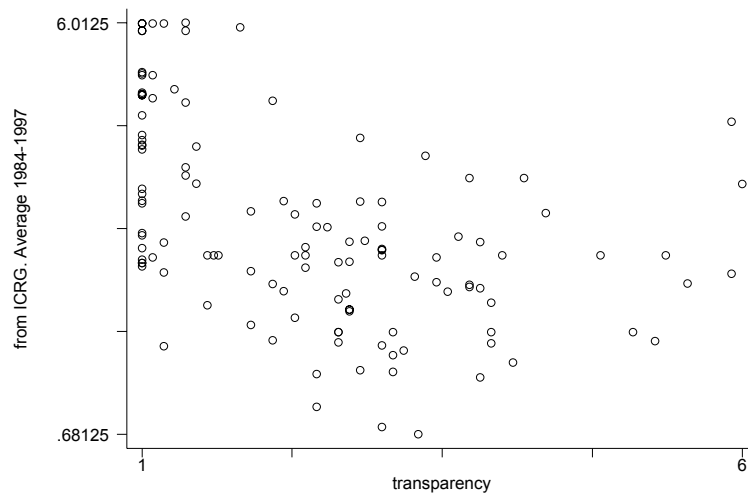
**Figure 2. Transparency Index and Regulatory burden (KKZ)**



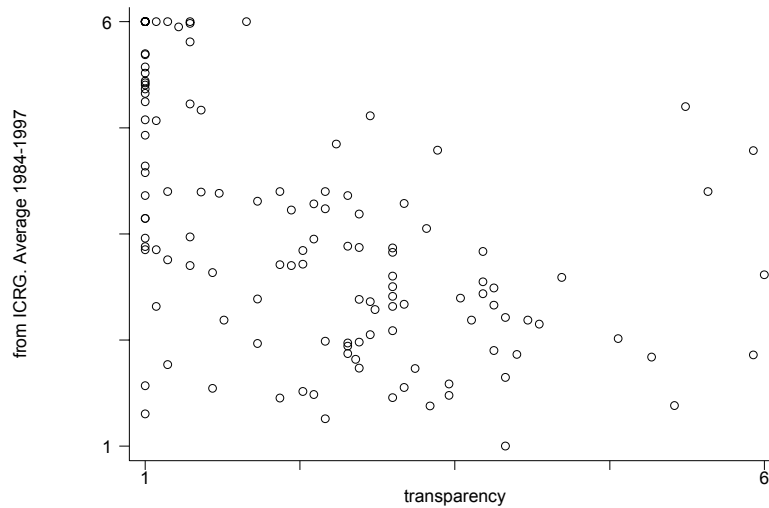
**Figure 3. Transparency Index and Graft (KKZ)**



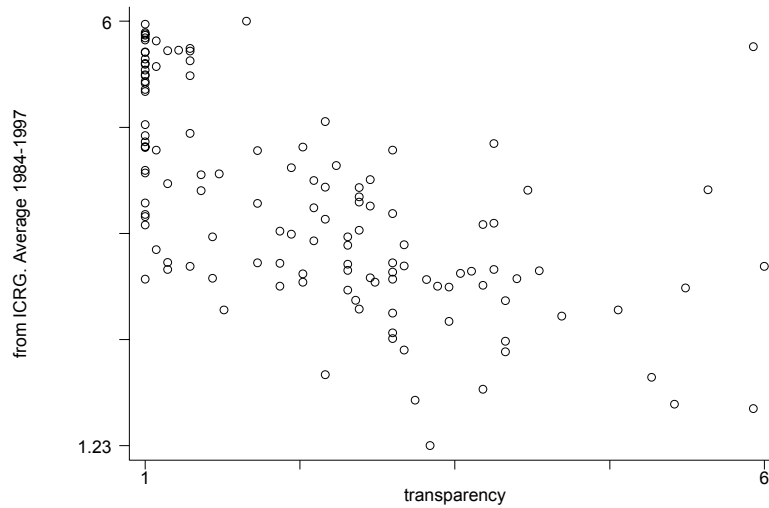
**Figure 4. Transparency Index and Corruption (ICRG)**



**Figure 5. Transparency Index and Rule of Law Index (ICRG)**

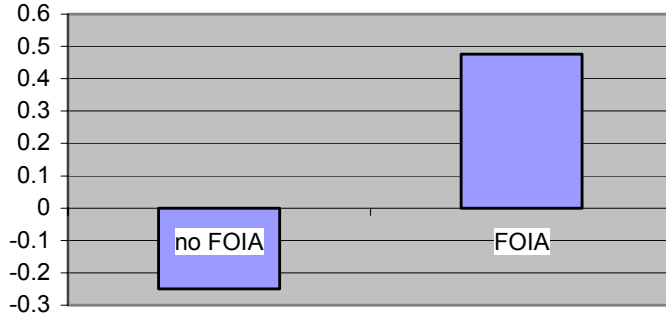


**Figure 6. Transparency Index and Contract repudiation risk (ICRG)**

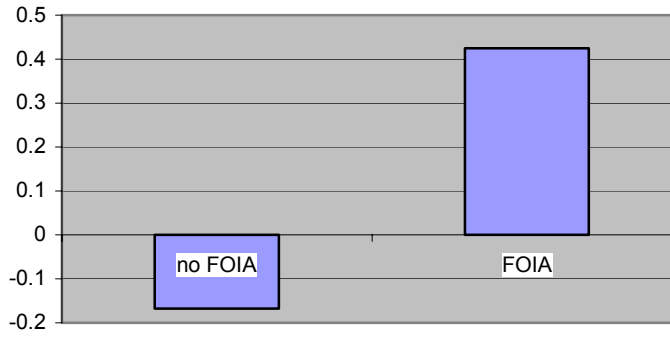


Each of the scatter plots indicate a negative association between the index and governance indicators. Bar graphs looking at governance indicators and access to information tell a similar story as shown in Figures 7-10.

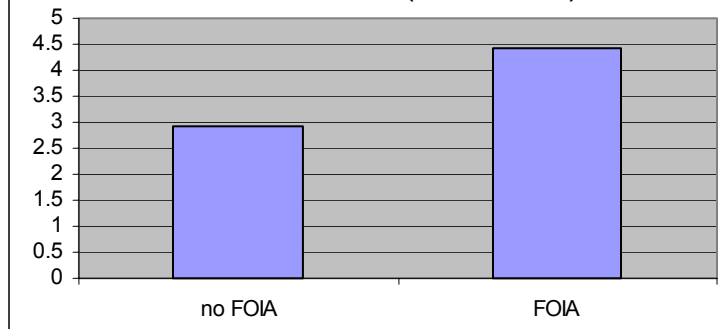
**Figure 7. Average Government Effectiveness in Countries with or without FOIA (KKZ indicator)**

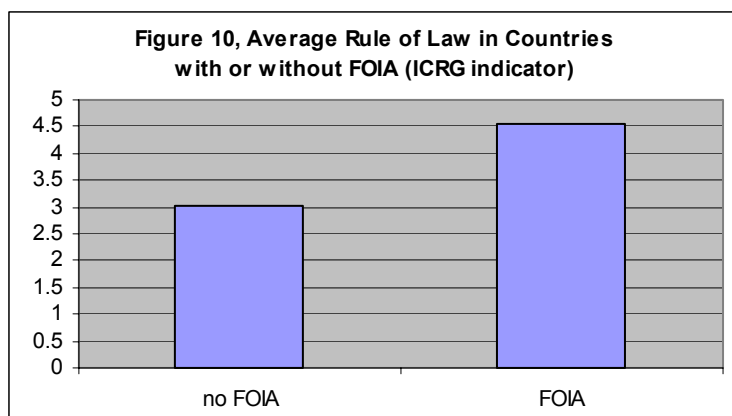


**Figure 8. Average Regulation Burden in Countries with and without FOIA (KKZ indicator)**



**Figure 9. Average Corruption in Countries with or without FOIA (ICRG indicator)**





### Regression Results

Tables 7a-b shows the most parsimonious specification of a regression of transparency on institutional quality. It shows that controlling for GDP per capita, the transparency index is strongly correlated with governance (many at the 1% confidence level). More transparent governments govern better for a wide number of governance indicators such as government effectiveness, regulatory burden, corruption (both KKZ and ICRG), voice and accountability, the rule of law, bureaucratic efficiency, contract repudiation, expropriation risk and a composite ICRG index.

This result holds also when a subset of countries in the sample – that composed of over 100 developing countries is considered as shown in Tables 8a-b.

**Table 7a. Transparency and Governance**

<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>						
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Income per capita <sup>(1)</sup>	.39*** (5.11)	.55*** (8.44)	.48*** (8.02)	.30*** (6.13)	.63*** (11.49)	.54*** (8.7)
Transparency	-.17** (-2.14)	-.06 (-1.16)	-.14** (-2.39)	-.14*** (-2.74)	-.04 (-.76)	-.11* (-1.85)
Constant	-2.71*** (-3.48)	-4.44*** (-6.84)	-3.64*** (-6.21)	-1.99*** (-3.95)	-5.08*** (-9.41)	-4.26*** (-7.02)
# obs	136	125	126	131	131	125
R <sup>2</sup>	.42	.52	.55	.45	.64	.57

**Table 7b. Transparency and Governance**

	<i>DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Income per capita <sup>(1)</sup>	.59*** (4.6)	.59*** (3.63)	.84*** (5.4)	.75*** (4.58)	.56*** (4.45)	.48*** (4.58)
Transparency	-.50*** (-6.39)	-.56*** (-5.49)	-.50*** (-4.56)	-.55*** (-5.31)	-.46*** (-5.35)	-.43*** (-5.92)
Constant	.39 (.36)	.10 (.07)	-1.8 (-1.35)	-1.03 (-.75)	.79 (.73)	1.68* (1.85)
# obs	94	94	94	94	94	94
R <sup>2</sup>	.59	.47	.54	.50	.57	.58

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

**Table 8a. Transparency and Governance in Non-OECD Countries**

	<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>					
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Income per capita <sup>(1)</sup>	.22*** (2.69)	.45*** (5.61)	.30*** (4.91)	.27*** (4.61)	.51*** (8.12)	.35*** (5.62)
Transparency	-.12* (-1.74)	-.03 (-.59)	-.09* (-1.77)	-.13** (.02)	-.001 (-.02)	-.05 (-1.11)
Constant	-1.57** (-2.01)	-3.76*** (-5.09)	-2.44*** (-4.45)	-1.79*** (-3.27)	-4.29 (-7.51)	-2.93*** (-5.45)
# obs	113	102	103	108	108	102
R <sup>2</sup>	.18	.33	.31	.30	.45	.34

**Table 8b. Transparency and Governance in Non-OECD Countries**

	<i>DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Income per capita <sup>(1)</sup>	.27*** (2.83)	.19 (1.48)	.43*** (3.68)	.32** (2.58)	.32*** (2.84)	.26*** (2.79)
Transparency	-.32*** (-4.46)	-.35*** (-3.8)	-.26** (-2.4)	-.32*** (-3.24)	-.32*** (-3.75)	-.29*** (-4.14)
Constant	2.13*** (2.69)	2.32** (2.30)	.36 (.36)	1.36 (1.34)	2.01** (2.15)	2.82*** (3.56)
# obs	72	72	72	72	72	72
R <sup>2</sup>	.34	.19	.24	.21	.32	.32

Table 9 shows the significance of the index after controlling for legal origin. Using table 9 as the standard set of regressions, several variations are run by adding different variables one at a time to check for the stability of the significance of the transparency index. The index



remains significant for most of the indicators above and often at the 1% level for all these permutations.

**Table 9a. Transparency and Legal Origin Terms**

<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>						
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Socialist Legal Code	-.31* (-1.77)	-.06 (-.32)	-.62*** (-4.28)	-.67*** (-4.3)	-.51*** (-3.57)	-.80*** (-5.91)
French Legal Code	-.02 (-.14)	-.13 (-.91)	-.10 (-.84)	-.11 (-1.18)	-.29*** (-2.74)	-.35*** (-3.17)
German Legal Code	.29 (-1.51)	.24 (1.10)	.20 (.84)	-.31** (-2.27)	.29 (1.65)	-.11 (-.38)
Scandinavian Legal Code	.65*** (4.1)	.49*** (3.53)	.62*** (4.93)	-.07 (-.63)	.48*** (4.08)	.79*** (4.82)
Income	.34*** (4.22)	.51*** (7.05)	.40*** (6.73)	.25*** (4.94)	.54*** (10.18)	.44*** (7.65)
Transparency	-.18** (-2.37)	-.06 (-.98)	-.17*** (-3.23)	-.20*** (-4.1)	-.06 (-1.38)	-.16*** (-3.08)
Constant	-2.16*** (-2.77)	-4.06*** (-5.45)	-2.79*** (-4.75)	-1.34*** (-2.51)	-4.14*** (-7.71)	-3.03*** (-5.51)
# obs	136	125	126	131	131	125
R <sup>2</sup>	.46	.55	.63	.55	.69	.69

**Table 9b. Transparency and Legal Origin Terms**

<i>DATA SET: ICRG, Averaged over the period 1984-1997</i>						
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Socialist Legal Code	.44 (1.63)	.73 (2.57)	1.16*** (5.27)	.01 (.06)	.32 (.92)	.68** (2.64)
French Legal Code	-.40** (-2.53)	-.20 (-.92)	-.31 (-1.43)	-.73*** (-3.31)	-.28* (-1.82)	-.38*** (-2.81)
German Legal Code	.67*** (3.7)	.51 (1.43)	.86** (2.43)	.75*** (2.8)	.92*** (6.17)	.54*** (4.3)
Scandinavian Legal Code	.84*** (4.12)	1.47*** (5.32)	1.17*** (4.49)	.88*** (2.98)	.59*** (3.1)	.39** (2.65)
Income	.53*** (4.2)	.51*** (3.17)	.78*** (5.20)	.66*** (4.02)	.52*** (4.12)	.45*** (4.51)
Transparency	-.42*** (-6.04)	-.47*** (-4.85)	-.39*** (-3.82)	-.46*** (-4.77)	-.39*** (-4.88)	-.37*** (-5.57)
Constant	.81 (.81)	.53 (.41)	-1.54 (-1.25)	-.24 (-.19)	1.02 (1.01)	1.89** (2.29)
# obs	94	94	94	94	94	94
R <sup>2</sup>	.68	.54	.62	.61	.65	.67

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

Controlling for various regional dummies (such as Africa, the Middle East and North Africa, East Asia, South Asia or Eastern Europe) does not alter these results significantly. Adding years since independence as an additional variable in the specifications (does reduce the

significance of the transparency index somewhat in some of the cases but generally the results stay the same: the transparency index is significantly correlated with governance indicators.

Others have found that state ownership of the media is associated with poorer economic and social outcomes. I use an index developed by Djankov et al (2001) and World Bank (2002), to see whether the transparency index is still significant once this index is added (not shown). However, the data on ownership of the media is only available for a much smaller sample. I find that addition of state ownership of the media to the right hand side of the regressions reduces the impact of the transparency index in some of the regressions (some of the versions using the KKZ indicators) but the general conclusions are still valid. That is, even in countries where much of information packaging and dissemination to the general public is controlled by government, a government that publishes more economic information governs better on average.

The transparency index is significant at the 10% level even after controlling for newspaper circulation, freedom of the press and the presence of a Freedom of Information law (see Tables 10a-10f).

**Table 10a. Transparency and Freedom of Press**

	<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>					
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Socialist Legal Code	-.03 (-.38)	.08 (.47)	-.51*** (-3.51)	-.55*** (-4.15)	-.40*** (-3.15)	-.68*** (-5.17)
French Legal Code	-.04 (-.61)	-.12 (-.92)	-.08 (-.76)	-.09 (-1.11)	-.28*** (-2.71)	-.34*** (-3.19)
German Legal Code	-.06 (-.70)	.09 (.50)	.10 (.48)	-.41*** (-3.22)	.21 (1.29)	-.22 (-.83)
Scandinavian Legal Code	.05 (.66)	.23 (1.53)	.45*** (3.5)	-.25 (-2.19)**	.32*** (2.52)	.59*** (3.58)
Income	.13*** (3.87)	.41*** (5.19)	.33*** (5.94)	.18*** (4.06)	.48*** (8.55)	.36*** (6.88)
Transparency	.03*** (21.9)	.01 (.80)	-.12** (-2.24)	-.14*** (-3.09)	-.009 (-.20)	-.09 (-2.14)
Freedom of press (reverse)	.03*** (21.9)	.01*** (4.18)	.01*** (3.72)	.01*** (5.16)	.009*** (3.61)	.01*** (4.40)
Constant	-2.57*** (-8.1)	-4.2*** (-5.82)	-2.94*** (-5.45)	-1.49*** (-3.37)	-4.27*** (-8.24)	-3.19*** (-6.52)
# obs	135	124	125	130	130	124
R <sup>2</sup>	.89	.62	.67	.63	.72	.74

**Table 10b. Transparency and Freedom of Press**

	<i>DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Socialist Legal Code	.65 (1.45)	.98** (2.15)	1.45*** (3.45)	.21 (.48)	.55 (1.02)	.85** (2.07)
French Legal Code	-.34** (-2.35)	-.12 (-.58)	-.23 (-1.10)	-.69*** (-3.24)	-.22 (-1.55)	-.34*** (-2.75)
German Legal Code	.50*** (2.94)	.35 (.98)	.65* (1.89)	.54** (2.10)	.75*** (5.39)	.38*** (3.04)
Scandinavian Legal Code	.59*** (3.25)	1.23*** (4.22)	.87*** (3.39)	.60** (2.12)	.35** (2.57)	.17 (1.31)
Income	.46*** (4.68)	.43*** (3.17)	.68*** (5.92)	.58*** (4.16)	.44*** (4.73)	.39*** (4.93)
Transparency	-.31*** (-5.12)	-.35*** (-3.33)	-.25** (-2.54)	-.36*** (-3.83)	-.27*** (-3.87)	-.28*** (-5.06)
Freedom of press (reverse)	.01*** (3.59)	.02*** (2.78)	.02*** (3.59)	.02*** (2.68)	.02*** (3.8)	.01*** (3.79)
Constant	.28 (.39)	-.07 (-.06)	-2.24** (-2.32)	.76 (-.72)	.46 (.66)	1.46** (2.34)
# obs	93	93	93	93	93	93
R <sup>2</sup>	.73	.59	.68	.64	.72	.72

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

**Table 10c. Transparency and Circulation**

	<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>					
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Socialist Legal Code	-.32 (-1.54)	-.05 (-.27)	-.73*** (-3.85)	-.81*** (-4.52)	-.60*** (-3.5)	-.80*** (-4.60)
French Legal Code	-.13 (-.80)	-.20 (-1.35)	-.25* (-1.88)	-.08 (-.86)	-.39*** (-3.13)	-.46*** (-3.51)
German Legal Code	.30 (1.38)	.25 (.88)	.04 (.14)	-.46** (-2.31)	.37* (1.9)	-.09 (-.27)
Scandinavian Legal Code	.57*** (3.07)	.53*** (3.47)	.55*** (3.52)	-.10 (-.88)	.51*** (3.92)	.76*** (3.97)
Income	.24 (1.65)	.34*** (3.00)	.35*** (3.10)	-.01 (-.19)	.48*** (5.11)	.49*** (4.15)
Transparency	-.15 (-1.50)	-.05 (-.67)	-.21** (-2.41)	-.12* (-1.98)	-.04 (-.79)	-.18** (-2.4)
Circulation (reverse)	.12 (1.32)	.09 (1.23)	.02 (.30)	.25*** (4.21)	.03 (.44)	-.03 (-.52)
Constant	-1.89** (-1.69)	-3.02*** (-3.30)	-2.36*** (-2.68)	-.16 (-.21)	-3.69*** (-5.13)	-3.22*** (-3.69)
# obs	102	101	101	102	102	101
R <sup>2</sup>	.48	.50	.62	.56	.66	.69

**Table 10d. Transparency and Circulation**

	<i>DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Socialist Legal Code	.32 (1.24)	.65** (2.1)	1.13*** (4.44)	.03 (.10)	.10 (.37)	.50** (2.27)
French Legal Code	-.55*** (-3.35)	-.47** (-2.05)	-.41* (-1.69)	-.94*** (-4.01)	-.34** (-2.14)	-.45*** (-3.34)
German Legal Code	.60** (2.55)	.54 (1.31)	.77* (1.75)	.90*** (2.86)	.66*** (3.76)	.34** (2.06)
Scandinavian Legal Code	.77*** (3.49)	1.39*** (4.72)	1.18*** (4.03)	.89*** (2.65)	.49** (2.61)	.30* (1.97)
Income	.48** (2.5)	.59** (2.39)	.74** (3.21)	.79** (3.02)	.26 (1.53)	.28** (2.01)
Transparency	-.42*** (-5.94)	-.53*** (-5.35)	-.38*** (-2.93)	-.57*** (-5.68)	-.27*** (-3.16)	-.30*** (-4.21)
Circulation (reverse)	.02 (.16)	-.10 (-.61)	.02 (.13)	-.18 (-1.22)	.23** (2.05)	.13 (1.48)
Constant	1.21 (1.08)	.58 (.41)	-1.36 (-1.00)	-.16 (-.11)	1.80** (1.76)	2.57*** (2.97)
# obs	82	82	82	82	82	82
R <sup>2</sup>	.68	.57	.59	.62	.66	.66

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

**Table 10e. Transparency and FOIA**

	<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>					
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Socialist Legal Code	-.40** (-2.45)	-.07 (-.41)	-.68*** (-4.56)	-.71*** (-4.49)	-.52*** (-3.58)	-.85*** (-6.17)
French Legal Code	.02 (.14)	-.11 (-.80)	-.08 (-.61)	-.08 (-.92)	-.27** (-2.57)	-.33*** (-2.91)
German Legal Code	.45 (1.63)	.27 (1.01)	.17 (.51)	-.35* (-1.8)	.42** (2.19)	-.02 (-.04)
Scandinavian Legal Code	.54*** (3.09)	.50*** (3.62)	.57*** (4.31)	-.10 (-.89)	.48*** (3.92)	.73*** (5.05)
Income	.31*** (3.7)	.46*** (5.91)	.37*** (5.29)	.23*** (3.88)	.52*** (8.28)	.44*** (6.34)
Transparency	-.09 (-1.37)	-.10 (-1.47)	-.15** (-2.39)	-.18*** (-3.09)	-.07 (-1.38)	-.11** (-2.15)
FOIA (reverse)	.52*** (3.46)	.04 (.30)	.26** (2.04)	.19** (2.02)	.08 (.74)	.23* (1.73)
Constant	-2.31*** (-3.01)	-3.66*** (-4.59)	-2.73*** (-3.99)	-1.27** (-2.07)	-3.94*** (-6.41)	-3.16*** (-5.05)
# obs	134	123	124	129	129	123
R <sup>2</sup>	.52	.54	.64	.56	.69	.70

**Table 10f. Transparency and FOIA**

	<i>DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Socialist Legal Code	.39 (1.01)	.67 (1.63)	1.12*** (3.87)	-.06 (-.14)	.27 (.62)	.65** (2.00)
French Legal Code	-.30* (-1.92)	-.09 (-.41)	-.24 (-1.06)	-.60*** (-2.68)	-.20 (-1.27)	-.33 (-2.35)
German Legal Code	.75** (2.62)	.67 (1.23)	.83* (1.70)	.92** (2.42)	.92*** (5.48)	.53*** (3.36)
Scandinavian Legal Code	.77*** (4.41)	1.40*** (5.65)	1.12*** (4.41)	.79*** (3.54)	.53*** (2.76)	.35** (2.37)
Income	.47*** (3.92)	.43*** (2.74)	.73*** (4.96)	.57*** (3.73)	.46*** (3.86)	.41*** (4.30)
Transparency	-.35*** (-5.80)	-.39*** (-4.17)	-.34*** (-3.7)	-.36*** (-3.99)	-.33*** (-4.87)	-.33*** (-5.50)
FOIA (reverse)	.52*** (2.74)	.64** (2.57)	.40 (1.48)	.72*** (2.81)	.45*** (2.47)	.30* (1.95)
Constant	.92 (1.04)	.68 (.56)	-1.47 (-1.29)	-.07 (-.07)	1.10 (1.23)	1.95** (2.53)
# obs	93	93	93	93	93	93
R <sup>2</sup>	.71	.58	.63	.64	.67	.68

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

Under the assumption that more information has greater value in democratic rather than autocratic governance regimes, an indicator for autocracy was added to the right hand side of the regressions. The inclusion of the indicators affects some of the variables; more information in more autocratic environments is less useful than in more democratic environments. However, the effect still significant at the 5 and 10 percent levels for several of the governance indicators.

These relationships do not prove one way causality since it may also be that governments that govern well have over time also been more likely to publish data. However, combined with the observation that information gives power to monitor and make good choices a significant and positive correlation between transparency and improved governance gives us pause to think: just giving better data to people can help countries do better.

**Table 11a. Transparency and Autocracy**

<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>						
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Socialist Legal Code	-.11 (-.74)	-.01 (-.07)	-.56*** (-3.89)	-.62*** (-3.89)	-.47*** (-.36)	-.73*** (-5.37)
French Legal Code	.12 (1.08)	-.07 (-.49)	-.04 (-.36)	-.03 (-.38)	-.26** (-2.33)	-.29** (-2.44)
German Legal Code	.47*** (2.66)	.33* (1.67)	.26 (1.07)	-.24 (-1.62)	.34** (2.19)	-.04 (-.18)
Scandinavian Legal Code	.42*** (4.26)	.44*** (3.07)	.56*** (4.22)	-.09 (-.85)	.43*** (3.46)	.68*** (4.24)
Income	.14** (2.24)	.38*** (4.59)	.34*** (4.46)	.21*** (3.31)	.47*** (7.27)	.37*** (5.04)
Transparency	-.07 (-1.34)	-.07 (-1.04)	-.13** (-2.17)	-.16*** (-2.76)	-.05 (-1.04)	-.09* (-1.77)
Autocracy	-.13*** (-8.72)	-.05** (-2.44)	-.04*** (-2.15)	-.03** (-2.20)	-.03* (-1.81)	-.05*** (-2.88)
Constant	-.14 (-.23)	-2.76*** (-3.21)	-2.18*** (-2.86)	-.93 (-1.4)	-3.41*** (-5.18)	-2.36*** (-3.21)
# obs	128	121	122	125	125	121
R <sup>2</sup>	.69	.56	.64	.56	.69	.72

**Table 11b. Transparency and Autocracy**

<i>*DATA SET: ICRG, Averaged over the period 1984-1997</i>						
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Socialist Legal Code	1.00*** (3.84)	1.39*** (4.7)	1.79*** (6.62)	.67** (2.3)	.83** (2.53)	1.11*** (4.63)
French Legal Code	-.18 (-1.12)	.02 (.10)	-.05 (-.23)	-.47** (-2.01)	-.07 (-.41)	-.22 (-1.6)
German Legal Code	.79*** (4.08)	.63** (2.33)	1.02*** (2.98)	.87*** (3.77)	1.06*** (4.36)	.63*** (3.31)
Scandinavian Legal Code	.65*** (4.30)	1.21*** (5.46)	1.01*** (4.2)	.64** (2.59)	.48*** (3.51)	.25** (2.14)
Income	.41*** (4.55)	.39*** (3.05)	.64*** (5.38)	.50*** (4.06)	.39*** (4.30)	.35*** (4.73)
Transparency	-.22*** (-3.19)	-.23** (-2.01)	-.18* (-1.83)	-.24** (-2.19)	-.22*** (-2.97)	-.22*** (-3.89)
Autocracy	-.12*** (-4.89)	-.14*** (-4.35)	-.12*** (-3.74)	-.14*** (-4.27)	-.10*** (-4.09)	-.09*** (-4.79)
Constant	1.85** (2.52)	1.6 (1.48)	-.39 (-3.8)	1.05 (1.02)	2.00** (2.62)	2.74*** (4.28)
# obs	91	91	91	91	91	91
R <sup>2</sup>	.76	.65	.68	.68	.71	.74

*\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.*

The transparency index developed here does not correct for the *quality* of the data produced. An index covering developing countries only and constructed by the World Bank

attempts to incorporate some quality measures.<sup>18</sup> When some of the above regressions are run with this index instead for developing countries only, the results are similar as shown in Tables 12a-b.

**Table 12a. An Alternative World Bank Index: Developing Countries Only**

	<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>					
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Socialist Legal Code	-.23 (-1.23)	-.06 (-.32)	-.31** (-2.24)	-.70*** (-4.15)	-.42*** (-2.82)	-.52*** (-3.76)
French Legal Code	-.16 (-1.12)	-.23 (-1.38)	.01 (.10)	-.15 (-1.30)	-.33** (-2.63)	-.31*** (-2.76)
German Legal Code	.20 (1.06)	-.59** (-2.56)	-.0005 (-0.00)	-.97*** (-6.00)	.13 (.73)	-.35** (-2.16)
Income	.30*** (2.96)	.31*** (2.87)	.24*** (2.81)	.32*** (4.55)	.36*** (4.35)	.32*** (3.32)
World Bank Data Index	-.18** (-2.27)	-.25*** (-2.93)	-.15** (-2.63)	-.23*** (-4.14)	-.16** (-2.55)	-.06 (-.87)
Constant	-1.87* (-1.98)	-1.87* (-1.81)	-1.67** (-2.22)	-.23*** (-4.14)	-2.38*** (-3.13)	-2.45*** (-2.76)
# obs	96	90	91	95	95	90
R <sup>2</sup>	.30	.32	.27	.42	.39	.33

**Table 12b. An Alternative World Bank Index: Developing Countries Only**

	<i>DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Socialist Legal Code	.55*** (2.84)	1.03*** (3.76)	1.34*** (4.88)	.14 (.58)	.42 (1.42)	.63*** (2.91)
French Legal Code	-.48** (-2.68)	-.26 (-.94)	-.37 (-1.59)	-.83*** (-3.21)	-.33* (-1.79)	-.52*** (-3.50)
German Legal Code	.46** (2.13)	.02 (.06)	-.06 (-.20)	.51 (1.52)	1.05*** (4.67)	.28 (1.59)
Income	.34*** (3.34)	.29 (1.57)	.44*** (3.7)	.45*** (3.01)	.37*** (3.46)	.28*** (3.12)
World Bank Data Index	-.24*** (-3.11)	-.15 (-1.57)	-.22** (-2.27)	-.23** (-2.23)	-.26*** (-2.99)	-.30*** (-4.04)
Constant	1.77** (2.08)	1.30 (.90)	.46 (.48)	.81 (.69)	1.83** (2.06)	3.12*** (3.99)
# obs	62	62	62	62	62	62
R <sup>2</sup>	.43	.15	.32	.84	.41	.51

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

*Note:* The index of Scandinavian Legal Code is dropped out of this regressions, because this World Bank index only has data for developing countries, and no developing countries have the legal origin as Scandinavia.

<sup>18</sup> See website <http://www.worldbank.org/data/tas/scbpaper.pdf>

The regressions results are less striking for the freedom of information law but they essentially tell the same story: the more access to information the better the quality of governance. There are three outliers for these sets of regressions. Switzerland, Norway and Luxemburg have no FOI law/act but have very good scores on governance. In the most parsimonious specification, I find that countries that have FOI laws are much more likely to be well governed as shown in Table 13a below.<sup>19</sup>

**Table 13a. FOIA and Governance (no outlier for FOI)**

	<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>					
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Income per capita <sup>(1)</sup>	.39*** (5.58)	.54*** (8.37)	.49*** (7.67)	.38*** (7.21)	.60*** (10.52)	.54*** (8.45)
FOIA	.56*** (3.72)	.17 (1.3)	.30** (2.13)	.15 (1.39)	.15 (.20)	.29* (1.95)
Constant	-3.34*** (-6.07)	-4.67*** (-8.66)	-4.18*** (-8.19)	-3.08*** (-7.13)	-5.04*** (-10.83)	-4.63*** (-9.11)
# obs	134	121	122	128	128	121
R <sup>2</sup>	.46	.49	.53	.41	.61	.56

**Table 13b. FOIA and Governance (no outlier for FOI)**

	<i>DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Income per capita <sup>(1)</sup>	.52*** (4.39)	.49*** (3.14)	.78*** (5.15)	.64*** (4.37)	.52*** (4.2)	.46*** (4.52)
FOIA	1.17*** (5.31)	1.39*** (4.90)	1.09*** (3.66)	1.46*** (5.08)	1.01*** (4.71)	.86*** (4.54)
Constant	-.63 (-.73)	-.84 (-.74)	-2.89** (-2.64)	-1.95* (-1.84)	-.29 (-.34)	.50 (.67)
# obs	91	91	91	91	91	91
R <sup>2</sup>	.56	.44	.49	.51	.52	.48

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

<sup>19</sup> The three outliers are omitted from this table.



Controlling for legal origin shows that the presence of a FOI law is correlated with good governance through mostly three measures in the KKZ: voice and accountability, and regulatory burden and sometimes with graft and government effectiveness as well (see Tables 14a-b).

**Table 14a. FOIA, Legal Origin, and Governance**

	<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>					
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Socialist Legal Code	-.33** (-2.0)	-.02 (-.13)	-.60*** (-4.08)	-.61*** (-3.75)	-.48*** (-3.36)	-.79*** (-5.82)
French Legal Code	.01 (.11)	-.12 (-.89)	-.07 (-.60)	-.10 (-1.05)	-.28 (-2.64)	-.33*** (-2.86)
German Legal Code	.48* (1.74)	.30 (1.14)	.22 (.68)	-.30 (-1.50)	.44** (2.33)	.02 (.07)
Scandinavian Legal Code	.54*** (3.04)	.50*** (3.59)	.59*** (4.21)	-.09 (-.72)	.48*** (3.86)	.75*** (5.05)
Income	.38*** (5.47)	.54*** (8.26)	.47*** (7.62)	.36*** (7.41)	.57*** (10.9)	.51*** (8.6)
FOIA	.55*** (3.71)	.06 (.52)	.31** (2.34)	.24** (2.55)	.10 (.92)	.26* (1.92)
Constant	-3.20*** (-5.77)	-4.54*** (-7.93)	-3.93*** (-7.73)	-2.82*** (-6.81)	-4.5*** (-10.31)	-4.06*** (-8.93)
# obs	137	124	125	131	131	124
R <sup>2</sup>	.52	.53	.62	.50	.69	.69

**Table 14b. FOIA, Legal Origin, and Governance**

	<i>*DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Socialist Legal Code	.61 (1.64)	.90** (2.29)	1.34*** (4.77)	.17 (.45)	.48 (1.12)	.86*** (2.76)
French Legal Code	-.28 (-1.51)	-.08 (-.34)	-.23 (-.92)	-.56** (-2.3)	-.18 (-.99)	-.31* (-1.86)
German Legal Code	1.12*** (3.42)	1.05** (1.85)	1.19** (2.32)	1.30*** (3.19)	1.27*** (6.04)	.88*** (4.46)
Scandinavian Legal Code	.96*** (3.98)	1.60*** (5.09)	1.30*** (4.5)	.99*** (3.59)	.71*** (2.8)	.53** (2.56)
Income	.58*** (4.39)	.55*** (3.28)	.84*** (5.36)	.68*** (4.21)	.57*** (4.35)	.52*** (4.91)
FOIA	.79*** (3.59)	.95*** (3.39)	.67** (2.26)	1.00*** (3.5)	.70*** (3.32)	.56*** (2.97)
Constant	-.83 (-.88)	-1.24 (-1.01)	-3.17*** (-2.82)	-1.92 (-1.64)	-.53 (-.58)	.30 (.39)
# obs	94	94	94	94	94	94
R <sup>2</sup>	.62	.5	.58	.59	.59	.57

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

These results hold under various permutations of the relationship; such as when state ownership of the media, various continent dummies and transparency are added. Controlling for

newspaper circulation, freedom of the press and a measure of autocracy does not change the basic results (see Tables 15a-b, 16a-b).

**Table 15a. Governance vs. Legal Origin, FOIA and Circulation**

	<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>					
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Socialist Legal Code	-.34* (-1.71)	-.03 (-.19)	-.66*** (-3.53)	-.79*** (-4.35)	-.59*** (-3.51)	-.75*** (-4.41)
French Legal Code	-.04 (-.26)	-.19 (-1.29)	-.18 (-1.36)	-.05 (-.54)	-.37*** (-2.96)	-.40*** (-2.85)
German Legal Code	.44 (1.4)	.28 (.94)	.16 (.47)	-.40 (-1.6)	.41* (1.9)	.02 (.04)
Scandinavian Legal Code	.57*** (2.94)	.54*** (3.63)	.59*** (3.65)	-.08 (-.86)	.52*** (4.03)	.80*** (4.82)
Income	.23 (1.56)	.35*** (3.25)	.41*** (3.44)	.01 (.13)	.48*** (5.24)	.53*** (4.49)
Circulation	.11 (1.33)	.09 (1.28)	.04 (.50)	.26*** (4.42)	.03 (.43)	-.02 (-.34)
FOIA	.57*** (3.35)	.04 (.32)	.29* (1.92)	.19* (1.74)	.12 (.97)	.27* (1.72)
Constant	-2.36** (-2.47)	-3.28*** (-4.35)	-3.52*** (-4.62)	-.80 (-1.29)	-3.86	-4.17*** (-5.77)
# obs	103	101	101	103	103	101
R <sup>2</sup>	.55	.50	.60	.56	.67	.68

**Table 15b. Governance vs. Legal Origin, FOIA and Circulation**

	<i>*DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Socialist Legal Code	.32 (1.00)	.64* (1.79)	1.12*** (3.88)	.02 (.04)	.09 (.27)	.49** (2.08)
French Legal Code	-.37** (-2.01)	-.26 (-1.05)	-.25 (-.96)	-.68** (-2.62)	-.20 (-1.23)	-.34** (-2.24)
German Legal Code	.79** (2.00)	.76 (1.24)	.93 (1.57)	1.18** (2.49)	.81*** (2.78)	.46* (1.7)
Scandinavian Legal Code	.83*** (3.52)	1.47*** (4.62)	1.24*** (4.09)	.97*** (3.22)	.53** (2.36)	.35* (1.89)
Income	.32* (1.97)	.40* (1.77)	.60*** (2.89)	.57** (2.62)	.16 (1.09)	.17 (1.34)
Circulation	.19** (2.06)	.14 (.99)	.19 (1.44)	.05 (.41)	.33*** (3.68)	.27*** (3.52)
FOIA	.69*** (3.15)	.79*** (2.81)	.58* (1.89)	1.02*** (3.41)	.56*** (2.93)	.42** (2.38)
Constant	.45 (.46)	-.41 (-.30)	-2.07 (-1.62)	-1.17 (-.88)	1.36 (1.52)	1.98** (2.48)
# obs	8.2	82	82	82	82	82
R <sup>2</sup>	.67	.53	.58	.60	.66	.63

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

**Table 16a. FOIA and Autocracy**

	<i>DATA SET: KAUFMANN, KRAAY AND ZOIDO-LOBATON</i>					
	How authorities are selected and replaced		Capacity of the state to implement sound policies		Respect of the state and the citizens for the rules	
	Voice and Accountability	Political Instability and Violence	Government Effectiveness	Regulatory Burden	Rule of Law	Graft
Socialist Legal Code	-.17 (-1.31)	.03 (.16)	-.54*** (-3.79)	-.56*** (-3.4)	-.46*** (-3.2)	-.72*** (-5.53)
French Legal Code	.14 (1.31)	-.08 (-.56)	-.01 (-.13)	-.03 (-.3)	-.27** (-2.37)	-.27* (-2.23)
German Legal Code	.45** (2.16)	.29 (1.4)	.22 (.73)	-.30* (-1.77)	.43** (2.54)	.001 (0.0)
Scandinavian Legal Code	.33** (2.63)	.42*** (2.87)	.52*** (3.77)	-.14 (-1.12)	.42*** (3.22)	.65*** (4.51)
Income	.12** (2.17)	.42*** (5.39)	.38*** (4.78)	.28*** (4.7)	.50*** (7.68)	.40*** (5.33)
Autocracy	-.13*** (-9.07)	-.05*** (-2.74)	-.04*** (-2.43)	-.04*** (-2.75)	-.03* (-1.85)	-.05*** (-2.89)
FOIA	.46*** (3.97)	.02 (.16)	.25** (2.00)	.20** (2.02)	.07 (.63)	.19 (1.53)
Constant	-.37 (-.70121)	-3.30*** (-4.52)	-2.91*** (-4.07)	-1.94*** (-3.51)	-3.82*** (-6.27)	-2.85*** (-4.23)
# obs	129	121	122	126	126	121
R <sup>2</sup>	.72	.56	.63	.52	.69	.72

**Table 16b. FOIA and Autocracy**

	<i>*DATA SET: ICRG, Averaged over the period 1984-1997</i>					
	ICRG	Corruption	Rule of Law	Bureaucracy Quality	Contract Repudiation	Expropriation Risk
Socialist Legal Code	1.17*** (4.13)	1.56*** (5.17)	1.97*** (8.36)	.77** (2.42)	1.01*** (2.87)	1.34*** (5.55)
French Legal Code	-.08 (-.50)	.11 (.49)	.02 (.09)	-.33 (-1.48)	.03 (.17)	-.13 (-.92)
German Legal Code	.84*** (5.28)	.71** (2.17)	.93*** (3.09)	.99*** (4.78)	1.07*** (6.10)	.65*** (4.65)
Scandinavian Legal Code	.65*** (3.94)	1.20*** (5.11)	1.00*** (4.14)	.64*** (2.92)	.48*** (2.8)	.26*** (1.83)
Income	.39*** (4.94)	.36*** (3.02)	.63*** (5.43)	.47*** (4.49)	.38*** (4.64)	.35*** (5.00)
Autocracy	-.14*** (-6.96)	-.16*** (-5.67)	-.15*** (-5.22)	-.15*** (-5.51)	-.12*** (-5.94)	-.12*** (-6.51)
FOIA	.45*** (2.88)	.47** (2.26)	.29 (1.20)	.65*** (2.89)	.42*** (2.67)	.27** (2.03)
Constant	1.40** (2.35)	1.23 (1.28)	-.71 (-7.7)	.54 (.68)	1.55** (2.54)	2.24*** (4.06)
# obs	91	91	91	91	91	91
R <sup>2</sup>	.76	.64	.68	.69	.71	.71

\*indicates significance at .1 level, \*\* at .05 level and \*\*\* at .01 level.

Economic theory tells us that information is needed to make sound economic and political choices, to monitor agents and reward or punish accordingly. Better availability of economic data and the ability of people to demand and receive the information they need is

highly correlated with governance. Governments that do not produce, organize and share information will be hampered in policymaking. Good policymaking requires up-to-date information on the economic situation; good policymaking requires the sharing of information for better coordination, analysis and monitoring.

These two sets of investigations have demonstrated that information flows as proxied by the two indices, the transparency index and the access to information index, are positively correlated with the quality of governance. Better governance has been empirically demonstrated to be correlated with higher growth. Extrapolating, there is a close relationship between better information flows and how fast economies grow.

Better decision-making in economic and political markets boosts growth. We also know that many different policy choices and institutional features affect information flows. Governments can choose to publish data and other information on their activities and they can choose whether or not to establish the regulatory system and organizational structure that allows production and dissemination of data and access to information. Thus, in the policy guidance that development advisors seek to impart, advising countries on the importance of processing and sharing data, on making this data widely available is policy advice that can boost economic growth. This paper has not demonstrated causality from more transparency to better institutional flows. It is likely that better governments are also more likely to promote more transparency. Yet it does give us some food for thought.

More research is definitely needed to take a closer look at the relationship between transparency and governance or information and economic growth. This paper provides a simple way to quantitatively assess whether the magnitude of the association is significant and worth another look.

The indicators used in the paper could be developed further. For example, the transparency indicator could be strengthened by considering not just the frequency and availability of data but also the quality of the data produced by governments. Moreover, my definition of “availability” probably overestimates the actual availability of data in developing countries and could be fine-tuned. Expanding the data set (e.g. to look at social indicators) would also be another direction in which the indicator could be developed. The FOI indicator could be substantially strengthened by considering how these laws are actually implemented, if at all, in countries. Another issue would be whether people are allowed to use the information they obtain: for example are newspaper journalists able to print information they obtain without fear of imprisonment – harsh libel and defamation laws would affect journalists’ behaviour. Looking at other restrictions, such as licensing of the media to prevent entry- would also enrich the analysis.

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## **Appendix A: A World Bank Index for Data Quality for Developing Countries**

This index scores the statistical practice of 125 developing countries with populations of one million or more. A high score indicates compliance with good statistical practice. The assessment is based on the following 10 factors: 1) base year for the national accounts e.g. is it within the last 10 years, 2) year of latest BoP manual used, 3) up-to-date reporting of external debt, 4) whether foreign trade price indexes are compiled, 5) population and 6) agricultural censuses are within the last 10 years, 7) the vital statistics registry is complete, as reported to the UN, 8) the CPI basket has been updated within the last 10 years, 9) sub-annual production index is compiled and 10) the country subscribes to the IMF's Special Data Dissemination Standard. The underlying information is from the primary data documentation in the latest edition of the World Bank's World Development Indicators and the IMF's International Finance Statistics.

What is used in this paper is an index composed from the information from this table, i.e., those countries with original scores of 9~10 gets “6”, 7~8 gets “5”, 5~6 gets “4”, and so on till the last group of 0 gets “1”.

Website: <http://www.worldbank.org/data/tas/scbpaper.pdf>