

LEADS AND LAGS: WHAT DO THE RECENT REPORTS BY THE WEF AND AT KEARNEY TELL ABOUT BRAZIL'S COMPETITIVENESS?

Recent surveys published by the World Economic Forum (WEF) and A.T.Kearney, albeit bringing about important information about global trends, apparently cast an unfavorable light on Brazil. An analysis of the WEF report, however, reveals that the move of Brazil in the WEF league table reflected mainly the weakening of macro-economic variables in 2002-2003. It is, thus, largely a lagged account of the shock in capital flows that Brazil experienced in 2002, which has largely been reverted since. Interestingly, but less noticed, the WEF report highlighted the good standing of Brazil in technology and public governance. The decline in rank at the A.T.Kearney FDI survey, on the other hand, can be largely explained by the upgrading of developed countries—ranging from France to Australia to the Netherlands and Japan, possibly on the heels of a greater emphasis on issues related to security. Among the many changes in rank recorded, emerging markets typically moved down the list, notwithstanding the optimism that has surrounded India and some other Asian countries.

Introduction

In the week of Columbus Day, many Brazilians discovered that, according with a new AT Kearney Survey, as well as to the latest World Economic Forum (WEF) report, Brazil had become “less competitive” and less attractive to foreign investors.

Of course, the Brazilian Authorities do not dispute that there is immense scope for reform in Brazil and they are quite attentive to the importance of improving competitiveness as a wealth-generating policy. This is why so many reforms have been undertaken in the first 20 months of the Lula Administration. This is also why the new administration strengthened fiscal responsibility and monetary control, building on a decade-long effort to overcome the imbalances of the 1980s. Among the early results of these choices are the prospect of further decline in the net debt/GDP ratio and economic growth above 4% in 2004. The authorities are also leading an important effort to address key issues on infrastructure investment, and working hard to reduce red tape and hold down taxes.

However, it is important to understand why the most discussed figures in those surveys are so much at odds with the results already harvested from the initial reforms, and what those figures mean in relation to the reforms underway and the possibilities of the country. Indeed, it is surprising that a country such as Brazil, where Congress has been so responsive to reform—both macro and micro, would fall behind in terms of competitiveness at this stage, even considering the progress occurring in other countries. The following paragraphs address these issues in detail, explaining the changes in rank and highlighting some important aspects of the surveys that have not received much publicity.

The message from the World Economic Forum Report

According to the WEF website (<http://www.weforum.org>)¹, the Growth Competitiveness Index (GCI) comprises three component indexes: the technology index, the public institutions index, and the macroeconomic environment index. These indexes are computed based on “hard” and “survey” data.

The decomposition of the index shows that the decline in the ranking of Brazil was due mainly to the deterioration of macro-economic variables used in its computation. Indeed, while Brazil is typically ranked in the 40-60 range for most variables, it was ranked 75th in the 2004 macroeconomic index. Of course, low economic growth in 2003 (-0,2%) could help explain this result. However, chapter 1 of the WEF report suggests that the drop in rank was largely due to variables with an even longer lag:

¹ <http://www.weforum.org/site/homepublic.nsf/Content/Global+Competitiveness+Programme%5CGlobal+Competitiveness+Report>

Brazil's drop (in the index) was precipitated by the worsening of the government deficit to 8.7 percent of GDP in 2002, when inflation rose to 8.4 percent and the interest rate ballooned to 43.5 percent (sic).

Hence, the deterioration of Brazil's ranking was largely due to events occurred in 2002—notably the sharp curtailing of international investment to Brazil in the wake of credit events in some emerging markets, as well as of the fall in the US stock markets and the aftermath of corporate shocks in developed markets, which heightened the risk aversion of international investors. These shocks led to a sharp depreciation of the real and a cortege of side effects, including in domestic demand and the public debt (captured by a deterioration of the credit rating of the country, now fully reversed). Considering these factors, it is worthwhile first to remember how the adjustment of the current account (6% of GDP) has been achieved since 2002, without any major recession. It is also important to reckon that the sensitivity of the public debt to the exchange rate has been cut by half in the last year and a half (because of the reduction in the dollar-denominated domestic debt and of Central Bank currency swaps), and that inflation has been brought under control.

Of course, these remarks are not completely lost in the GCI, since, while the “hard-data” component with its inevitable lag, points to a sharp deterioration of the Brazilian rank (e.g., on “macro-stability” and the credit rate), the survey component is much more positive, placing Brazil comfortably among its peers (Brazil ranked 50th on the macro-stability survey, and 52nd in the government efficiency index).

Decomposition of the Marco-environment Index

Country	Macro Environment Index		Macro Stability Sub-Index						Gov. Waste Index		Country Credit Rate	
			Overall		Hard-data		Survey *					
	Rank	Score	Rank	Score	Rank	Score	Rank	Score	Rank	Score	Rank	Score
Hungary	38	4.09	66	3.97	73	3.82	21	4.34	41	3.54	30	4.88
Czech R.	39	4.08	27	4.49	31	4.57	24	4.31	71	2.58	32	4.76
SA	40	4.08	41	4.38	56	4.24	12	4.71	37	3.61	40	3.95
Morocco	43	3.95	37	4.42	38	4.48	28	4.27	44	3.46	50	3.51
Vietnam	45	3.87	16	4.65	33	4.54	9	4.93	40	3.57	67	2.61
Poland	49	3.83	62	4.04	57	4.24	73	3.53	65	2.71	33	4.54
India	52	3.75	43	4.36	69	4.02	5	5.21	72	2.56	48	3.74
Mexico	54	3.74	73	3.81	76	3.79	53	3.86	55	2.96	37	4.39
Brazil	75	3.16	88	3.38	94	3.16	50	3.92	52	3.07	62	2.8
Peru	58	3.61	26	4.52	26	4.6	25	4.31	70	2.6	61	2.81
Panama	59	3.59	47	4.32	21	4.73	80	3.29	83	2.32	51	3.41
Philippines	60	3.52	46	4.33	36	4.52	55	3.84	89	2.11	54	3.31
Russia	61	3.44	61	4.04	68	4.03	39	4.09	76	2.46	55	3.19
Indonesia	64	3.37	65	3.98	66	4.04	56	3.83	42	3.5	80	2.01
Colombia	66	3.33	68	3.94	78	3.76	20	4.41	73	2.54	60	2.9
Turkey	82	2.93	94	3.27	96	3.09	62	3.73	75	2.47	63	2.71

*Green cells → scores that are “better” than those of Brazil; pink → “worse”; white → about the same.

The impact of 2002 on the rank can be gauged by comparing what would have been the rank of Brazil if its macro-variable were in par with its traditional value or its other indexes. For instance, if instead of rank 75, Brazil had earned a 55th rank in the macroeconomic index, entailing a score in the 3.70-3.75 range, the country's overall index could have risen from 3.95 to 4.15.

Global Competitiveness Index adjusted for macro indicators of Brazil

Country	Macroeconomic Index		Public Institutions Index		Technology Index		Overall - GCI
	Ranking	Score	Ranking	Score	Ranking	Score	
Argentina	93	2.61	88	3.22	45	4.22	3.35
Brazil	55	3.74	53	4.27	35	4.44	4.15
Chile	35	4.36	19	5.62	31	4.6	4.86
China	25	4.56	52	4.33	65	3.67	4.19
Colombia	66	3.33	60	4.13	60	3.76	3.74
Czech Repb.	39	4.08	47	4.51	21	4.84	4.48
Hong Kong SAR	15	4.91	10	6.03	37	4.4	5.11
Hungary	38	4.09	33	5.18	32	4.57	4.61
India	52	3.75	55	4.26	64	3.68	3.90
Indonesia	64	3.37	76	3.63	78	3.25	3.42
Korea	23	4.67	36	5.03	6	5.28	4.99
Malaysia	27	4.49	34	5.12	20	4.89	4.83
Mexico	54	3.74	50	4.35	43	4.26	4.12
Morocco	43	3.95	68	3.86	71	3.5	3.77
Panama	59	3.59	71	3.75	50	4.1	3.81
Peru	58	3.61	54	4.27	61	3.75	3.88
Philippines	60	3.52	85	3.29	56	3.92	3.58
Poland	49	3.83	58	4.17	34	4.44	4.15
Russian Fed.	61	3.44	81	3.34	69	3.61	3.46
South Africa	40	4.08	43	4.69	40	4.35	4.37
Thailand	26	4.54	37	4.97	39	4.37	4.63
Turkey	82	2.93	63	4.07	54	3.96	3.65
Vietnam	45	3.87	61	4.11	73	3.41	3.80

In terms of ranking, the adjustment to a score of 4,15 would imply a rise from the 54th overall ranking to around the 45th ranking—i.e., there would have been no lowering in ranking vis-à-vis the 2003 report. In terms of peer countries, the rise would also be quite significant:

Reported GCI Rank and Adjusted GCI Rank

Reported GCI			Adjusted GCI		
Country	Ranking	Score	Country	Ranking	Score
Colombia	63	3.74	Peru	57	3.88
Morocco	61	3.77	India	56	3.90
Vietnam	60	3.80	Mexico	47	4.12
Panama	59	3.81	Poland	45	4.15
BRAZIL	54	3.95	BRAZIL		4.15
Peru	57	3.88	China	44	4.19
India	56	3.90	South Africa	42	4.37
Mexico	47	4.12	Czech Repb.	39	4.48
Poland	45	4.15	Hungary	33	4.61

Interestingly, one of the factors strengthening the overall rank of Brazil in the GCI was the openness of the country to foreign investment and the effect that trade and exchanges with other countries was deemed to have on the dissemination of technology (see box below to understand how the technology index is built). Brazil ranked quite well in the technology index (35th), as noted in chapter 1 of the report:

(...) technology offers a bright spot: tertiary enrollment increased significantly and diffusion of ICT continues at a very fast pace in Brazil.

Indeed, according with the WEF methodology, Brazil holds a quite remarkable position in technology. This may be surprising for some, given that the strengths of Brazil in this area typically receive little coverage in the international press. However, those more acquainted with Brazil will recognize, for instance, that Brazil is one of the few countries able to develop and build aircrafts and has world-class technology in oil research and production. Those will also be familiar with the important technological basis on the sciences of life that Brazil has already acquired. The latter explains a significant part of the growth of agricultural production in recent years, which has surpassed by far the increase in farmed areas. These aspects of Brazil are reflected in the quite favorable assessment of the ability of the country to innovate (30th ranking), even if they are still not fully reflected in hard-data indicators such as patents, being more apparent in innovation in products ranging from swimwear to air compressors and electronic voting devices (in place before 2000).

Technology Index for selected countries (WEF)

			Brazil	SA	Mexico	Turkey	India	China	Russia
Technology Index		Rank	35	40	43	54	64	65	69
		Score	4.44	4.35	4.26	3.96	3.68	3.67	3.61
Innovation Subindex	Overall	Rank	60	58	59	68	66	70	27
		Score	2.25	2.27	2.25	2.01	2.06	1.97	3.36
	Hard-data	Rank	63	66	60	67	73	78	21
		Score	1.59	1.57	1.75	1.53	1.37	1.26	3.32
	Survey	Rank	30	24	48	66	34	36	62
		Score	4.21	4.37	3.76	3.46	4.13	4.11	3.47
ICT Subindex	Overall	Rank	43	44	48	51	75	62	56
		Score	4.23	4.09	3.95	3.88	2.87	3.42	3.66
	Hard-data	Rank	46	49	50	48	86	67	51
		Score	4.22	4	3.98	4.16	2.02	3.08	3.84
	Survey	Rank	36	37	47	74	30	43	76
		Score	4.26	4.26	3.9	3.32	4.58	4.09	3.31
Technology Transfer		Rank	2	3	6	39	7	47	69
		Score	5.44	5.39	5.35	4.72	5.31	4.57	3.62

Brazil also ranks quite prominently in the use and spreading of information and communications technology (ICT), in addition to its readiness to absorb technology through foreign investment (Technology Transfer index).

The message from the AT Kearney Survey

Although the scope of the AT Kearney report is narrower than that of the WEF report, it reflects the views of important decision makers on Foreign Direct Investment. It consolidates the results of a survey of senior strategy executives and managers, seniors VPs and Directors, as well as of CEOs, CFOs, and board members of companies located mainly in North America, Europe, and Asia.

It is noteworthy that the report underscores that FDI flows worldwide continued to decline from the peak reached in 1999-2000. Hence, the decline observed in flows towards Brazil, in part associated with the completion of the privatization cycle of the 1990s, is not out of sync with what is happening in other parts of the world. On the other hand, after a patch of low economic activity indicators in the US, more than half of the respondents of the 2004 survey said they plan to increase their investments abroad (the recovery of the U.S. economy was the most frequent factor considered as likely to influence FDI decisions, being cited by 60% of the respondents).

Although one of the most publicized results of the survey was the drop of the Brazilian rank in the FDI Confidence Index, the real message of the survey was a quite different one. **The main pattern arising from the change in the ranks of the Confidence Index was the strong upgrading of**

developed countries—including from Western Europe--and the penalization of emerging markets in the wake of an important change in investors' perception of risks.

FDI Confidence Index ranked by improvement from 2003 to 2004

Country	2003 Ranking	2004 Ranking	Change	GROUP
Hong Kong	22	8	14	D
Australia	19	7	12	D
Singapore	28	18	10	D
Malaysia	23	15	8	E
France	11	6	5	D
Japan	15	10	5	D
India	6	3	3	E
UK	7	4	3	D
Italy	12	9	3	D
Netherlands	27	24	3	D
Indonesia	25	23	2	E
China	1	1	0	E
US	2	2	0	D
Germany	5	5	0	D
Czech Rep.	13	14	-1	E
Canada	14	16	-2	D
Hungary	17	19	-2	E
Russia	8	11	-3	E
Spain	10	13	-3	D
South Korea	18	21	-3	D
Thailand	16	20	-4	E
Taiwan	20	25	-5	D
Poland	4	12	-8	E
Brazil	9	17	-8	E
Mexico	3	22	-19	E

There are, of course, exceptions, often associated with political changes, but they are few. Good examples of those are Malaysia and India among emerging markets and Spain among developed countries. The common thread, however, was the sharp rise of developed countries like Australia, France and Japan, and the decline of countries such as Russia, South Korea, and Taiwan. Very telling, the Netherlands, Italy and the UK inched up, despite the absence of indications of major changes in policies or even in the economic outlook. On the other hand, countries such as the Czech Republic and Hungary, for which the prospects of ascension strengthened, were downgraded. The change in fortune was particularly strong for Mexico.

The change of investors' concerns is very clear, with a new emphasis on the protection of intellectual property rights, terrorism risks, employee security, and corporate governance issues. On the other hand, the importance attributed to financial risks, the rule of law and potential risks of social disturbance receded.

Most Critical risks to firm operations in 2003 and 2004

	2004	2003	Change
Theft of intellectual property	28%	17%	11%
Terrorist attacks	26%	21%	5%
Corporate governance issues	30%	25%	5%
Security threats to employees/assets	26%	22%	4%
Employee fraud/sabotage	10%	8%	2%
IT disruption	19%	17%	2%
Product quality/safety problems	20%	19%	1%
Activist attacks on brand	5%	5%	0%
Natural disasters	6%	8%	-2%
Absence of rule of law	29%	34%	-5%
Country financial risk	60%	67%	-7%
Government regulation/legal decisions	64%	72%	-8%
Disruption of key supplier/customer	23%	33%	-10%
Currency/interest rate volatility	51%	63%	-12%
Political & social disturbances	46%	62%	-16%

The heavy weight given to security and related issues probably helped push OECD countries up and explain a large part of the change in the rank of Brazil. Five out of the 8 slots between the 2003 and 2004 ranks of Brazil were filled with developed countries that were below Brazil in 2003, but moved to the first tier of the ranking in the wake of the new emphasis on security. Spain, although an OECD country, moved down, possibly in view of having been a target of terrorism, coupled with political changes. Only Malaysia, among emerging countries, drastically improved its rank in absolute terms, with Poland and the Czech Republic improving mainly on relative terms to Brazil.

Country	2003 Ranking	2004 Ranking
China	1	1
US	2	2
India	6	3
UK	7	4
Germany	5	5
France	11	6
Australia	19	7
Hong Kong	22	8
Italy	12	9
Japan	15	10
Russia	8	11
Poland	4	12
Spain	10	13
Czech Rep.	13	14
Malaysia	23	15
Canada	14	16
Brazil	9	17

On balance, the relative position of Brazil among emerging market peers did not change very significantly. More specifically, the pecking order relative to Brazil moved little from 2003 to 2004 (it moved more in 2002-2003). Most countries that were in a better position than Brazil in 2003 (green cells) remained so in 2004. Similarly, those that were in a weaker position (pink cells), typically remained “below” Brazil in 2004. The only exceptions were Mexico, that dropped in the rank, and Malaysia, that rose.

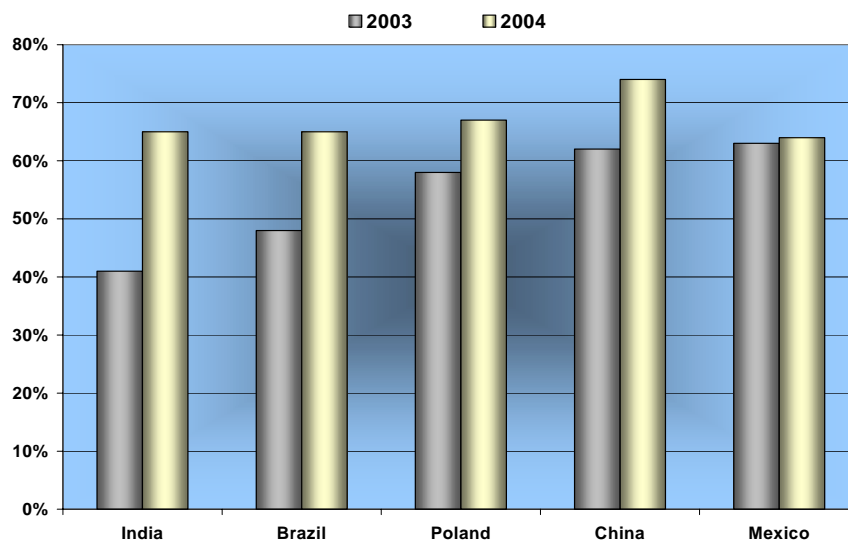
Country	2003 Rank	2004 Rank
China	1	1
Mexico	3	22
Poland	4	12
India	6	3
Russia	8	11
Brazil	9	17
Czech Rep.	13	14
Thailand	16	20
Hungary	17	19
South Korea	18	21
Malaysia	23	15
Indonesia	25	23

In addition to the tilting in favor of developed countries, the survey highlighted two issues that have reflected a narrower focus of the discussion about FDI recently. These are the outsourcing of services jobs to countries with a large English-speaking population and the continuation of flows to China—which still originate, to a significant extent, in the Pacific Rim. The survey, for instance, showed that “contact centers” such as call centers accounted for 18% of the allocation of selected offshore activities in 2004, up from 10% one year before. In addition, business processes such as accounting and HR answered for another 22% of planned investments. Not surprisingly, India and China are well ahead of the pack in the ranking *for the case of offshore decisions*.² However, it should be borne in mind that outsourcing is just part of the overall FDI flow and, total annual FDI flows to India, for instance, amount to just about US\$ 4,5 billion.

A final result of the survey was the evaluation of profitability and risk in five major recipients of foreign investment, i.e., China, India, Brazil, Mexico and Poland. Regarding profitability, there was a general improvement in expectations and results from 2003 to 2004, with the share of positive answers jumping up 12 percentage points.

Brazil was the country with the second largest jump in profitability, with positive answers rising from 48% (less than half) to 65% (more than two thirds). The latter result was well on par with peer countries (excepting China, where the proportion of positive answers reached 74% in 2004).

Proportion of “Yes” to the question “If invested, are profitability targets met?”

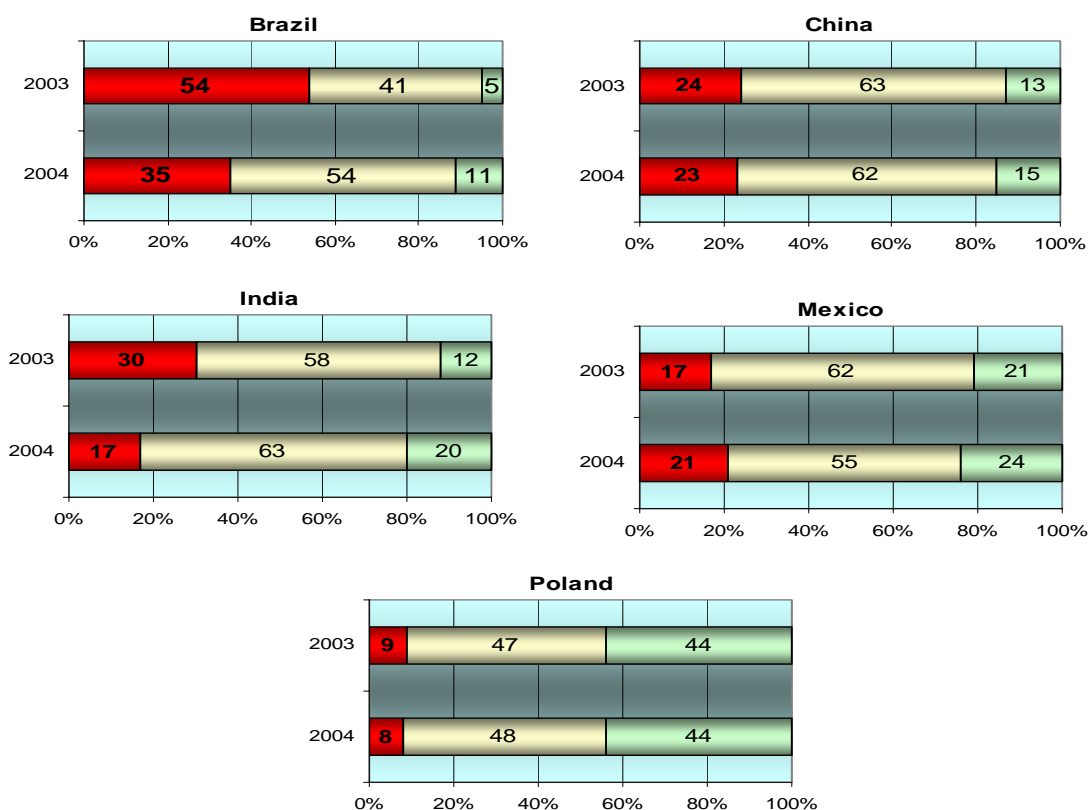


² Some have linked the optimism with regard to China to the fact Asian and Pacific countries such as HK SAR, Australia, Singapore and New Zealand were among the countries with largest jumps in the ranking .

The indicator of risk assessment yielded by the survey is obviously subjective. Nonetheless, the survey results can influence the pricing of Brazilian assets and the appetite of foreign direct investors, and should be reported. It is thus comforting to notice that the share of investors that considered Brazil a country of “high risk” declined from 54% at the beginning of the new administration to 35%.

The relatively high perception of risk, of course, has to be put against the background that Brazil is a well-established democracy that has been a recipient of foreign investment for more than a century without recording any significant events of expropriation or social upheaval.

PROPORTION OF INVESTORS WHO CONSIDER THE COUNTRY A “HIGH”(RED), “MEDIUM” (YELLOW) OR “LOW” (GREEN) RISK



Looking forward, the Brazilian authorities are convinced that the success of their reform agenda, the sturdiness of the country institutions, as well as the absence of major social or political risks in the region will concur to shield the Brazilian economy from capital or other macroeconomic shocks in the period ahead.



BOX 1.

The three indexes composing the GCI are calculated on the basis of both "hard data" and "Survey data." The responses to the Executive Opinion Survey are responses ranging from 1 to 7 (see the chapter at the end of the Report for further information on the Executive Opinion Survey); the hard data were collected from various sources, described in the Technical Notes and Sources at the end of the Report. All of the data used in the calculation of the Growth Competitiveness Index can be found in the data tables section of the Report.

The standard formula for converting each hard data variable to the 1-to-7 scale is:
 $6 \times (\text{country value} - \text{sample minimum}) + 1 (\text{sample maximum} - \text{sample minimum})$

The sample minimum and sample maximum are the lowest and highest values of the overall sample, respectively. In some instances, adjustments were made to account for extreme outliers in the data.

The sample of countries is divided into two groups: the core innovators and the non-core innovators. Core innovators are countries with more than 15 US utility patents registered per million population in 2002; non-core innovators are all other countries. For the core innovators, we place extra emphasis on the role of innovation and technology. The weightings for the core innovators are as follows:

Growth Competitiveness Index for core innovators = (1/2 technology index)
+ (1/4 public institutions index) + (1/4 macroeconomic environment index)

For the non-core innovators, we calculate the Growth Competitiveness Index values as a simple average of the three component indexes:

Growth Competitiveness Index for non-core innovators = (1/3 technology index)
+ (1/3 public institutions index) + (1/3 macroeconomic environment index)

Technology index components

The technology index is calculated for the core and non-core innovators as follows:

technology index for core innovators = (1/2 innovation subindex) + (1/2 information and communication technology subindex)

technology index for non-core innovators = (1/8 innovation subindex) + (3/8 technology transfer subindex)
+ (1/2 information and communication technology subindex)

Innovation subindex

innovation subindex = (1/4 Survey data) + (3/4 hard data)

Innovation Survey questions

3.01 What is your country's position in technology relative to world leaders'?

3.02 Companies in your country are not interested/aggressive in absorbing new technology?

3.06 How much do companies in your country spend on R&D relative to other countries?

3.08 What is the extent of business collaboration in R&D with local universities?

Innovation hard data

3.17 US utility patents granted per million population in 2002

3.18 Gross tertiary enrollment rate in 2000 or most recent available year

Technology transfer subindex

technology transfer subindex = unweighted average of two technology transfer Survey questions

3.03 Is foreign direct investment in your country an important source of new technology?

3.04 Is foreign technology licensing in your country a common means of acquiring new technology?