



# **Emerging Markets Forum**

## Infrastructure Development and Services in Selected Emerging Market and OECD Countries: Key Indicators

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**Discussion Draft**

*Part of the EMF Series of papers on International Capital Flows, Domestic  
Capital Markets and Growth and Development in Emerging Markets Countries*

# 2006 Global Meeting



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By Harpaul Alberto Kohli  
Centennial Group

## Foreword

This report presents comparative key indicators of infrastructure development and services in 12 countries between 1980 and 2005. The basic objective is to present a broad and quick comparison across countries of the coverage, efficiency, and quality of key infrastructure services during the past 30 years.

The comparisons are presented in a series of charts and graphs based on a comprehensive database of economic, social, financial, and sectoral data indicators maintained by the Centennial Group.

## Data Sources

The underlying data used in this report mostly comes from the World Bank's World Development Indicators 2006, except where noted. Some data also comes from the IMF's International Financial Statistics and World Economic Outlook. While the international data used in this report is not always complete and in many cases is at variance with the national data, it remains the best (and the only practical) basis for inter-country comparisons.

## Coverage

The report covers the following:

- **Countries:** The report covers 12 countries, seven low or middle-income countries (Brazil, China, India, Indonesia, Malaysia, Mexico, and Turkey) and five upper middle or high-income countries (Japan, Korea, and Singapore in Asia; Chile in LAC; and Germany in Europe). For illustrative purposes, two of the former—India and Brazil—are compared to both sets of countries. First, to the other five other emerging market economies (EMCs), which are either at a similar stage of development or can be regarded as the major competitors in the global market place. And, then to the second set of countries that can be regarded as the current “best practice” in infrastructure services to whose level all other emerging market countries must ultimately rise in order to become truly competitive in the global economy.
- **Sectors:** Five major infrastructure sectors are covered: i) Energy (Energy overall and Power); ii) Transport (Roads, Civil Aviation, Ports and Railways); iii) Water and Sanitation; iv) Telephony; and v) other Information Technology (Internet and Computers).

- **Indicators:** Where possible, four sets of indicators are provided: i) Absolute Quantities (tons or KW of energy, km of roads, number of passengers, etc.); ii) Per Capita Consumption or Penetration (to see how far apart are the countries in meeting consumer needs); iii) Usage per Unit of GDP (is infrastructure keeping up with economic growth?); and iv) Quality and Efficiency Indicators (are the consumers and the economy being well served by the service providers?).
- **Private Participation:** Finally, the report presents available data on private financing of infrastructure in four specific infrastructure sectors. But, the data is limited and no clear trends can be derived from it, except that private flows are very volatile both at country and sector level. This data must be used with caution.

It is not the purpose of this report to present any conclusions. Instead, it is meant only to present some data comparable across countries to stimulate further analysis and discussion. Accordingly, after this foreword, no further commentary is offered in the report.

Still two main messages stand out even from this limited exercise. First, relative to the “best practice countries”, despite recent progress, most low and middle-income EMCs still have a long way to go (with the exception of China in some sectors). Yet, the countries must adopt these “best practice standards” as the long-term goal, at least in areas like transport, power, and communications that are critical to global competitiveness. And second, most countries need to both invest much more in infrastructure and very significantly improve the quality and efficiency of the services.

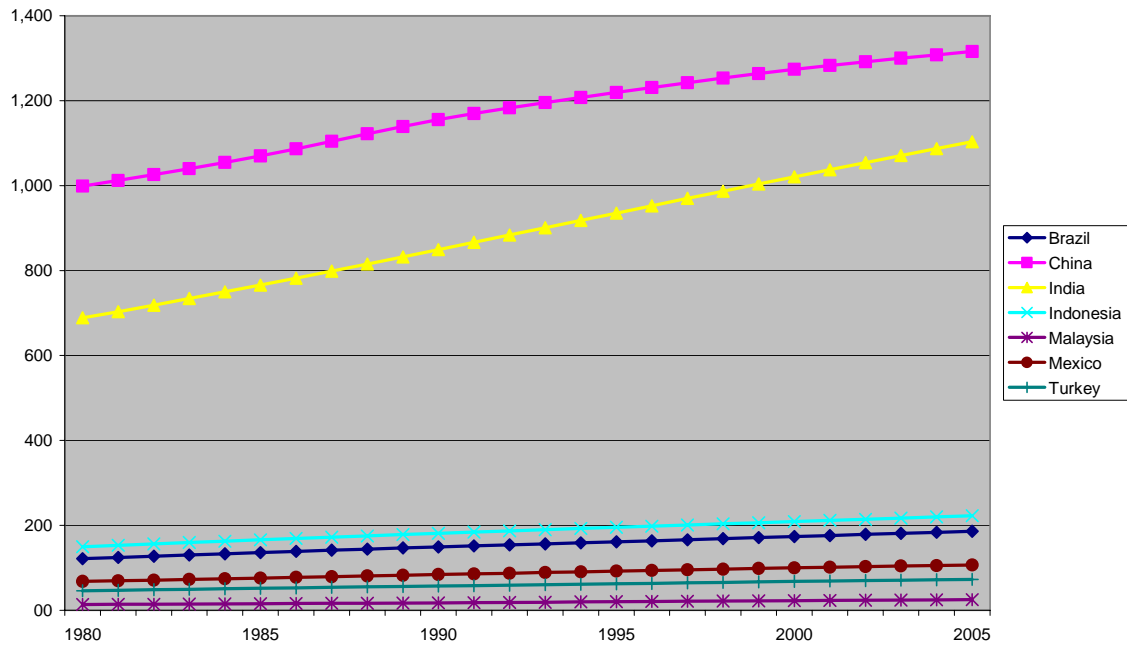
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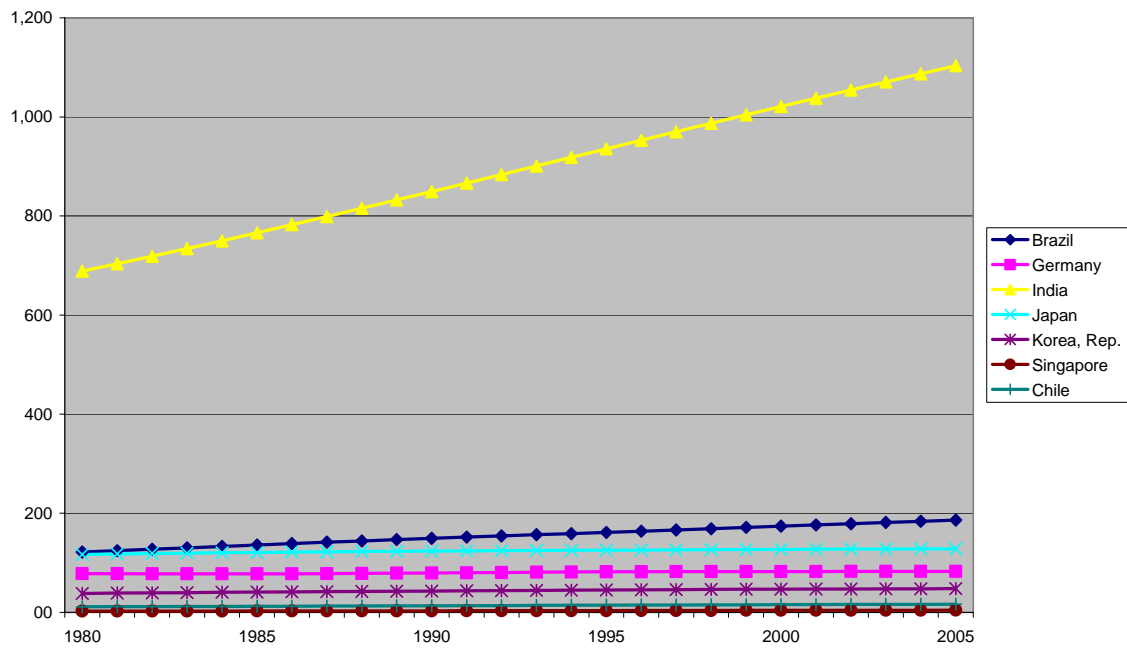
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## **A. Basic Economic Data**

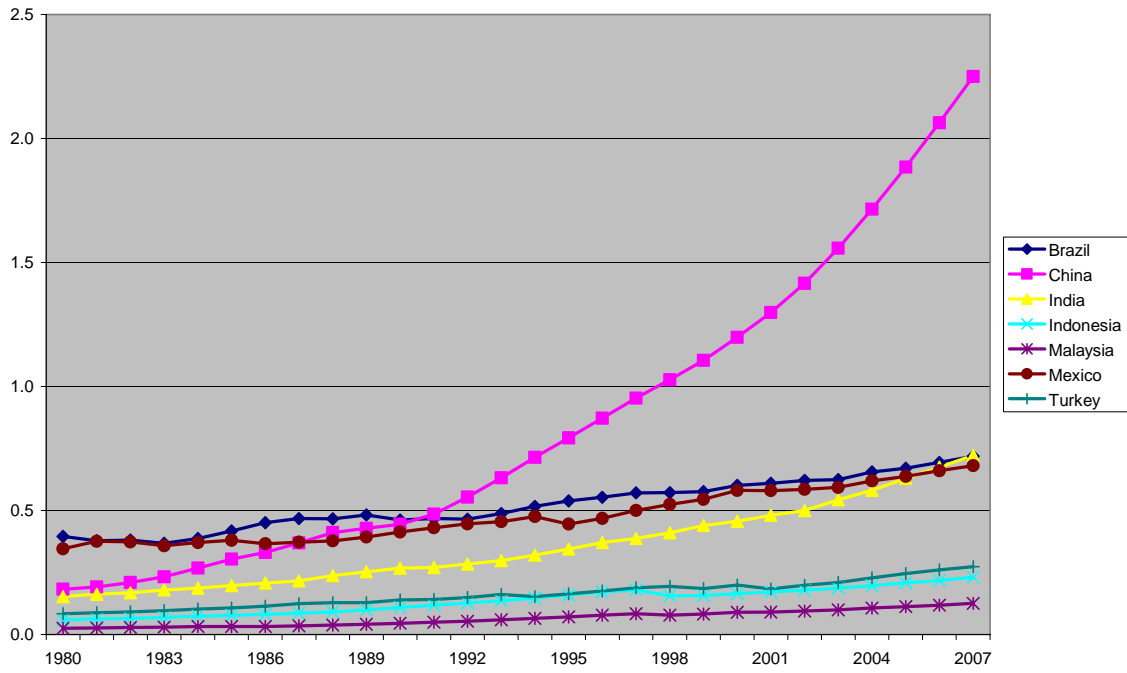
**Population (millions)**  
 Source: IMF's International Financial Statistics



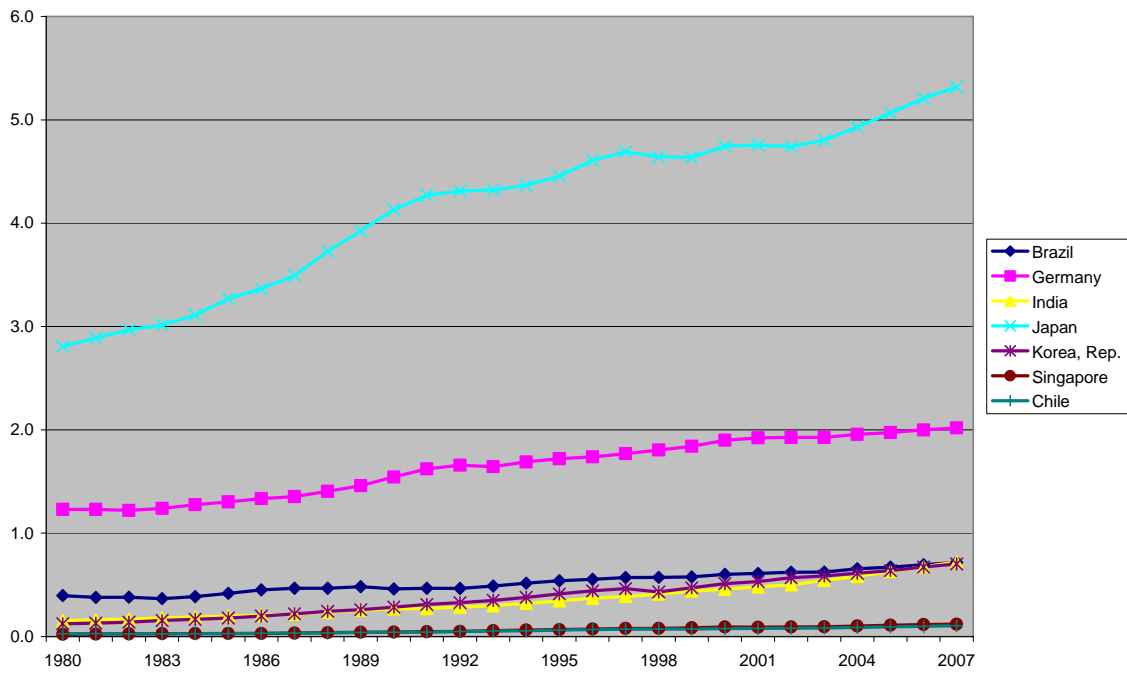
**Population (millions)**  
 Source: The IMF's International Financial Statistics



GDP (trillion constant 2000 US\$)

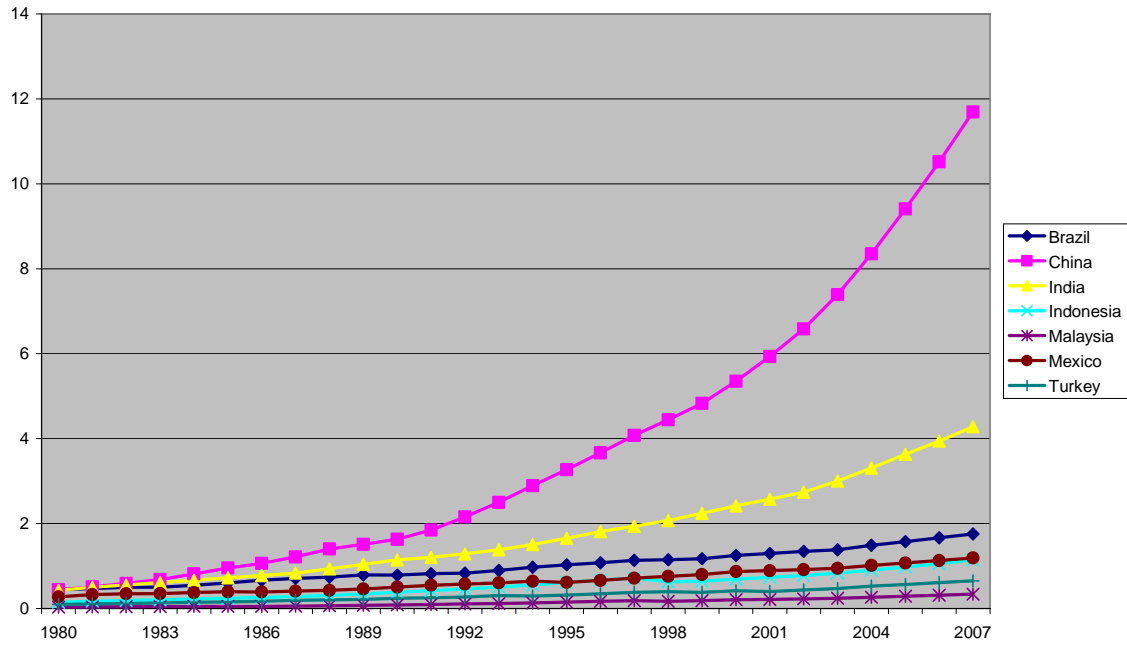


GDP (trillion constant 2000 US\$)

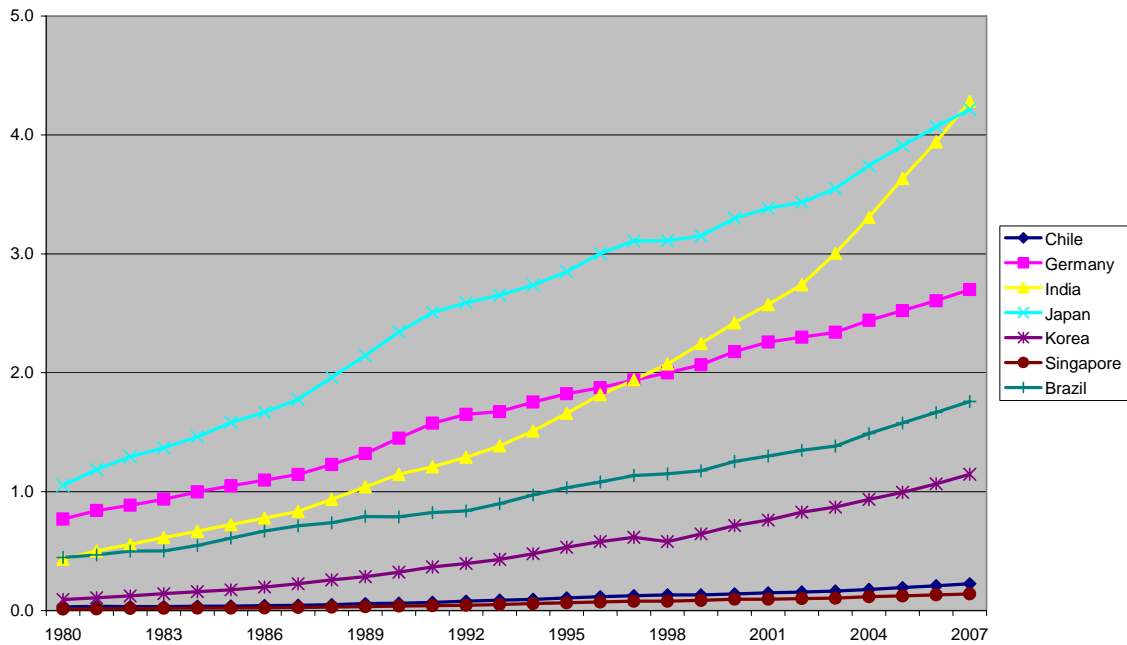




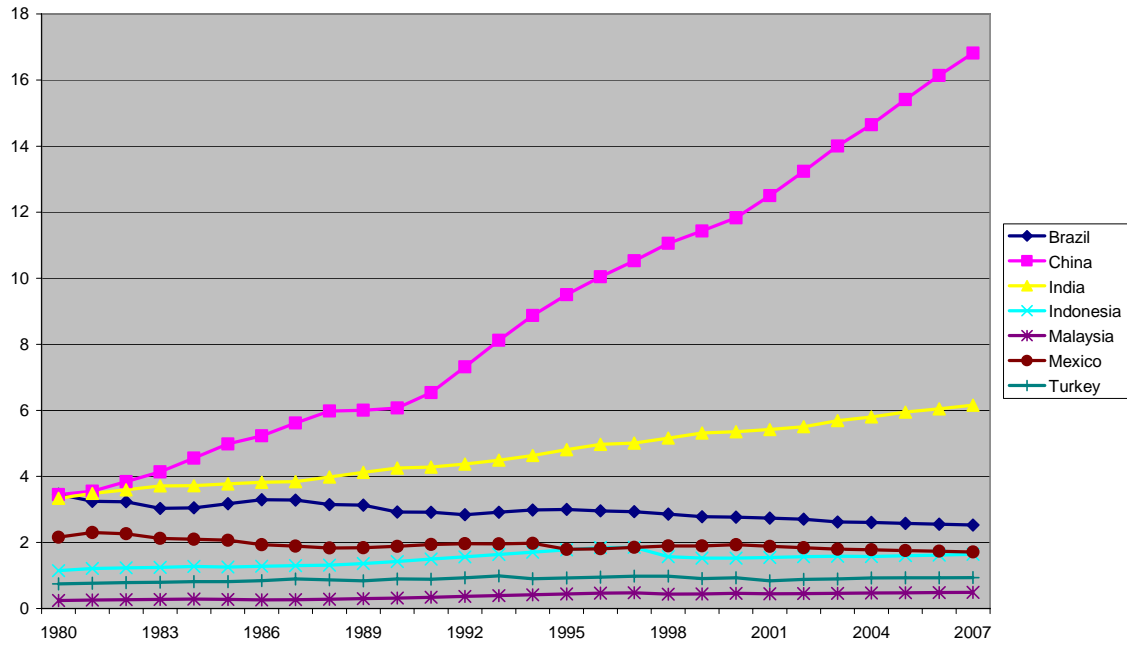
**GDP PPP (trillion current \$)**  
Source: IMF's WEO



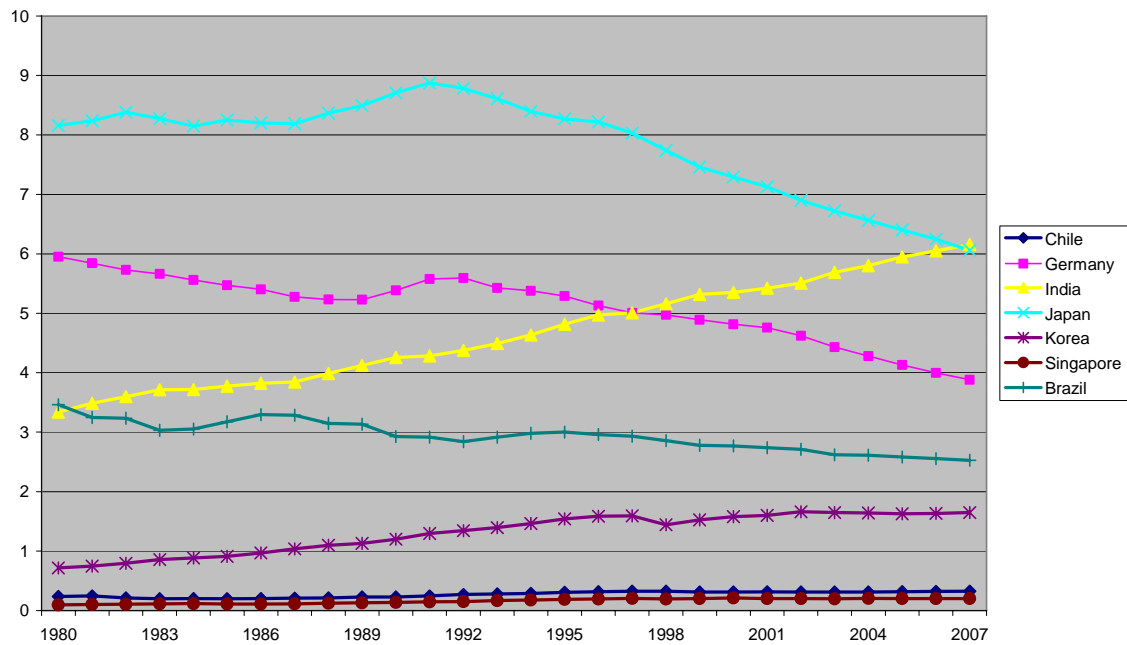
**GDP PPP (trillion current \$)**  
Source: IMF's WEO



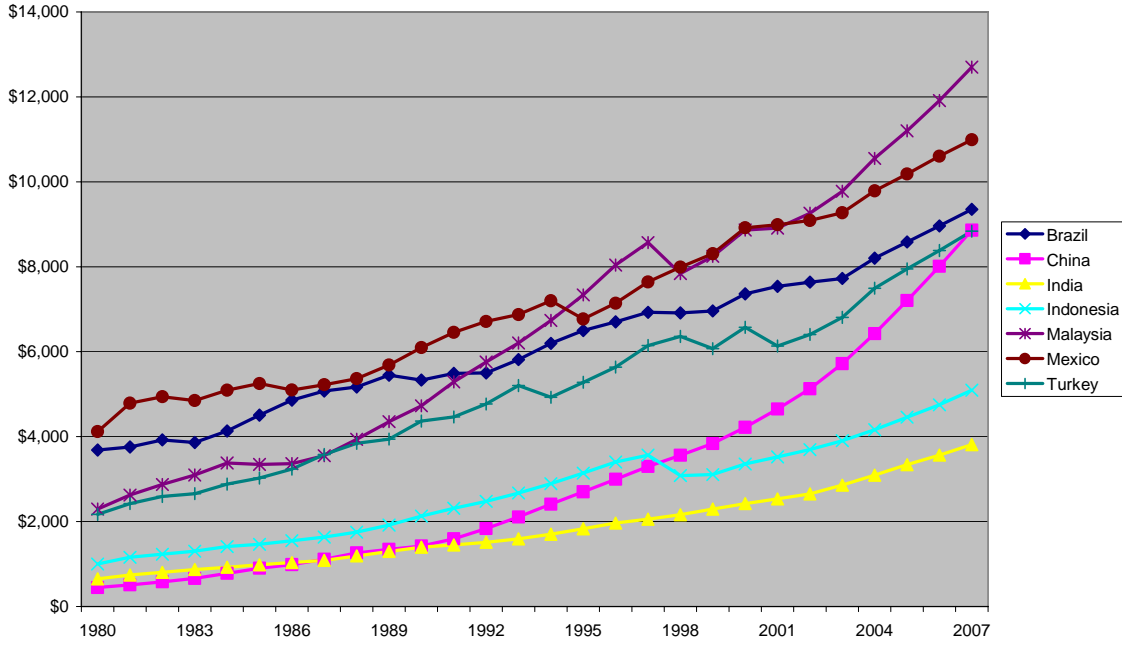
**GDP PPP Share of World Total (%)**  
Source: IMF's WEO



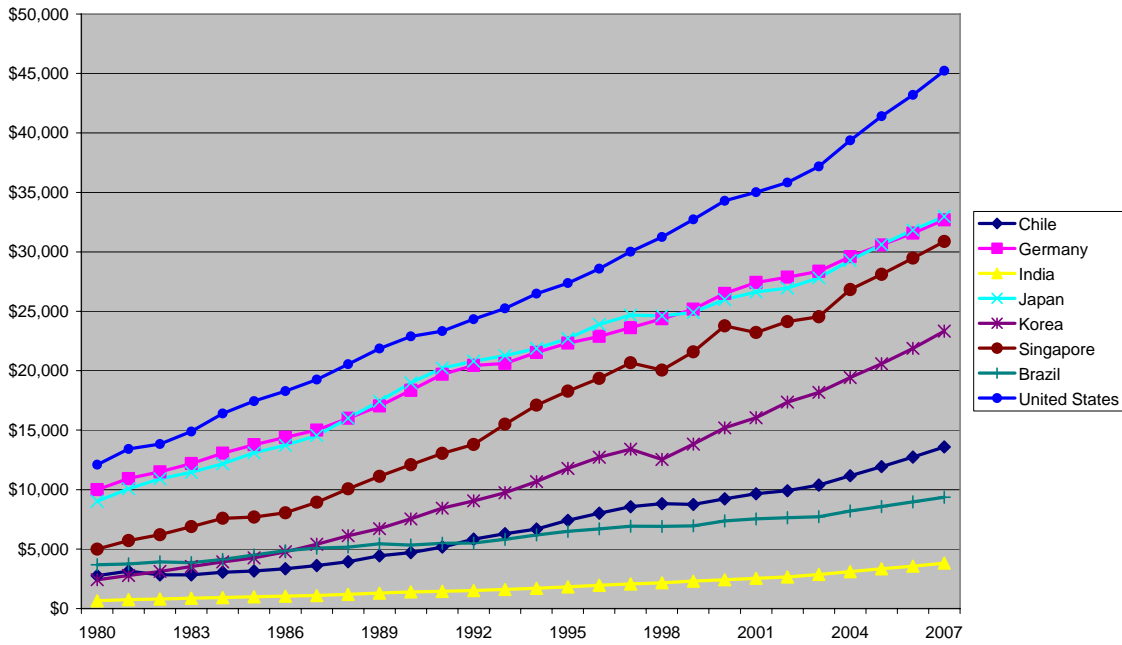
**GDP PPP Share of World Total (%)**  
Source: IMF's WEO



**GDP PPP per capita (\$)**  
Source: IMF's WEO



**GDP PPP per capita (\$)**  
Source: IMF's WEO



**B. Key Infrastructure Indicators  
For Selected EMCs  
(Tables)**

2003-2004	Brazil	China	India	Indonesia	Malaysia	Mexico	Turkey
<b>ENERGY (2003)</b>							
Energy production (mt of oil equivalent)	171	1,381	453	250	84	243	24
Energy imports, net (% of commercial energy use)	11.43	2.02	18.11	-54.72	-47.98	-51.63	70.06
Energy use (kg oil equivalent per capita)	1065.3	1093.9	519.9	752.54	2318.4	1563.5	1116.6
Energy use per PPP GDP (kg oil eq. per const 2000 PPP \$)	0.14	0.21	0.19	0.24	0.24	0.18	0.17
Energy use per GDP (kg oil eq. per const 2000 \$)	0.29	0.94	1.02	0.96	0.54	0.27	0.37
GDP per unit of energy use (const 2000 PPP \$ per kg oil eq.)	6.85	4.53	5.25	4.26	3.88	5.61	5.97
Electricity production (billion kwh)	365	1,907	633	113	78	219	141
Electricity prod. from oil sources (% of total)	2.96	3.01	4.59	24.93	4.34	32.37	6.54
Electricity prod. from nuclear sources (% of total)	3.66	2.27	2.80			4.80	
Electric power consumption (kwh per capita)	1882.8	1378.5	435.31	440.11	3060.5	1801.5	1656
Electric power cons per GDP (kwh per const 2000 GDP)	0.55	1.14	0.85	0.50	0.75	0.31	0.56
Electric power trans & distrib. losses (% of output)	17.31	7.11	26.21	16.16	5.55	14.56	18.49
Electricity (% managers deeming major constraint)	20.3	29.7	28.9	22.3	14.8		17.3
Pump price for super gasoline (US\$ per liter)	0.84	0.48	0.87	0.27	0.37	0.59	1.44
<b>TRANSPORT (2004)</b>							
Aircraft departures (thousands)	486	1,216	302	319	171	333	110
Air transport, freight (million ton-km)	1499.5	8188.2	689.43	434.14	2599.2	402.59	369.42
Air transp., freight per GDP (ton-km per thous const 2000 \$)	2.3	4.8	1.2	2.2	24.3	0.6	1.6
Air transport, passengers carried (mn)	35	120	24	27	19	21	13
Air transp., pass. per GDP (per mn const 2000 \$)	53.8	69.8	40.9	135.8	180.4	34.3	54.6
Roads, total network (thousand km)	1,725	1,810	3,315	368	72	349	354
Roads, paved (% of total roads)	5.5	79.48	62.6	58.0	77.9	33.5	41.6
Rail lines (thousand total route-km)	30	61	63	6	2	27	9
Railways, goods hauled (billion ton-km)		1,509	333	4	1		7
Railways, gds hauled per GDP (ton-km per thous const 2000 \$)		1,097	613	27	11		34
Railways, passengers carried (bn passenger-km)	1	551	541	16	2	2	5
Railways, pass. per GDP (pass.-km per thous const 2000 \$)		321	931		18		23
Container port traffic (mn TEU)	5	75	4	6	11	2	3
Container port traffic per GDP (TEU per mn const 2000 \$)	7.7	43.5	7.3	28.2	105.5	3.1	12.8
Average time to clear customs (days)	13.76	7.88	6.69	5.78	3.65		6.4
<b>INFORMATION TECHNOLOGY (2004)</b>							
Fixed line & mobile subscr. (per 1,000 people)	587.2	499.4	84.5	183.8	765.6	544.6	750.5
Fixed line & mobile subscr. per GDP (per mn const 2000 \$)	164.8	377.4	157.0	202.8	178.5	91.2	234.8
Telephone mainlines (per 1,000 people)	230.4	241.1	40.7	45.9	178.6	174.1	266.6
Telephone mainlines per GDP (per mn const 2000 \$)	64.7	182.2	75.6	50.7	41.6	29.2	83.4
Mobile phones (per 1,000 people)	357	258	44	138	587	370	484
Mobile phones per GDP (per mn const 2000 \$)	100	195	81	152	137	62	151
Av. cost of local phone call (US\$ per 3 min.)		0.03	0.02	0.03	0.02		0.14
Av. cost of phone call to US (US\$ per 3 min.)	0.70	2.89	1.19	2.78	0.71		2.08
Telephone faults (per 100 mainlines)	1.6		126.0	20.0	40.0	1.7	30.4
Personal computers (per 1,000 people)	105.2	40.9	12.1	13.9	196.8	108.0	51.6
Personal comp. per GDP (per mn const 2000 \$)	29.5	30.9	22.4	15.3	45.9	18.1	16.1
Internet users (per 1,000 people)	120	73	32	67	397	135	142
Internet total monthly price (\$ per 20 hours of use)	27.99	10.14	8.74	22.26	8.42	22.63	19.83

	Brazil	China	India	Indonesia	Malaysia	Mexico	Turkey
<b><u>WATER AND SANITATION (2002)</u></b>							
Improved water source (% of pop. w/ access)	89	77	86	78	95	91	93
Improved water src, urban (% of urban pop. w/ access)	96	92	96	89	96	97	96
Improved water src, rural (% of rural pop. w/ access)	58	68	82	69	94	72	87
Improved sanitation facilities (% of pop. w/ access)	75	44	30	52		77	83
Improved sanit. fac., urban (% of urban pop. w/ access)	83	69	58	71		90	94
Improved sanit. fac., rural (% of rural pop. w/ access)	35	29	18	38	98	39	62
<b><u>GDP AND POPULATION (2004)</u></b>							
Population, total (mn)	184	1,296	1,080	218	25	104	72
GDP (bn current US\$)	461	1,271	510	173	95	648	184
GDP (bn constant 2000 US\$)	655	1,715	581	197	107	619	229
GDP, PPP (bn current international \$)	1,357	5,829	2,804	673	223	908	445
GDP, PPP (bn constant 2000 intl \$)	1,385	7,024	3,115	722	235	935	511

Source: The World Bank's World Development Indicators

Energy data are for 2003, except gasoline price, which is 2004, Energy use per GDP and per PPP GDP, which is 2002, and % managers ranking electricity as a constraint data for Turkey (2002) & for Indonesia (2004).

Most transport data are for 2004. However, data is for 2002 for roads total network (save China & Mexico (2003), Malaysia (2001), and Brazil (2000)), paved roads (save Brazil (2000), China (2003), Malaysia (2001), & Mexico 2003), and Brazil & Mexico rail lines. Indonesia rail lines is for 2003;

Also for 2002 are data for China, India, and Turkey Rail goods hauled; and China, rail passengers carried. For time to clear customs, Turkey is for 2005, Indonesia is for 2004, and Brazil, China, India, & Malaysia are for 2003. For rail passengers, Indonesia is 1998, Mexico is 1996, and Brazil is 1994.

Information Technology data are for 2004, except internet monthly price and cost of local call which are for 2003. For cost of call to US, Brazil's is 2003, & Turkey's is 2002. For telephone faults, Mexico's & Turkey's are 2003, India's & Malaysia's are 2002, & Indonesia's is 2001.

Water and Sanitation data are for 2002.

GDP and Population data are for 2004.

1990	Brazil	China	India	Indonesia	Malaysia	Mexico	Turkey
<b>ENERGY</b>							
Energy production (mt of oil equivalent)	98	903	334	161	49	194	26
Energy imports, net (% of commercial energy use)	26.89	-2.58	8.57	-70.09	-116.99	-56.76	51.21
Energy use (kg oil equivalent per capita)	902.49	775.13	430.1	532.09	1233.7	1490.6	943.92
Energy use per PPP GDP (kg oil eq. per const 2000 PPP \$)	0.13	0.48	0.25	0.23	0.22	0.19	0.17
Energy use per GDP (kg oil eq. per const 2000 \$)	0.27	2.11	1.35	0.94	0.49	0.29	0.36
GDP per unit of energy use (const 2000 PPP \$ per kg oil eq.)	7.17	2.05	3.95	4.26	4.46	5.05	5.57
Electricity production (billion kwh)	223	621	289	33	23	123	58
Electricity prod. from oil sources (% of total)	2.51	7.88	4.33	42.71	55.91	57.34	6.85
Electricity prod. from nuclear sources (% of total)	1.00		2.12			2.39	
Electric power consumption (kwh per capita)	1424.9	424.36	249.22	151.99	1095.1	1203.9	800.51
Electric power cons per GDP (kwh per const 2000 GDP)	0.46	1.17	0.79	0.27	0.44	0.24	0.32
Private investment in energy (mn current US\$)							68
Private investment in telecoms (mn current US\$)					870	2,198	
Private investment in transport (mn current US\$)		173	02	116		4,603	
Electric power trans & distrib. losses (% of output)	14.22	6.89	19.85	13.72	9.00	12.22	11.61
<b>TRANSPORT</b>							
Aircraft departures (thousands)	416	196	126	205	131	177	44
Air transport, freight (million ton-km)	1082	818.29	662.9	458.6	574.2	143.2	101.3
Air transp., freight per GDP (ton-km per thous const 2000 \$)	2.3	2.0	2.5	4.6	12.6	0.3	0.7
Air transport, passengers carried (mn)	19	17	11	9	10	14	4
Air transp., pass. per GDP (per mn const 2000 \$)	41.5	40.2	40.5	92.8	225.3	34.6	30.9
Roads, total network (thousand km)	1,670	1,181	2,000	289	86	239	367
Roads, paved (% of total roads)	9.7			45.1	70.0	35.1	
<b>INFORMATION TECHNOLOGY</b>							
Fixed line & mobile subscr. (per 1,000 people)	65.0	5.9	6.0	6.0	94.2	65.6	122.1
Fixed line & mobile subscr. per GDP (per mn const 2000 \$)	20.8	16.3	19.0	10.8	37.7	13.2	48.9
Telephone mainlines (per 1,000 people)	65.0	5.9	6.0	5.9	89.3	64.8	121.5
Telephone mainlines per GDP (per mn const 2000 \$)	20.8	16.3	19.0	10.7	35.7	13.0	48.7
Telephone mainlines, waiting list (thousands)	428	689	1,961	389	82	1,111	1,419
Mobile phones (per 1,000 people)	0.005	0.01	0	0.10	4.87	0.77	0.56
Mobile phones per GDP (per mn const 2000 \$)	0.00	0.03	0	0.18	1.95	0.15	0.22
Av. cost of local phone call (US\$ per 3 min.)			0.04	0.05	0.04	0.10	0.06
Telephone faults (per 100 mainlines)	4.7		222.0	71.0	76.0	13.5	32.3
Personal computers (per 1,000 people)	3.1	0.4	0.3	1.1	8.4	8.2	5.3
Personal comp. per GDP (per mn const 2000 \$)	1.0	1.2	1.0	2.0	3.4	1.7	2.1
<b>WATER AND SANITATION</b>							
Improved water source (% of pop. w/ access)	83	70	68	71		80	81
Improved water src, urban (% of urban pop. w/ access)	93	100	88	92	96	90	92
Improved water src, rural (% of rural pop. w/ access)	55	59	61	62		54	65
Improved sanitation facilities (% of pop. w/ access)	70	23	12	46	96	66	84
Improved sanit. fac., urban (% of urban pop. w/ access)	82	64	43	66	94	84	96
Improved sanit. fac., rural (% of rural pop. w/ access)	37	7	1	38	98	20	67
<b>GDP AND POPULATION</b>							
Population, total (mn)	148	1,135	850	178	18	83	56
GDP (bn constant 2000 US\$)	461	413	268	99	45	414	140
GDP, PPP (bn constant 2000 intl \$)	958	1,813	1,445	404	100	627	296

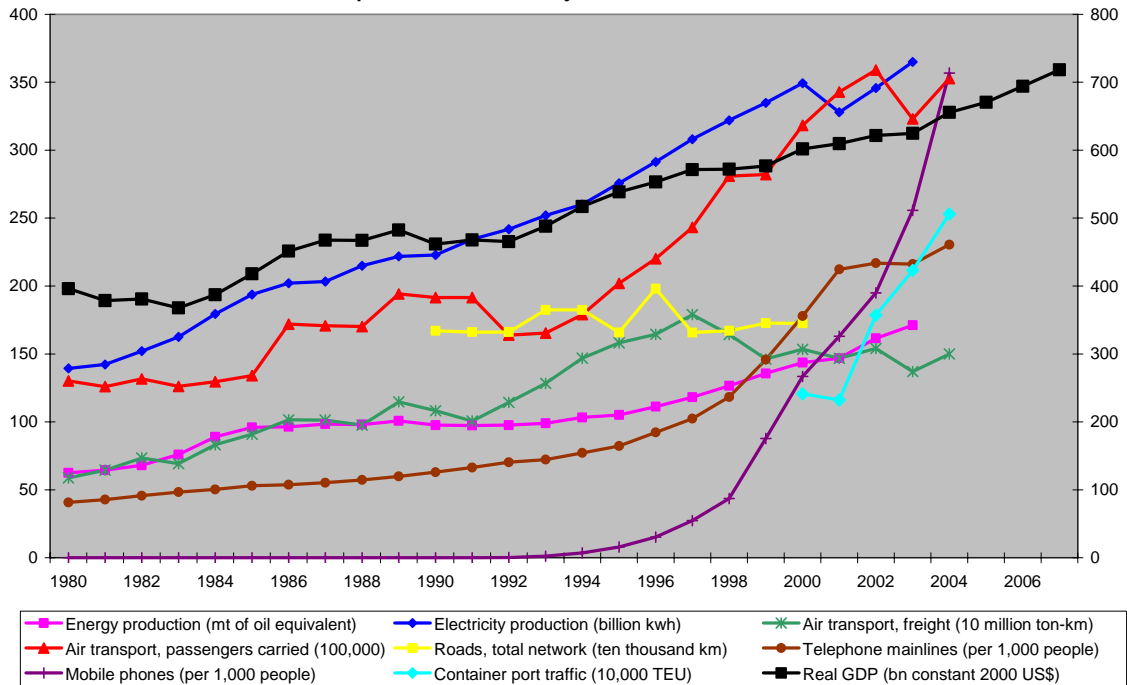
1980	Brazil	China	India	Indonesia	Malaysia	Mexico	Turkey
<b>ENERGY</b>							
Energy production (mt of oil equivalent)	63	615	218	125	18	148	17
Energy imports, net (% of commercial energy use)	44.06	-2.83	10.32	-123.48	-49.66	-51.88	45.61
Energy use (kg oil equivalent per capita)	920.02	609.96	353.6	377.28	883.67	1439.2	708.38
Energy use per PPP GDP (kg oil eq. per const 2000 PPP \$)	0.13	0.80	0.30	0.25	0.21	0.18	0.17
Energy use per GDP (kg oil eq. per const 2000 \$)	0.27	3.52	1.59	1.01	0.46	0.27	0.36
GDP per unit of energy use (const 2000 PPP \$ per kg oil eq.)	7.38	1.24	3.33	3.87	4.57	5.39	5.62
Electricity production (billion kwh)	139	301	119	8	10	67	23
Electricity prod. from oil sources (% of total)	3.75	25.80	8.38	72.00	84.88	57.93	25.05
Electricity prod. from nuclear sources (% of total)			2.51				
Electric power consumption (kwh per capita)	974.65	252.95	130.25	42.05	630.82	845.83	439.32
Electric power cons per GDP (kwh per const 2000 GDP)	0.30	1.46	0.59	0.12	0.34	0.17	0.23
Electric power trans & distrib. losses (% of output)	11.81	8.07	18.27	18.43	9.00	11.15	12.13
<b>TRANSPORT</b>							
Aircraft departures (thousands)	233	51	100	125	89	177	19
Air transport, freight (million ton-km)	588.2	120.9	366	121.9	109.9	131.5	10.3
Air transp., freight per GDP (ton-km per thous const 2000 \$)	1.5	0.7	2.4	2.3	4.3	0.4	0.1
Air transport, passengers carried (mn)	13	3	7	5	5	13	1
Air transp., pass. per GDP (per mn const 2000 \$)	32.9	15.1	43.3	94.5	177.5	37.2	14.9
<b>INFORMATION TECHNOLOGY</b>							
Fixed line & mobile subscr. (per 1,000 people)	40.8	2.2	3.1	2.5	28.7	40.3	25.7
Fixed line & mobile subscr. per GDP (per mn const 2000 \$)	12.5	12.6	14.1	6.9	15.5	7.9	13.5
Telephone mainlines (per 1,000 people)	40.8	2.2	3.1	2.5	28.7	40.3	25.7
Telephone mainlines per GDP (per mn const 2000 \$)	12.5	12.6	14.1	6.9	15.5	7.9	13.5
Telephone mainlines, waiting list (thousands)		164	447	44	144	409	1,627
Mobile phones (per 1,000 people)	0	0	0	0	0	0	0
Mobile phones per GDP (per mn const 2000 \$)	0	0	0	0	0	0	0
<b>GDP AND POPULATION</b>							
Population, total (mn)	122	981	687	148	14	68	44
GDP (current US\$)	2E+11	2E+11	2E+11	8E+10	2E+10	2E+11	7E+10
GDP (bn constant 2000 US\$)	396	170	153	54	25	346	84
GDP, PPP (current international \$)	446	404	437	117	30	283	96
GDP, PPP (bn constant 2000 intl \$)	827	748	810	217	56	524	177



**C. Key Infrastructure Indicators  
For  
Individual EMCs**

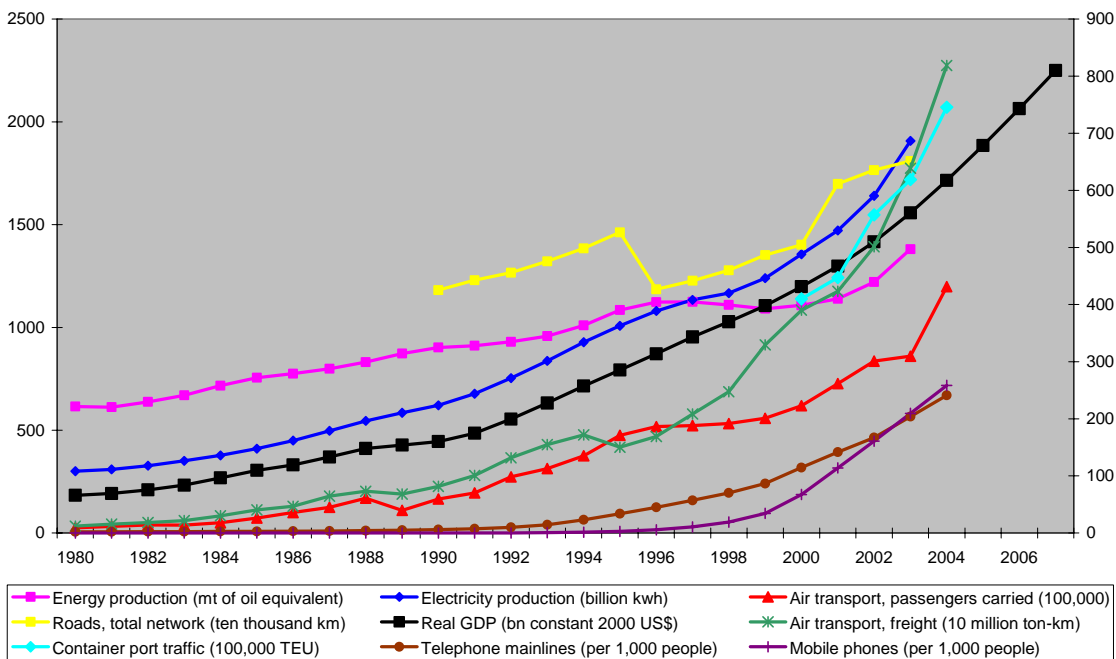
### Brazil Key Infrastructure Indicators

Source: World Development Indicators. Projections also use World Economic Outlook.



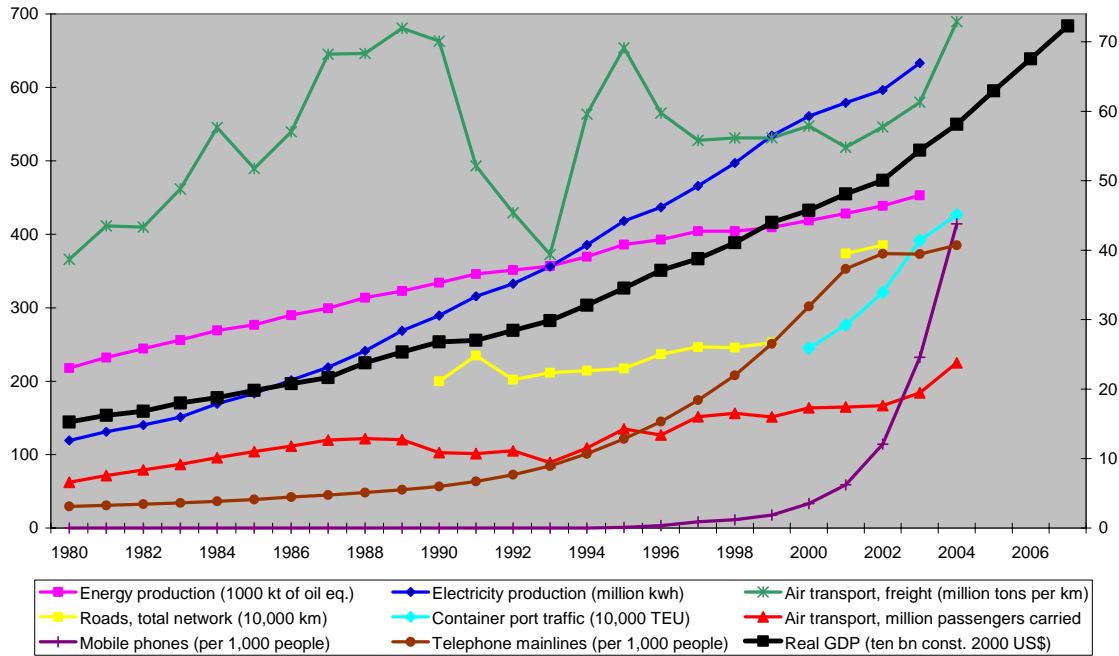
### China Key Infrastructure Indicators

Source: World Development Indicators. Projections also use World Economic Outlook.



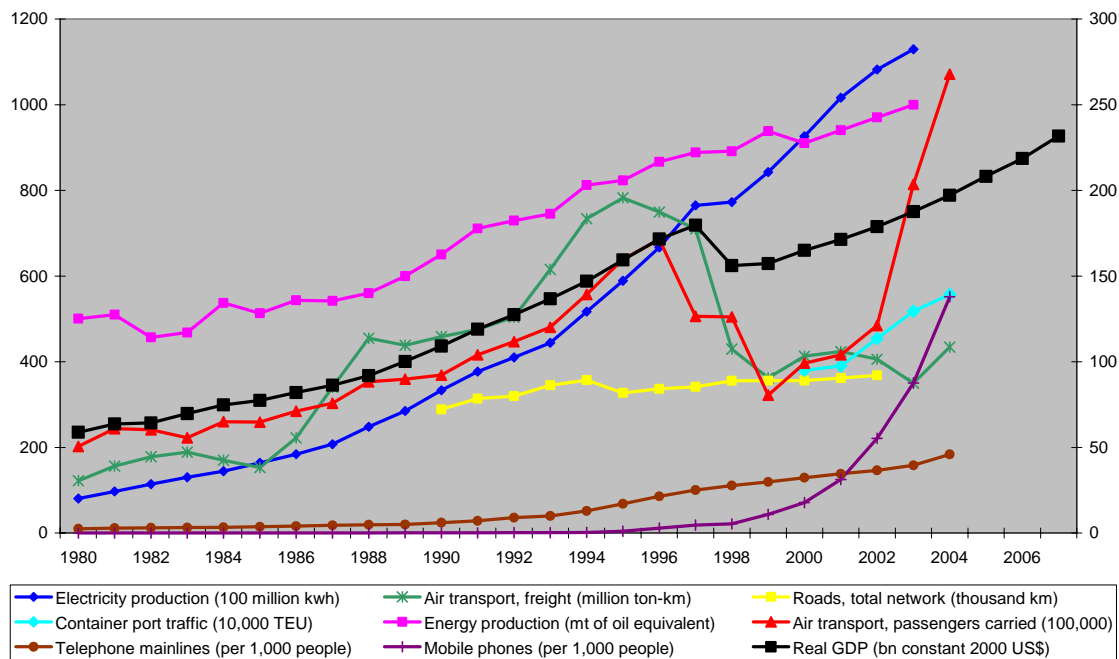
### India Key Infrastructure Indicators

Source: World Development Indicators. Projections also use World Economic Outlook.



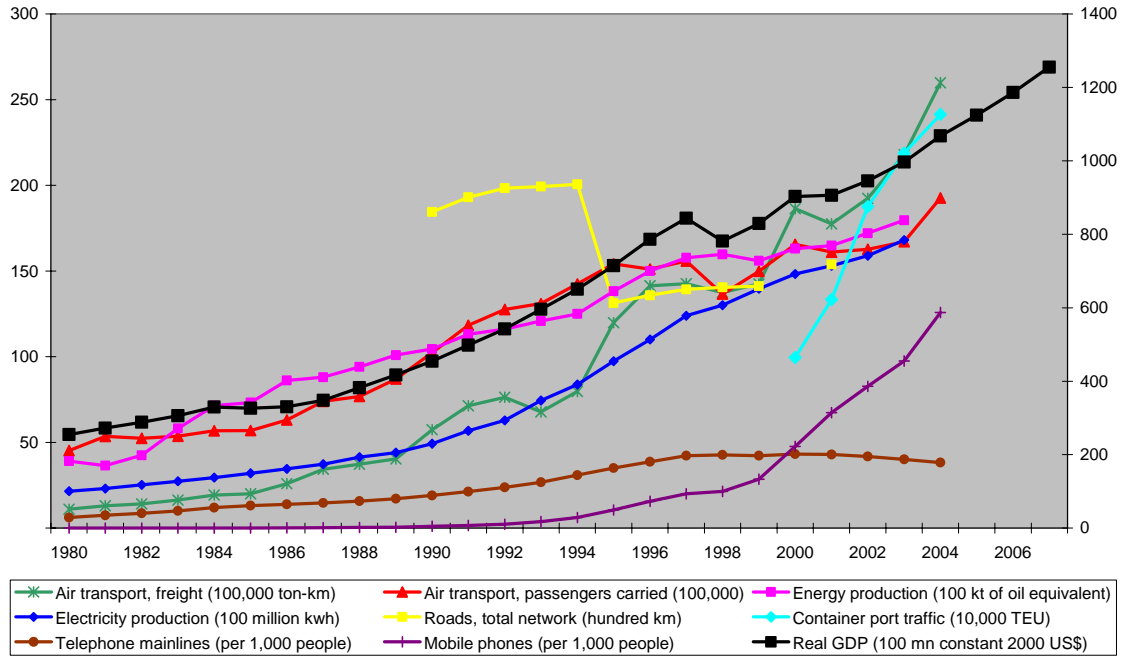
### Indonesia Key Infrastructure Indicators

Source: World Development Indicators. Projections also use World Economic Outlook.



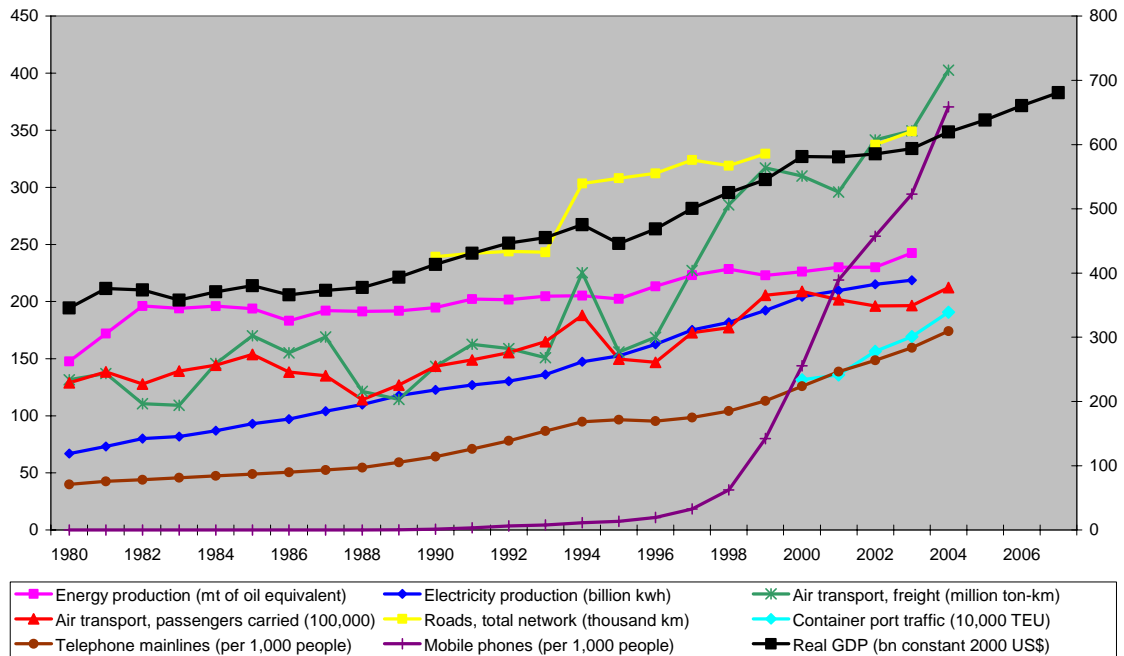
### Malaysia Key Infrastructure Indicators

Source: World Development Indicators. Projections also use World Economic Outlook.



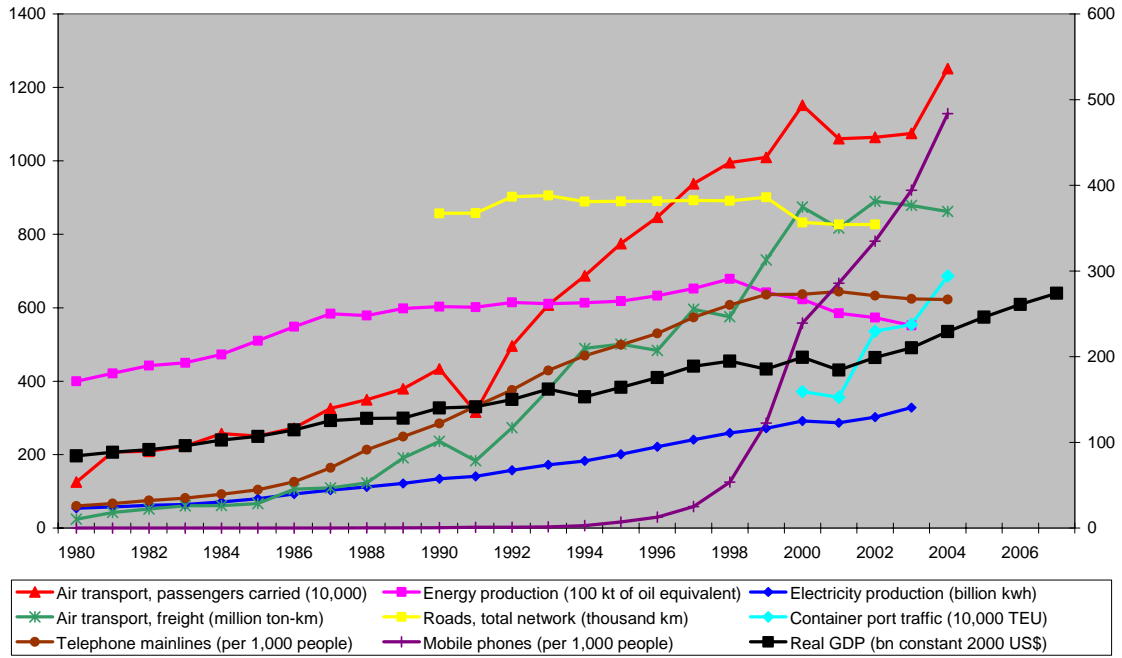
### Mexico Key Infrastructure Indicators

Source: World Development Indicators. Projections also use World Economic Outlook.



## Turkey Key Infrastructure Indicators

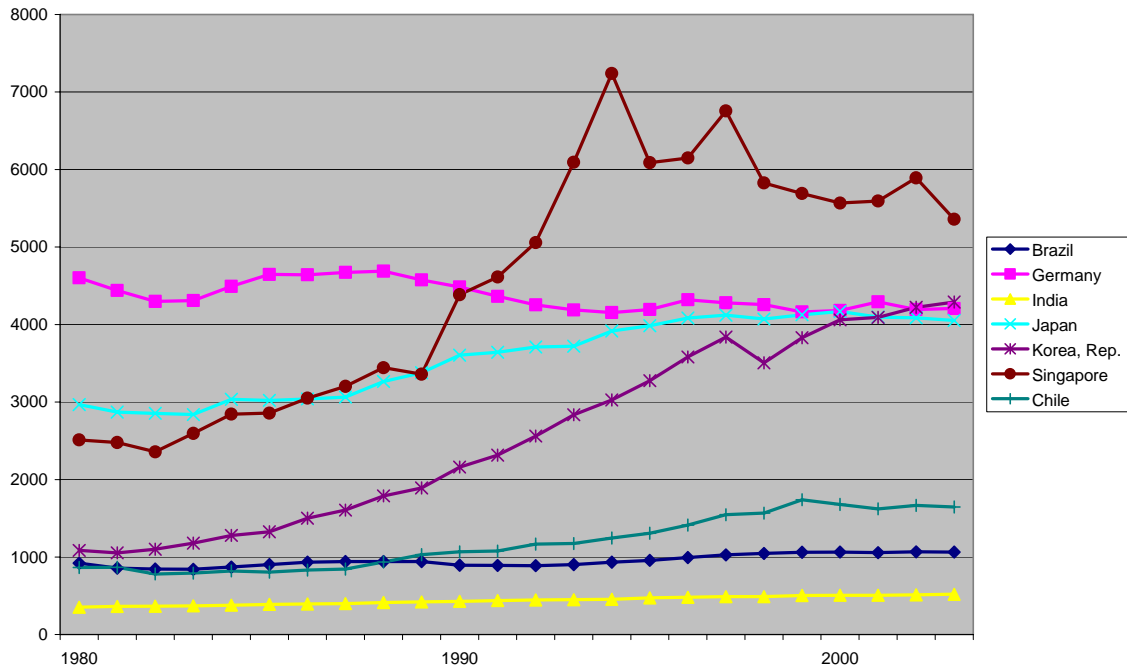
Source: World Development Indicators. Projections also use World Economic Outlook.



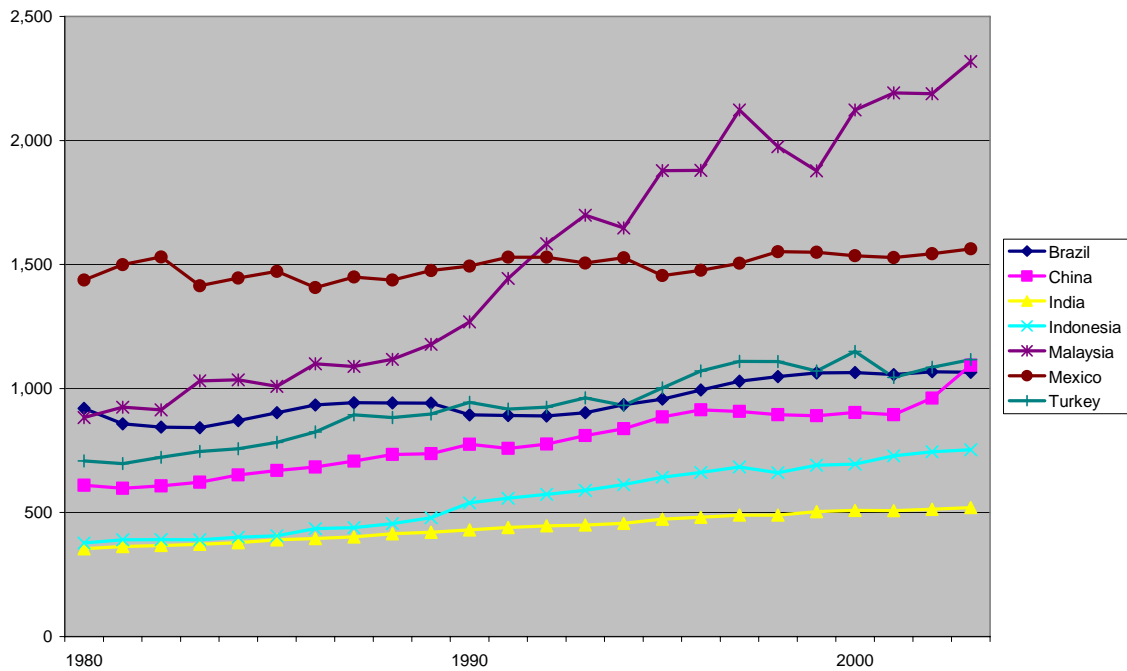
**D. Comparison of Key Indicators  
For  
Selected EMCs and OECD Countries**

## **1. Energy**

Energy use (kg of oil equivalent per capita)

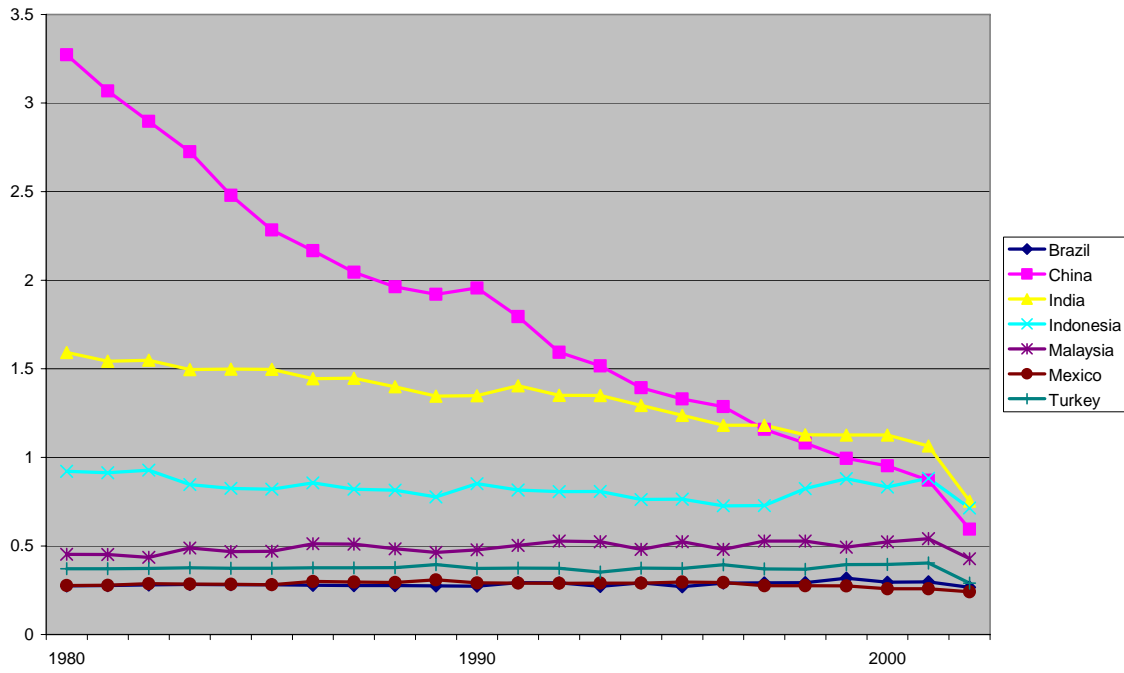


Energy use (kg of oil equivalent per capita)

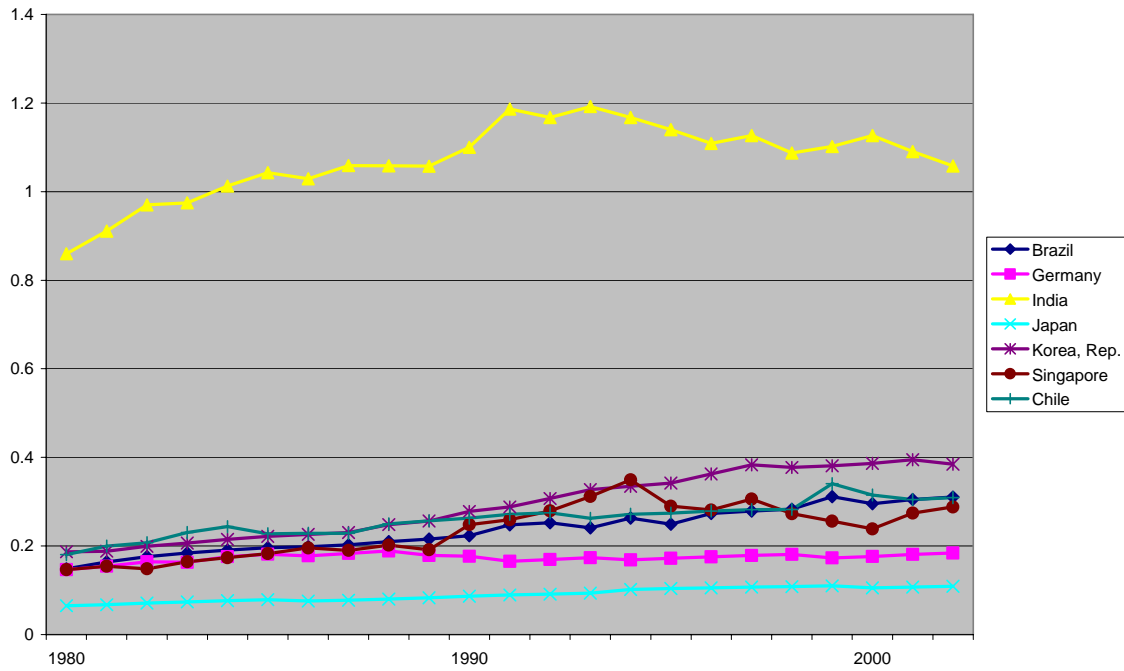




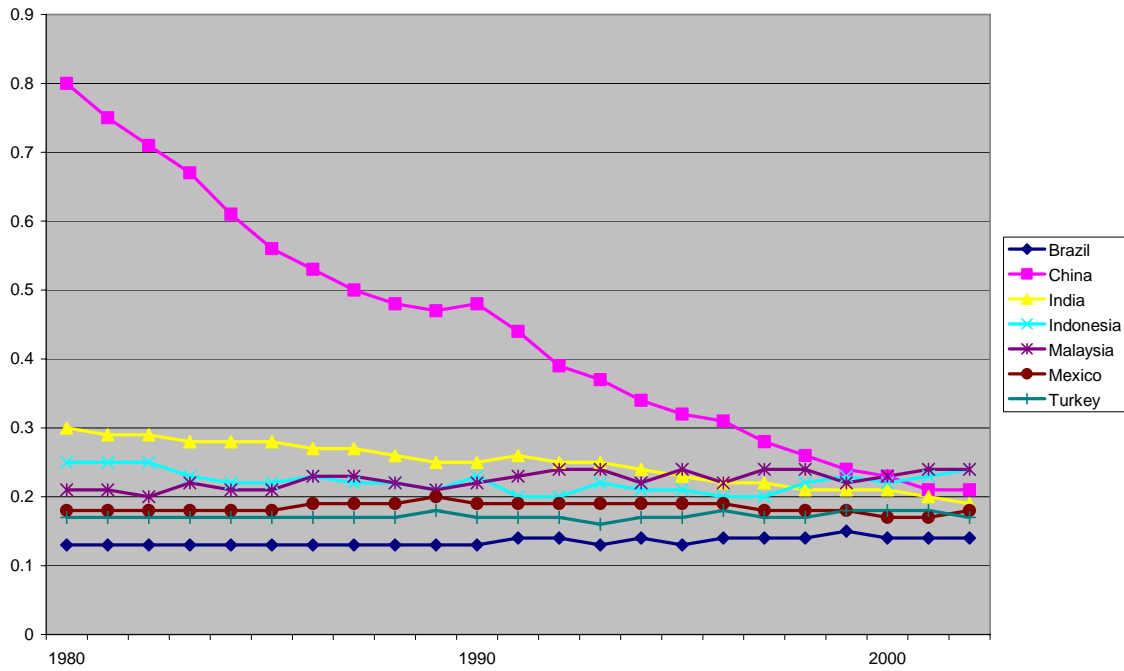
Energy use per GDP (kg of oil equivalent per constant 2000 \$)



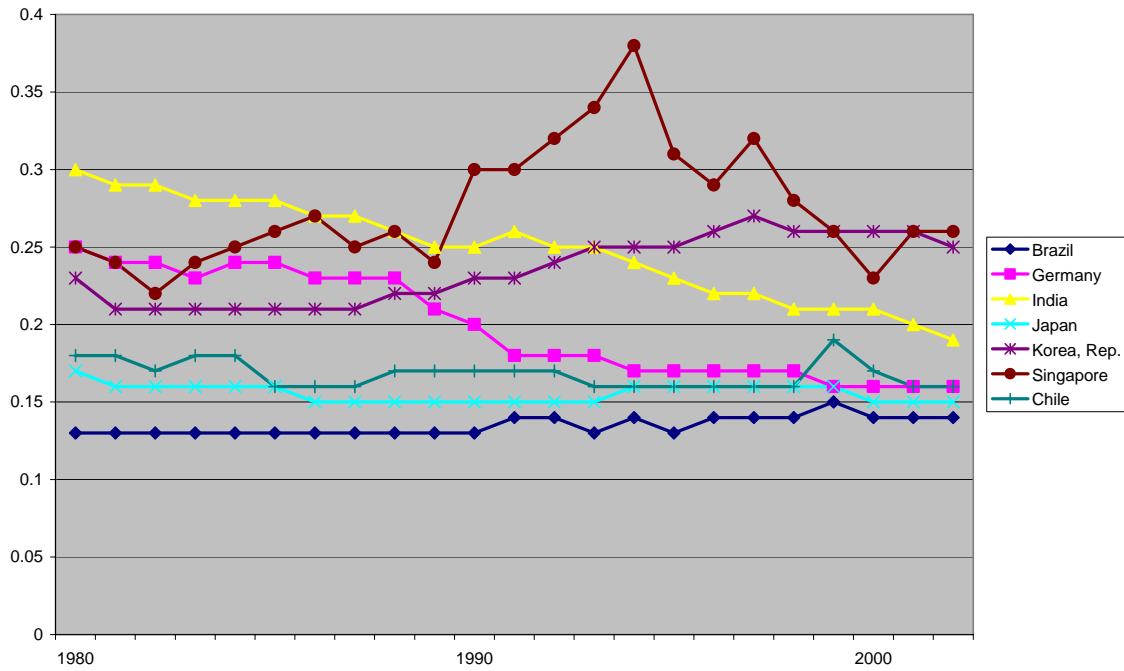
Energy use per GDP (kg of oil equiv. per const. 2000 \$)



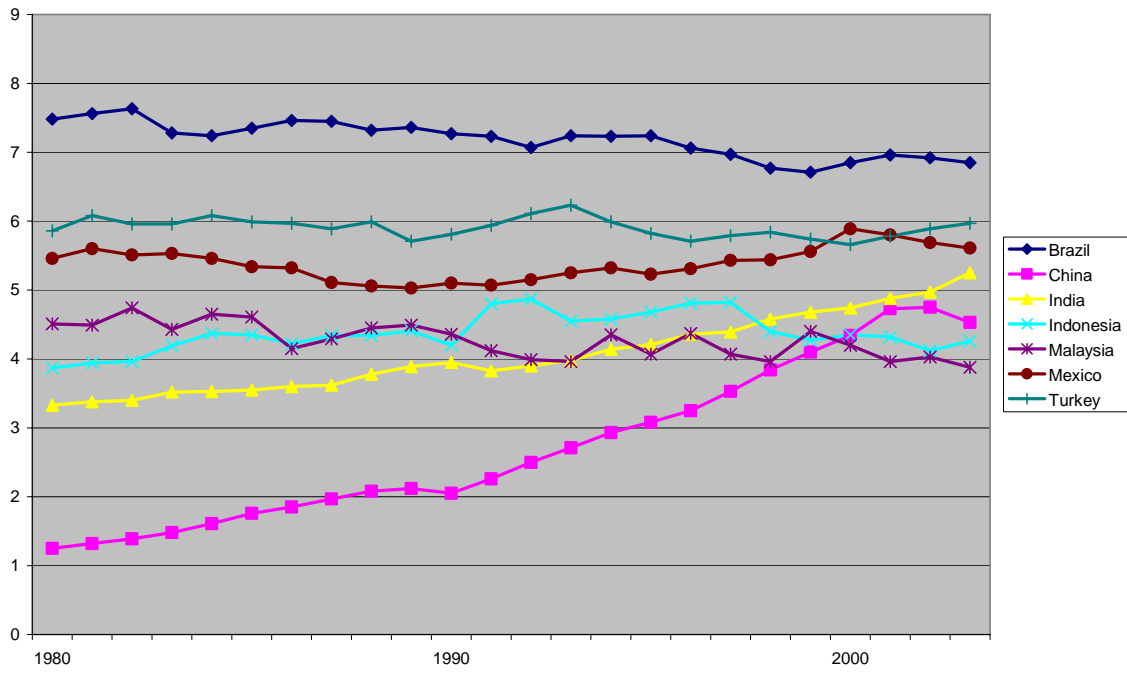
Energy use per PPP GDP (kg of oil equivalent per const. 2000 PPP \$)



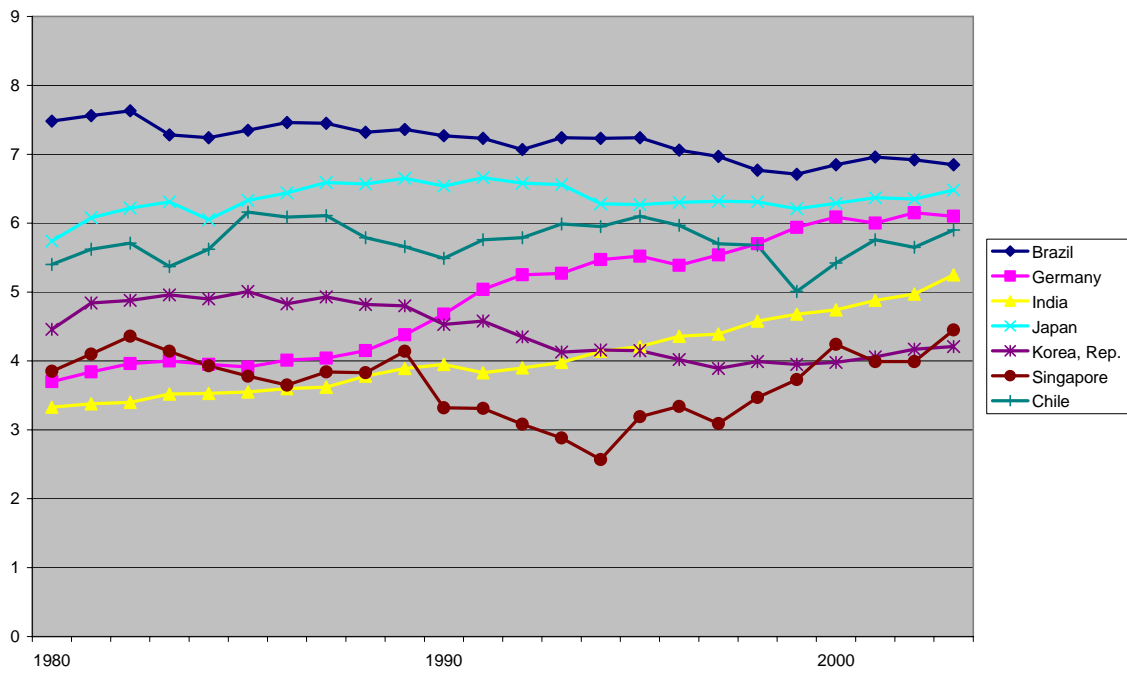
Energy use per PPP GDP (kg of oil equivalent per const. 2000 PPP \$)



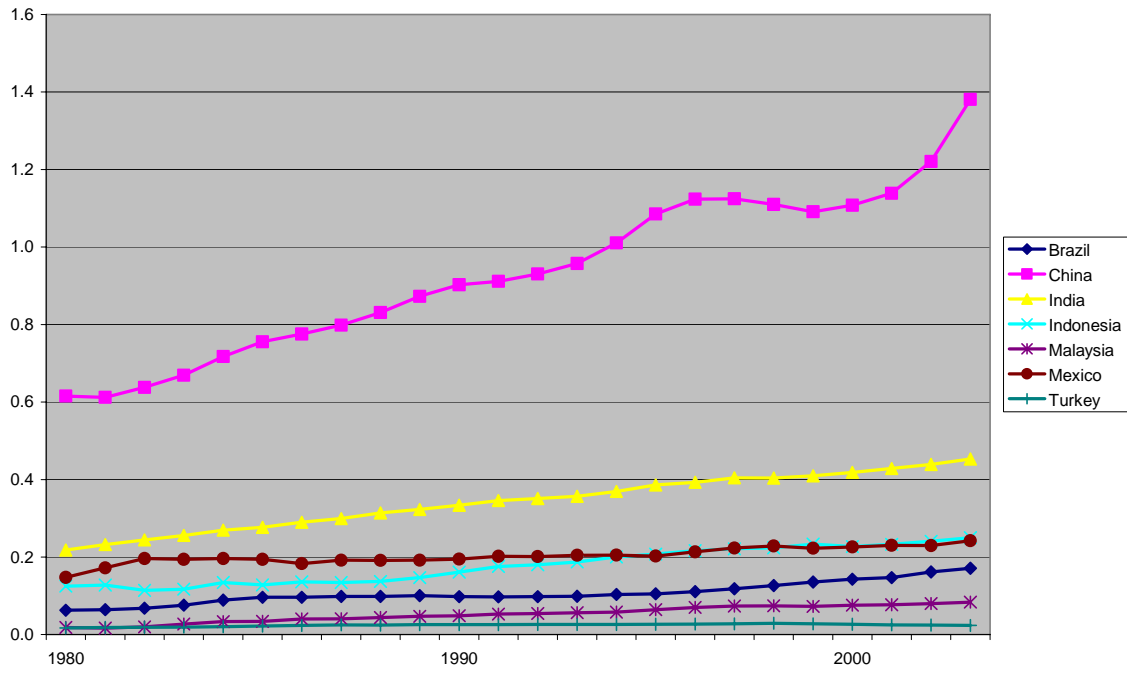
GDP PPP per unit of energy use (const. 2000 PPP \$ per kg of oil eq.)



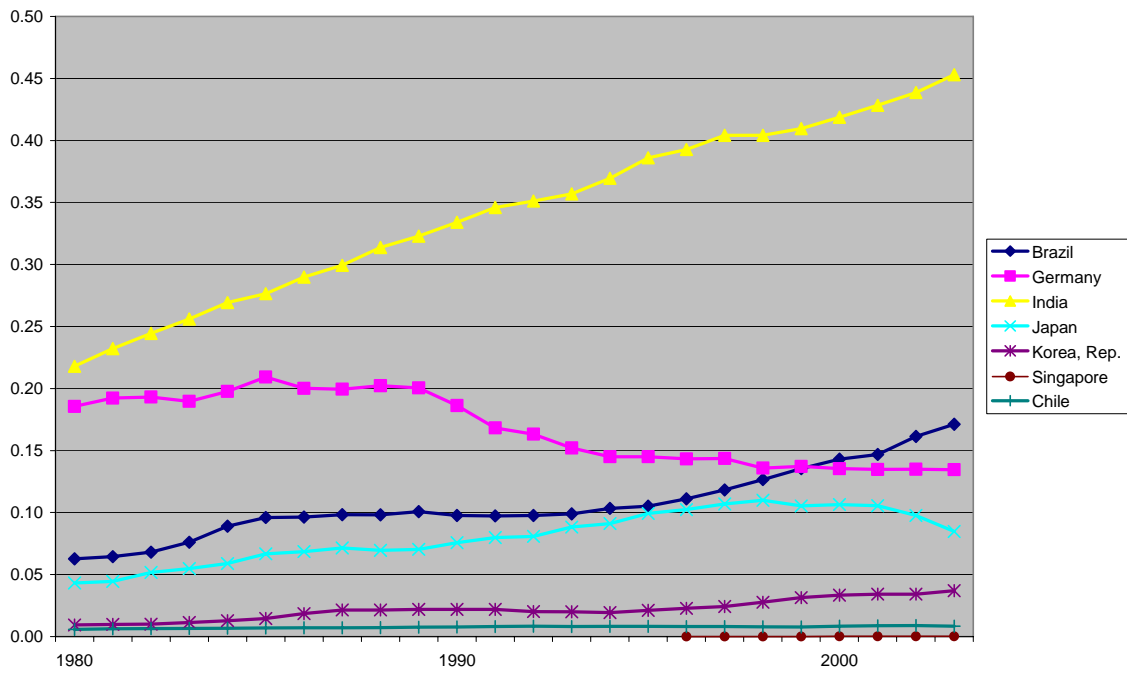
GDP PPP per unit of energy use (const. 2000 PPP \$ per kg of oil eq.)



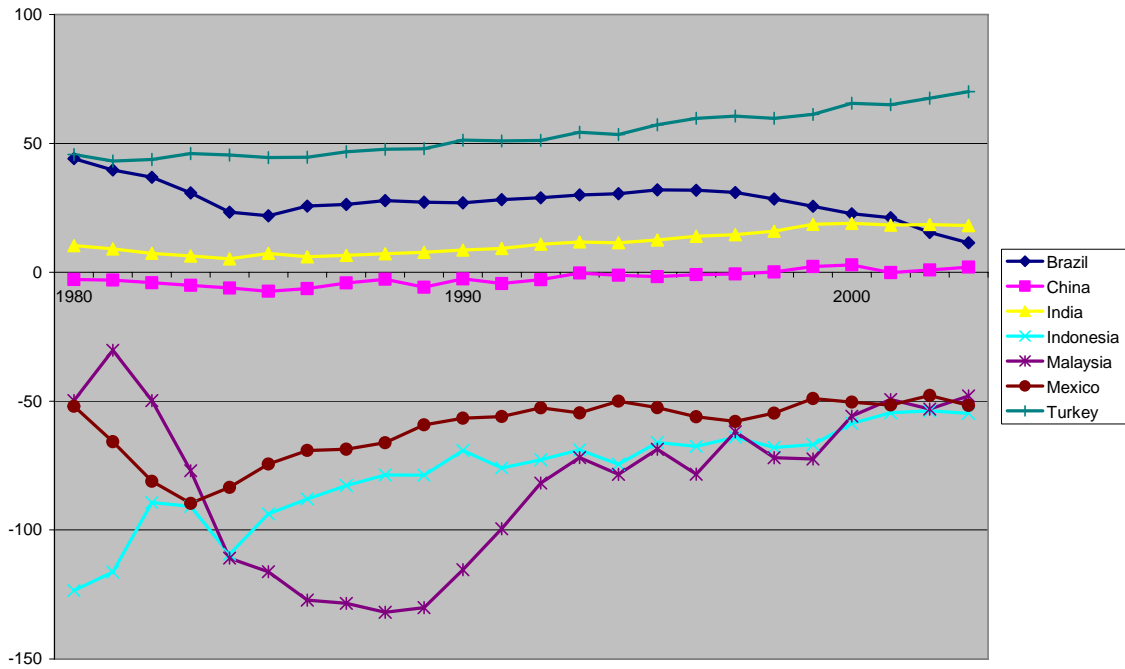
Energy production (mn kt of oil equivalent)



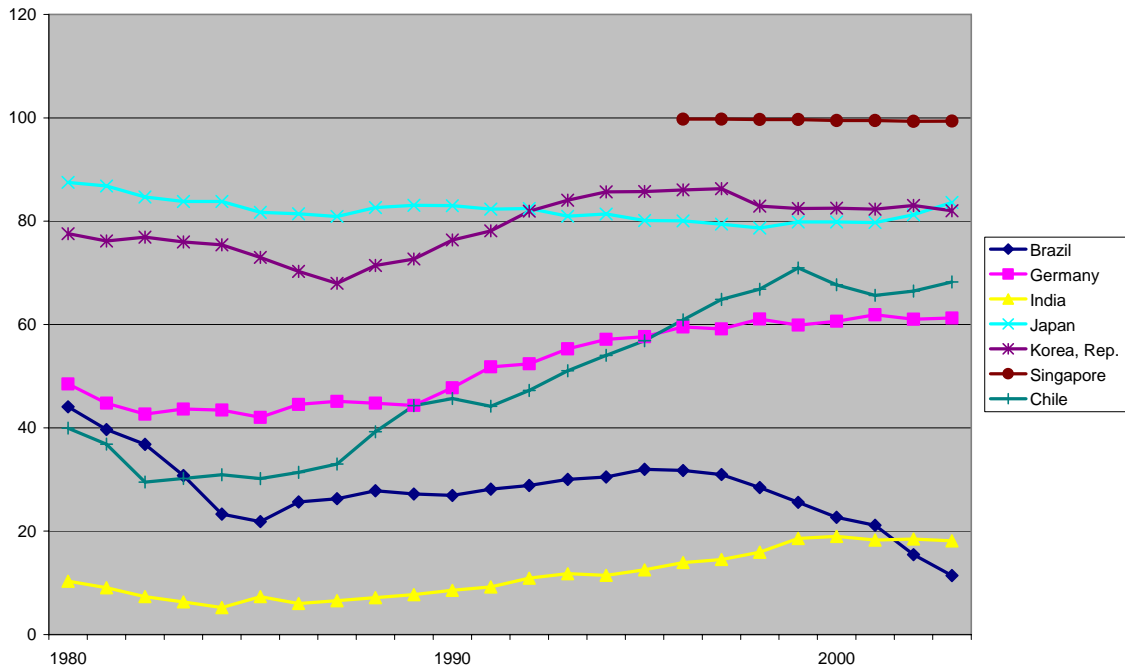
Energy Production (mn kt of oil equiv.)



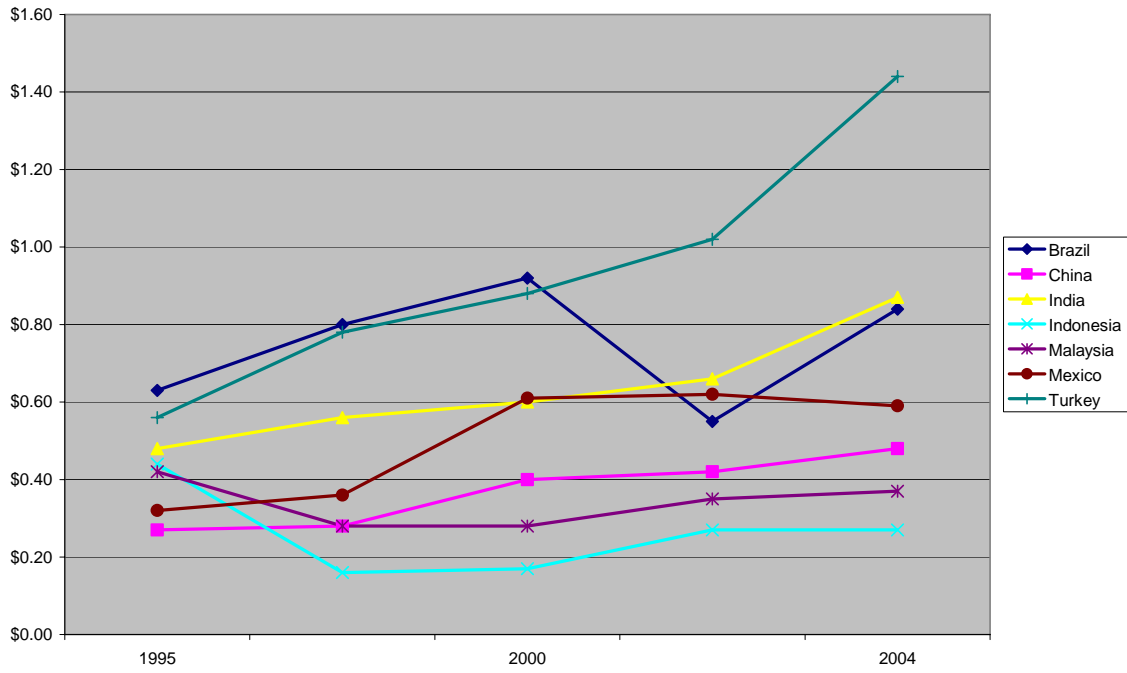
Energy imports, net (% of commercial energy use)



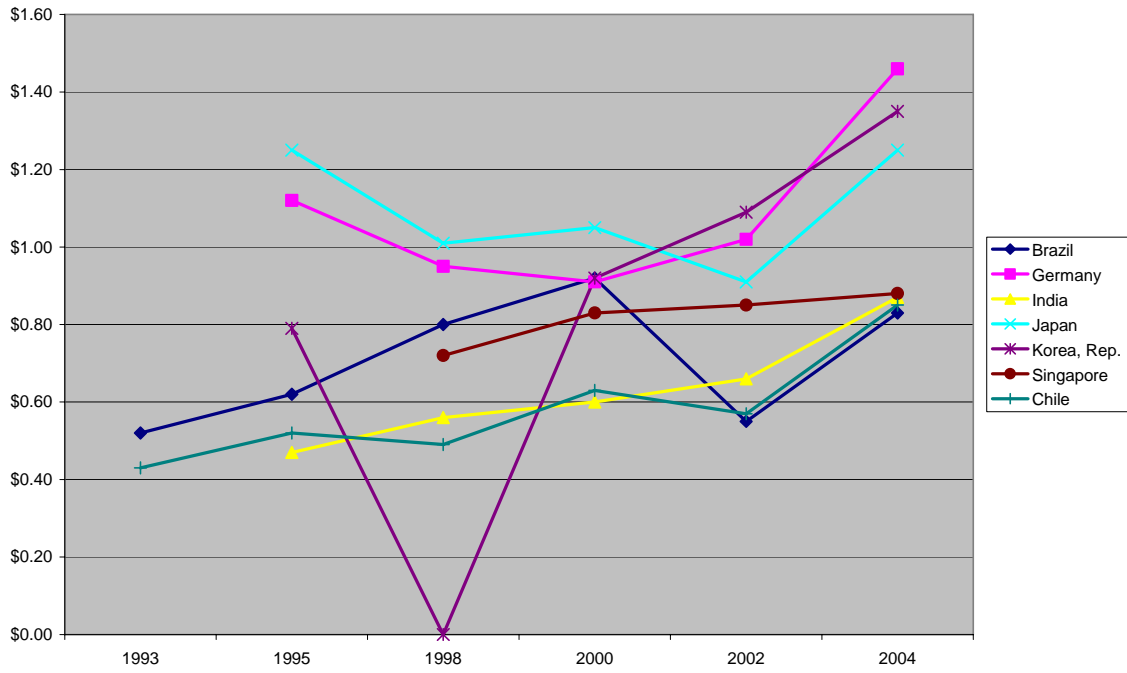
Energy imports, net (% of commercial energy use)



Pump price for super gasoline (US\$ per liter)

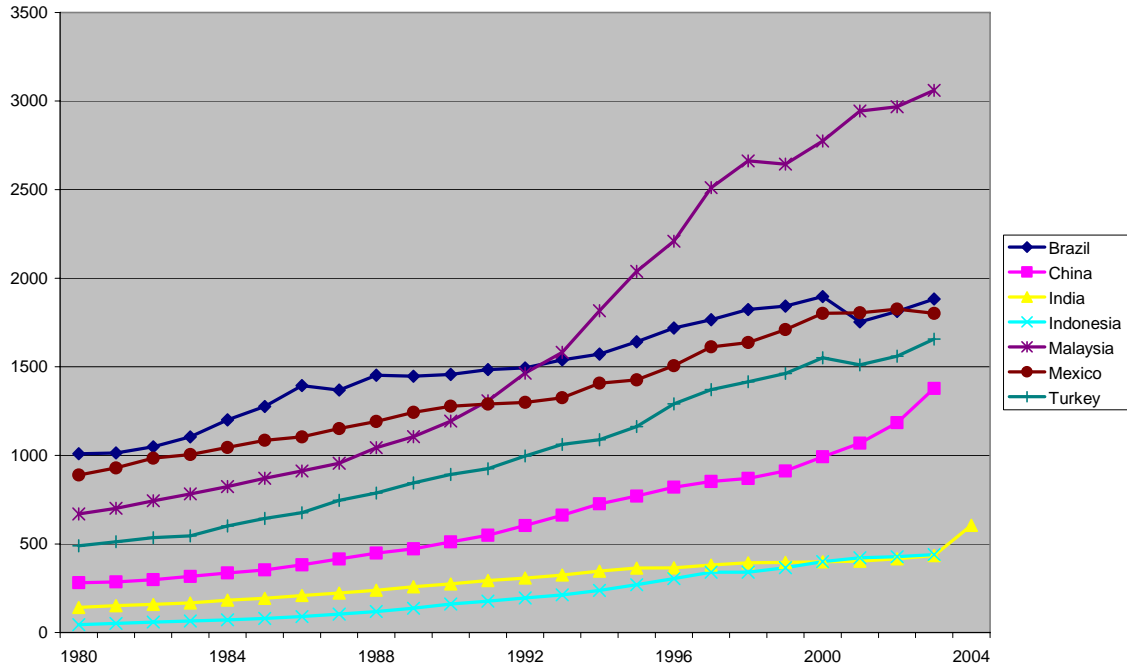


Pump price for super gasoline (US\$ per liter)

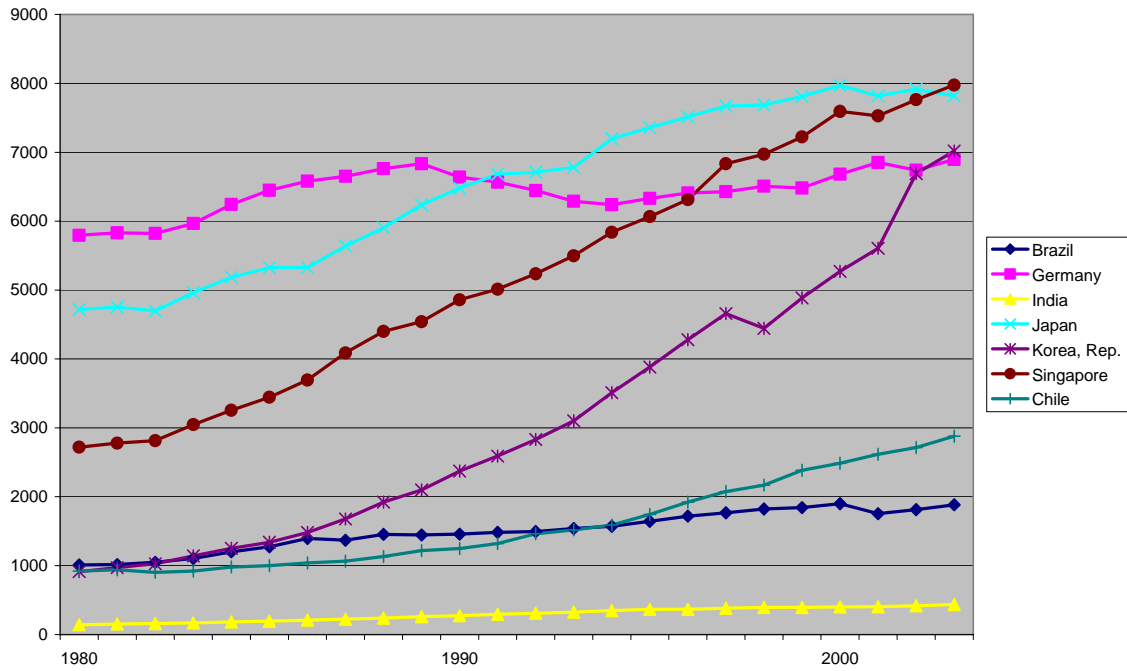


## **2. Power**

Electric power consumption (kwh per capita)

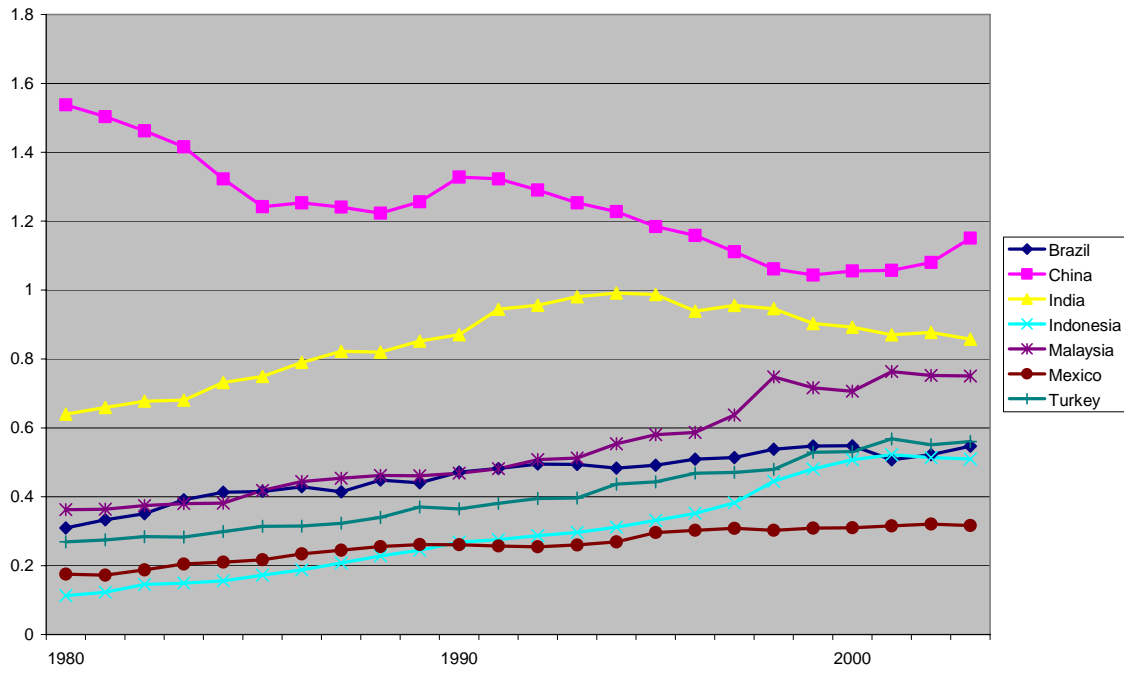


Electric power consumption (kwh per capita)

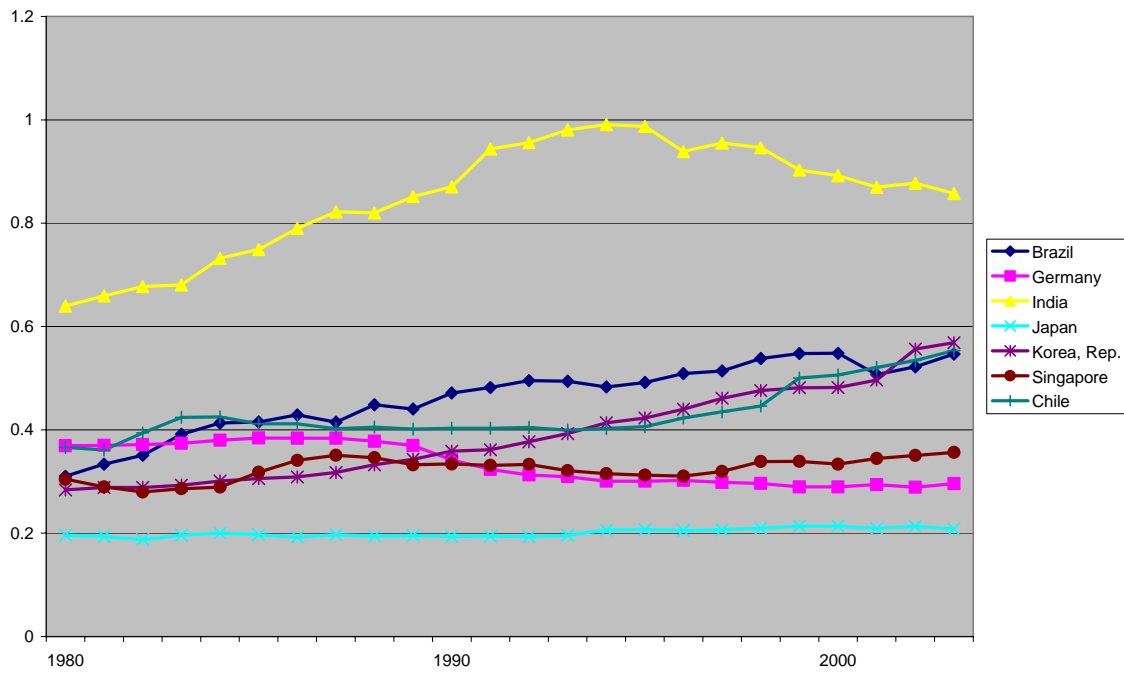




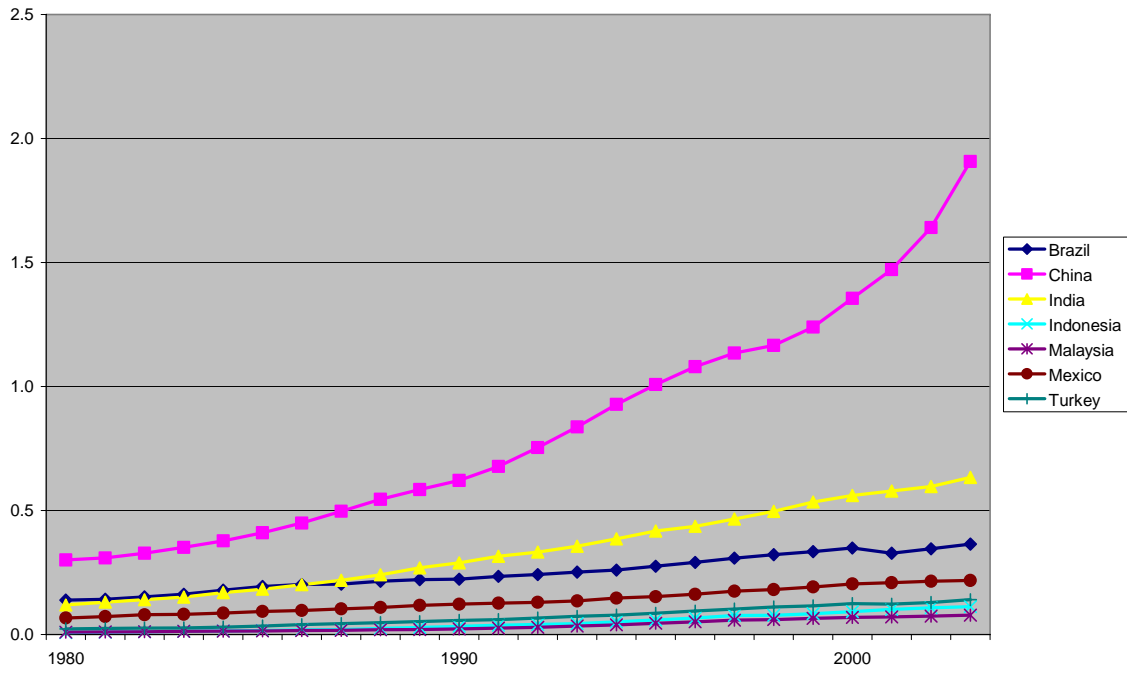
**Electric power cons per GDP (kwh per const 2000 GDP)**



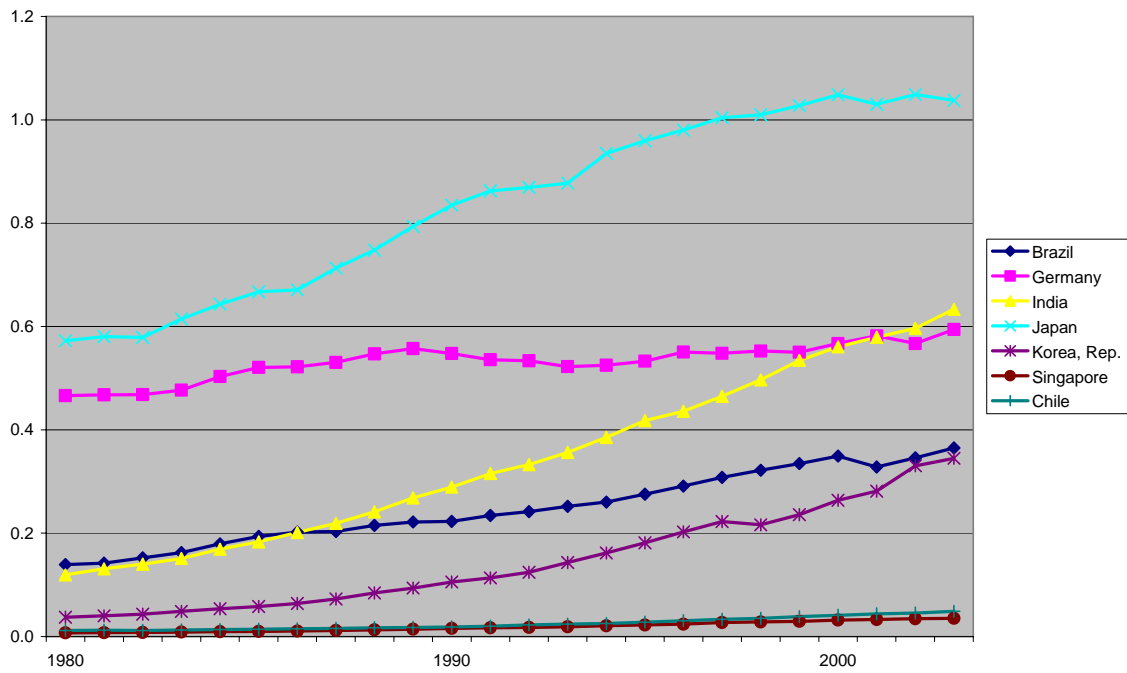
**Electric power cons per GDP (kwh per const 2000 \$)**



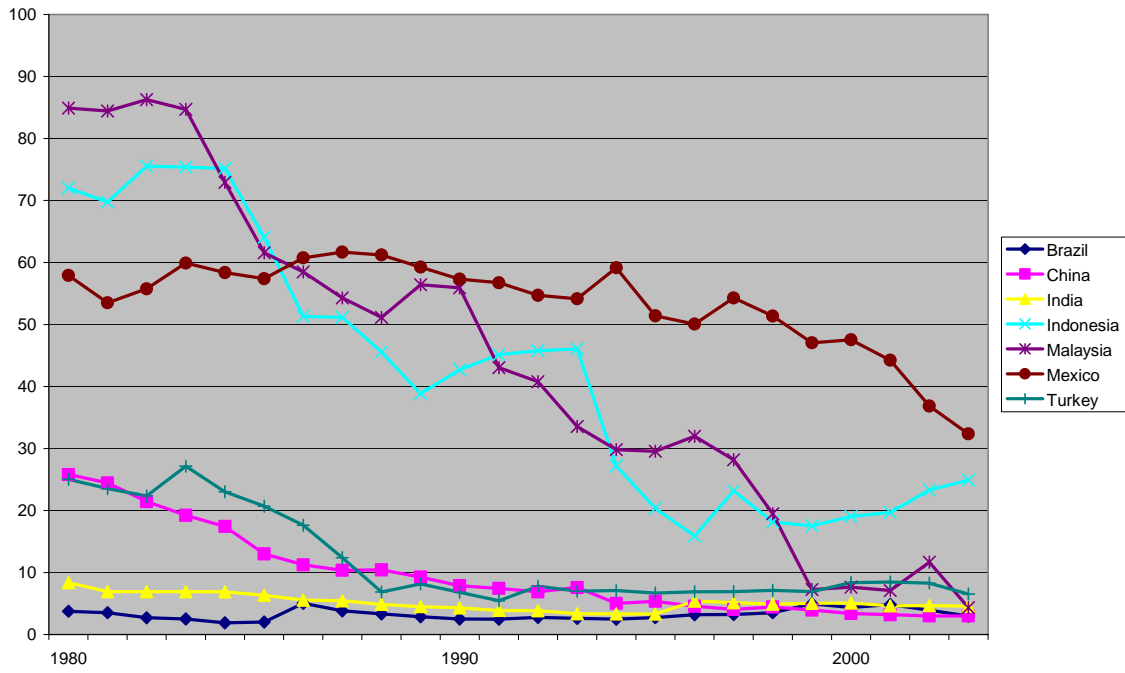
Electricity production (trillion kwh)



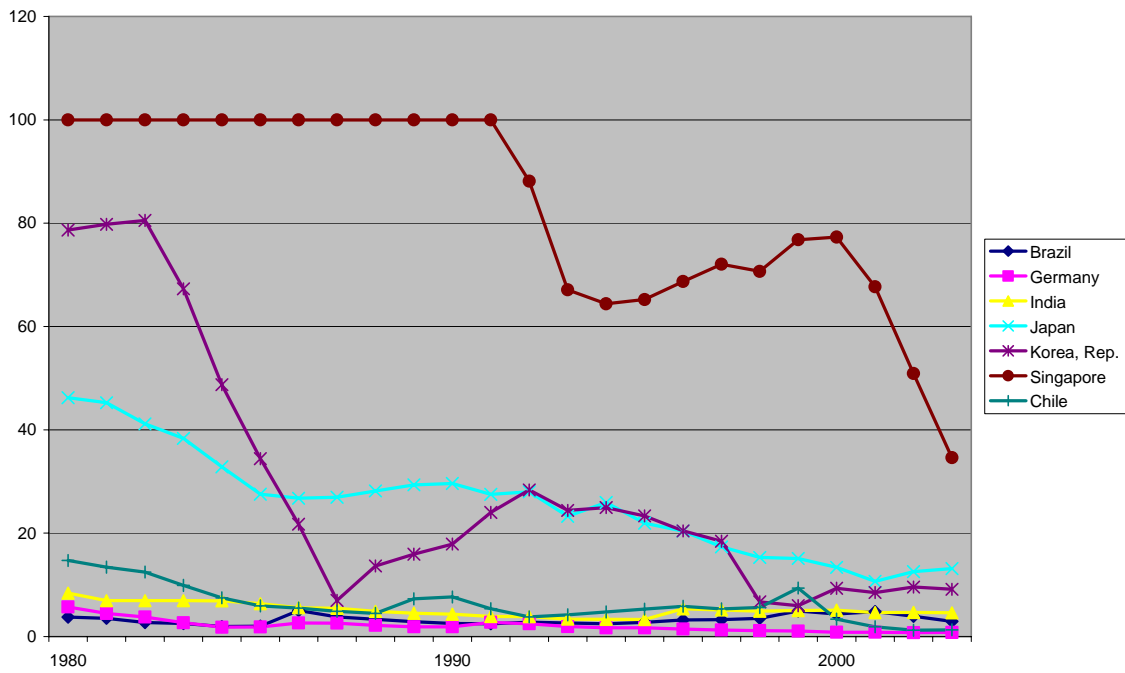
Electricity production (trillion kwh)



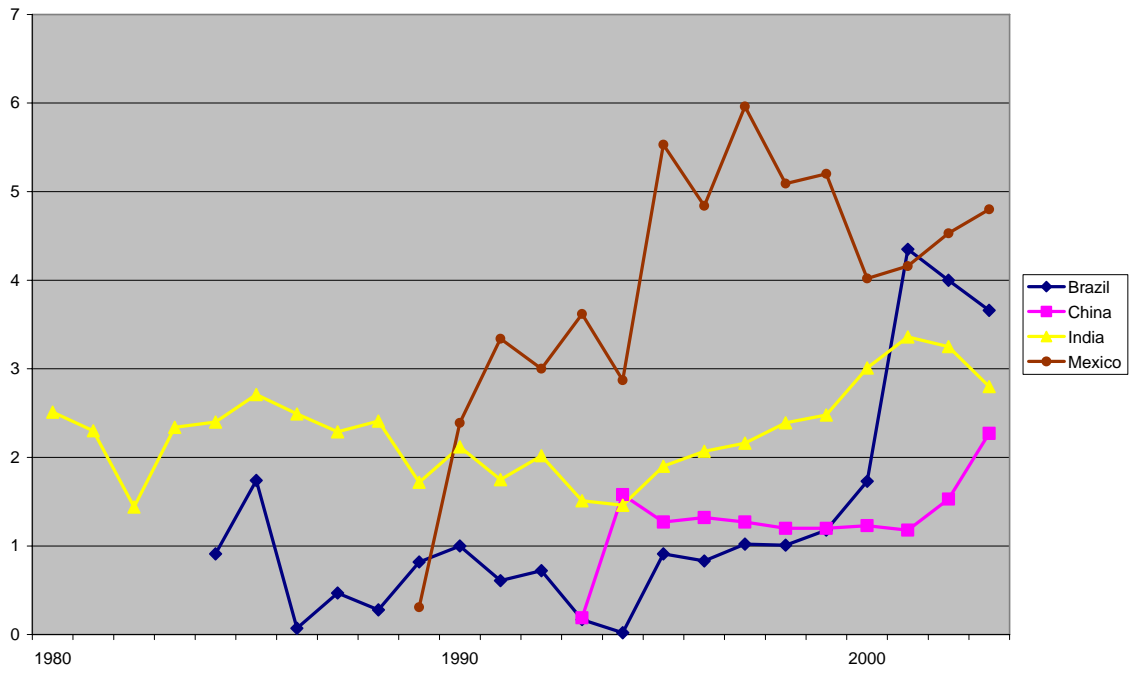
Electricity production from oil sources (% of total)



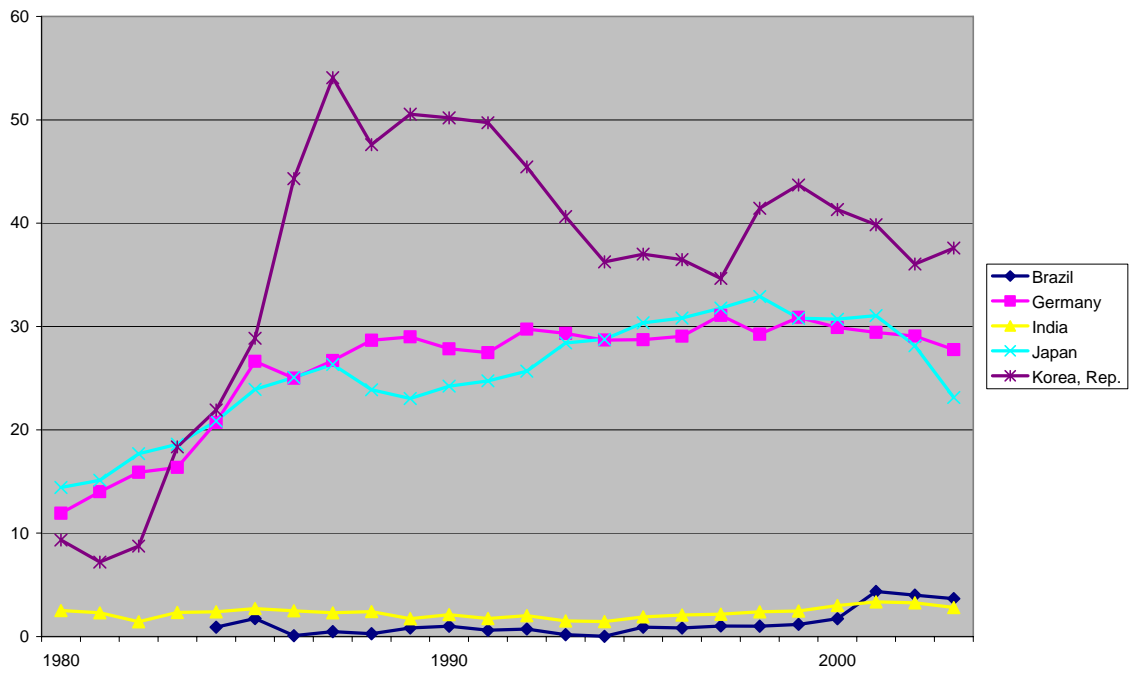
Electricity production from oil sources (% of total)



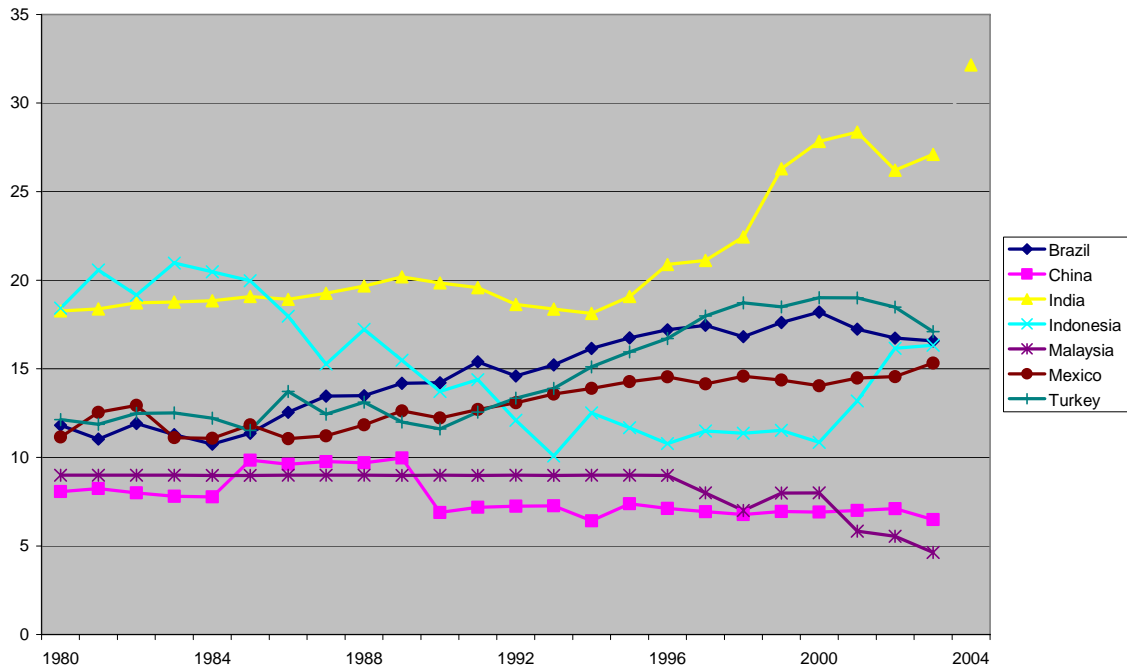
Electricity production from nuclear sources (% of total)



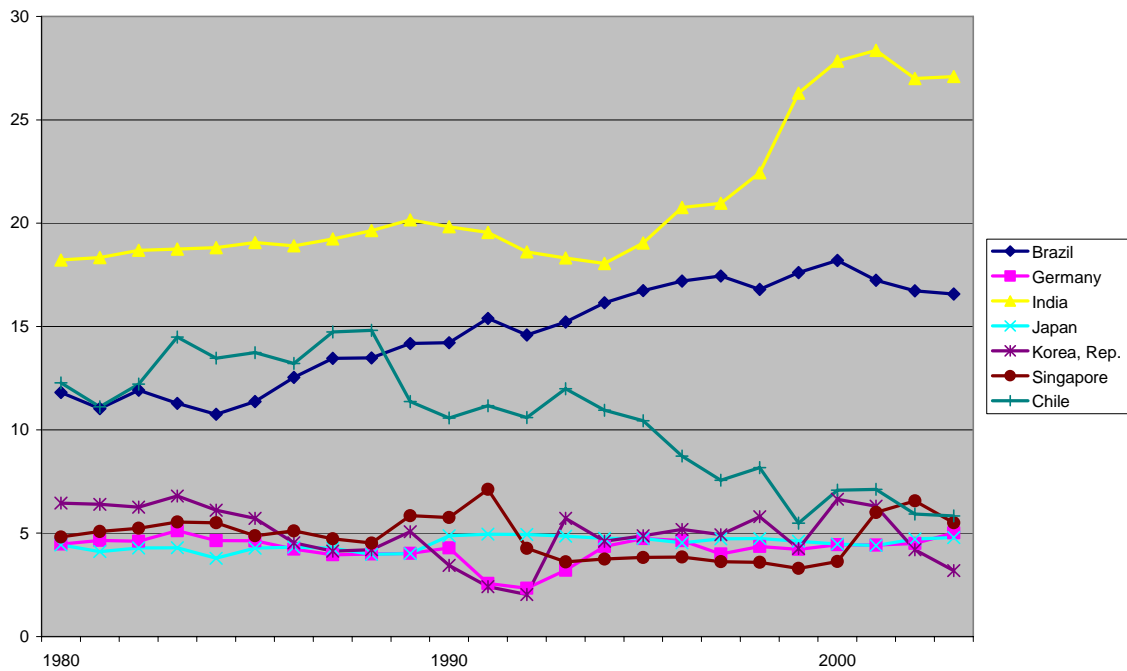
Electricity production from nuclear sources (% of total)



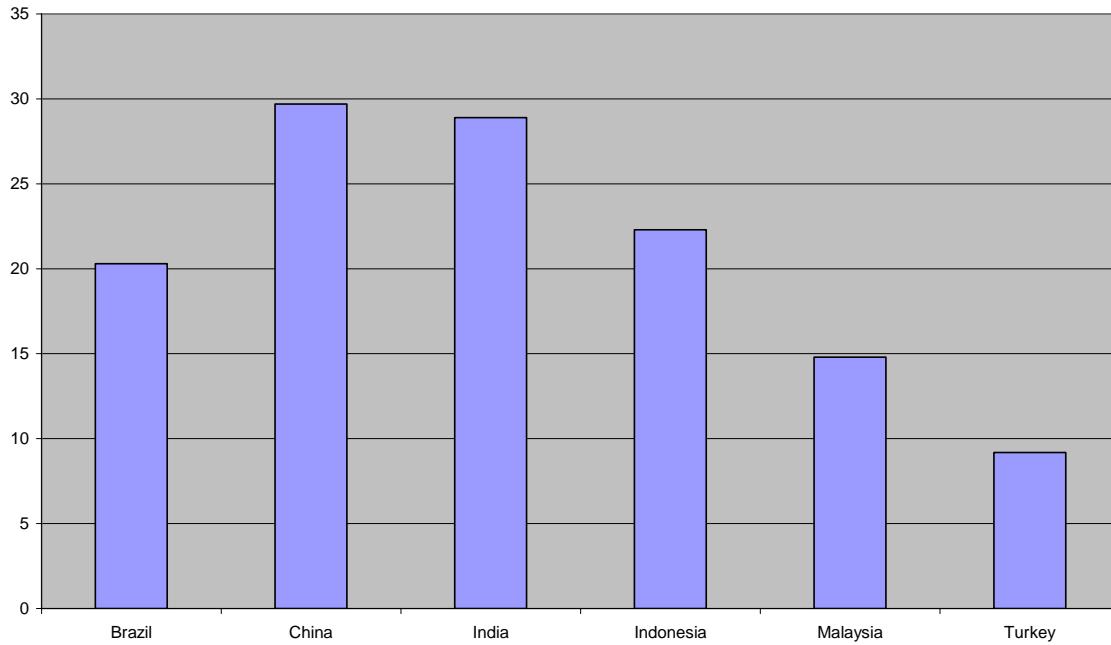
Electric power transmission and distribution losses (% of output)



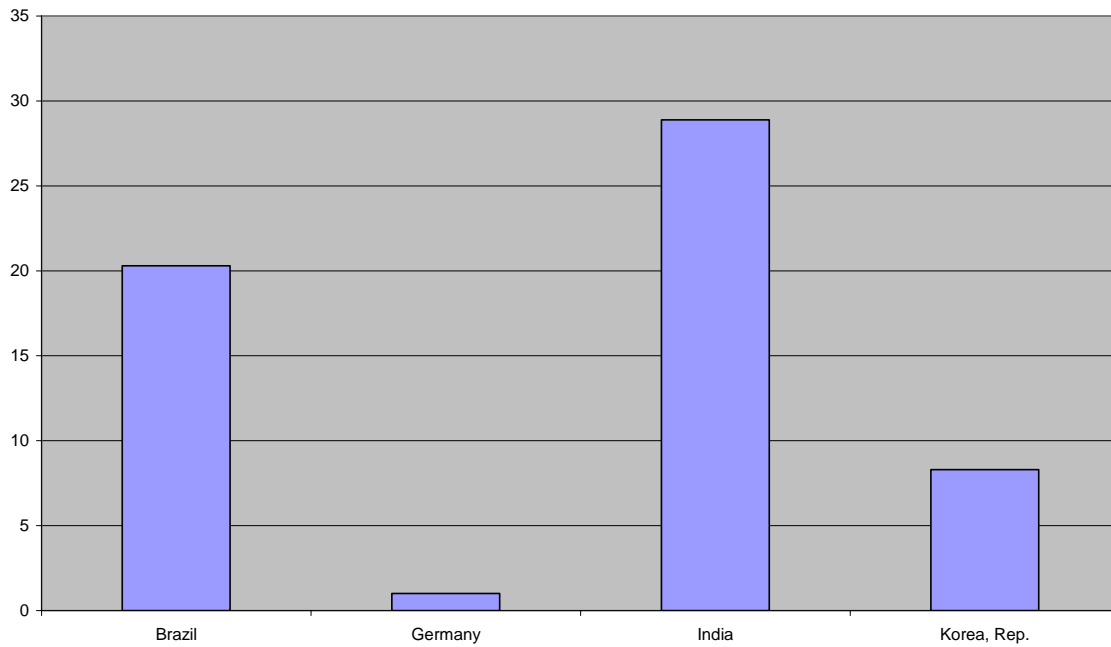
Electric power transmission and distribution losses (% of output)



**Electricity (% managers surveyed ranking this as a major constraint)**  
2003 (2004 for Indonesia & 2005 for Turkey)

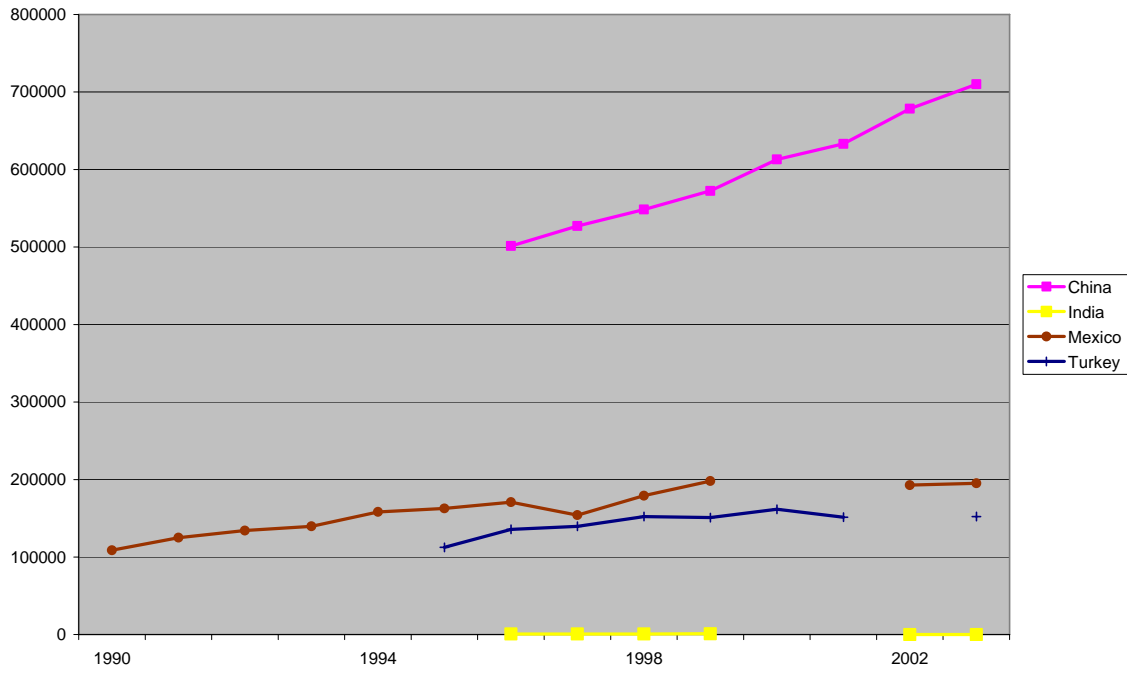


**Electricity (% managers surveyed ranking this as major constraint)**  
2005 (Brazil & India are 2003)

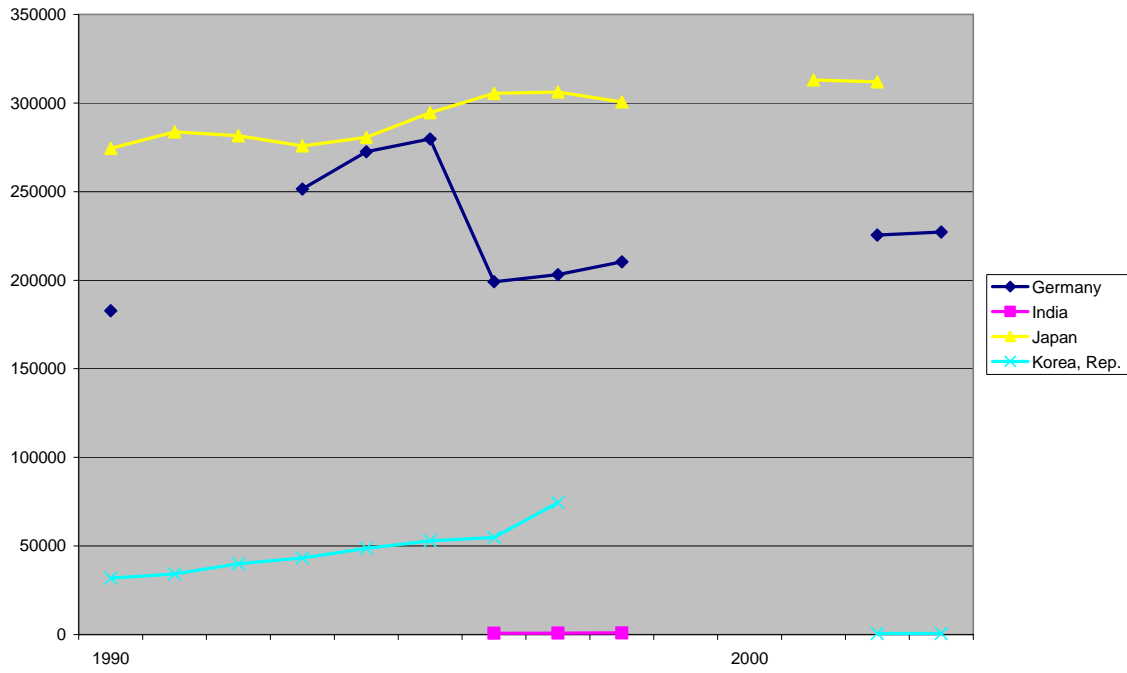


### **3. Roads**

Roads, goods transported (million ton-km)

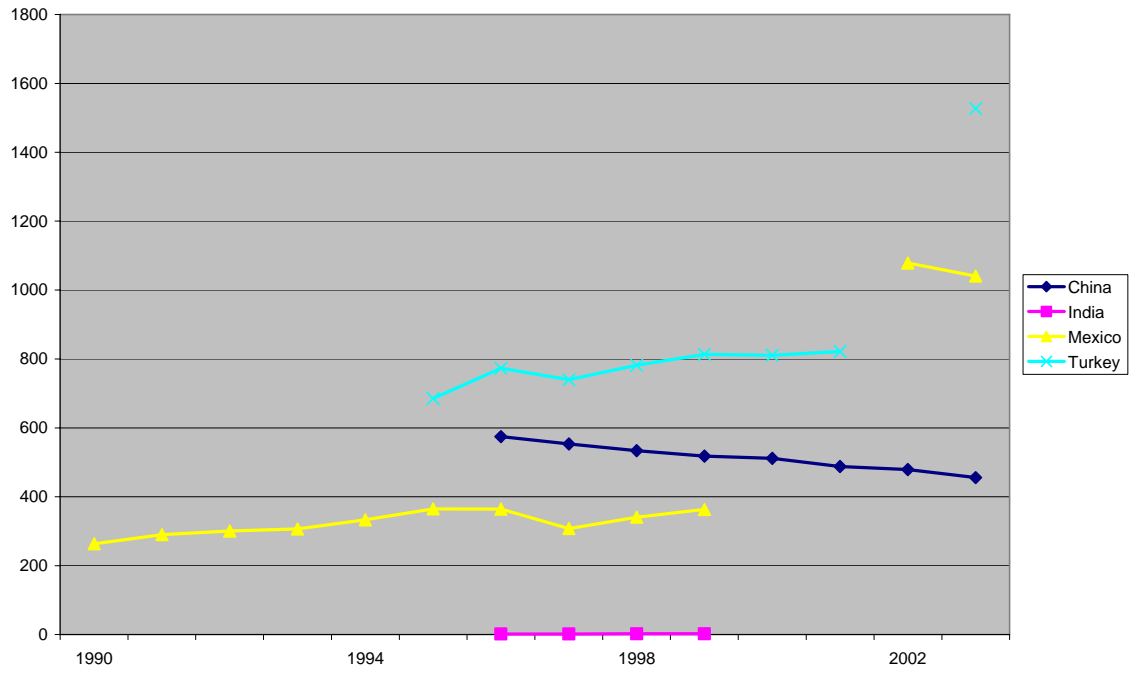


Roads, goods transported (million ton-km)

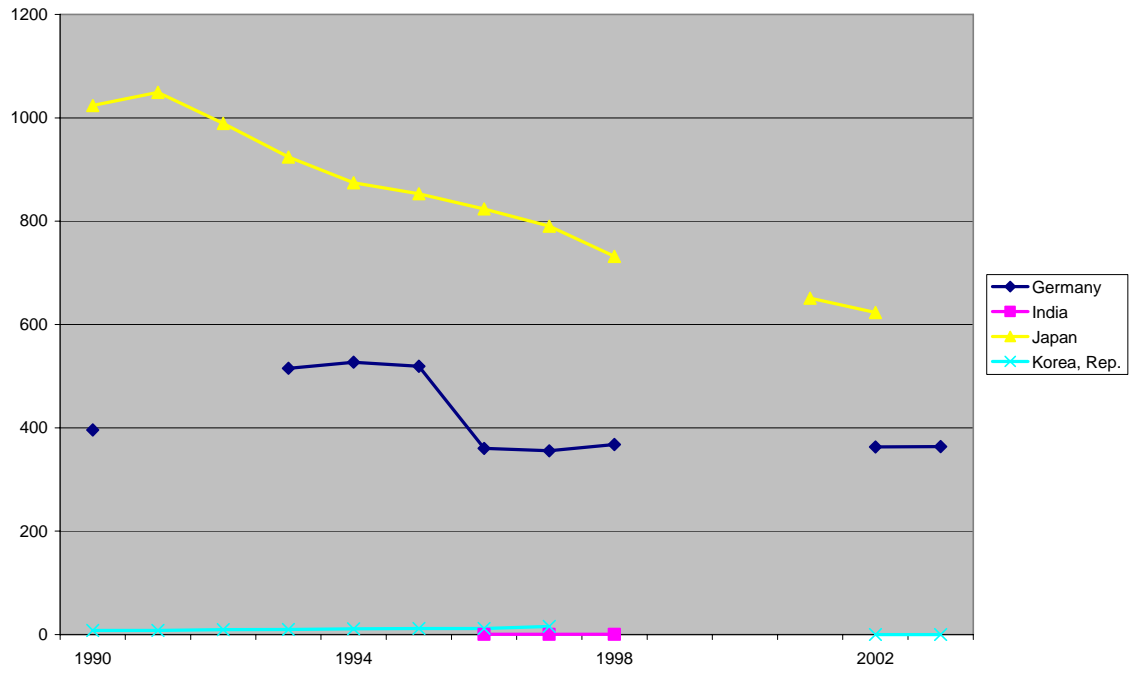




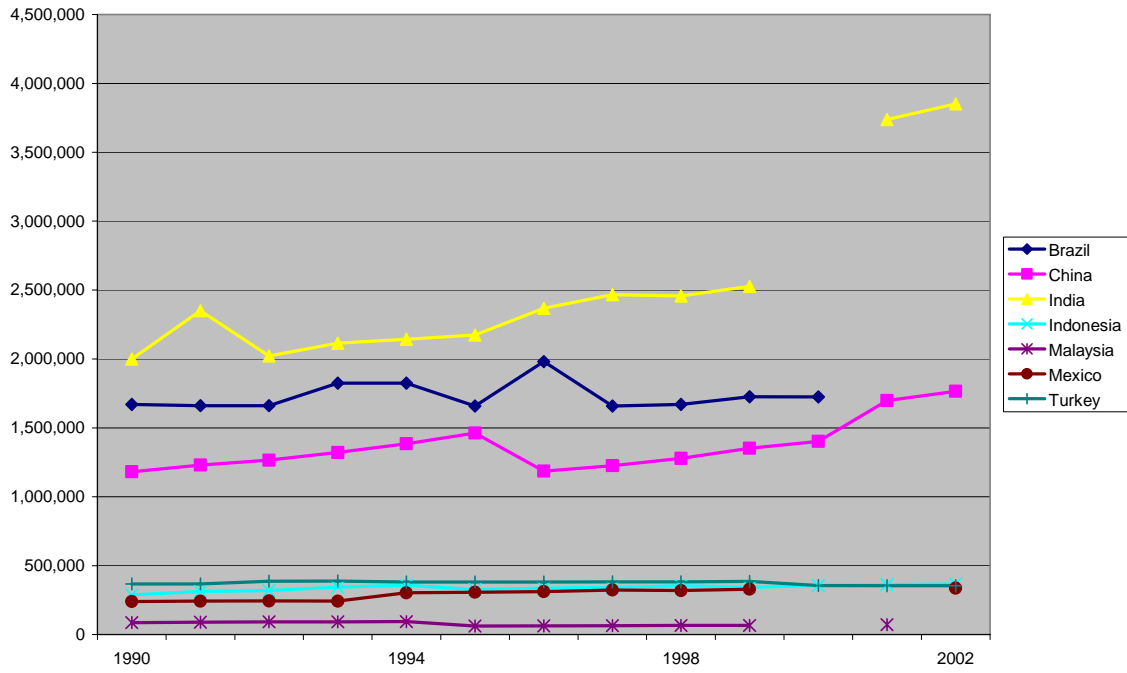
Roads, goods transp. per GDP (ton-km per thous. const 2000 \$)



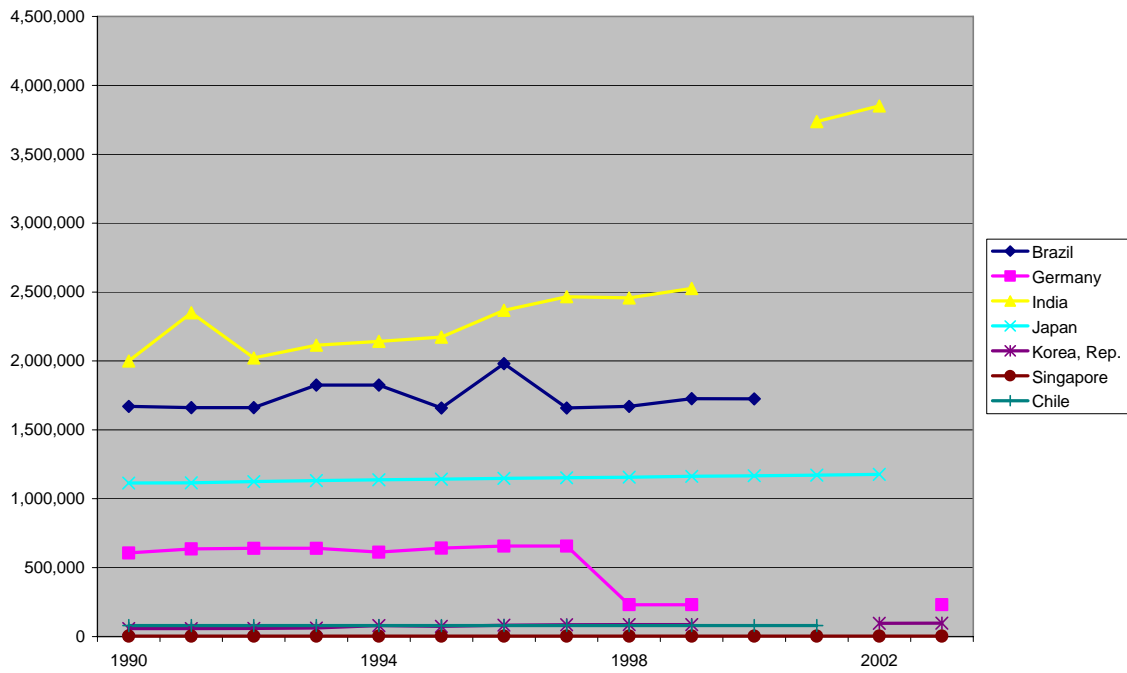
Roads, goods transp. per GDP (ton-km per thous. const 2000 \$)



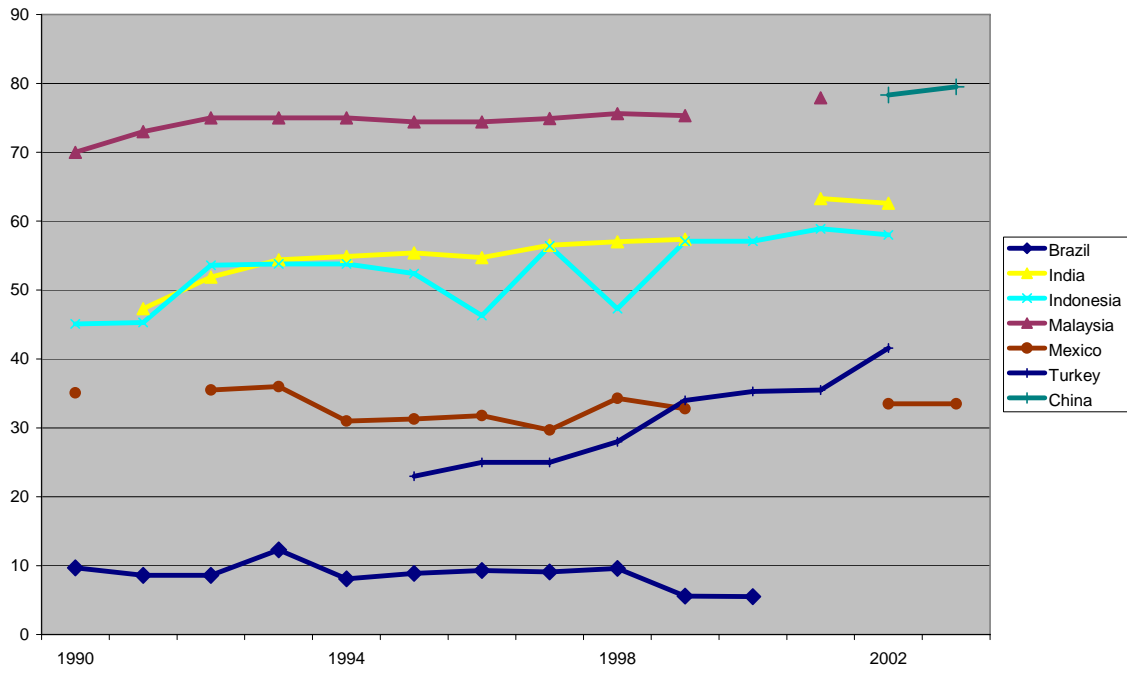
Roads, total network (km)



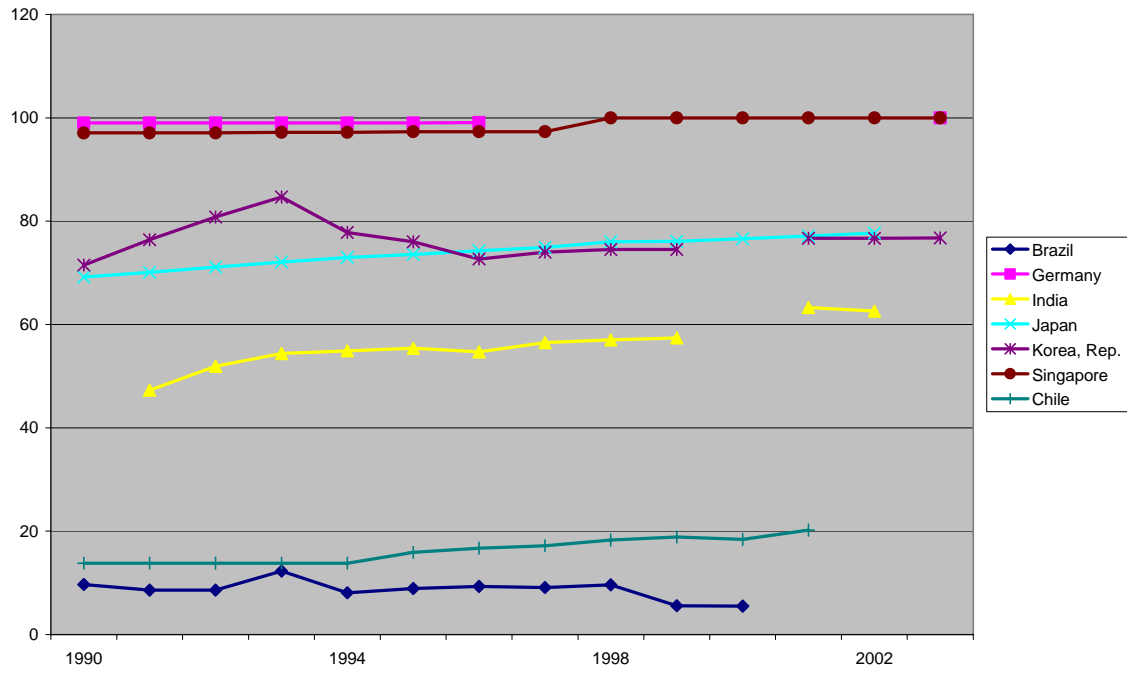
Roads, total network (km)



Roads, paved (% of total roads)

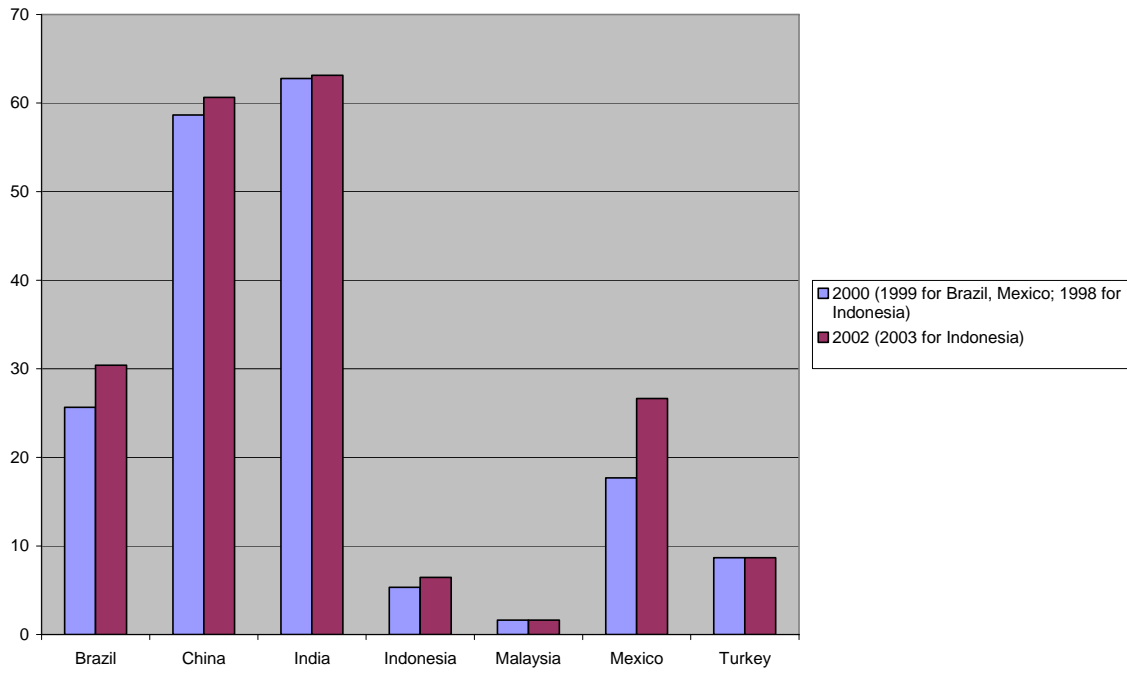


Roads, paved (% of total roads)

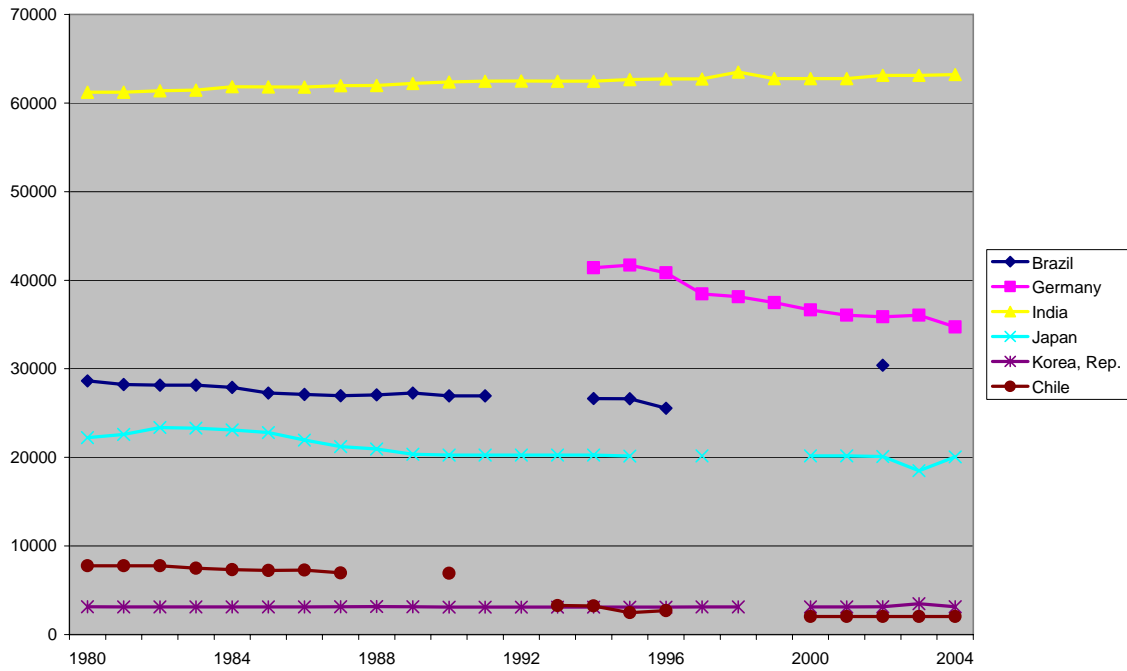


## **4. Railways**

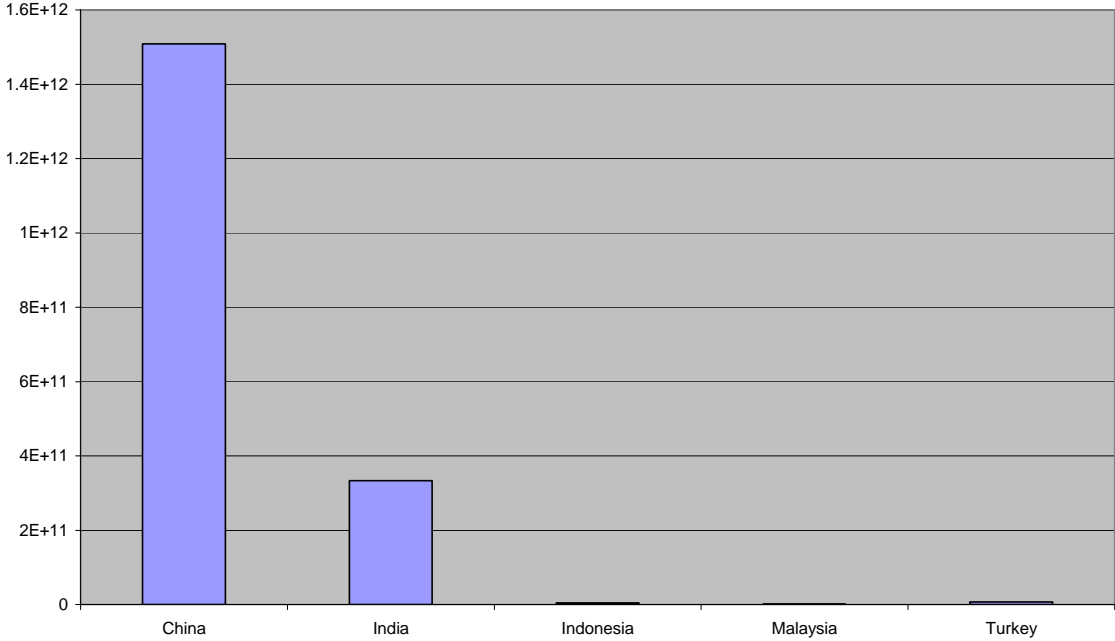
**Rail lines (thousand route-km)**



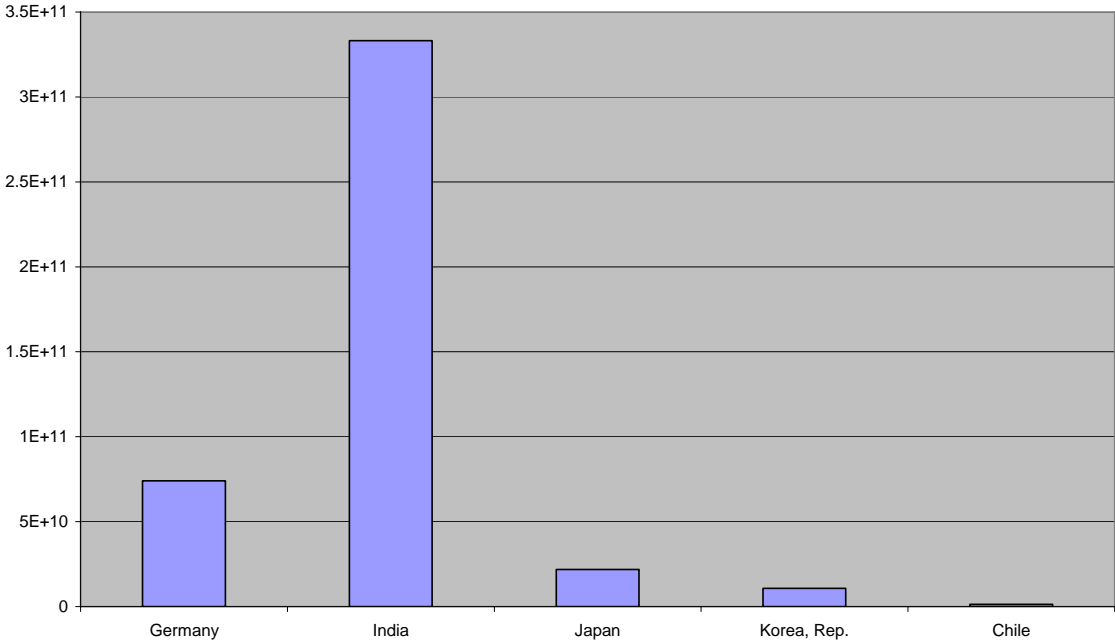
**Rail lines (total route-km)**



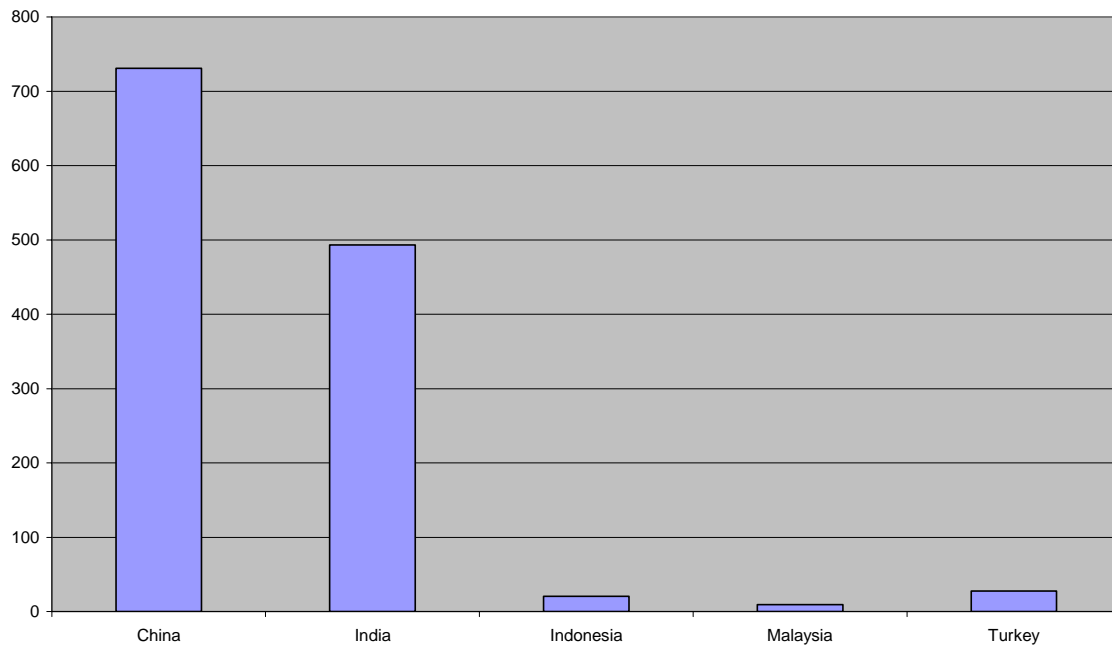
**Railways, good hauled (ton-km)**  
2002 (2003 for Indonesia, Malaysia)



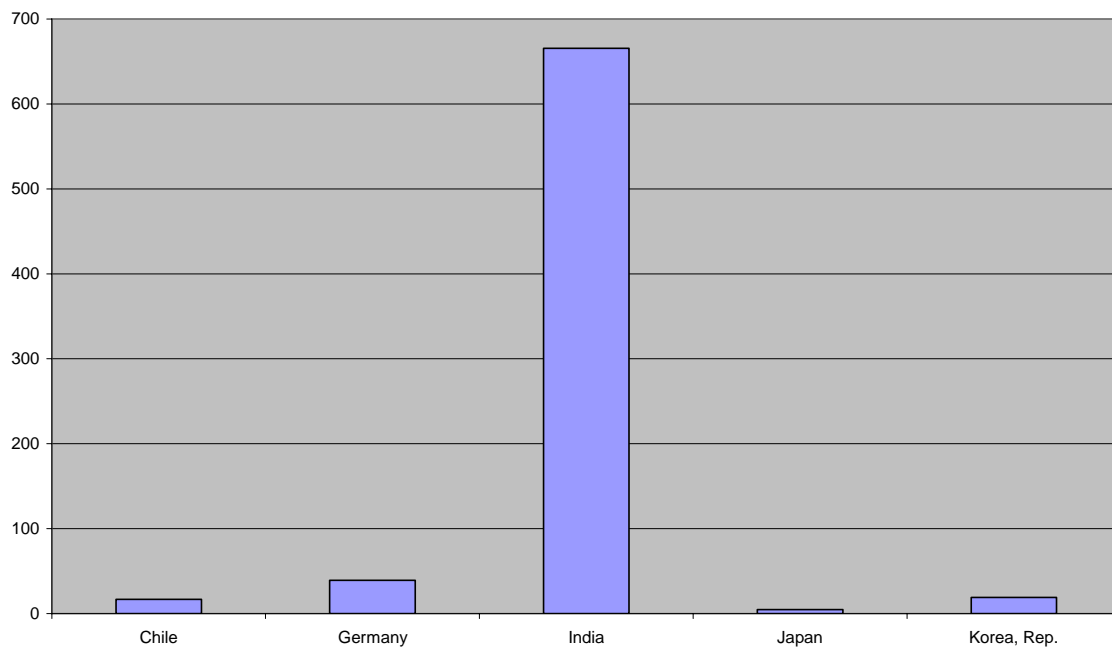
**Railways, goods hauled (ton-km)**  
2002 (Chile 2003)



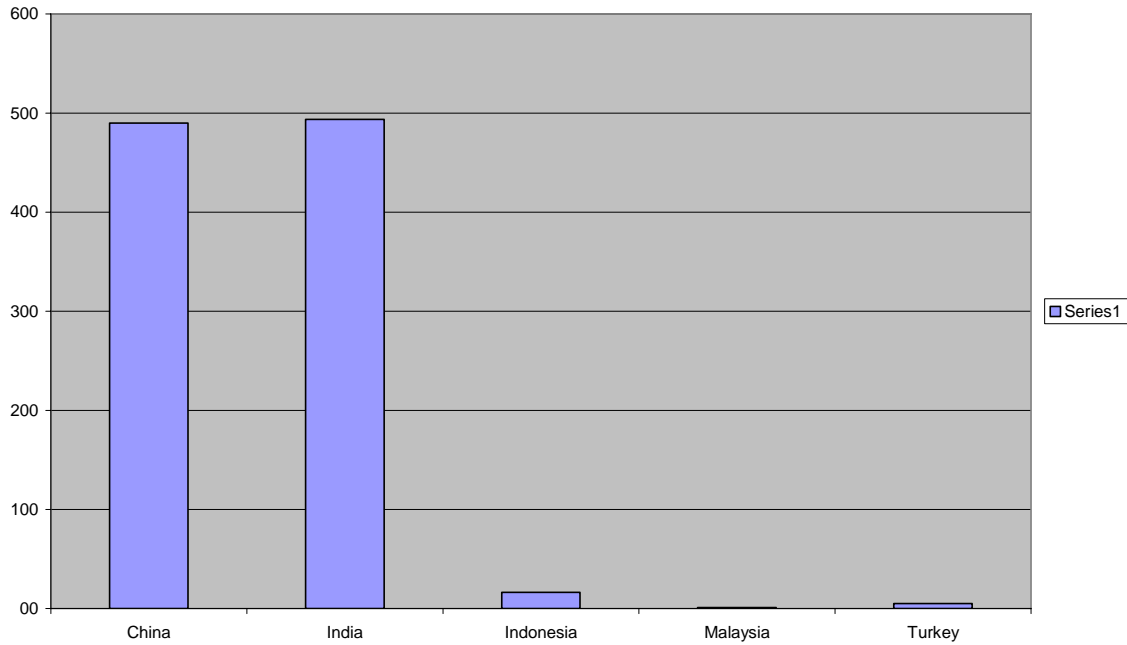
**Railways, good hauled per GDP (ton-km per thous const 2000 \$)**  
2002 (2003 for Indonesia, Malaysia)



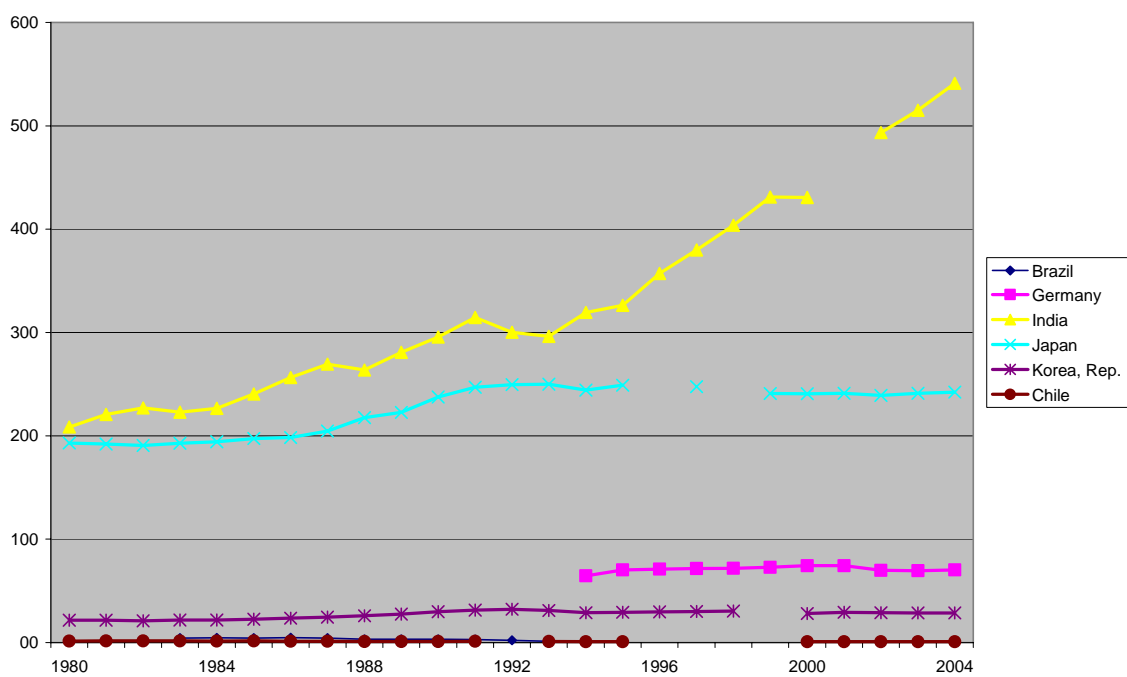
**Railways, good hauled per GDP (ton-km per thous const 2000 \$)**  
2002 (2003 for Chile)



**Railways, passengers carried (bn passenger-km)**  
2002 (2003 for Indonesia)

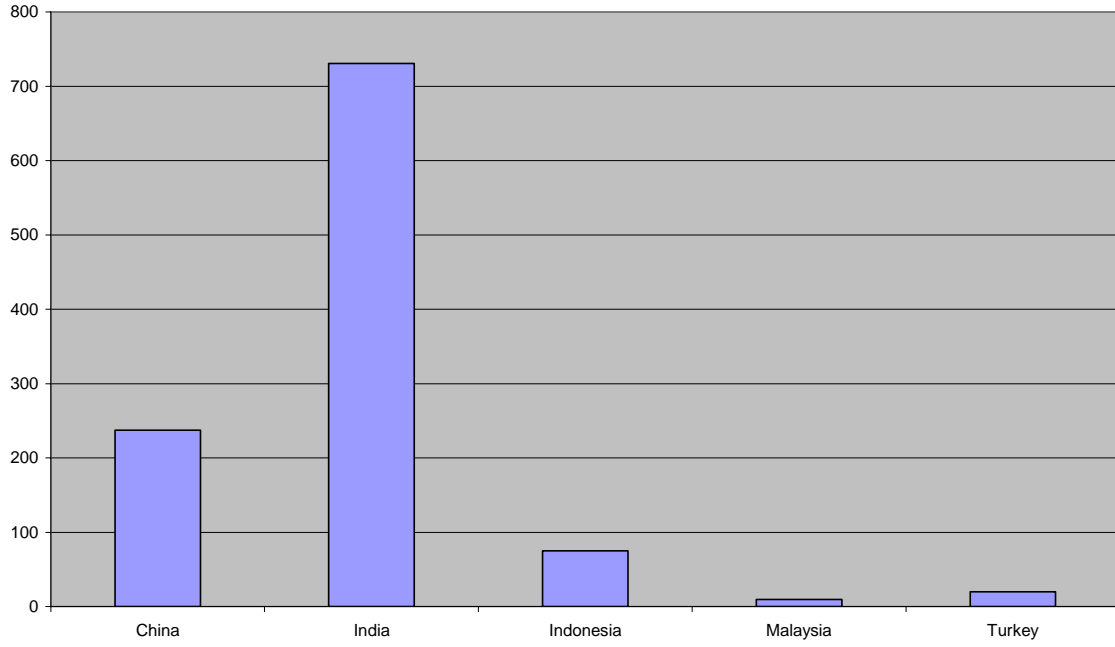


**Railways, passengers carried (bn passenger-km)**



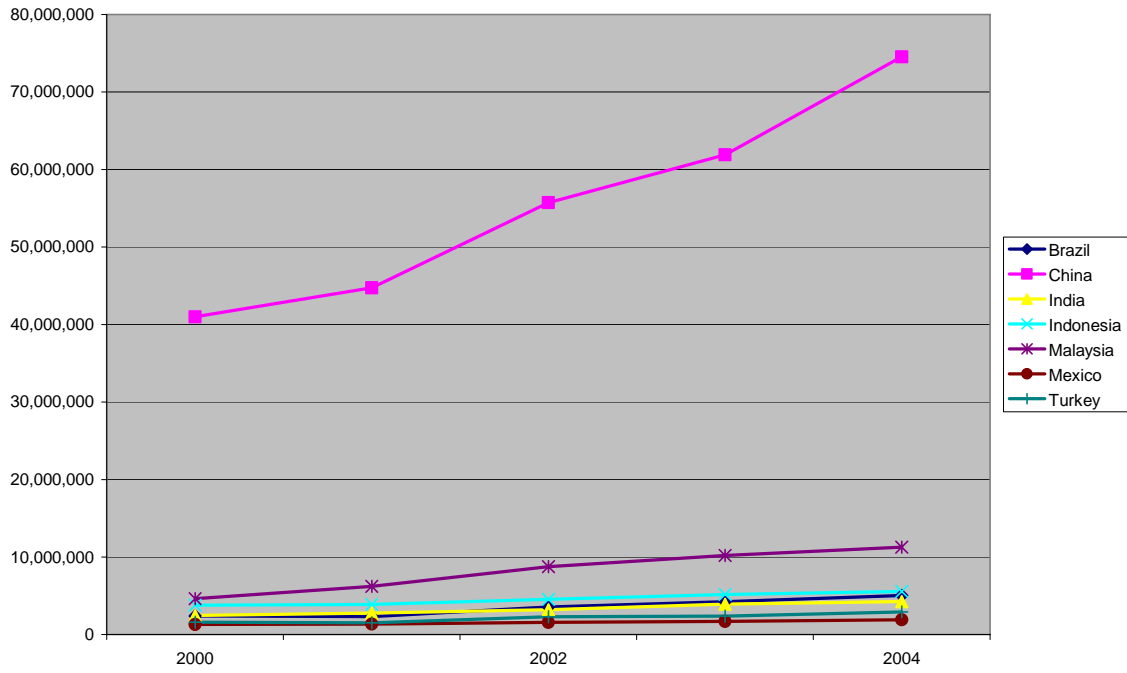


**Railways, passengers carried per GDP (pass-km per th. const 2000 \$)**  
2002 (2003 for Indonesia)

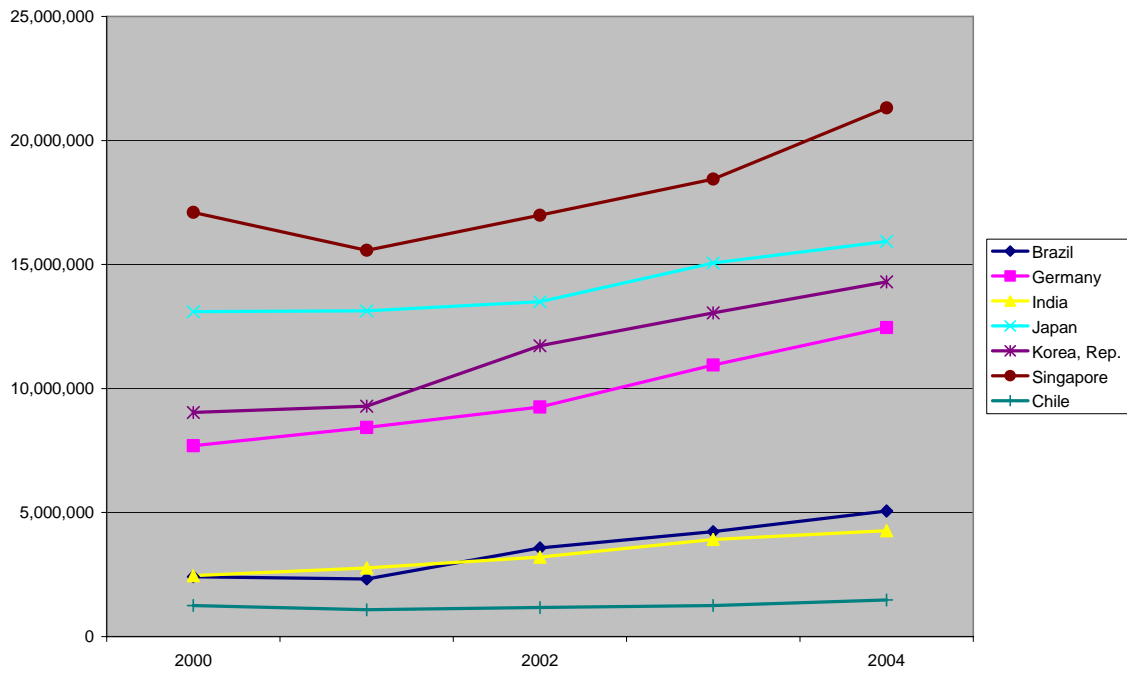


## **5. Ports**

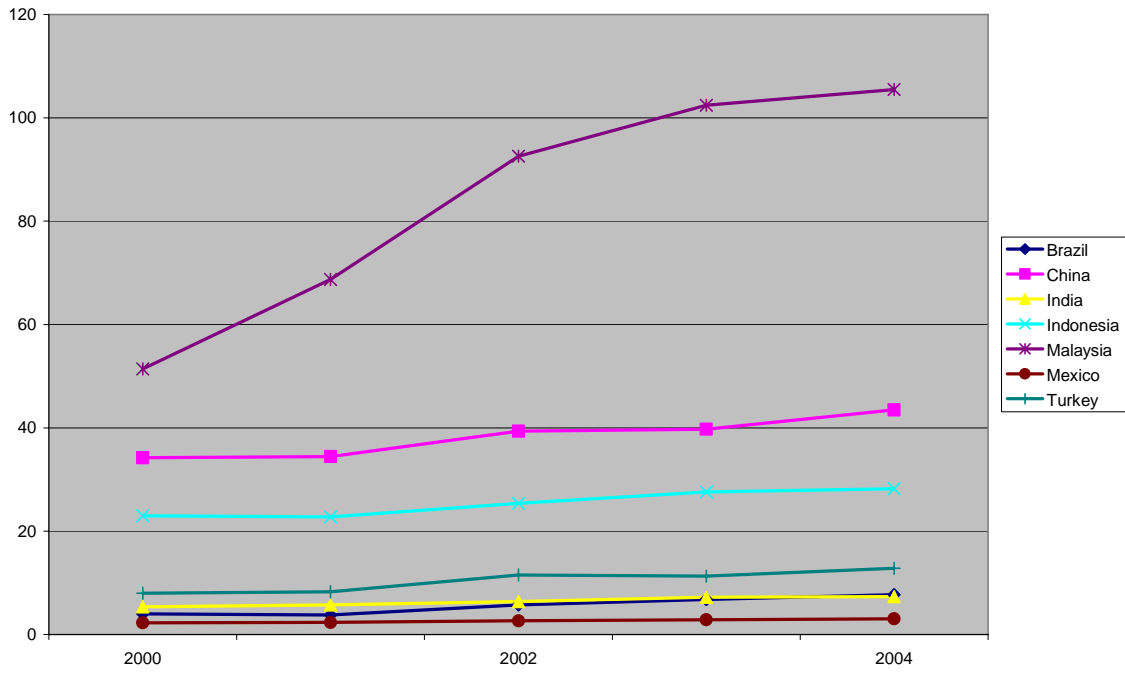
**Container port traffic (TEU: 20 foot equivalent units)**



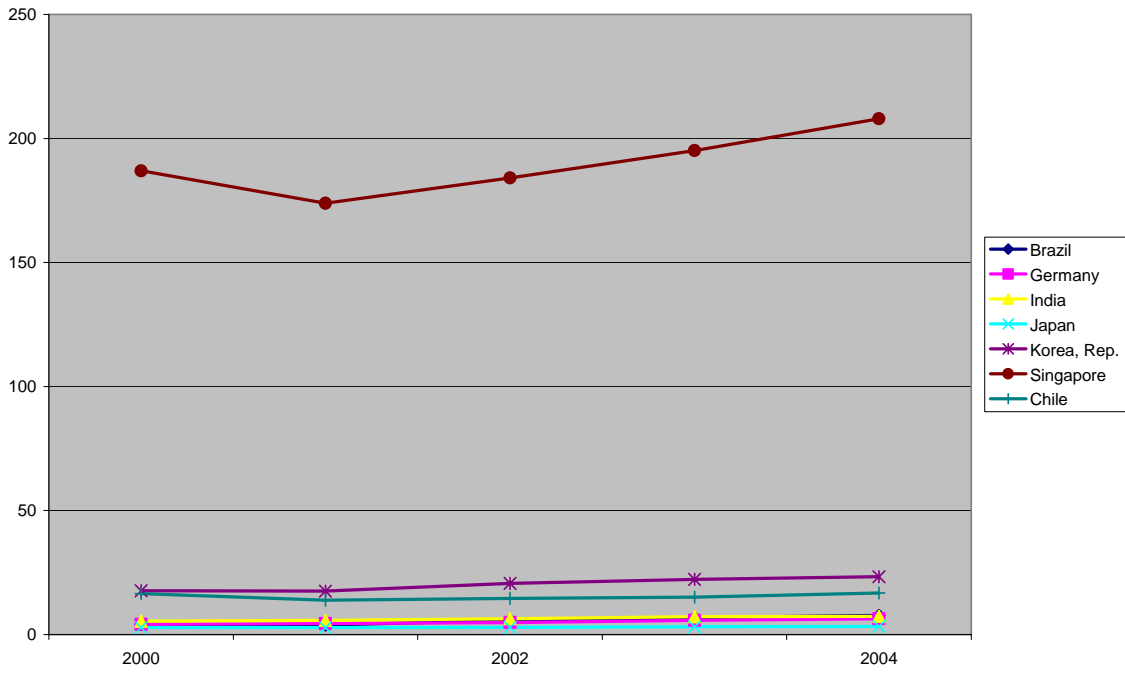
**Container port traffic (TEU: 20 foot equivalent units)**



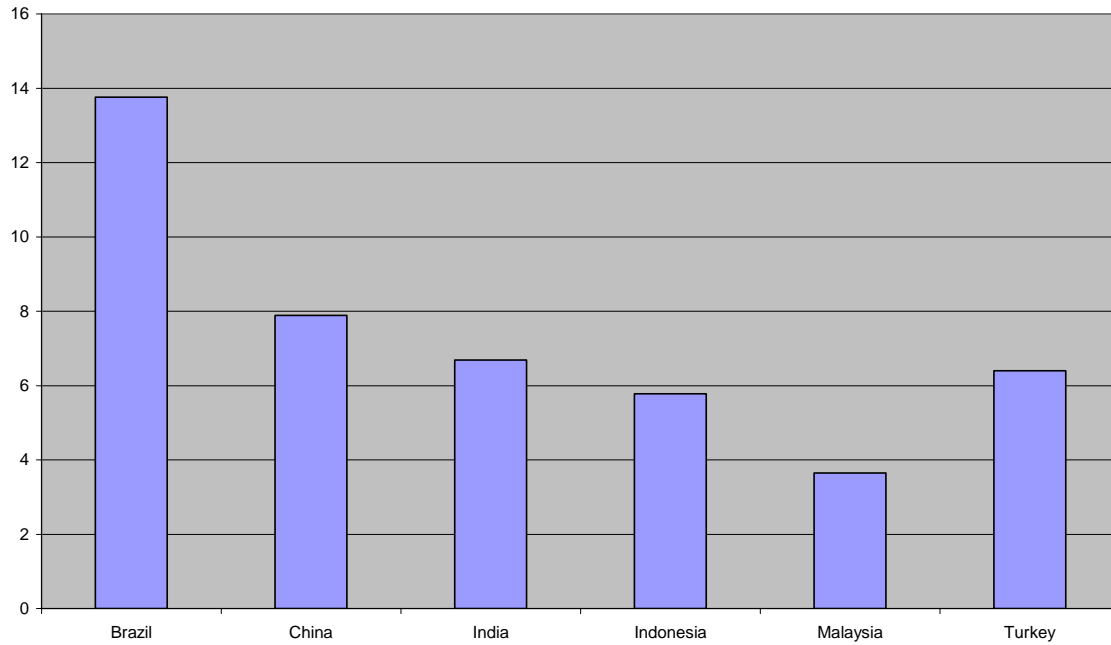
Container port traffic per GDP (TEU per mn const 2000 \$)



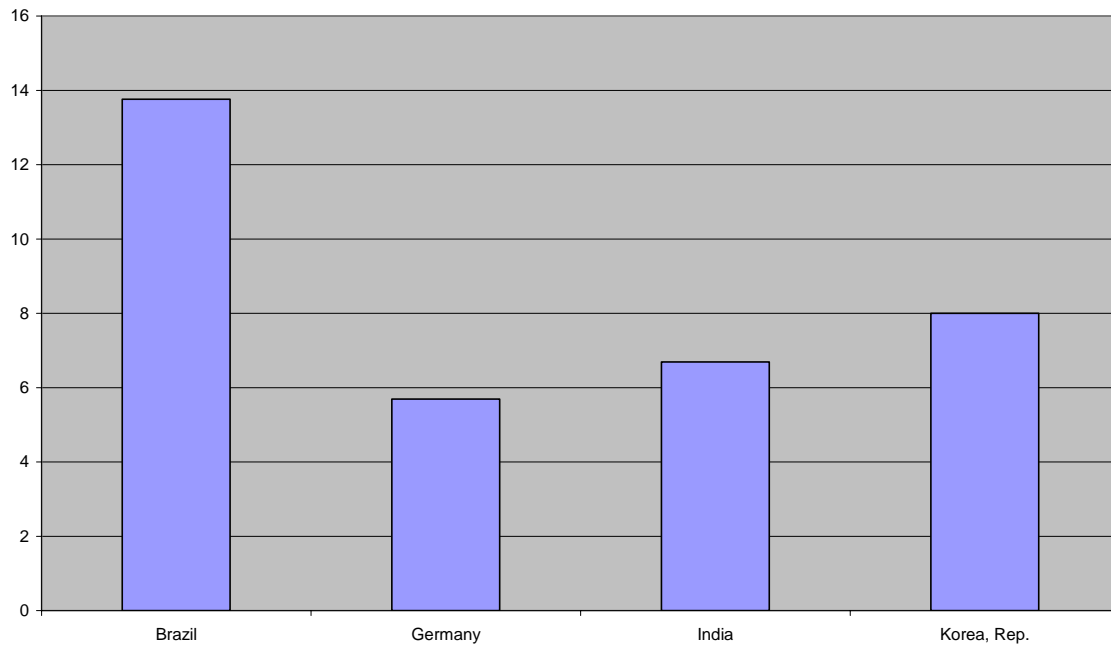
Container port traffic per GDP (TEU per mn const 2000 \$)



**Average time to clear customs (days)**  
2003 (Turkey 2005; Indonesia 2004)

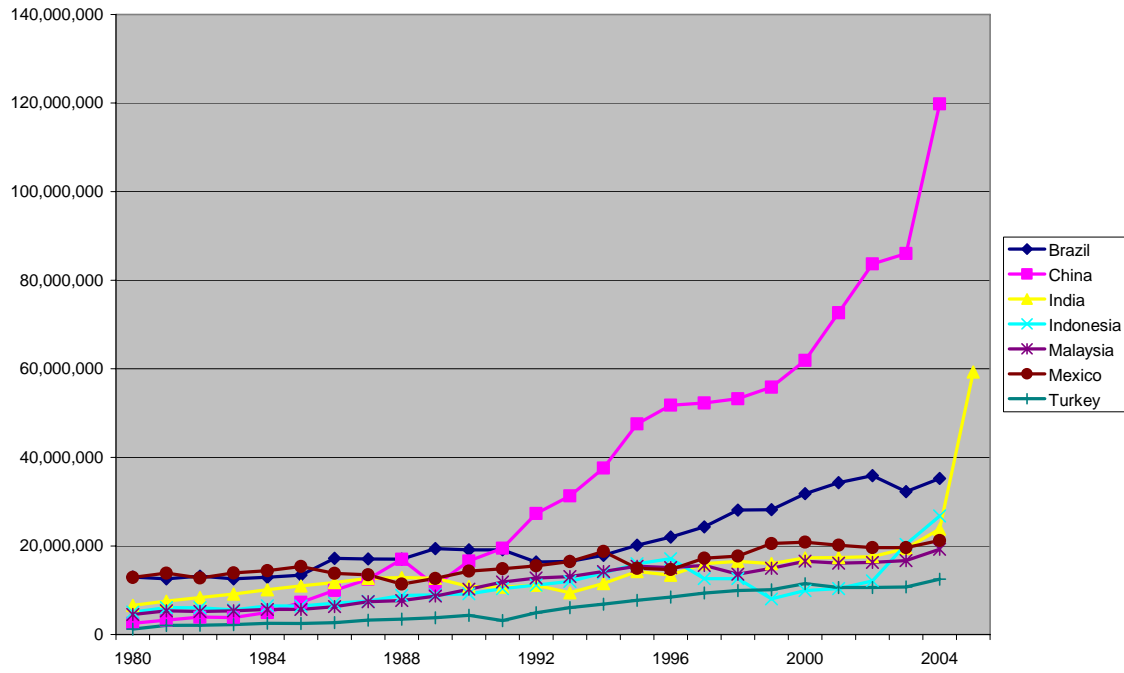


**Average time to clear customs (days)**  
2005 (Brazil & India are 2003)

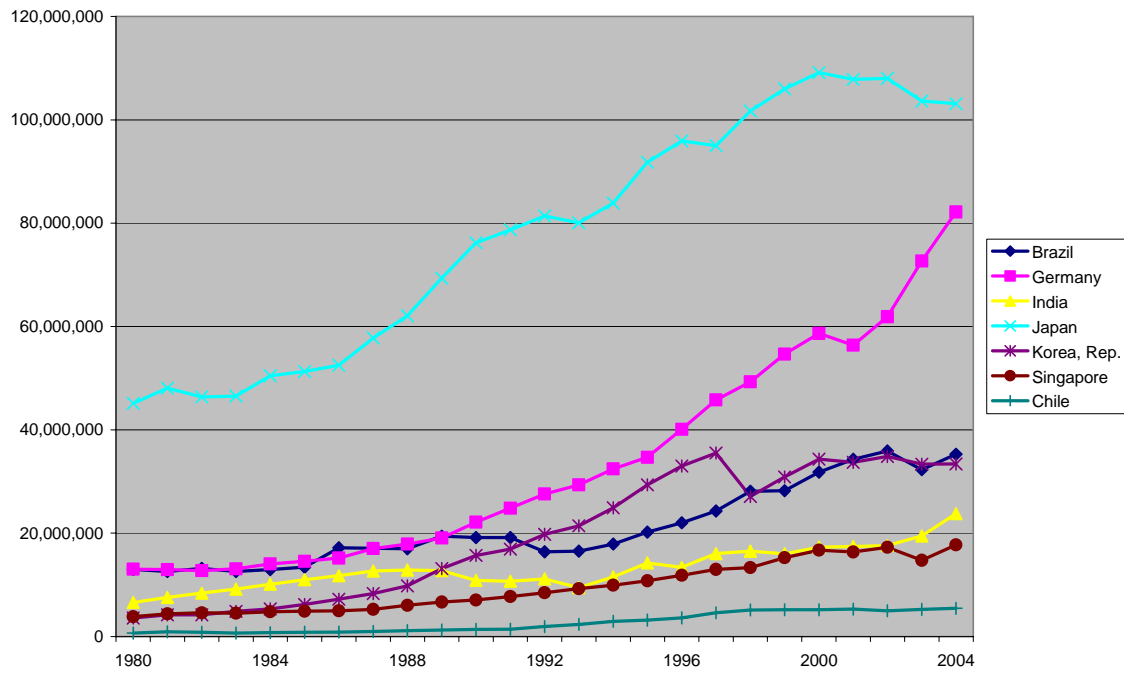


## **6. Air Transport**

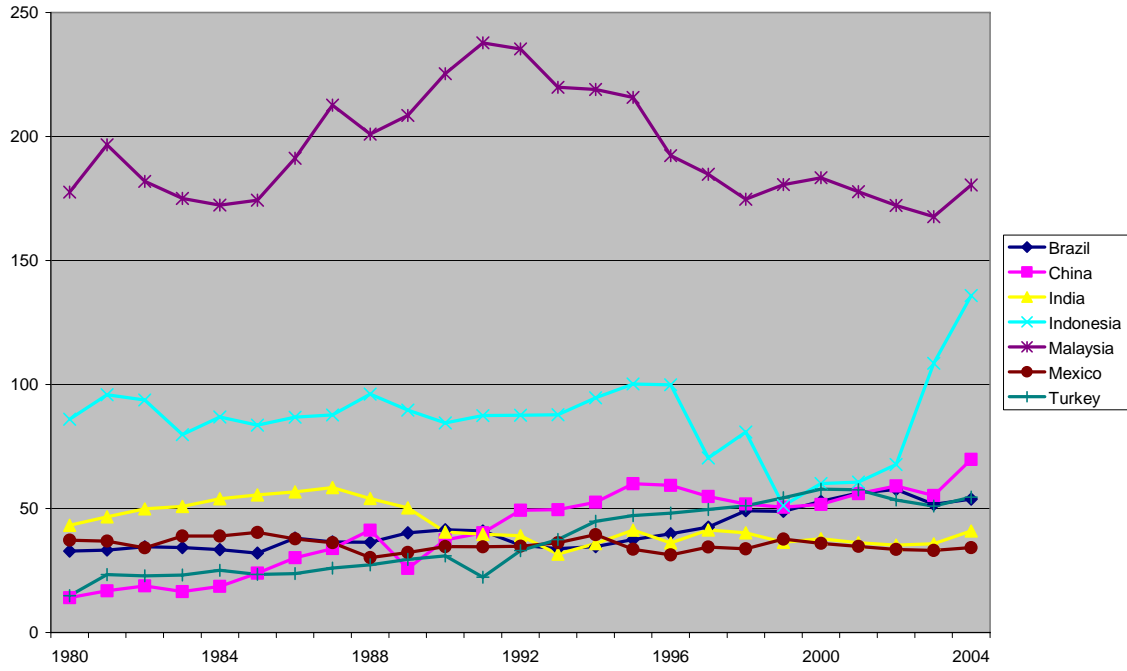
### Air transport, passengers carried



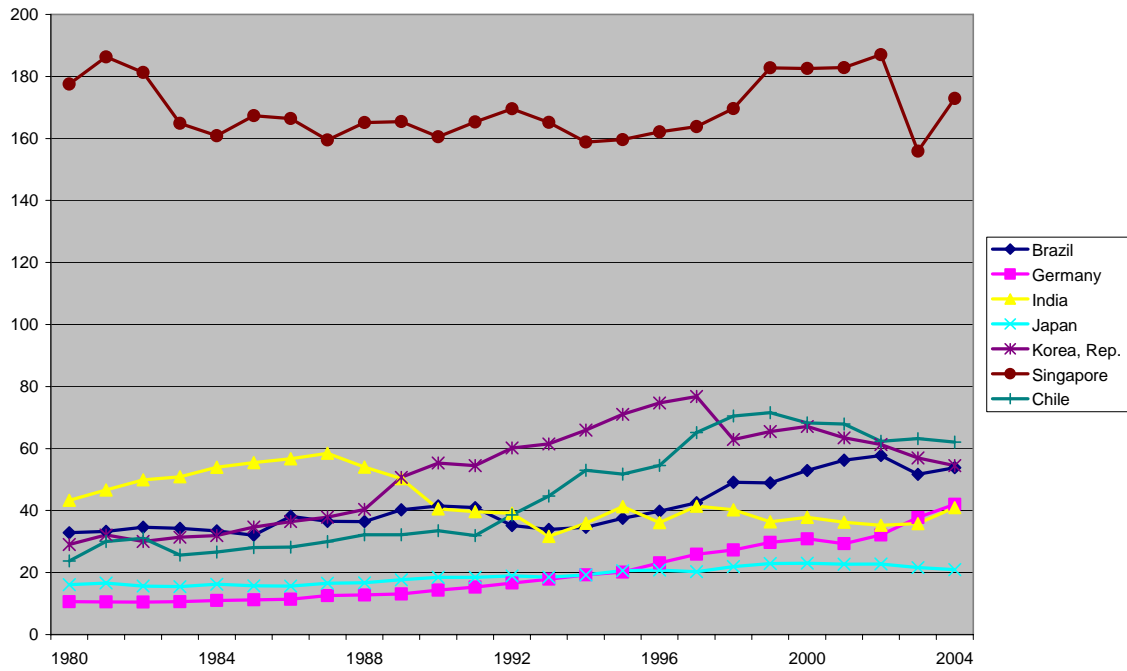
### Air transport, passengers carried



Air transport, passengers carried per GDP (per mn const 2000 \$)

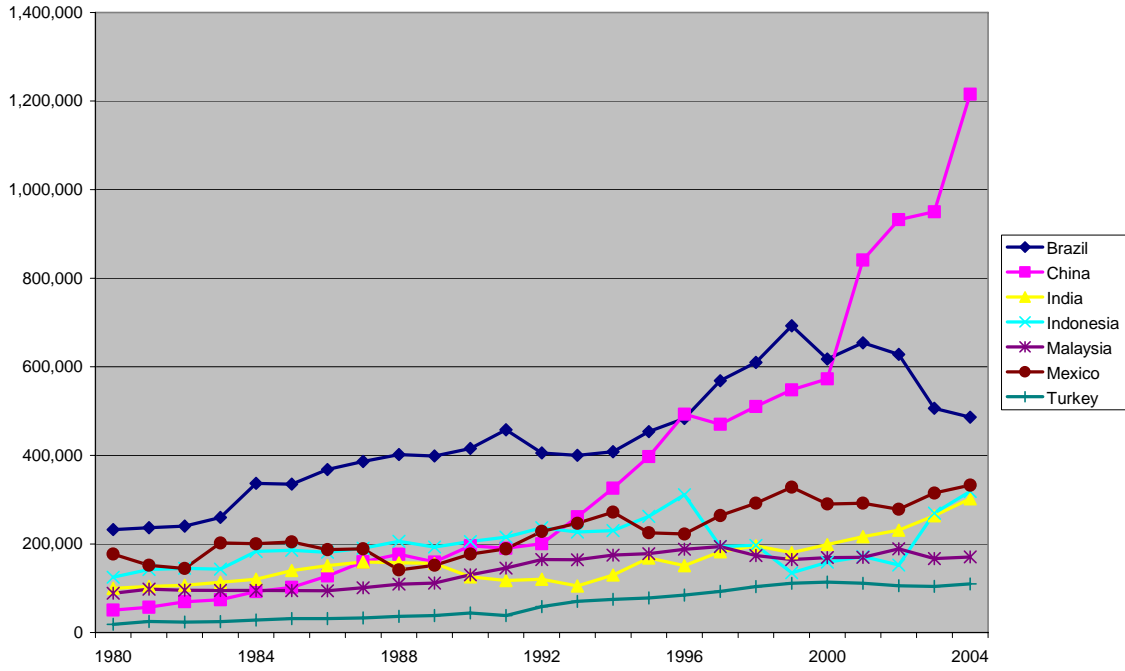


Air transport, passengers carried per GDP (per mn const 2000 \$)

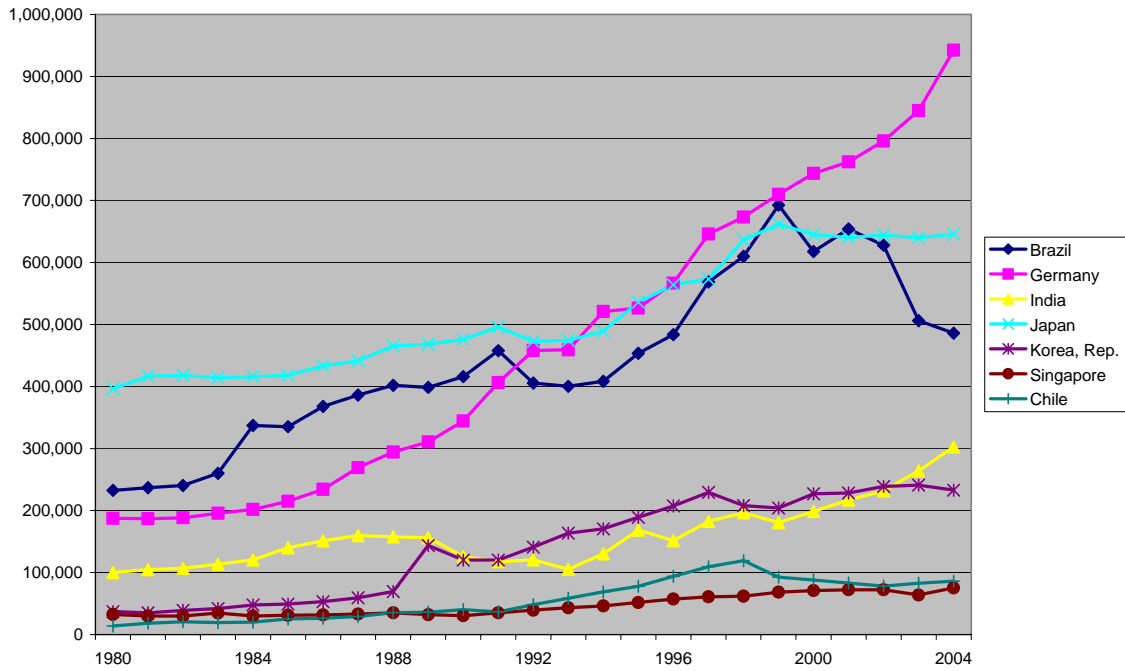




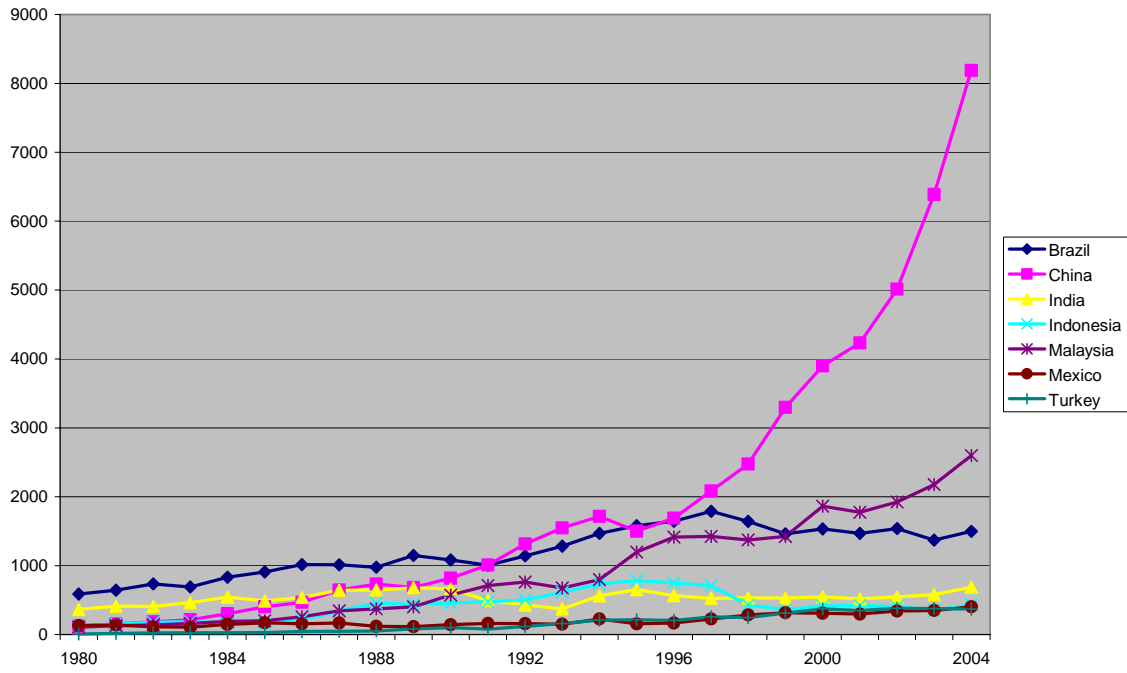
### Aircraft departures



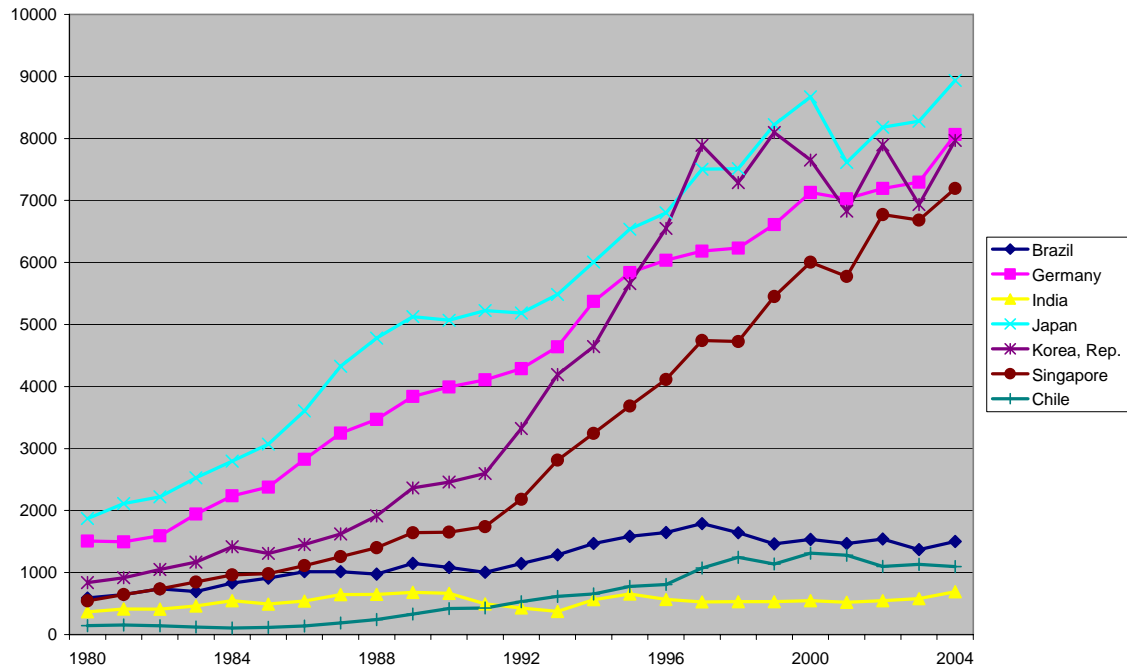
### Aircraft departures



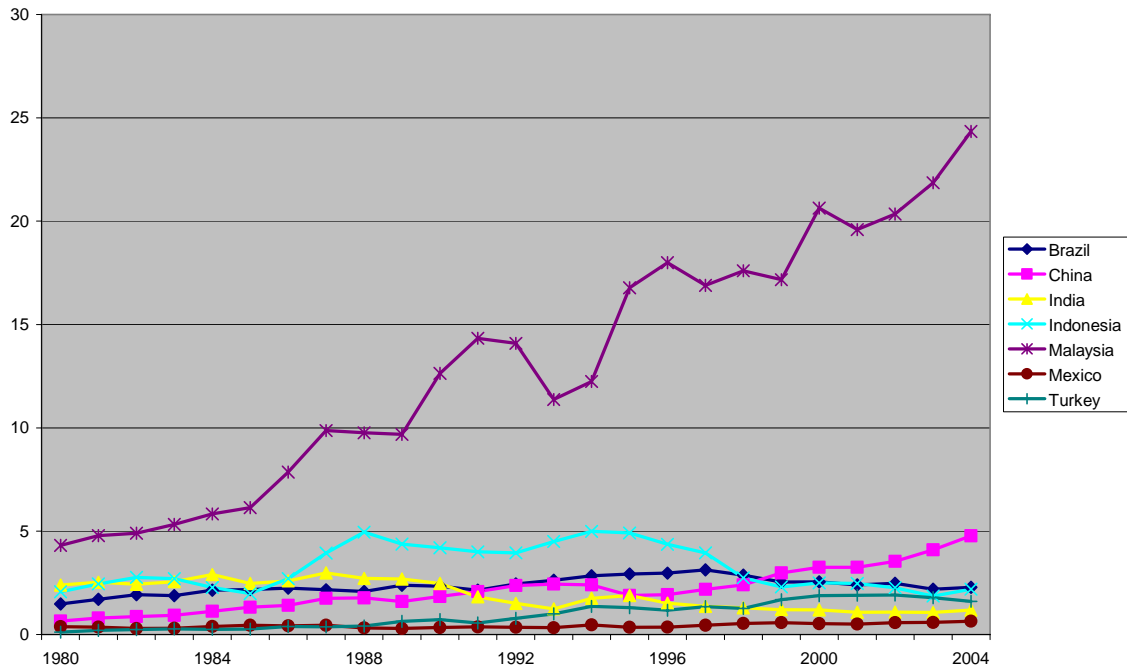
Air transport, freight (million ton-km)



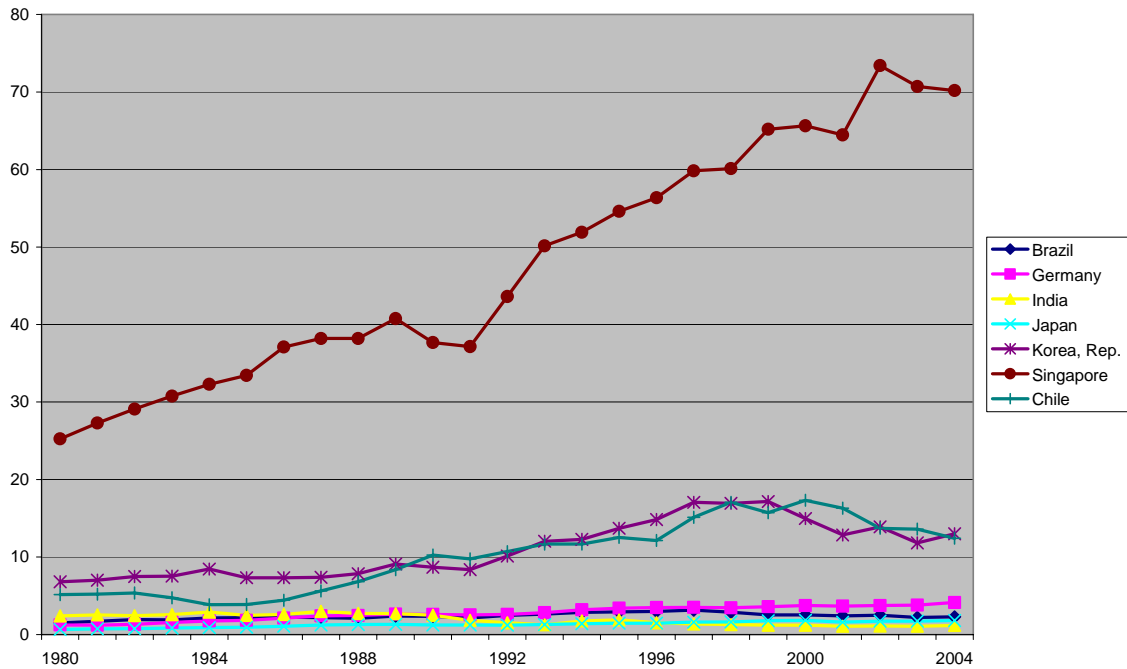
Air transport, freight (million ton-km)



Air transport, freight per GDP (million ton-km per const 2000 \$)

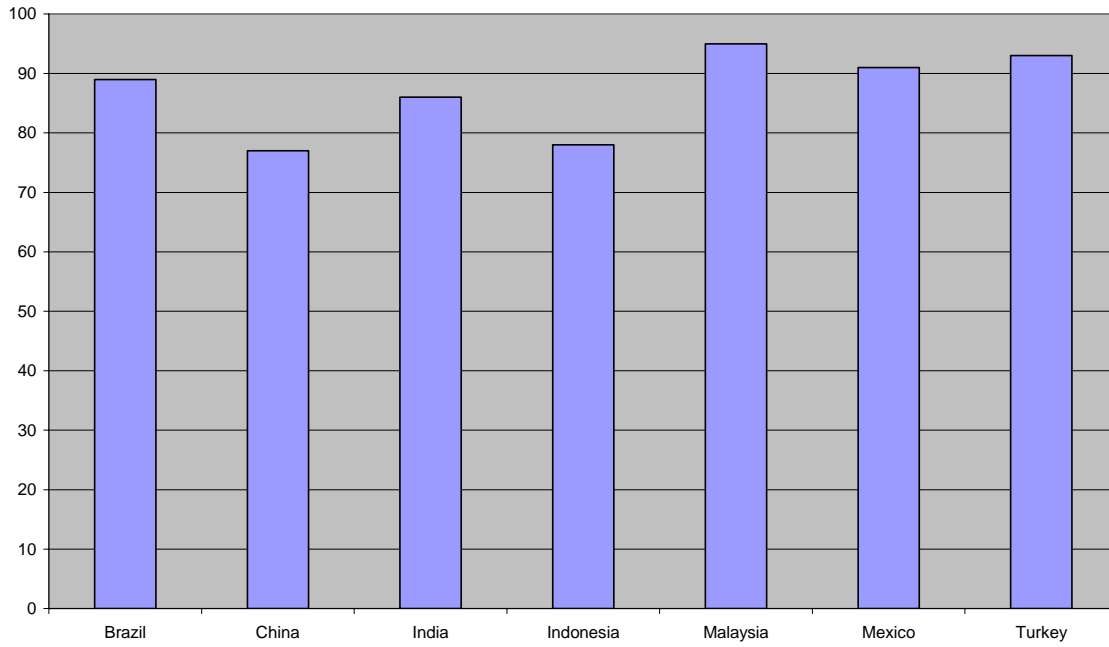


Air transport, freight per GDP (ton-km per thous const 2000 \$)

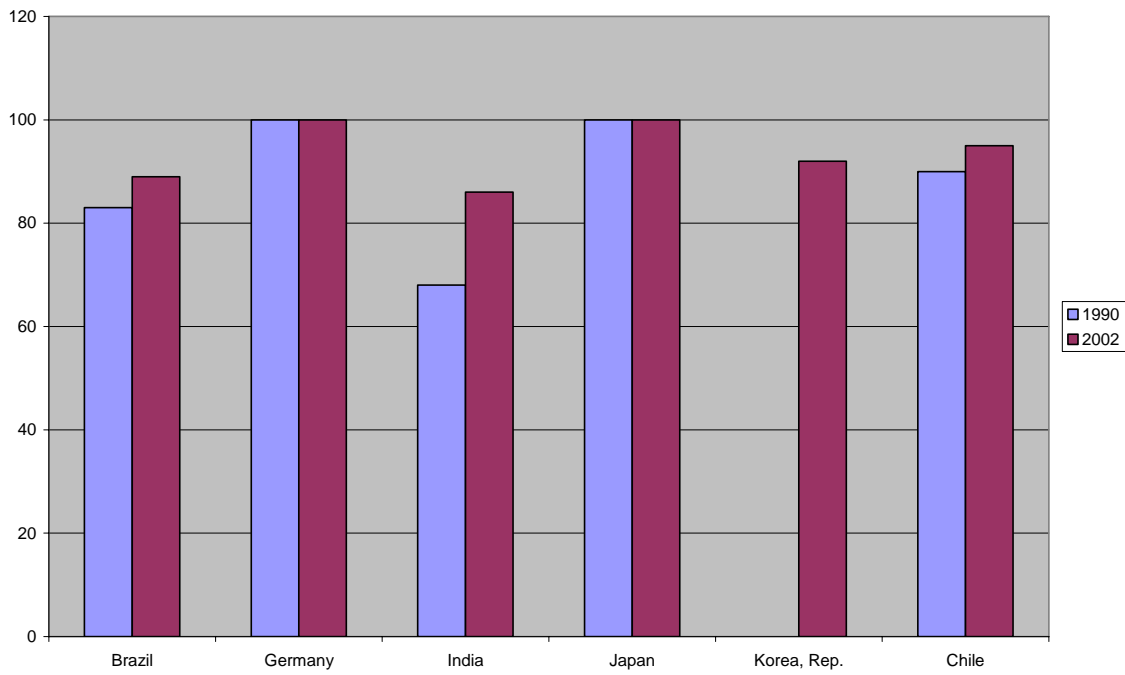


## **7. Water and Sanitation**

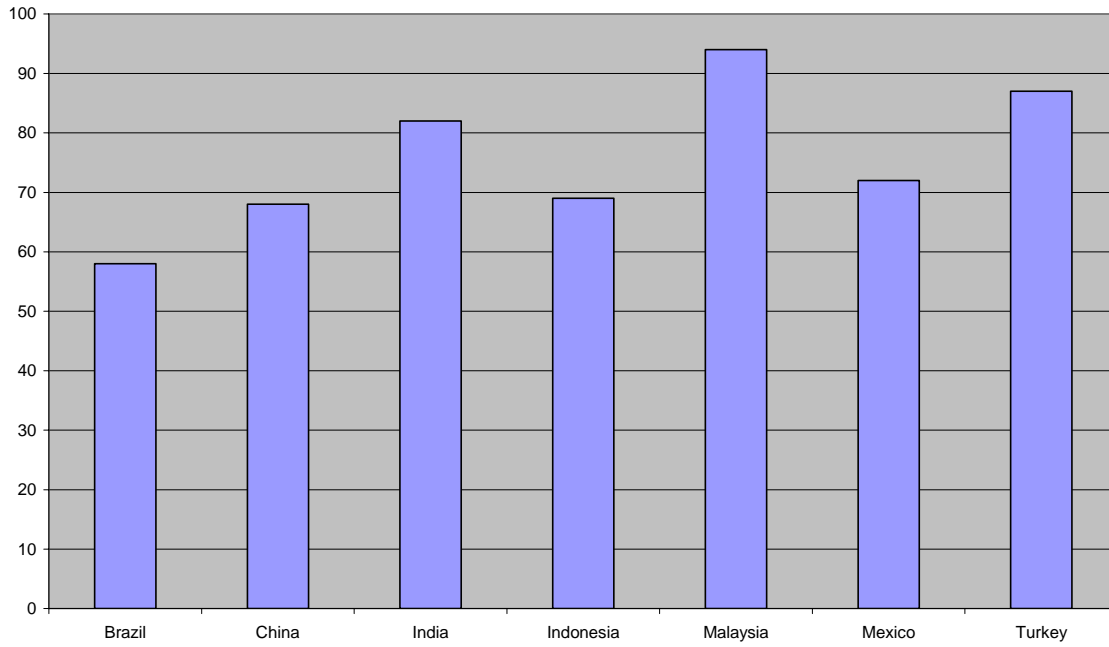
**Improved water source (% of population with access)  
2002**



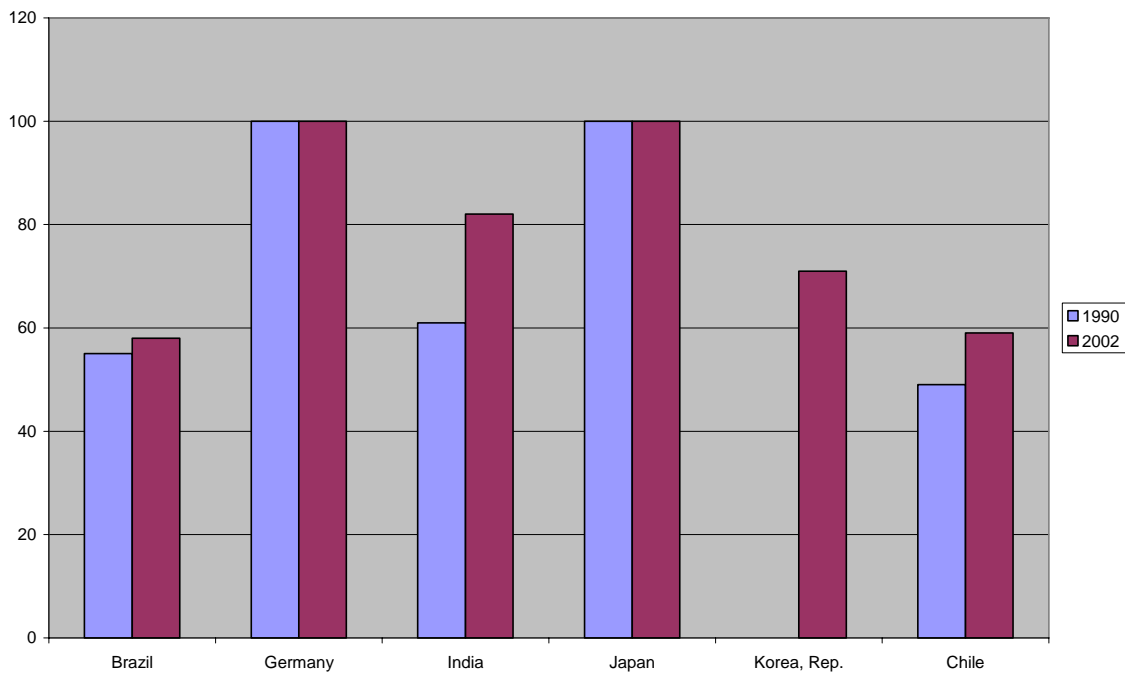
**Improved water source (% of population with access)**



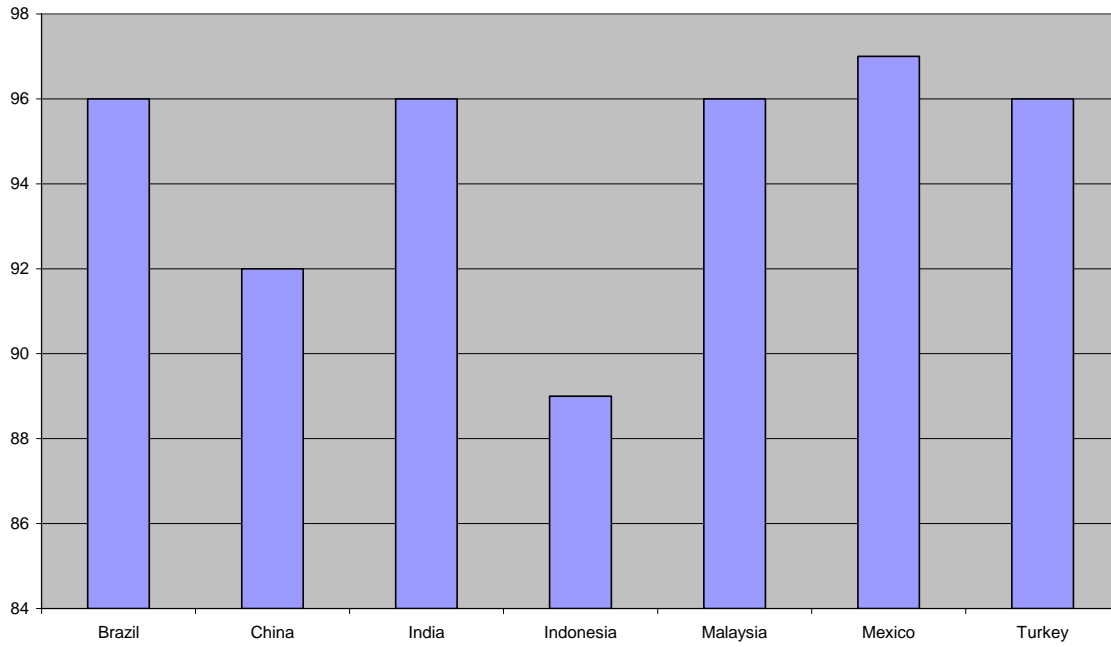
**Improved water source, rural (% of rural population with access)  
2002**



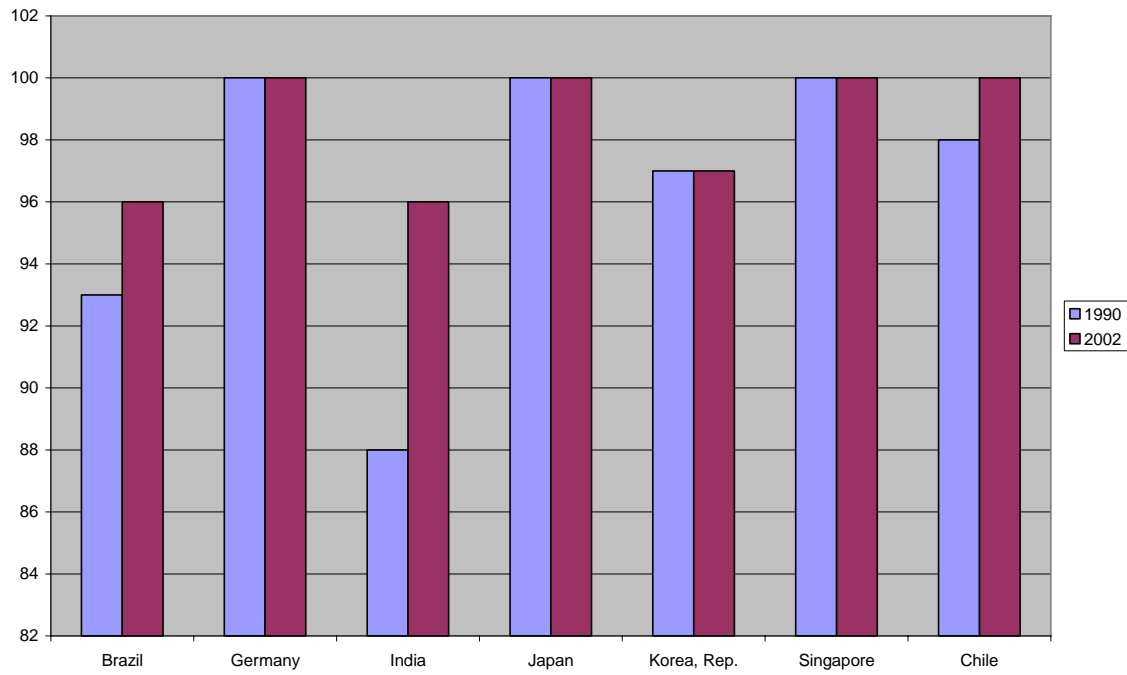
**Improved water source, rural (% of rural population with access)**



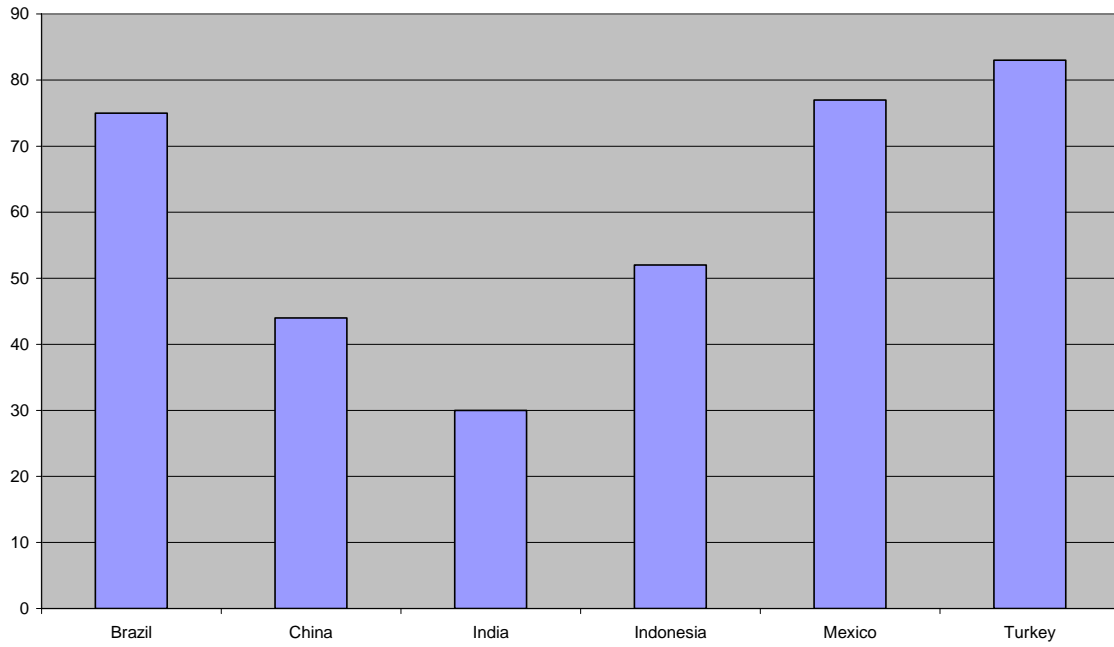
**Improved water source, urban (% of urban population with access)  
2002**



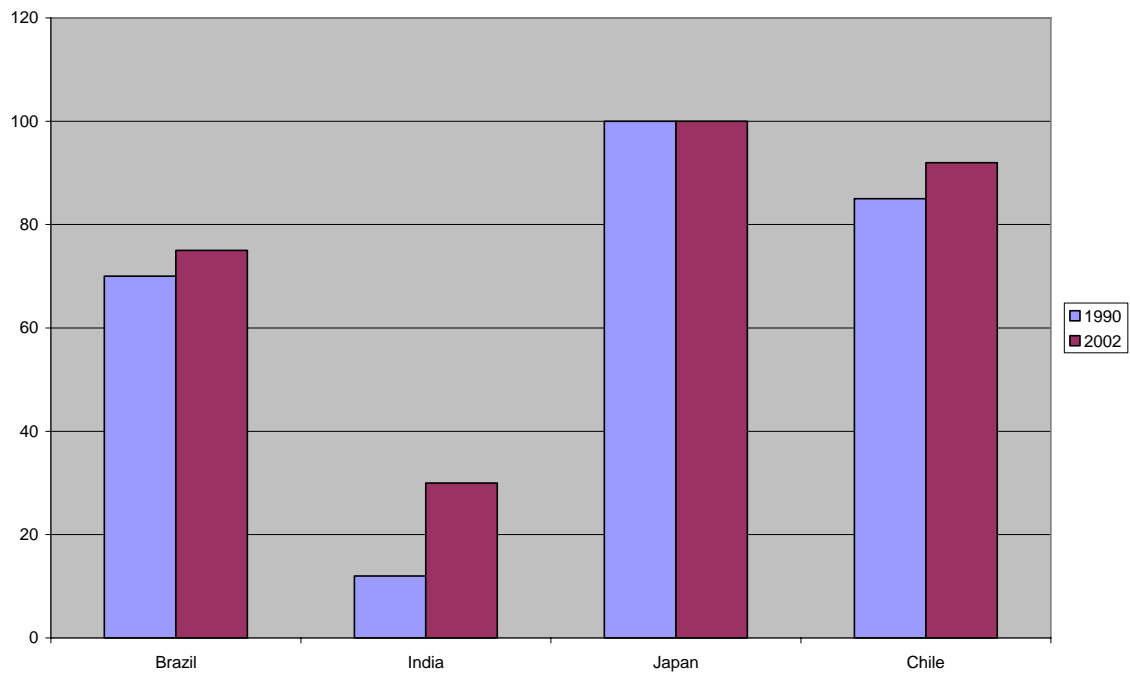
**Improved water source, urban (% of urban population with access)**



**Improved sanitation facilities (% of population with access)  
2002**

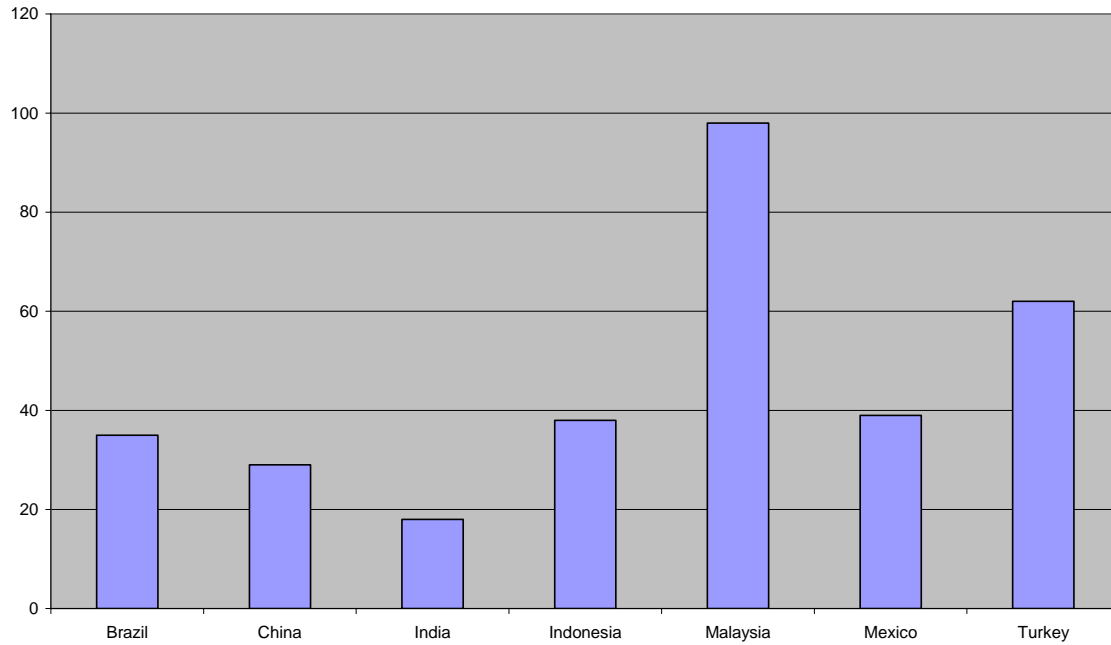


**Improved sanitation facilities (% of population with access)**

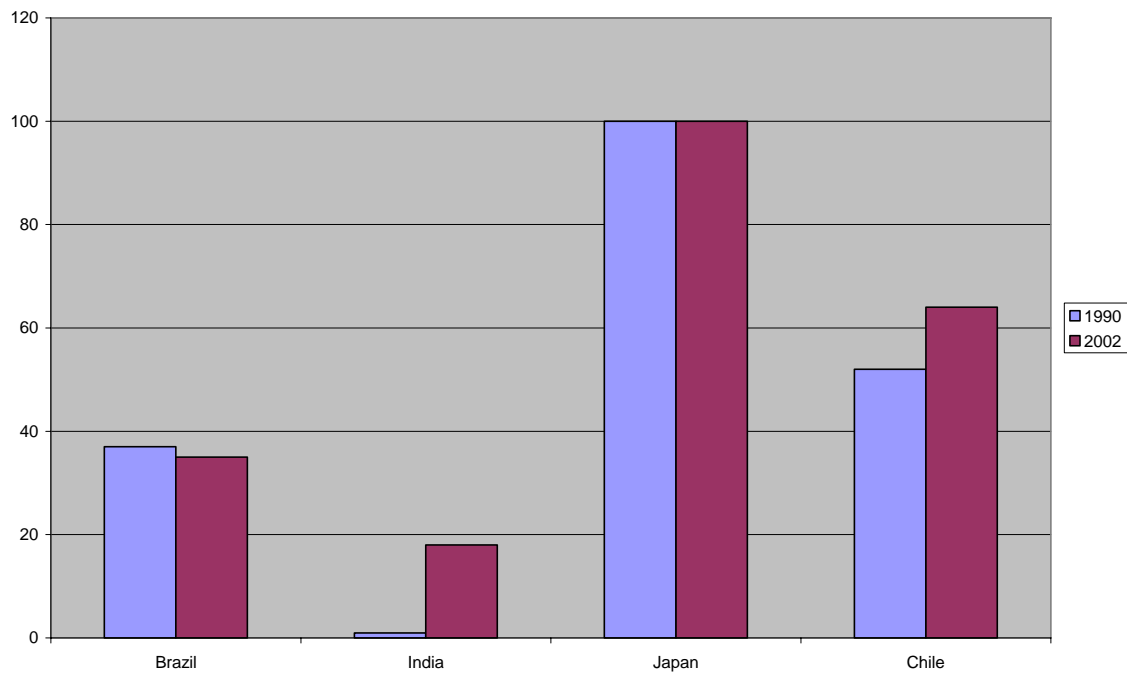




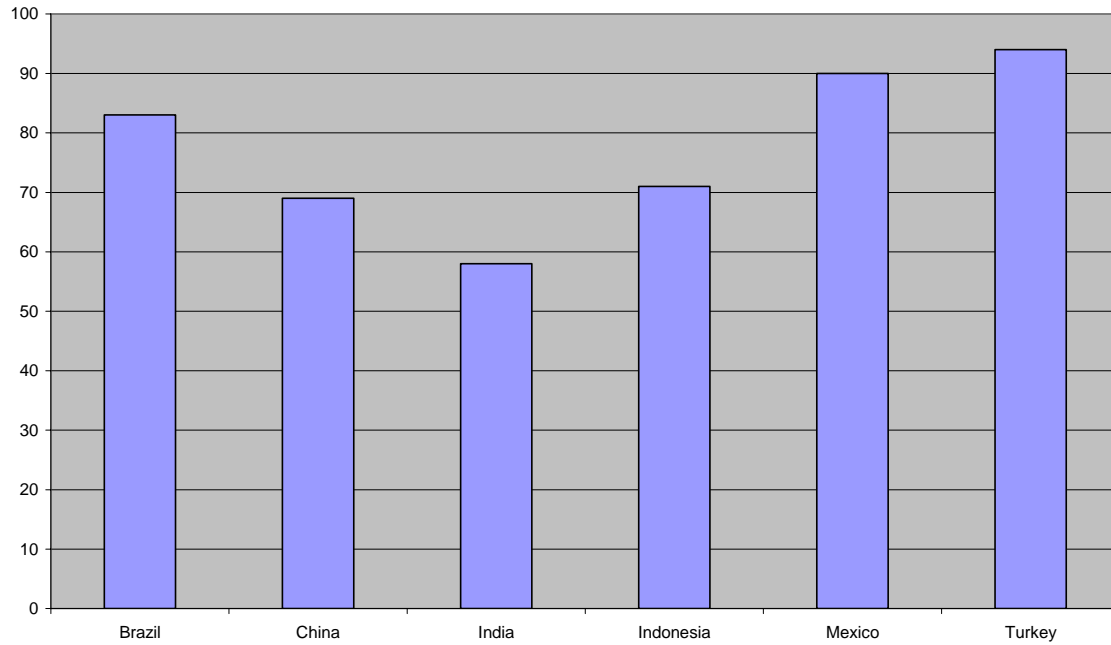
**Improved sanitation facilities, rural (% of rural pop. with access)  
2002**



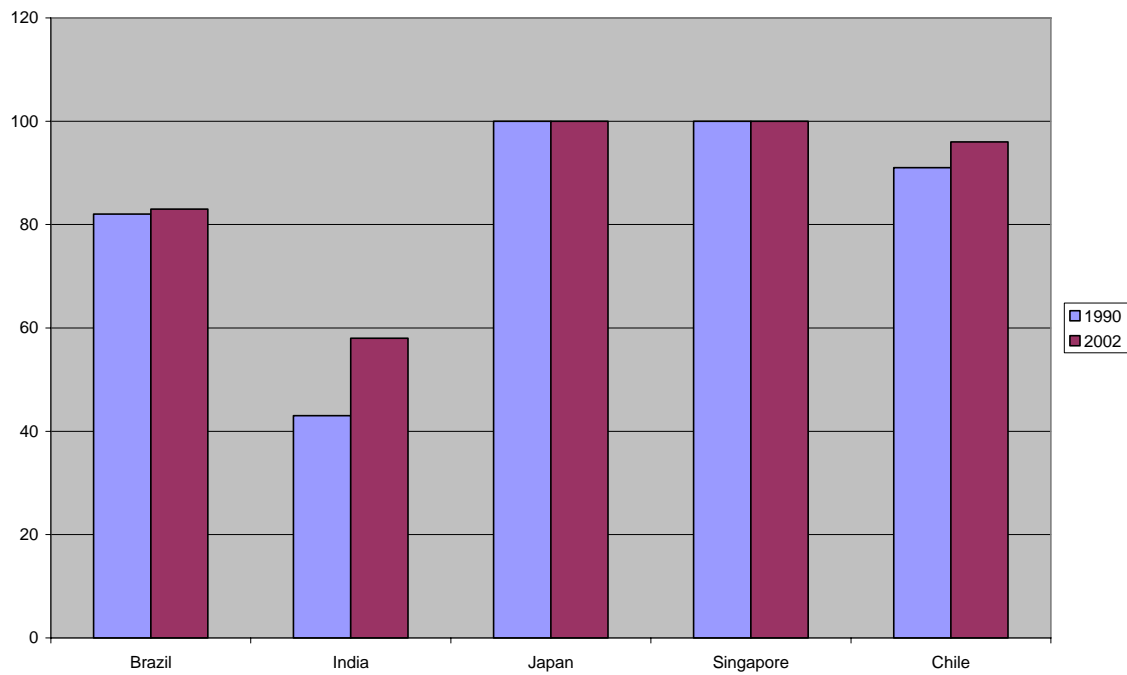
**Improved sanitation facilities, rural (% of rural pop. with access)**



**Improved sanitation facilities, urban (% of urban pop. with access)  
2002**

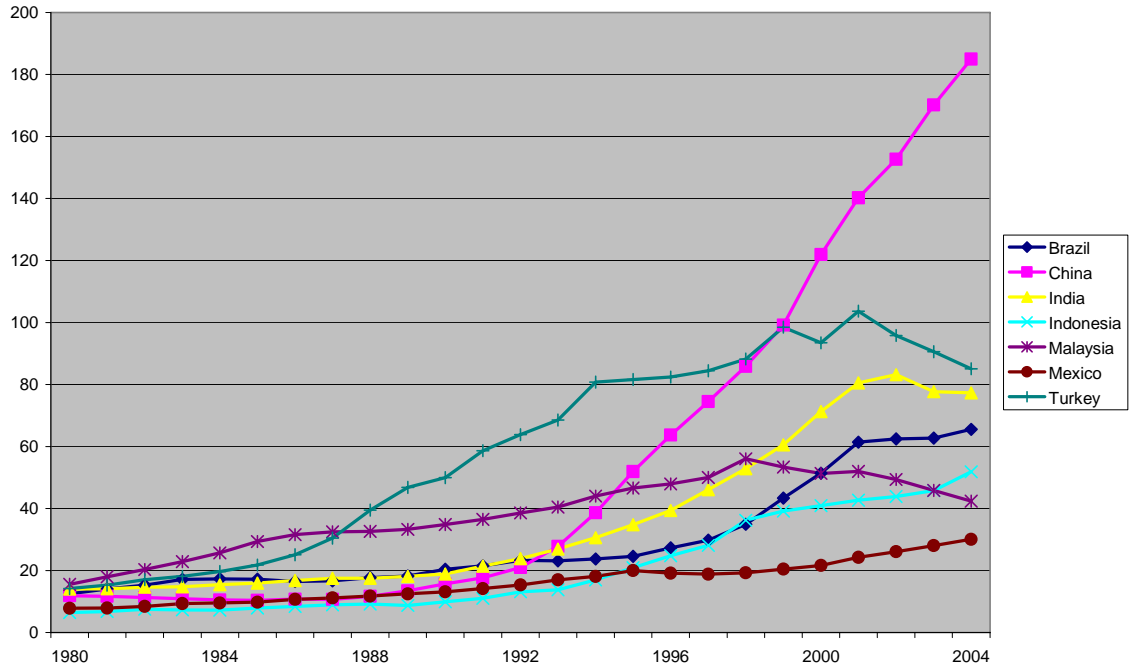


**Improved sanitation facilities, urban (% of urban pop. with access)**

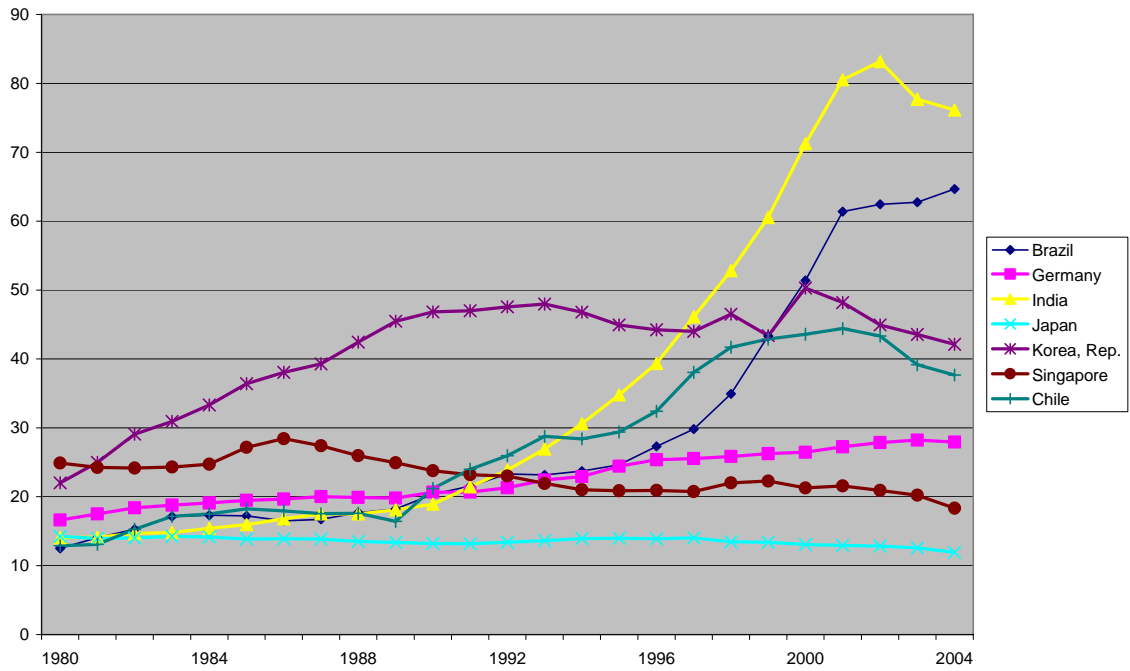


## **8. Telephony**

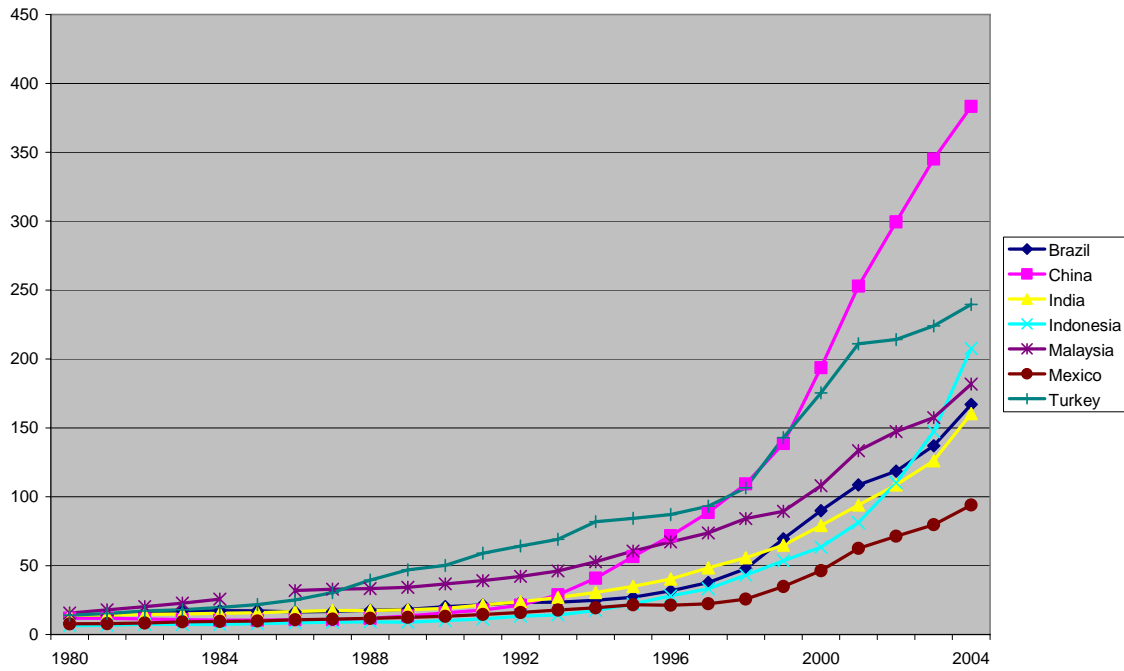
Telephone mainlines per GDP (per mn const 2000 \$)



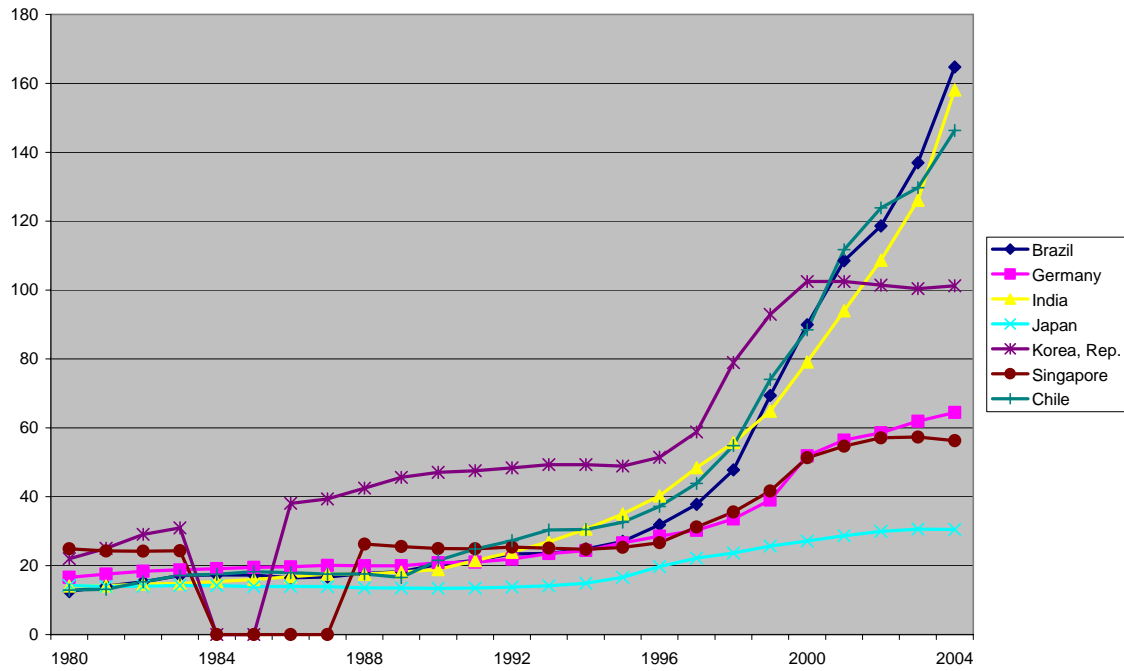
Telephone mainlines per GDP (per mn const 2000 \$)



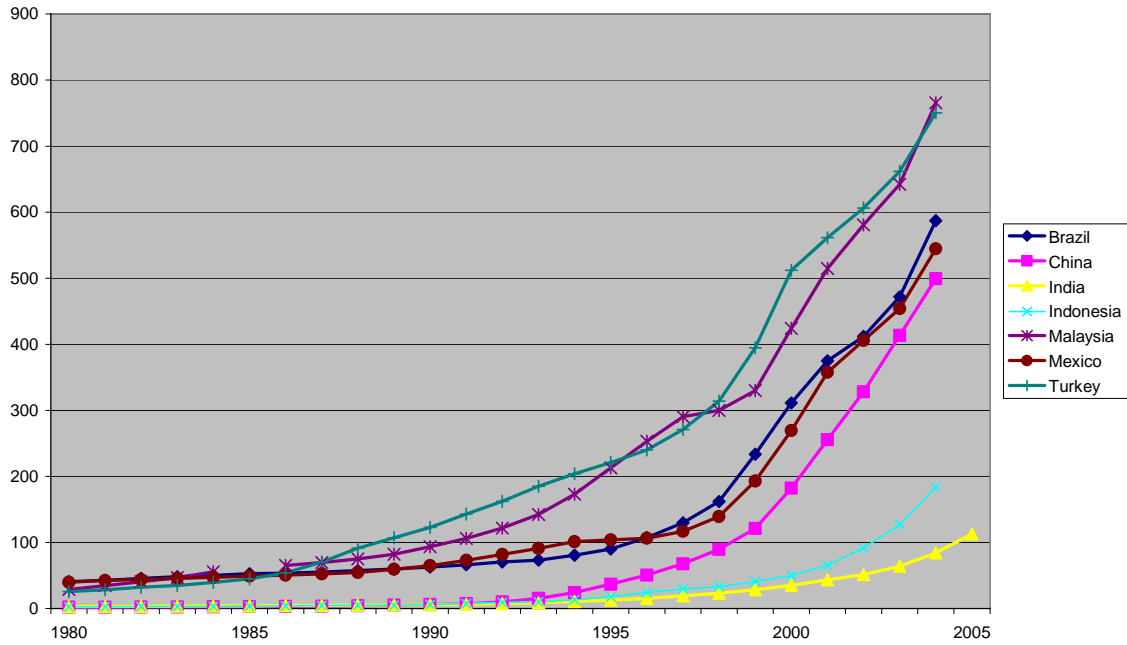
Fixed line & mobile phone subscribers per GDP (per mn const 2000 \$)



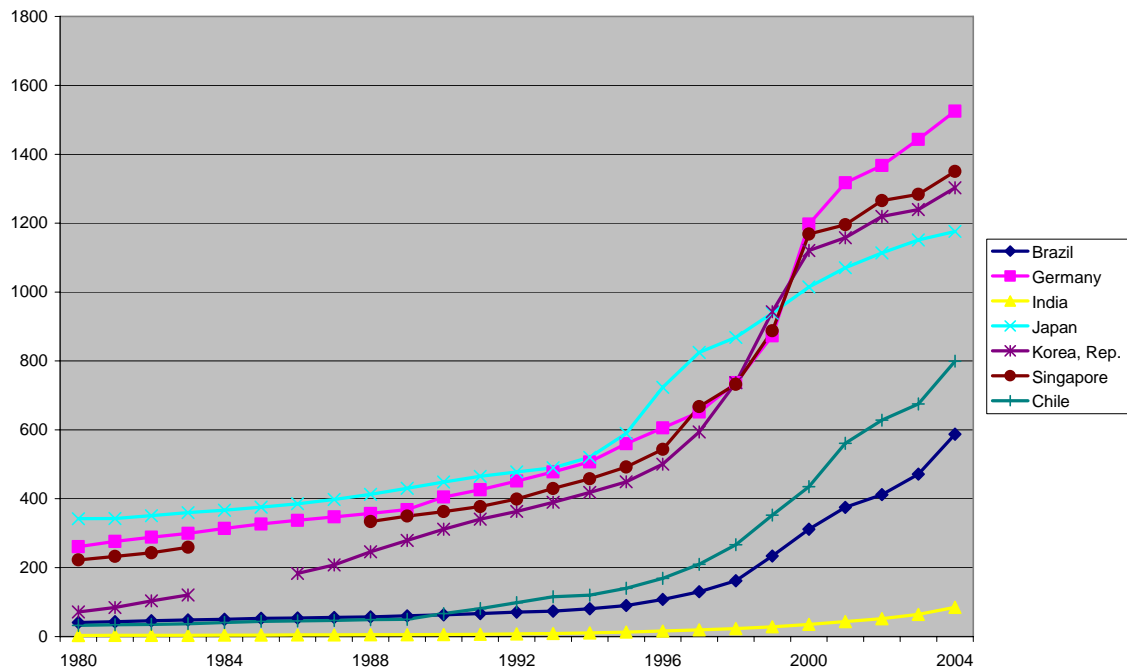
Fixed line & mobile phone subscribers per GDP (per mn const 2000 \$)



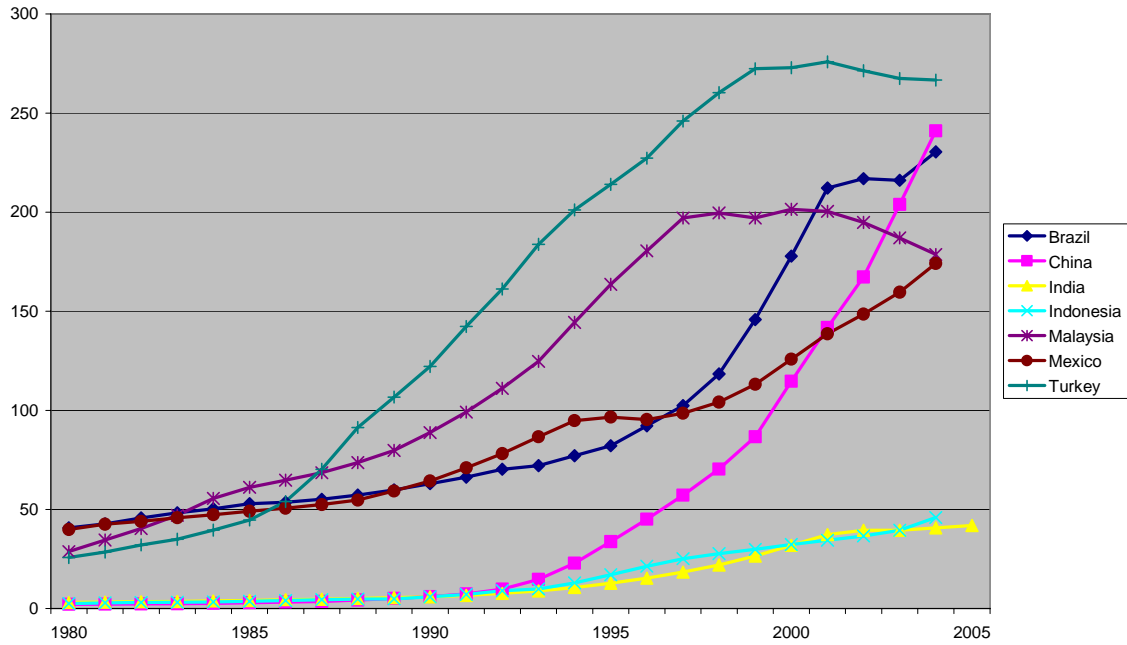
**Fixed line and mobile phone subscribers (per 1,000 people)**  
 2005 data from the Planning Commission of India



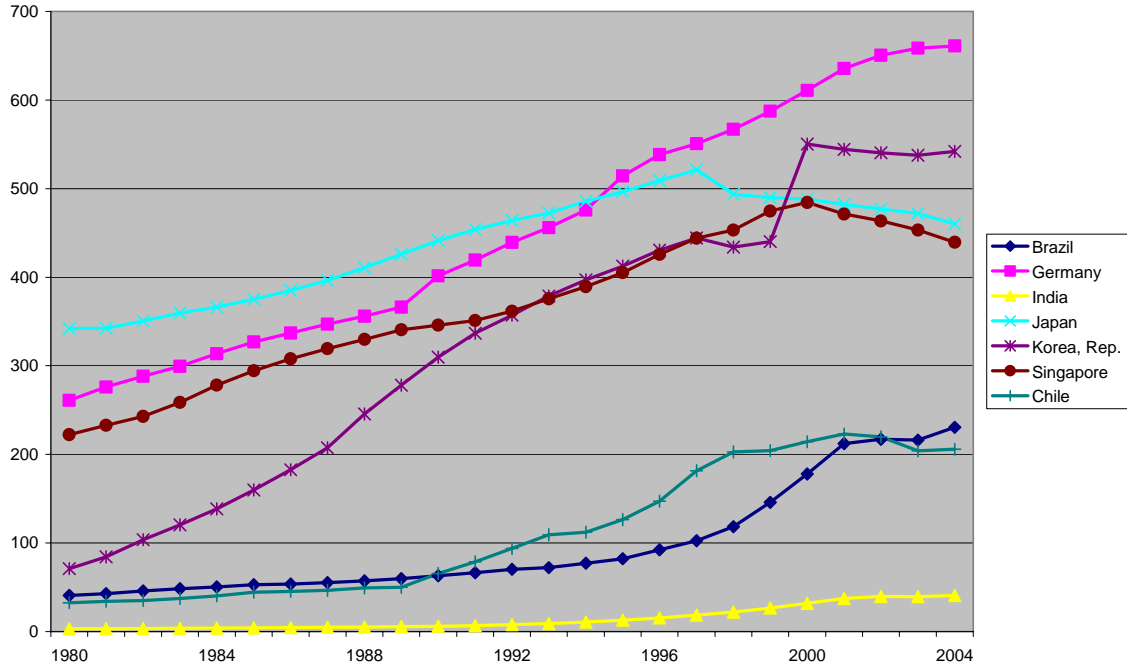
**Fixed line and mobile phone subscribers (per 1,000 people)**



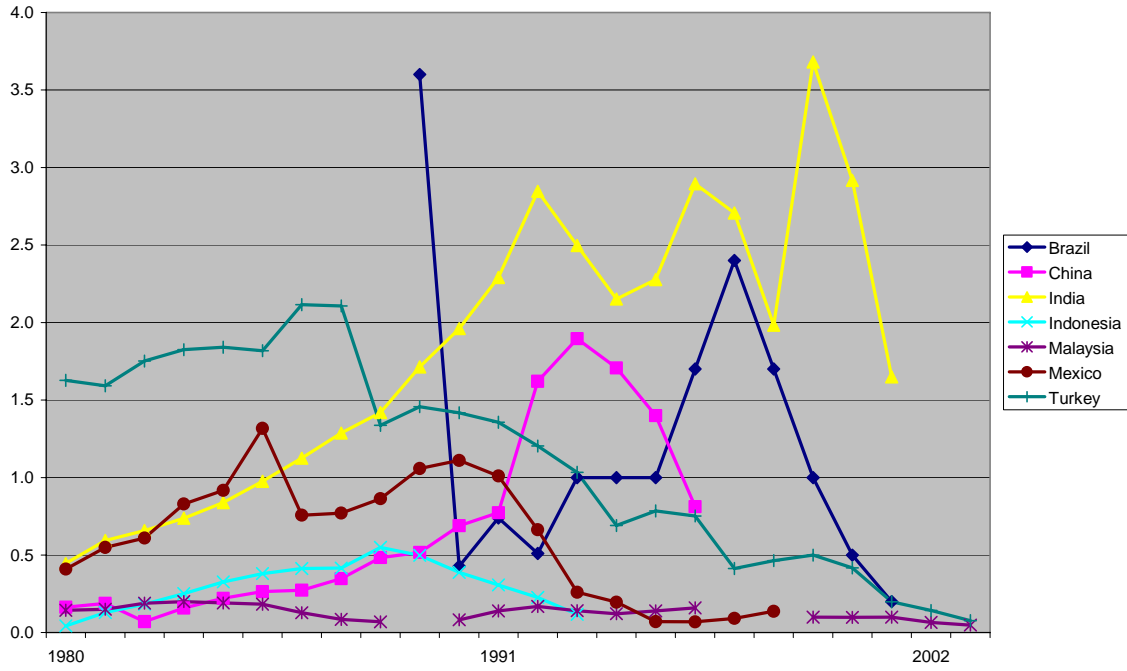
**Telephone mainlines (per 1,000 people)**  
2005 data from the Planning Commission of India



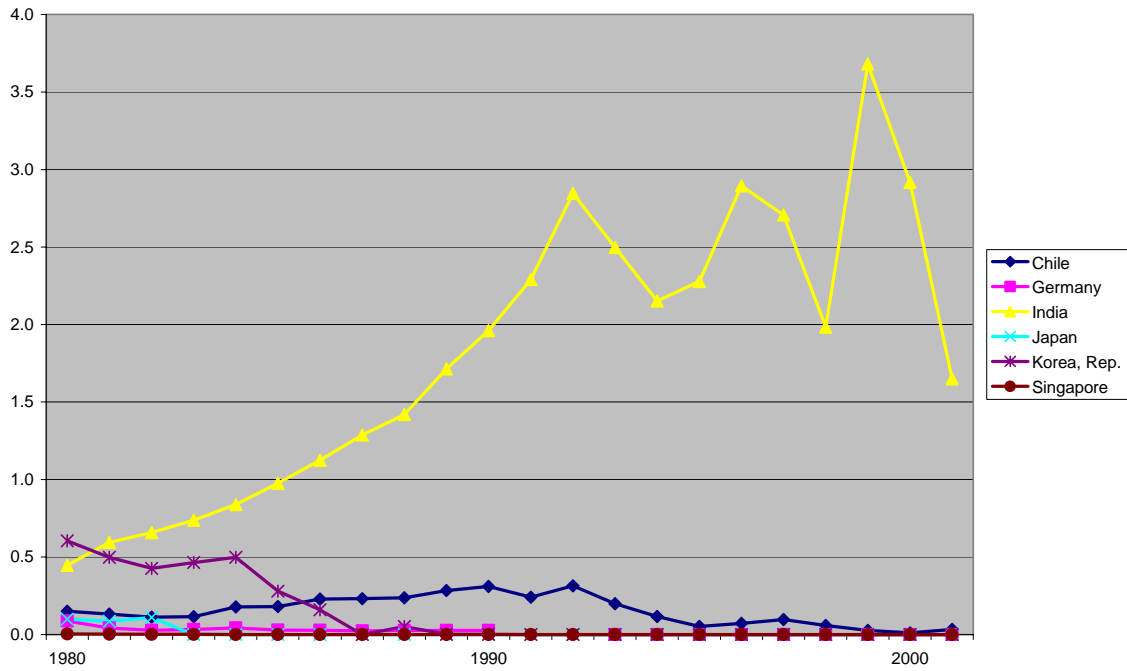
**Telephone mainlines (per 1,000 people)**



Telephone mainlines, waiting list (million people)

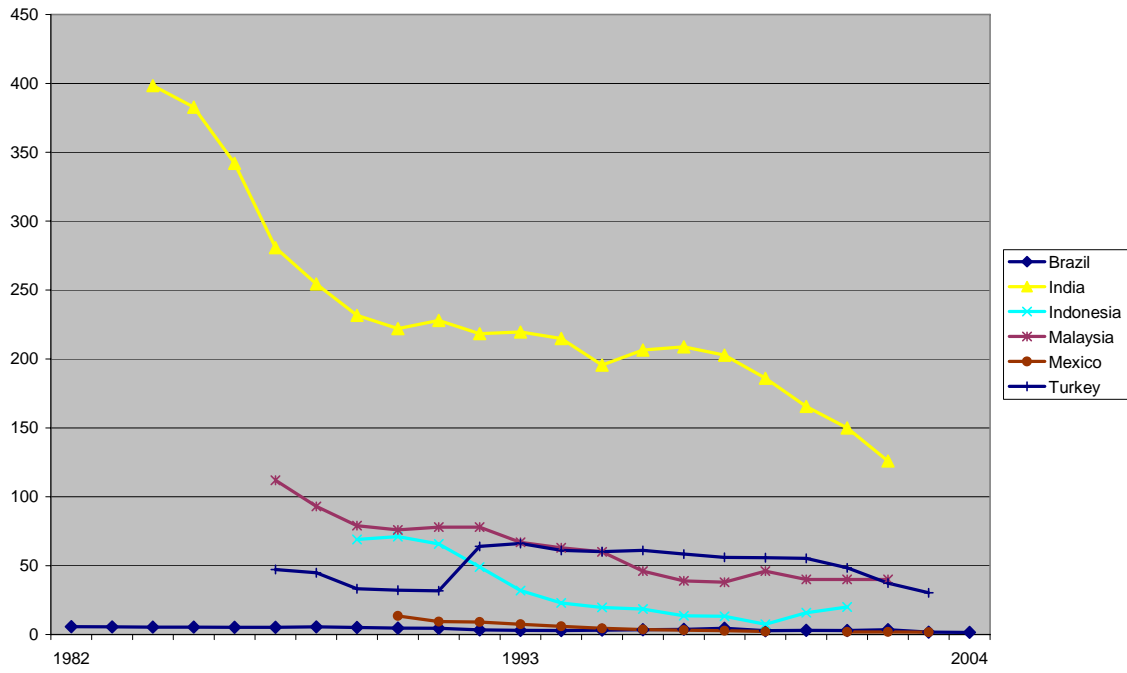


Telephone mainlines, waiting list (million people)

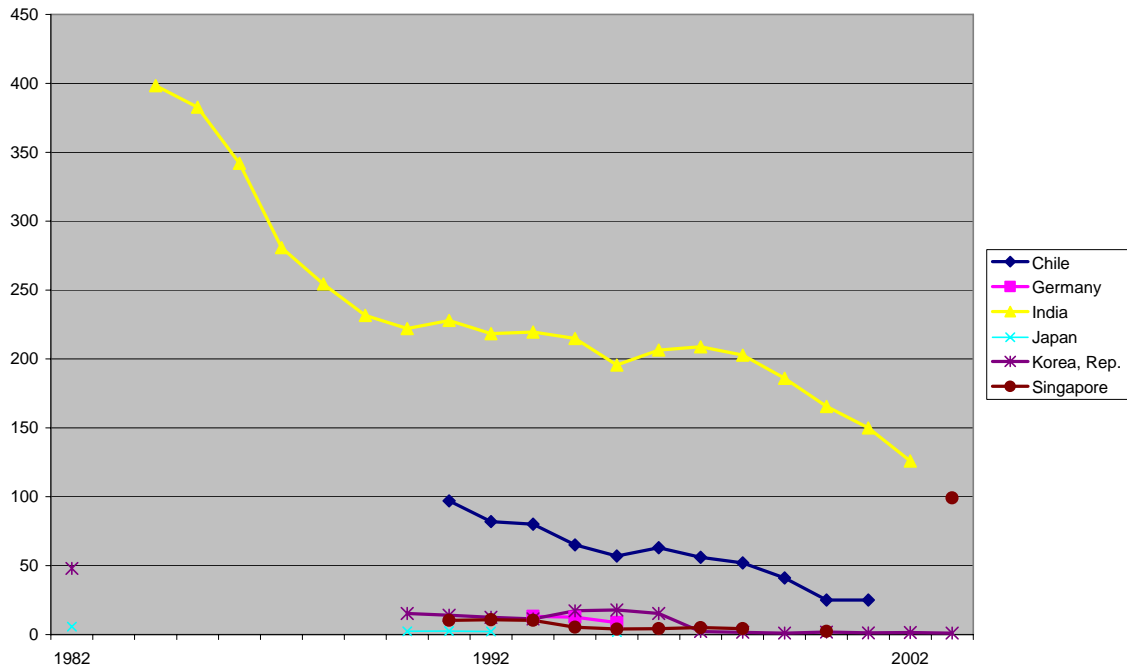




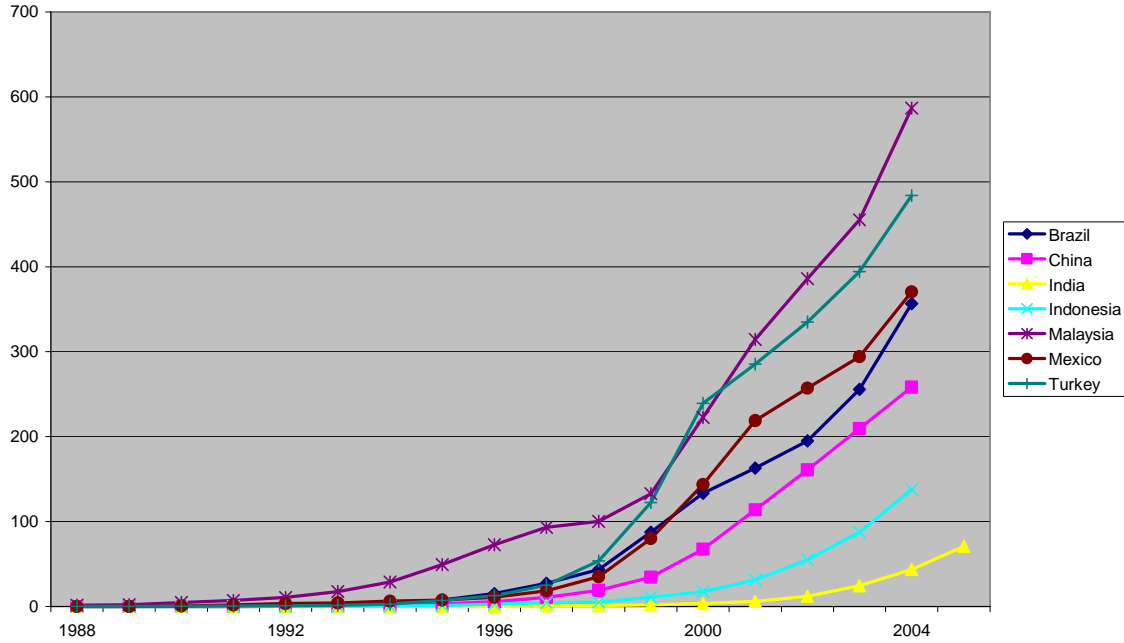
Telephone faults (per 100 mainlines)



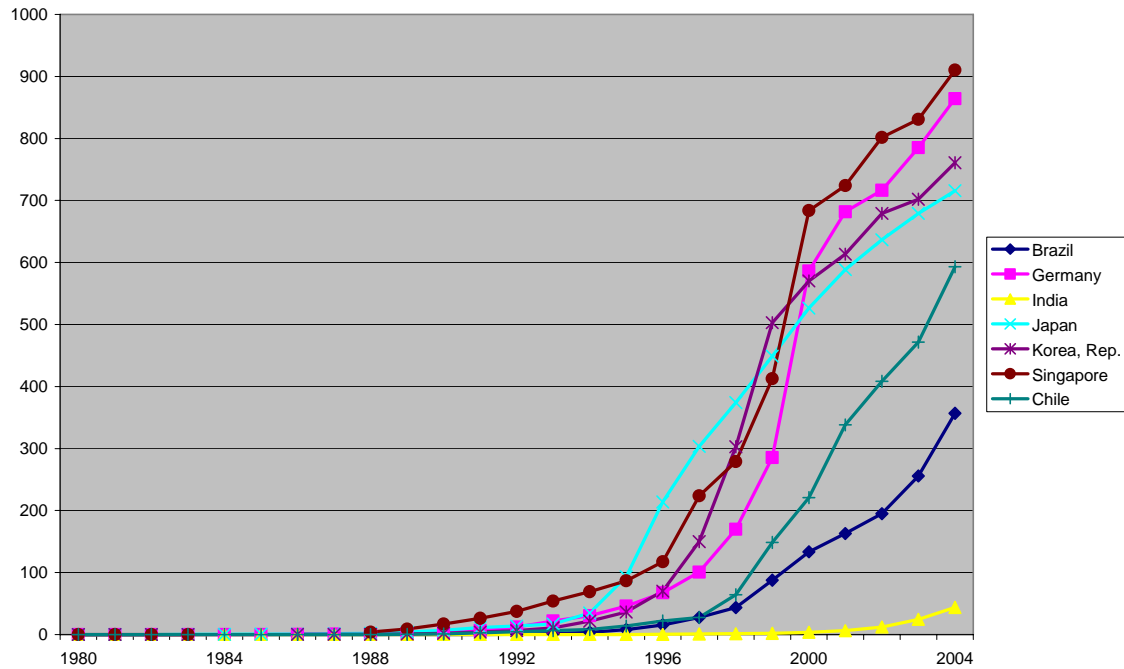
Telephone faults (per 100 mainlines)



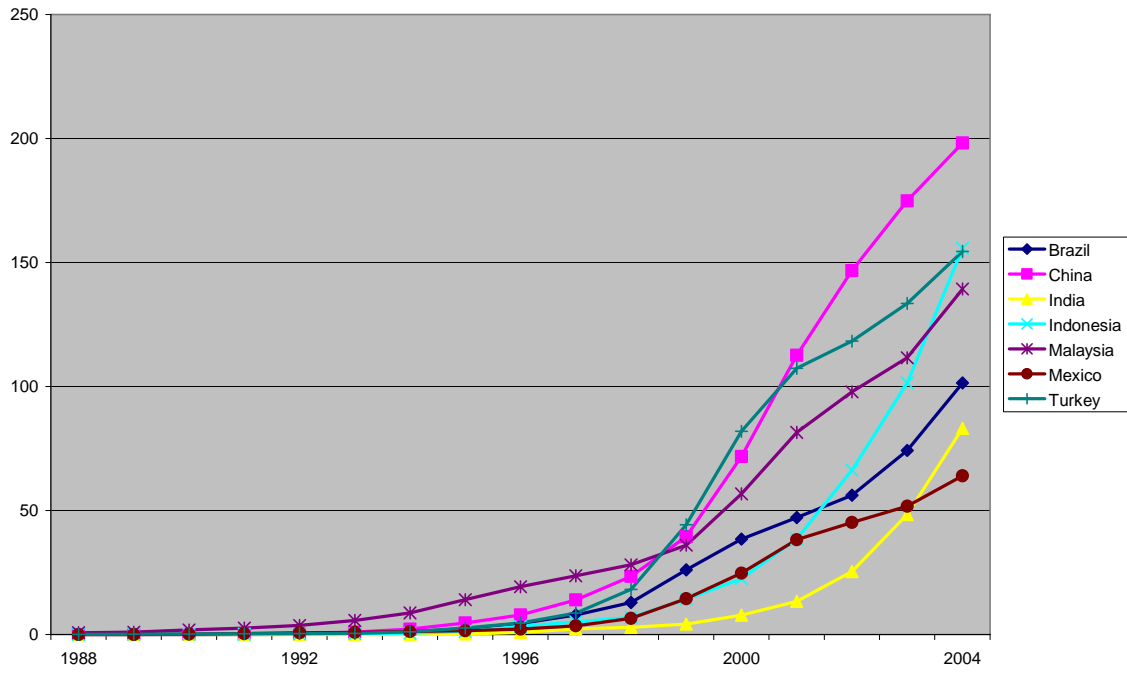
**Mobile phones (per 1,000 people)**  
2005 data from the Planning Commission of India



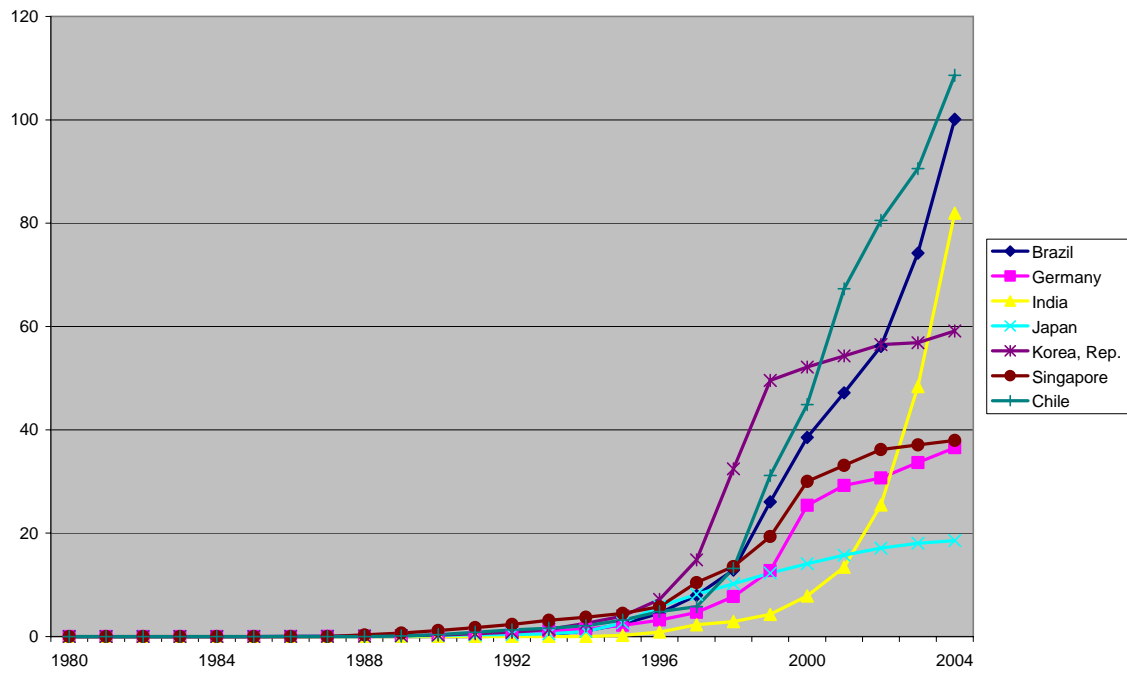
**Mobile phones (per 1,000 people)**



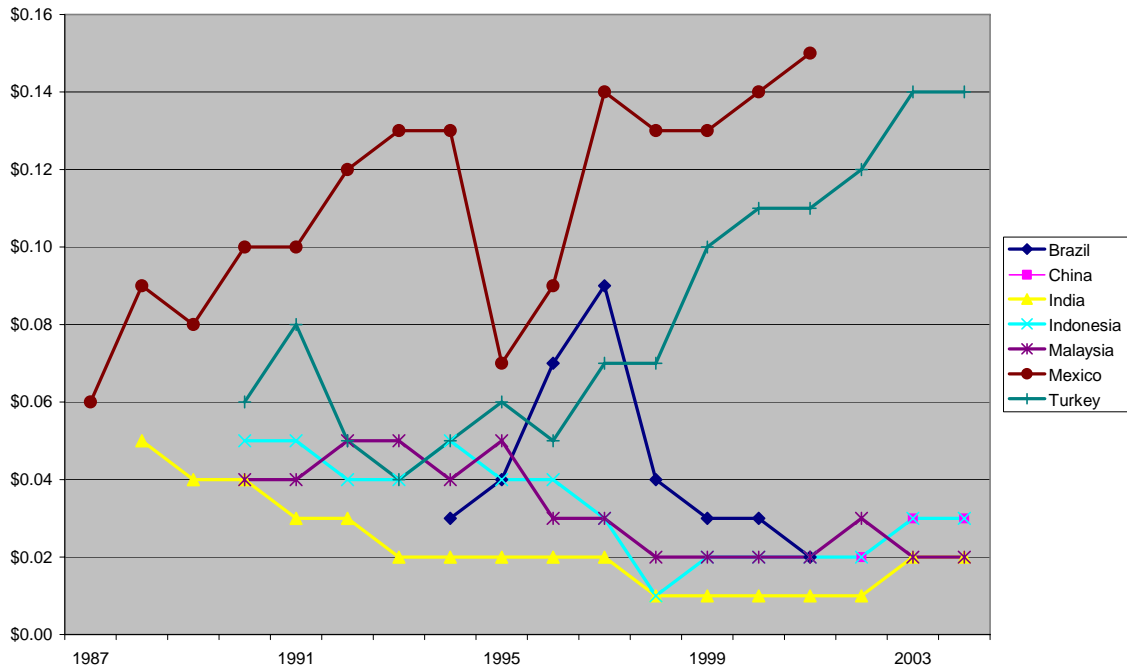
Mobile phones per GDP (per mn const 2000 \$)



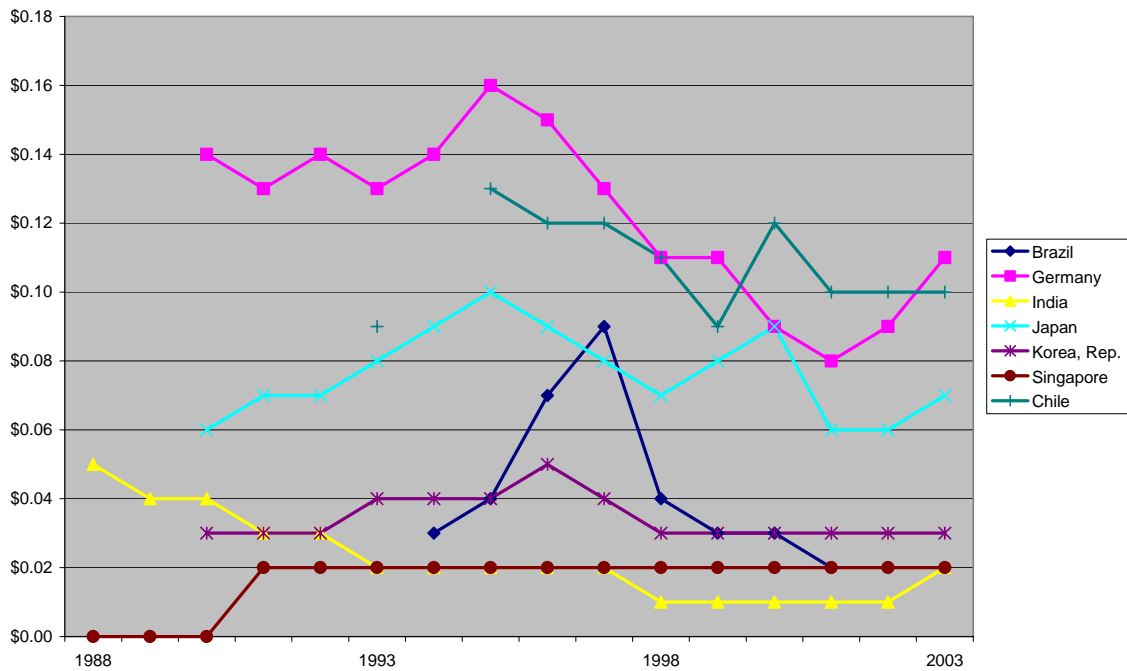
Mobile phones per GDP (per mn const 2000 \$)



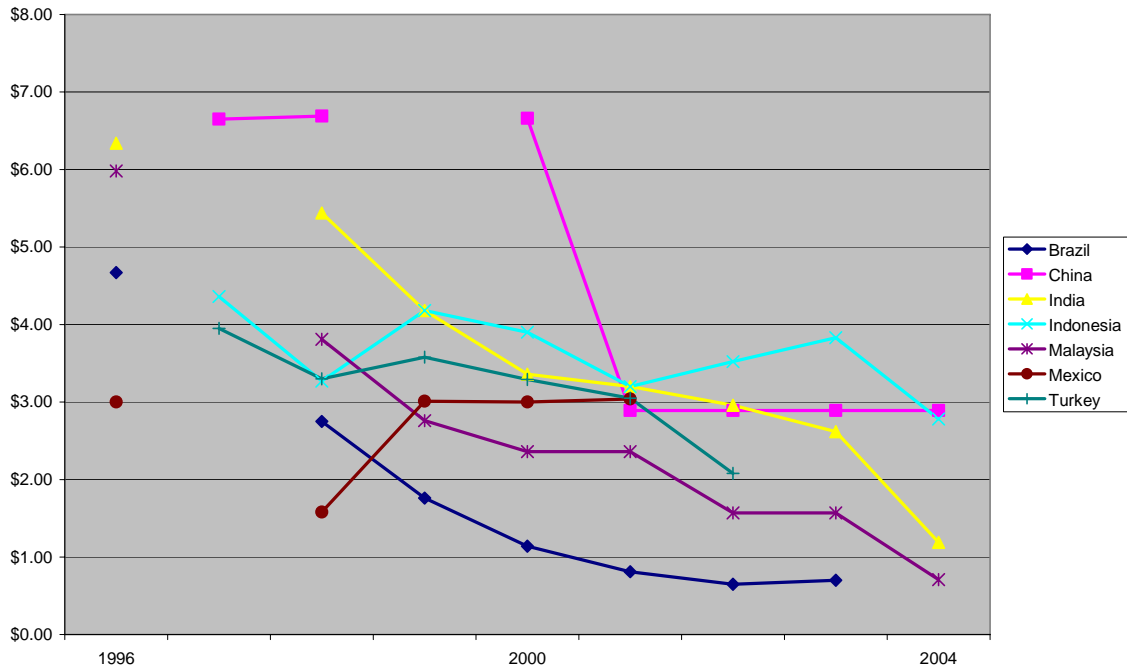
Telephone average cost of local call (US\$ per three minutes)



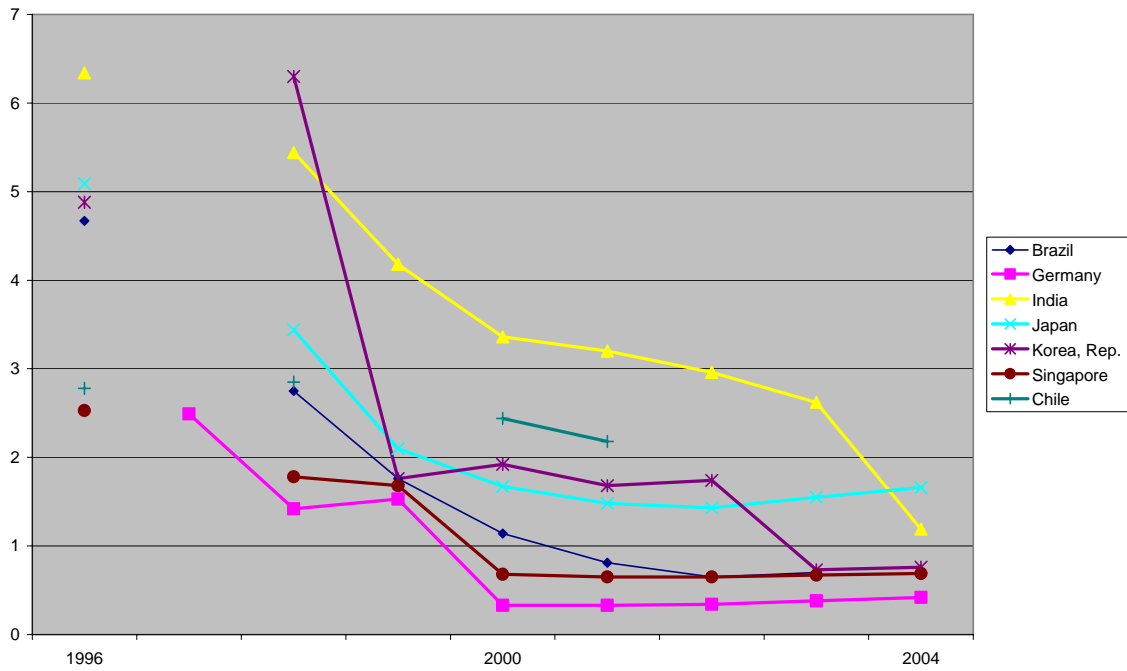
Telephone average cost of local call (US\$ per three minutes)



Telephone average cost of call to US (US\$ per three minutes)

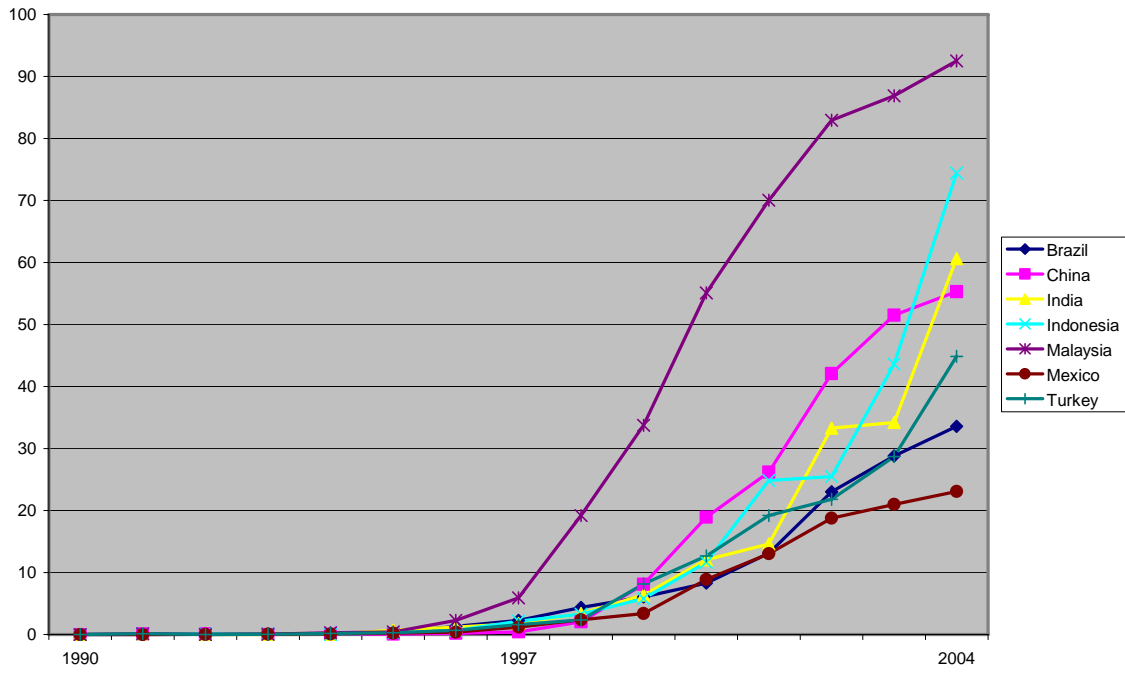


Telephone average cost of call to US (US\$ per three minutes)

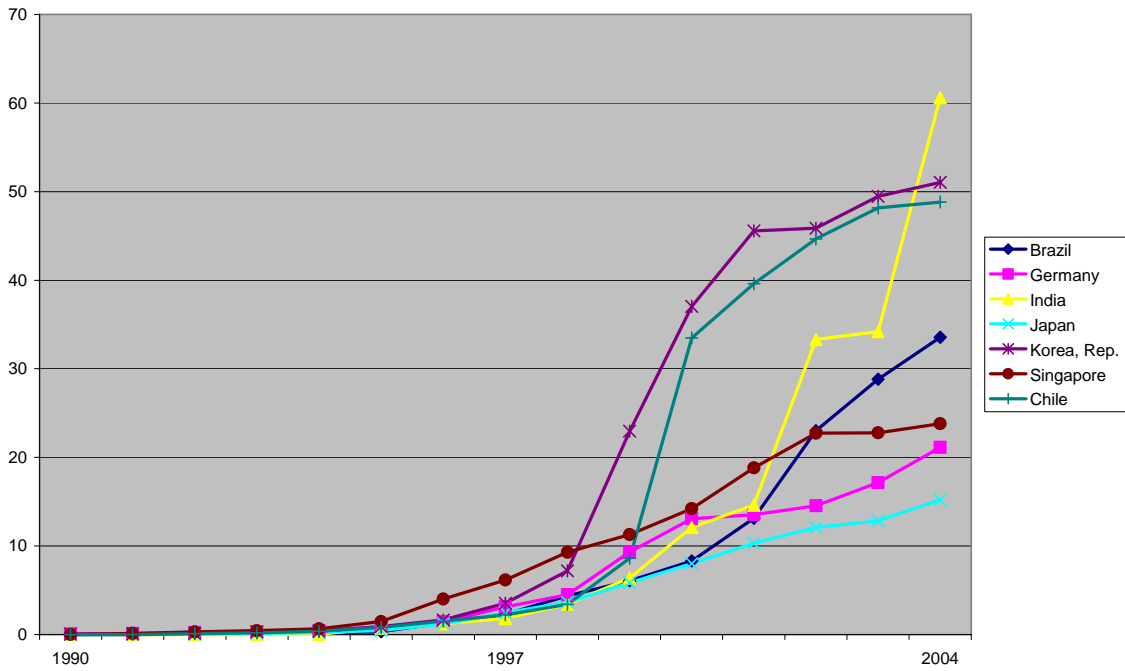


## **9. Information Technology**

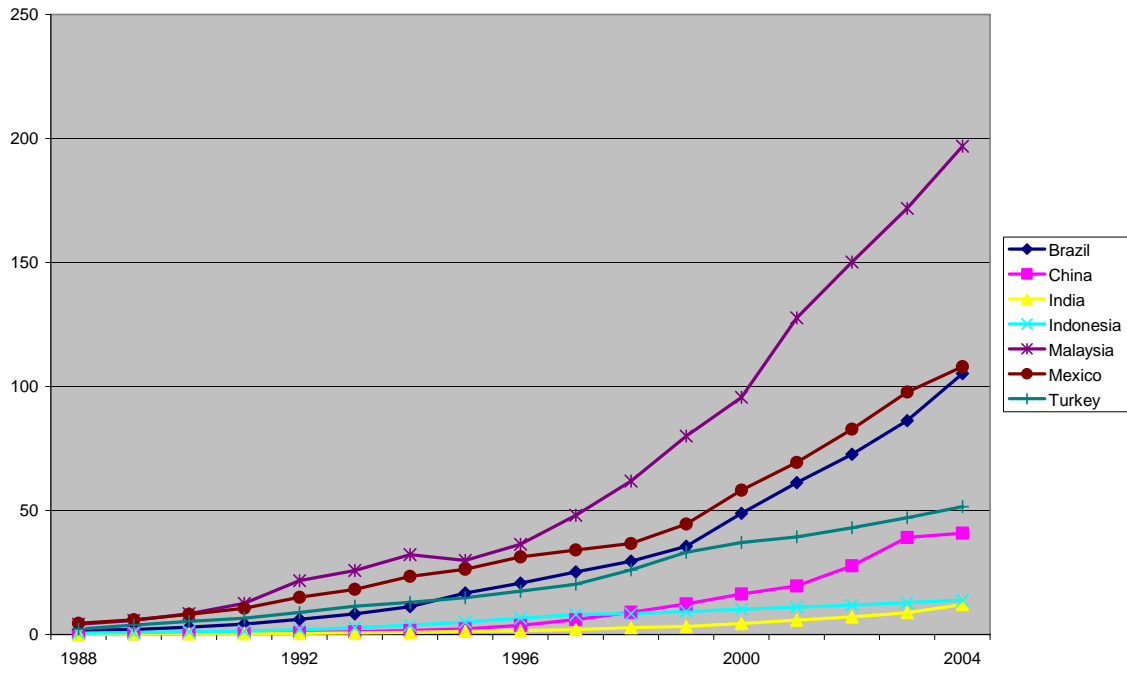
Internet Users per GDP (per thous const. 2000 \$)



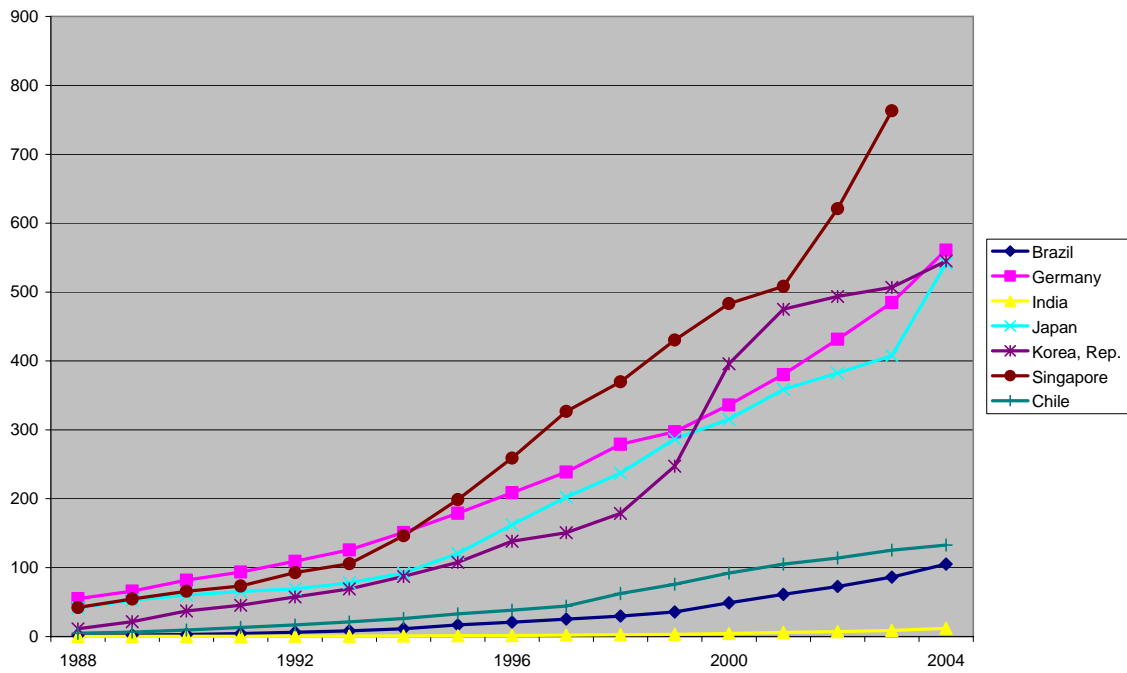
Internet Users per GDP (per thous const. 2000 \$)



Personal computers (per 1,000 people)

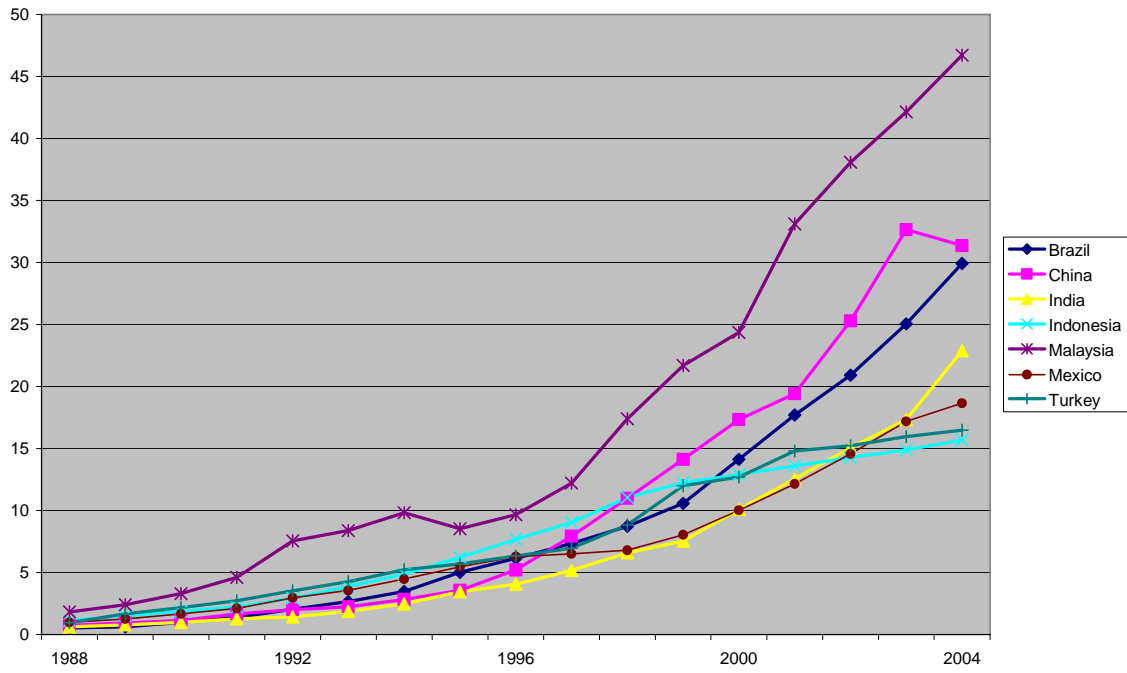


Personal computers (per 1,000 people)

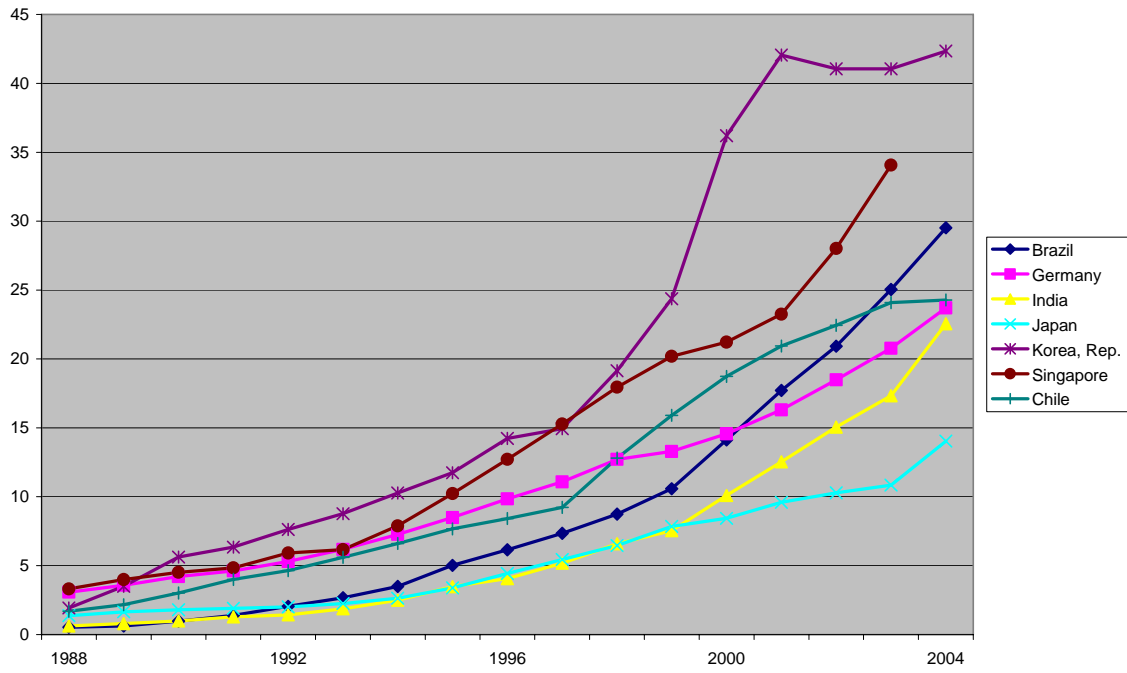




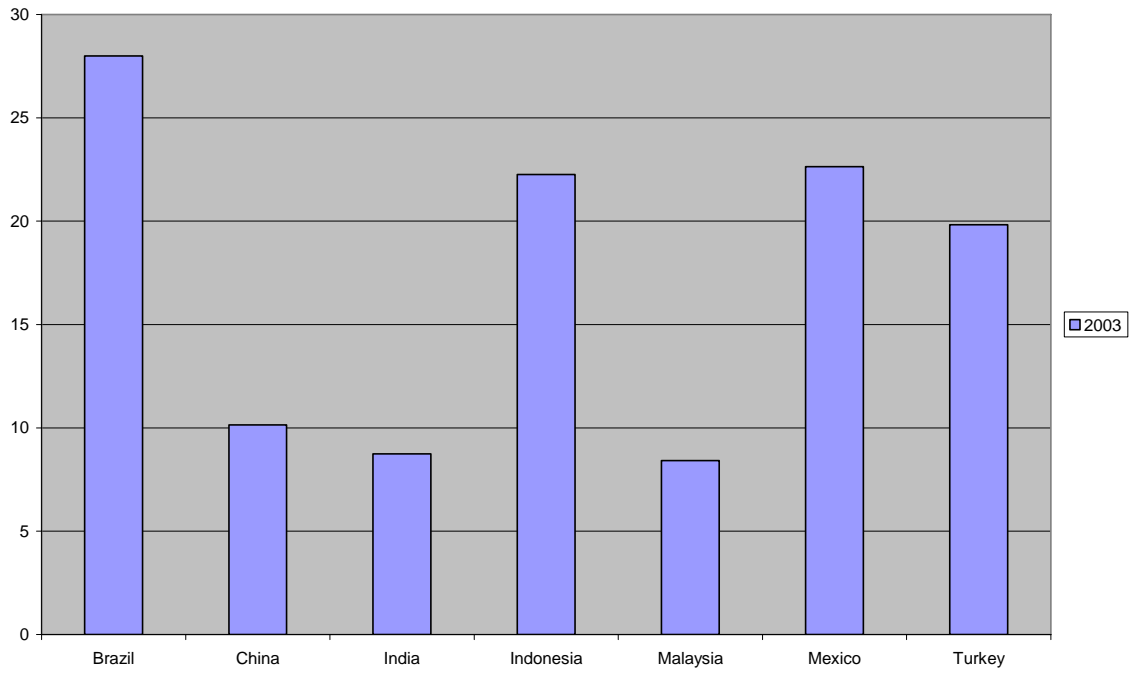
Personal computers per GDP (per mn const 2000 \$)



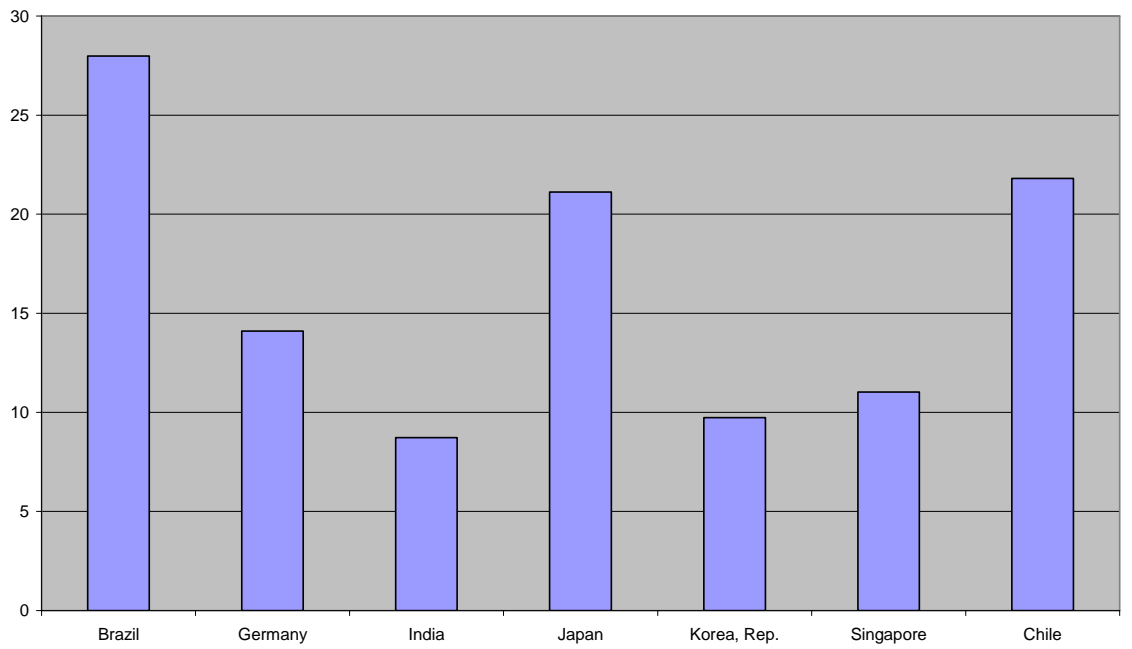
Personal computers per GDP (per mn const 2000 \$)



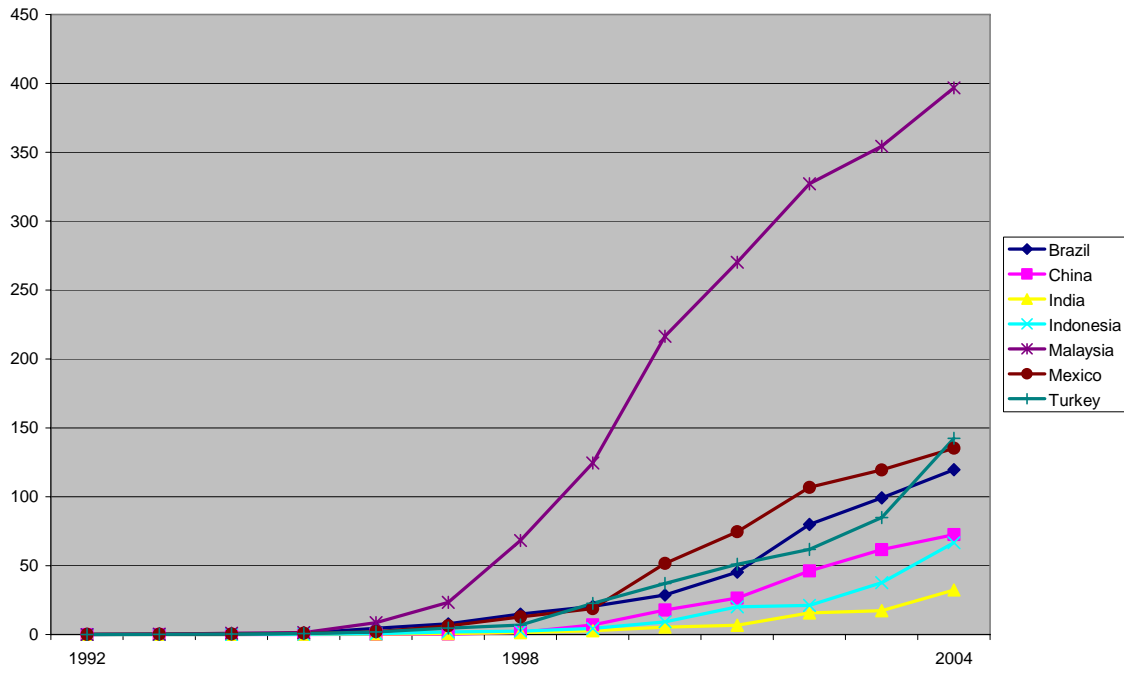
**Internet total monthly price (\$ per 20 hours of use)**



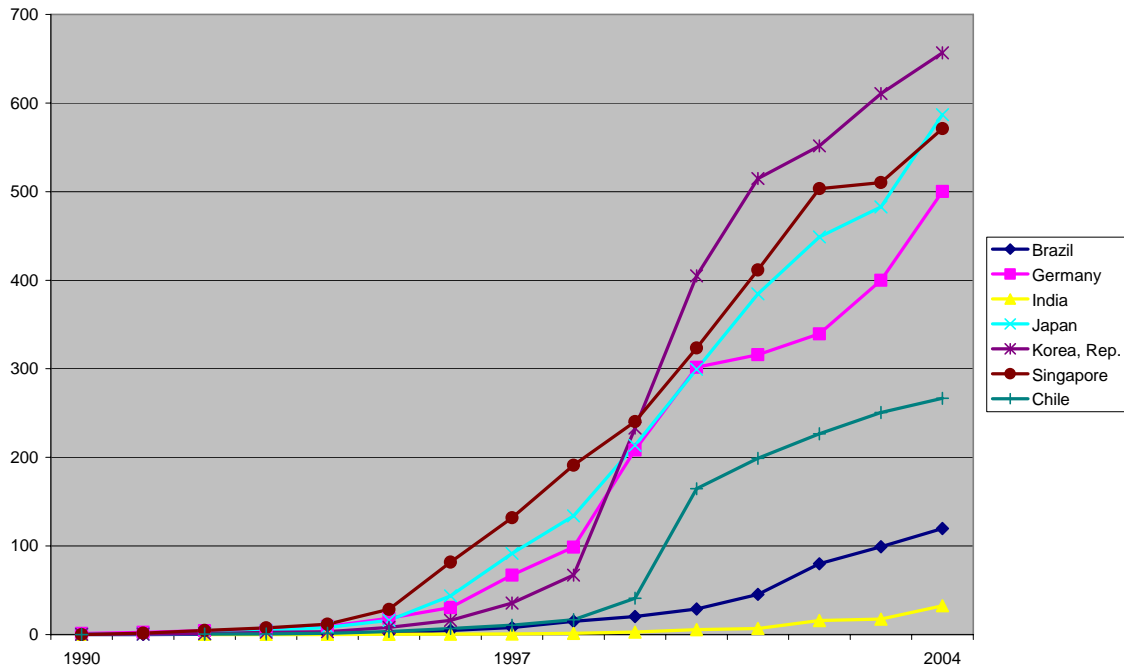
**Internet Monthly Price (\$)  
2003**



Internet users (per 1,000 people)

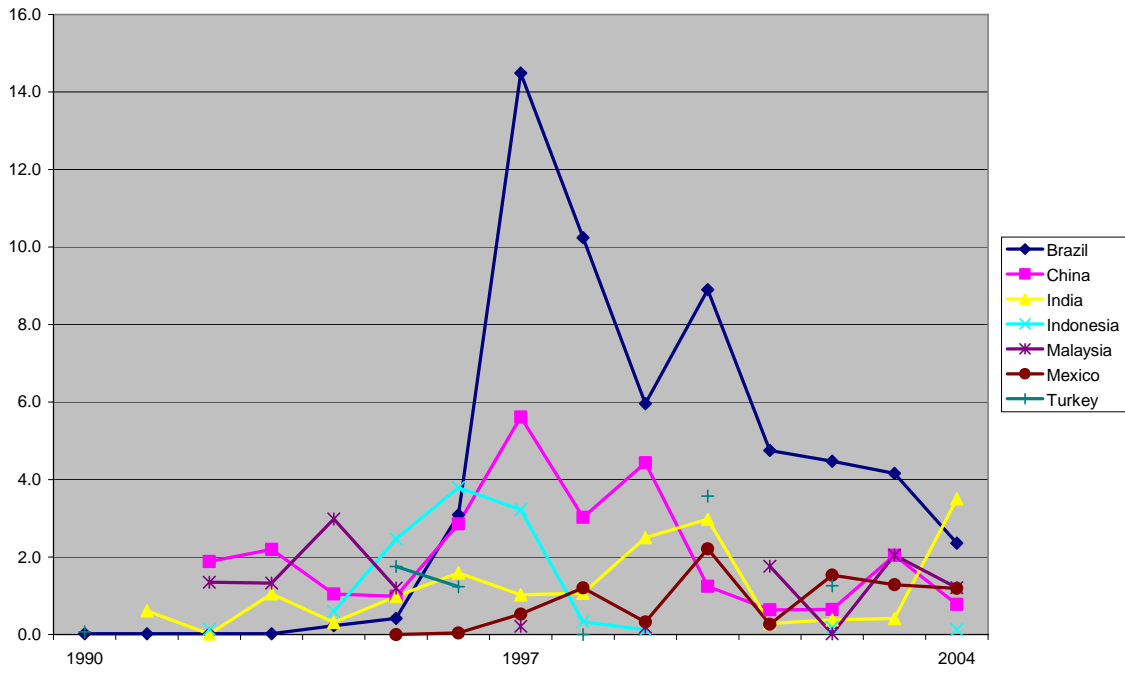


Internet users (per 1,000 people)

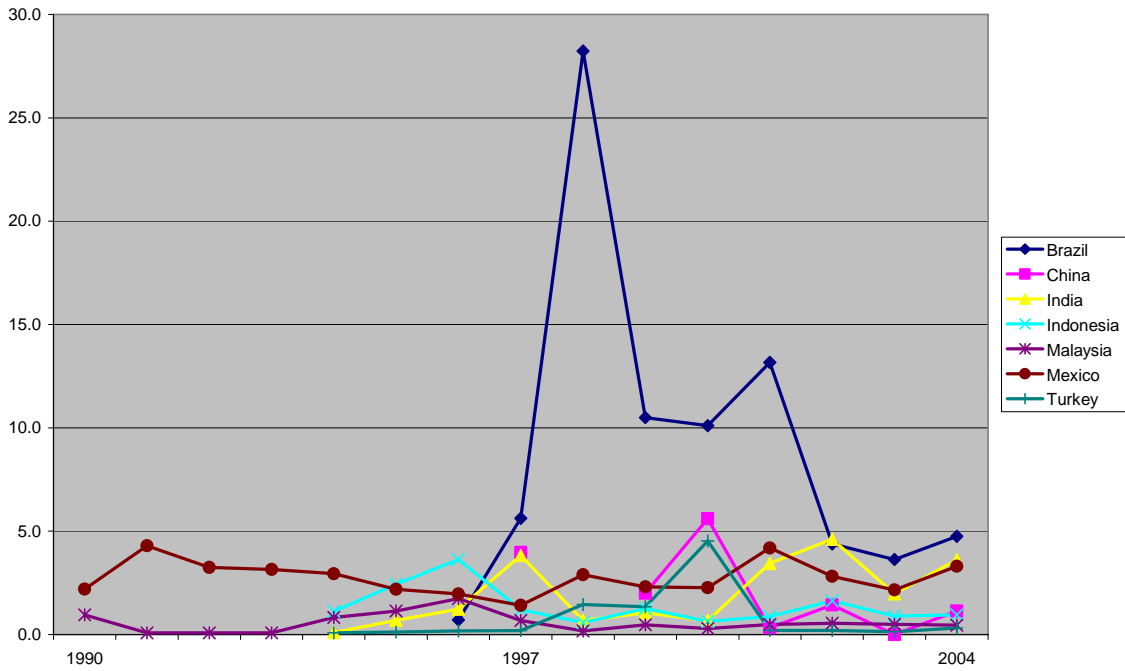


## **E. Private Investment in Infrastructure**

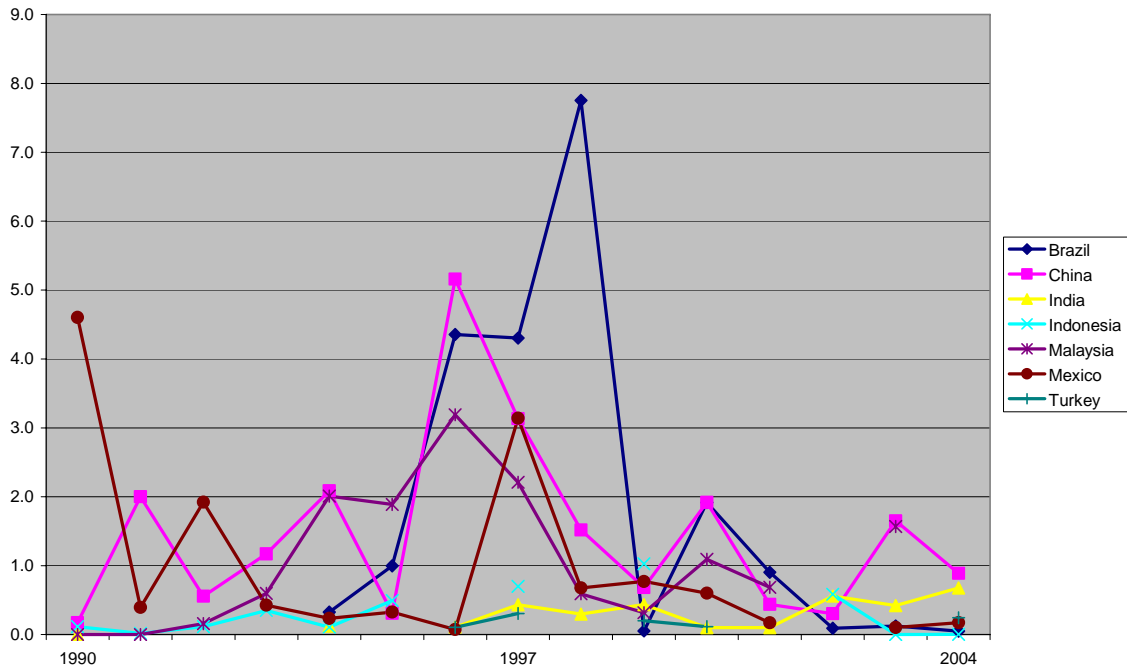
**Private investment in energy (billion current US\$)**



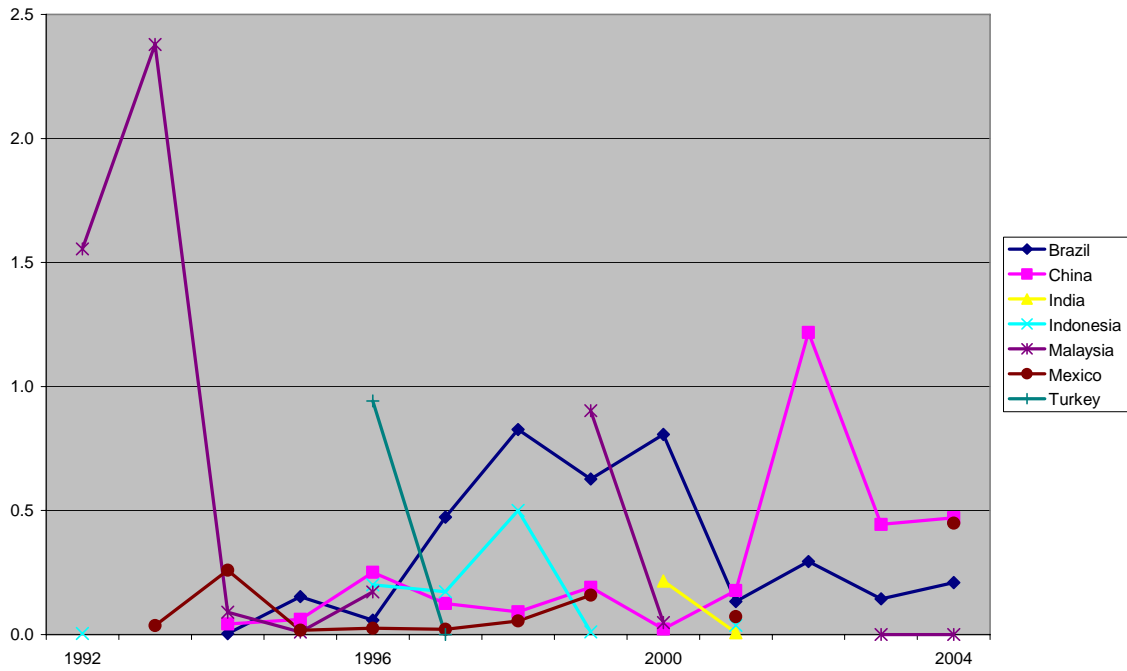
**Private investment in telecoms (billion current US\$)**



Private investment in transport (billion current US\$)



Private investment in water and sanitation (billion current US\$)







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# 2006 Global Meeting