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Our analyses, estimates and forecasts are based on official statistical data and information available up to April 30, 2002. Any differences in estimates from previous numbers of PEO are the result either of the publication of new official data or modification of preliminary data.

### Appendix 1. Components of aggregate demand, 1996–2003 (% change, yoy)

		GDP	GDP	Domestic demand	Consumption		Investment	Exports	Imports	
		PLN billion			household	public				
1996	1Q-4Q	387.8	6.0	9.7	8.7	2.1	19.7	12.0	28.0	
1997	1Q-4Q	472.4	6.8	9.2	6.9	3.2	21.7	12.2	21.4	
1998	1Q-4Q	553.6	4.8	6.4	4.8	1.6	14.2	14.3	18.5	
1999	1Q-4Q	615.1	4.1	4.8	5.2	1.3	6.8	-2.6	1.0	
2000	1Q-4Q	684.9	4.0	2.8	2.6	1.5	2.7	23.2	15.6	
2001	1Q-4Q	722.3	1.1	-2.0	2.1	0.5	-10.2	10.8	-0.1	
<b>Forecast</b>										
2002	1Q-4Q	762.9	1.8	0.5	2.3	0.9	-4.6	13.6	7.6	
2003	1Q-4Q	818.8	3.5	4.6	2.9	0.7	11.8	20.2	20.3	
1996	1Q	85.3	3.4	8.0	8.5	2.2	13.1	14.4	36.7	
	2Q	92.9	5.4	6.7	6.5	-6.4	20.5	21.6	29.1	
	3Q	98.5	7.2	10.6	8.3	1.2	26.8	25.3	42.2	
	4Q	111.2	7.9	13.0	11.4	12.0	17.3	-12.5	7.9	
1997	1Q	103.8	6.9	7.9	6.7	3.4	19.6	20.5	24.2	
	2Q	113.0	7.4	9.0	7.1	3.5	21.0	29.9	36.1	
	3Q	119.2	6.7	9.4	7.1	3.4	21.2	8.1	18.4	
1998	4Q	136.4	6.4	10.4	6.6	2.4	23.2	-3.5	11.7	
	1Q	123.7	6.5	7.3	6.3	2.2	17.3	18.8	20.2	
	2Q	133.4	5.3	5.7	4.1	1.6	14.6	24.7	23.0	
	3Q	140.0	4.9	6.1	4.4	1.5	14.2	18.9	20.6	
1999	4Q	156.5	3.0	6.6	4.6	1.1	12.9	-1.9	11.6	
	1Q	134.4	1.6	3.4	4.6	1.3	5.9	-9.9	-3.2	
	2Q	147.0	2.9	4.6	5.1	1.2	6.5	-4.6	1.6	
	3Q	155.3	5.0	5.5	5.6	1.4	6.8	2.0	4.0	
2000	4Q	178.4	6.2	5.7	5.7	1.3	7.3	2.7	1.6	
	1Q	152.3	5.9	5.2	4.8	1.3	5.4	20.8	15.6	
	2Q	166.0	5.0	3.3	3.0	1.3	2.8	27.7	17.6	
	3Q	171.0	3.1	1.3	1.1	1.6	2.0	22.5	12.7	
2001	4Q	195.6	2.3	1.7	1.6	1.5	2.1	22.1	16.2	
	1Q	165.6	2.3	-1.3	1.5	0.2	1.5	10.4	-1.5	
	2Q	176.6	0.9	-1.8	1.6	0.3	-8.4	6.9	-2.1	
	3Q	179.9	0.8	-2.0	2.1	0.4	-13.6	13.3	3.5	
2002	4Q	200.3	0.3	-2.9	3.2	1.0	-14.3	12.3	-0.4	
	1Qe2	173.3	0.8	-0.8	2.3	0.9	-15.1	8.4	2.3	
	<b>Forecast</b>									
	2Q	184.9	1.0	-0.7	2.2	0.9	-11.2	10.5	3.7	
2003	3Q	190.7	2.2	0.9	2.2	0.8	-2.6	17.8	11.8	
	4Q	213.9	3.0	2.2	2.5	0.8	2.4	16.8	11.9	
	1Q	184.4	2.4	3.3	2.8	0.8	8.1	19.5	18.1	
	2Q	197.6	3.1	4.3	2.9	0.8	11.3	20.2	20.0	
	3Q	204.4	3.5	4.6	2.9	0.7	12.2	20.9	21.5	
	4Q	232.5	4.8	6.1	3.1	0.7	13.3	20.3	21.4	

Source: Data – CSO; forecasts and estimates (e2) – CASE.

Notes: 1. Domestic demand is defined as the sum of consumption of households and non-commercial institutions, public consumption and accumulation. This table does not provide separate indicators for the consumption of non-commercial institutions and accumulation of inventories.

2. Data are not seasonally adjusted.

3. Estimates at annual average prices of the previous year, forecasts at average 2000 prices.

4. GDP in PLN billion at current prices.

**Appendix 2. Value added in major sectors of the economy, 1996–2003 (% change, yoy)**

		GDP	Gross value added					
			total	agriculture and forestry	industry	construction	market services	non-market services
1996	1Q-4Q	6.0	5.3	2.5	7.6	2.8	5.3	2.6
1997	1Q-4Q	6.8	6.4	1.0	10.3	13.6	4.4	2.9
1998	1Q-4Q	4.8	4.7	5.7	4.3	9.3	4.8	2.3
1999	1Q-4Q	4.1	3.7	-0.1	3.0	3.5	6.0	-0.6
2000	1Q-4Q	4.0	3.7	-6.0	6.5	-0.7	4.2	2.2
2001	1Q-4Q	1.1	0.9	-8.0	-0.6	-7.6	3.9	0.7
<b>Forecast</b>								
2002	1Q-4Q	1.8	1.5	-3.0	1.1	-6.4	4.1	0.7
2003	1Q-4Q	3.5	3.3	1.1	4.4	8.2	3.7	0.4
1996	1Q	3.4	2.5	-2.0	6.1	-18.5	3.3	2.4
	2Q	5.4	4.4	2.2	6.9	-4.2	5.2	1.8
	3Q	7.2	6.5	2.7	9.8	5.0	6.1	2.9
	4Q	7.9	7.7	6.7	7.6	21.9	6.5	3.2
1997	1Q	6.9	6.4	-1.5	8.7	14.7	5.5	4.9
	2Q	7.4	6.7	1.7	11.5	15.6	4.5	1.3
	3Q	6.7	6.5	2.7	10.7	13.3	4.3	1.1
	4Q	6.4	6.2	0.3	10.2	12.2	3.5	3.8
1998	1Q	6.5	6.4	0.8	10.5	14.6	4.3	3.7
	2Q	5.3	5.2	4.3	5.3	10.8	5.6	0.2
	3Q	4.9	4.8	5.2	3.3	8.8	5.9	1.4
	4Q	3.0	2.9	12.8	-1.1	6.1	3.6	3.1
1999	1Q	1.6	1.3	0.2	-4.3	2.0	5.6	-0.6
	2Q	2.9	2.6	-0.9	-0.3	2.8	5.4	-0.5
	3Q	5.0	4.6	-0.1	5.9	3.2	6.2	-0.8
	4Q	6.2	5.9	0.4	9.7	4.9	6.6	-0.5
2000	1Q	5.9	5.7	-5.4	9.6	4.1	5.2	3.2
	2Q	5.0	4.8	-6.2	9.1	0.7	4.8	1.8
	3Q	3.1	2.9	-5.8	6.0	-2.3	3.1	2.1
	4Q	2.3	2.2	-6.3	2.3	-2.4	4.0	1.8
2001	1Q	2.3	2.1	-7.2	3.3	-5.2	3.5	0.2
	2Q	0.9	0.8	-4.6	-1.3	-8.0	3.7	0.4
	3Q	0.8	0.6	-4.3	-1.5	-8.2	4.1	0.7
	4Q	0.3	0.1	-16.4	-2.5	-8.0	4.2	1.4
2002	1Qe2	0.8	0.6	-11.0	-1.2	-15.8	4.4	0.6
<b>Forecast</b>								
	2Q	1.0	0.8	-2.8	1.3	-11.6	3.1	0.2
	3Q	2.2	1.9	-1.1	1.8	-5.0	4.3	0.6
	4Q	3.0	2.5	-0.3	2.2	-0.3	4.7	1.3
2003	1Q	2.4	2.3	-7.2	3.5	3.5	3.4	0.2
	2Q	3.1	2.9	1.3	4.2	6.3	3.3	0.1
	3Q	3.5	3.3	1.8	4.3	9.0	3.5	0.2
	4Q	4.8	4.4	5.6	5.5	10.9	4.5	0.8

Source: Data – CSO; forecasts and estimates (e2)– CASE.

Notes: 1. Data is not seasonally adjusted.

2. Estimates at annual average prices of the previous year, forecasts at average 2000 prices.

### Appendix 3. Contributions to GDP growth, 1997–2003 (%)

		GDP	Domestic demand	Household consumption	Public consumption	Investment in fixed assets	Stock-building	Net exports	Exports	Imports
1997	1Q-4Q	6.8	9.4	4.3	0.6	4.5	0.1	-2.6	3.0	-5.5
1998	1Q-4Q	4.8	6.7	3.0	0.3	3.3	0.1	-1.9	3.7	-5.5
1999	1Q-4Q	4.1	5.1	3.3	0.2	1.7	-0.1	-1.0	-0.7	-0.3
2000	1Q-4Q	4.0	2.9	1.7	0.2	0.7	0.3	1.0	6.1	-5.1
2001	1Q-4Q	1.1	-2.2	1.3	0.1	-2.5	-1.0	3.2	3.2	0.0
<b>Forecast</b>										
2002	1Q-4Q	1.8	0.6	1.5	0.1	-1.2	0.1	1.3	4.0	-2.8
2003	1Q-4Q	3.5	4.9	1.9	0.1	2.9	0.0	-1.4	5.9	-7.4

Source: Data – CSO; forecasts – CASE.

Notes: 1. Contributions to GDP growth were calculated using the following formula:

(rate of growth of X) \* (share of X in GDP, calculated in average prices in the base period).

2. GDP growth and the sum of contributions to GDP may not add up due to approximations.

#### Appendix 4. Household disposable income, 1998–2003

		Disposable income	including:		Real disposable income	Savings rate
			Wages and salaries	Social benefits		
		% change, yoy				%
1998	1Q-4Q	17.0	17.8	12.8	4.6	13.2
1999	1Q-4Q	9.5	9.9	12.2	2.1	10.8
2000	1Q-4Q	11.6	8.7	8.7	1.4	9.8
2001	1Q-4Q	6.9	4.3	11.2	1.3	9.4
<b>Forecast</b>						
2002	1Q-4Q	5.8	4.4	8.4	1.9	9.2
2003	1Q-4Q	7.0	7.6	4.0	2.4	9.2
1998	1Q	24.5	-	14.6	9.3	12.9
	2Q	16.4	-	14.1	2.9	12.4
	3Q	15.5	-	12.1	3.9	11.8
	4Q	12.6	-	12.8	3.2	15.4
1999	1Q	10.9	9.4	11.2	4.4	12.6
	2Q	8.9	9.6	10.3	2.4	8.4
	3Q	7.8	10.6	15.4	0.6	9.5
	4Q	10.4	10.4	12.4	1.1	12.4
2000	1Q	11.3	11.2	12.2	1.0	9.3
	2Q	14.8	8.4	10.2	4.4	9.9
	3Q	11.5	7.5	6.8	0.6	9.2
	4Q	8.9	7.6	6.3	-0.3	10.7
2001	1Q	9.2	7.3	7.6	2.3	10.5
	2Q	5.8	4.9	8.7	-0.7	8.6
	3Q	7.3	4.5	13.9	2.3	9.5
	4Q	5.3	1.1	14.2	1.5	9.0
2002	1Q	5.6	2.8	12.6	2.1	9.8
<b>Forecast</b>						
	2Q	5.6	4.3	10.8	2.8	8.8
	3Q	5.7	5.0	5.5	2.5	9.4
	4Q	6.4	5.5	5.5	2.8	8.9
2003	1Q	6.7	7.2	4.2	2.8	9.6
	2Q	6.9	7.5	5.5	3.4	8.8
	3Q	6.8	7.6	3.2	3.3	9.4
	4Q	7.5	8.2	3.2	3.9	9.2

Source: Annual data – CSO, quarterly data and forecasts – CASE.

Note: 1. The savings rate is shown as a percentage of nominal disposable income.

2. Social security benefits include: pensions, unemployment benefits, and pre-retirement benefits.

3. Wages and salaries for the entire economy – according to the CSO definition (Table 14 in Statistical Bulletin).

### Appendix 5. Real sphere, 1998–2003 (% change, yoy)

		Output		Enterprise sector	
		industry	construction	average employment	real gross wages
1998	1Q-4Q	4.8	11.3	1.9	-
1999	1Q-4Q	4.4	3.9	-1.0	3.1
2000	1Q-4Q	7.1	-1.4	-3.3	1.2
2001	1Q-4Q	0.0	-10.5	-3.3	1.5
<b>Forecast</b>					
2002	1Q-4Q	0.6	-7.3	-3.3	2.8
2003	1Q-4Q	4.6	8.0	0.8	3.1
1998	1Q	10.9	24.0	2.3	-
	2Q	6.0	10.2	2.3	-
	3Q	3.9	13.2	1.9	-
	4Q	-0.8	4.4	1.0	-
1999	1Q	-3.1	0.6	-0.1	-
	2Q	1.2	4.0	-1.2	-
	3Q	7.4	3.2	-1.7	-
	4Q	11.7	6.4	-1.6	-
2000	1Q	10.7	4.8	-3.6	5.3
	2Q	9.6	-1.4	-3.2	2.7
	3Q	6.7	-2.9	-2.9	-0.2
	4Q	2.6	-3.4	-2.8	-0.3
2001	1Q	4.5	-8.9	-2.5	1.7
	2Q	-0.7	-10.9	-3.0	-0.3
	3Q	-0.8	-11.7	-3.8	2.0
	4Q	-2.6	-10.0	-3.5	2.7
2002	1Q	-1.6	-16.4	-4.8	1.9
<b>Forecast</b>					
	2Q	0.9	-11.2	-4.5	3.6
	3Q	1.3	-5.0	-2.9	3.2
	4Q	1.7	-1.1	-1.0	2.5
2003	1Q	4.3	4.9	0.1	3.6
	2Q	4.7	7.2	0.9	3.2
	3Q	4.5	8.2	1.0	3.0
	4Q	5.0	9.8	1.3	2.5

Source: Data – CSO, forecasts – CASE.

Notes: 1. Data on construction calculated from monthly data.

2. Data prior to 2000 are not comparable due to a change in the CSO's statistical population.

### Appendix 6. Selected indicators for enterprises, 2000–2001

	Profit on sales	Gross profitability		1 <sup>st</sup> level liquidity	Average employment		Average wages		Investment		
		total	public sector		private sector	public sector	private sector	public sector	private sector	public sector	private sector
	PLN million	%	%	%	% change, yoy	% change, yoy	% change, yoy	% change, yoy	% change, yoy	% change, yoy	
2000	I	5445	3.3	1.5	16.3	-7.9	1.3	13.7	18.3	-	-
	II	13373	2.3	1.6	16.4	-7.6	0.9	12.3	16.3	-14.3	26.1
	III	22451	2.2	2.1	16.2	-7.2	0.7	11.5	15.0	-16.1	24.1
	IV	26952	1.9	1.2	15.5	-6.6	0.2	12.0	13.3	-9.5	17.0
2001	I	5116	1.1	1.2	16.3	-8.1	2.3	12.0	8.0	-	-
	II	10479	1.3	1.6	16.1	-8.0	2.0	9.9	7.7	-26.5	4.3
	III	18335	1.4	1.8	16.5	-8.0	1.5	10.1	6.9	-24.4	-5.7
	IV	23303	0.7	-0.8	17.9	-8.5	1.3	8.1	7.2	-31.5	-11.6

Source: Data – CSO.

Notes: 1. Cumulative data from the beginning of each year.

2. The indicator of the 1st level liquidity is calculated as a ratio of cash and tradable equities to short-term liabilities according to their end-period volumes.

3. Gross profit on sales – for non-financial entities which employ over 49 people.

### Appendix 7. Labour market, 1996–2003

		Working population	Employment	Registered unemployment		LFS unemployment	
		('000)	('000)	('000)	%	('000)	%
1996	1Q-4Q	15021	8548	2360	13.2	1961	11.5
1997	1Q-4Q	15439	8648	1826	10.3	1737	10.2
1998	1Q-4Q	15800	8752	1831	10.4	1827	10.6
1999	1Q-4Q	15374	8702	2350	13.1	2641	15.3
2000	1Q-4Q	15018	8120	2703	15.1	2760	16.0
2001	1Q-4Q	14544	7827	3115	17.4	3186	18.5
<b>Forecast</b>							
2002	1Q-4Q	14237	7720	3376	18.8	-	-
2003	1Q-4Q	14120	7721	3394	18.9	-	-
1996	1Q	14763	8487	2726	15.4	2349	14.0
	2Q	14977	8513	2508	14.3	2103	12.4
	3Q	14682	8522	2341	13.5	2018	11.6
	4Q	14932	8671	2360	13.2	1961	11.5
1997	1Q	15034	8567	2236	12.6	2176	12.8
	2Q	15394	8645	2040	11.6	1927	11.3
	3Q	15747	8675	1854	10.6	1853	10.7
	4Q	15579	8706	1826	10.3	1737	10.2
1998	1Q	15553	8717	1846	10.4	1896	11.1
	2Q	15809	8759	1688	9.6	1753	10.2
	3Q	16060	8714	1677	9.6	1786	10.3
	4Q	15779	8816	1831	10.4	1827	10.6
1999	1Q	15255	8747	2170	12.0	2141	12.5
	2Q	15600	8717	2074	11.6	-	-
	3Q	15338	8649	2178	12.1	-	-
	4Q	15302	8695	2350	13.1	2641	15.3
2000	1Q	14803	8139	2532	14.0	2880	16.7
	2Q	15009	8106	2437	13.6	2825	16.3
	3Q	15225	8083	2529	14.0	2675	15.4
	4Q	15032	8152	2703	15.1	2760	16.0
2001	1Q	14364	7896	2899	16.1	3158	18.2
	2Q	14579	7852	2849	15.9	3208	18.4
	3Q	14743	7791	2920	16.3	3127	17.9
	4Q	14488	7768	3115	17.4	3186	18.5
2002	1Q	13975	7717	3260	18.1	-	-
<b>Forecast</b>							
	2Q	14245	7724	3188	17.7	-	-
	3Q	14476	7713	3278	18.1	-	-
	4Q	14249	7726	3376	18.8	-	-
2003	1Q	13750	7706	3376	18.9	-	-
	2Q	14088	7712	3263	18.1	-	-
	3Q	14409	7715	3296	18.3	-	-
	4Q	14231	7751	3394	18.9	-	-

Source: Data – CSO; quarterly data of the working population and forecasts – CASE.

Notes: 1. Employment according to CSO data from the Statistical Bulletin.

2. Employment concerns entities in the national economy employing more than 5 people to the end-1999 and 9 people from 2000.

3. In 2Q99 and 3Q99 there was a break in the Labour Force Survey (LFS).



### Appendix 8. Basic price indicators, 1998–2003 (% change, yoy)

		CPI		PPI		Currency basket	GDP deflator
		period average	end of period	period average	end of period	period average	period average
1998	1Q-4Q	11.8	8.6	7.3	4.8	6.0	11.8
1999	1Q-4Q	7.3	9.8	5.7	8.1	11.7	6.8
2000	1Q-4Q	10.1	8.5	7.8	5.6	3.5	7.1
2001	1Q-4Q	5.5	3.6	1.6	-0.4	-6.8	4.7
<b>Forecast</b>							
2002	1Q-4Q	3.2	3.6	0.8	2.3	0.4	3.8
2003	1Q-4Q	3.5	3.7	3.2	3.8	5.0	3.7
1998	1Q	13.9	13.9	9.2	9.2	12.3	11.9
	2Q	13.1	12.2	8.1	7.7	6.3	12.1
	3Q	11.2	10.6	6.7	6.4	4.1	12.0
	4Q	9.2	8.6	5.2	4.8	2.1	11.4
1999	1Q	6.2	6.2	4.1	4.7	9.0	7.0
	2Q	6.4	6.5	5.1	5.2	13.9	7.1
	3Q	7.2	8.0	5.8	6.2	9.4	5.6
	4Q	9.2	9.8	7.5	8.1	14.4	7.4
2000	1Q	10.3	10.3	7.9	7.3	4.1	7.0
	2Q	10.0	10.2	8.1	8.9	5.2	7.6
	3Q	10.8	10.3	8.5	8.3	4.4	6.8
	4Q	9.2	8.5	6.9	5.6	0.5	7.1
2001	1Q	6.7	6.2	4.2	3.8	-3.1	6.2
	2Q	6.6	6.2	2.2	0.9	-11.1	5.3
	3Q	4.9	4.3	0.8	0.7	-4.5	4.4
	4Q	3.7	3.6	-0.6	-0.4	-8.2	2.1
2002	1Q	3.4	3.3	0.2	0.4	-0.9	3.9
<b>Forecast</b>							
	2Q	2.8	3.0	0.6	1.1	1.9	3.7
	3Q	3.1	3.3	0.7	0.2	-2.0	3.7
	4Q	3.5	3.6	1.7	2.3	2.9	3.7
2003	1Q	3.8	4.0	2.6	2.7	3.9	3.9
	2Q	3.4	3.3	3.1	3.1	6.8	3.6
	3Q	3.4	3.5	3.4	3.6	5.3	3.6
	4Q	3.5	3.7	3.8	3.8	4.1	3.7

Source: Data – CSO (currency basket – NBP); forecasts – CASE.

Notes: 1. Currency basket consists of: euro – 60% and US\$ – 40%.

2. End of period indices indicate an average for the last month of a given quarter.

### Appendix 9. Basic exchange rates, 1998–2003 (PLN)

		US\$		Euro		Real effective exchange rate
		period average	end of period	period average	end of period	
1998	1Q-4Q	3.49	3.49	-	-	151.10
1999	1Q-4Q	3.97	4.17	4.23	4.22	145.70
2000	1Q-4Q	4.35	4.31	4.01	3.88	158.60
2001	1Q-4Q	4.09	4.01	3.67	3.58	174.10
<b>Forecast</b>						
2002	1Q-4Q	4.11	4.22	3.68	3.79	-
2003	1Q-4Q	4.30	4.33	3.89	3.96	-
1998	1Q	3.51	3.46	-	-	151.67
	2Q	3.44	3.48	-	-	153.79
	3Q	3.55	3.61	-	-	148.67
	4Q	3.48	3.49	-	-	145.49
1999	1Q	3.76	3.94	4.22	4.29	142.43
	2Q	3.96	3.94	4.19	4.10	146.07
	3Q	3.97	4.08	4.17	4.29	150.13
	4Q	4.18	4.17	4.34	4.22	146.63
2000	1Q	4.11	4.09	4.07	3.95	158.10
	2Q	4.38	4.40	4.08	4.17	159.20
	3Q	4.39	4.49	3.98	3.92	161.47
	4Q	4.50	4.31	3.92	3.88	163.90
2001	1Q	4.09	4.06	3.78	3.70	169.80
	2Q	3.99	3.97	3.49	3.39	181.90
	3Q	4.22	4.22	3.76	3.85	169.90
	4Q	4.08	4.01	3.65	3.58	174.60
2002	1Q	4.13	4.14	3.62	3.63	174.30
<b>Forecast</b>						
	2Q	4.03	4.02	3.61	3.63	-
	3Q	4.11	4.14	3.71	3.73	-
	4Q	4.19	4.22	3.77	3.79	-
2003	1Q	4.25	4.26	3.82	3.83	-
	2Q	4.29	4.30	3.86	3.88	-
	3Q	4.31	4.31	3.93	3.94	-
	4Q	4.34	4.33	3.95	3.96	-

Source: Data – NBP, real effective exchange rate – JP Morgan, forecasts – CASE.

Notes: 1. End of period exchange rates indicate an average for the last month of a given quarter.

2. Real effective exchange rate, 1990=100 (an increase in the indicator's level means appreciation).

## Appendix 10. Balance of payments, 1998–2003 (US\$ billion)

		Balance on					Balance on					Gross reserve assets
		current account		merchandise trade			unclassified current account	capital and financial account		foreign direct investment	portfolio investment	
		% of GDP		exports	imports							
1998	1Q-4Q	-6.86	-4.33	-13.72	30.12	43.84	6.00	11.67	4.97	1.33	28.28	
1999	1Q-4Q	-11.57	-7.48	-14.38	26.35	40.73	3.64	8.25	6.35	1.45	27.31	
2000	1Q-4Q	-9.98	-6.34	-13.17	28.26	41.42	3.99	7.75	8.17	2.77	27.46	
2001	1Q-4Q	-7.05	-3.99	-11.66	30.30	41.96	4.40	3.32	6.61	2.01	26.57	
<b>Forecast</b>												
2002	1Q-4Q	-7.81	-4.22	-11.77	30.19	41.96	4.02	7.10	4.07	1.92	27.35	
2003	1Q-4Q	-9.85	-5.17	-14.36	32.26	46.62	4.53	8.10	5.08	1.99	27.55	
1998	1Q	-2.00	-3.30	-3.24	7.06	10.30	1.16	3.24	1.00	0.21	24.40	
	2Q	-0.67	-2.87	-2.88	7.67	10.55	1.72	2.19	1.26	0.36	27.12	
	3Q	-1.22	-2.98	-3.30	7.80	11.10	1.87	3.54	1.68	-0.86	28.10	
	4Q	-2.98	-4.33	-4.31	7.60	11.90	1.25	2.70	1.02	1.61	28.28	
1999	1Q	-2.24	-4.47	-2.82	7.01	9.83	0.80	1.85	1.13	-0.29	28.61	
	2Q	-2.76	-5.85	-3.36	6.28	9.64	0.79	1.29	1.04	0.03	27.38	
	3Q	-3.01	-7.00	-3.89	6.21	10.10	1.15	2.06	2.47	-0.09	27.89	
	4Q	-3.56	-7.48	-4.31	6.84	11.15	0.90	3.05	1.71	1.80	27.31	
2000	1Q	-3.52	-8.23	-3.85	6.32	10.17	0.73	2.08	1.55	2.44	26.24	
	2Q	-2.12	-7.79	-3.02	6.84	9.86	1.06	1.19	1.12	0.21	25.99	
	3Q	-2.25	-7.31	-3.34	7.17	10.51	1.08	1.42	0.90	-0.08	25.42	
	4Q	-2.09	-6.34	-2.96	7.93	10.89	1.12	3.05	4.59	0.19	27.46	
2001	1Q	-2.14	-5.35	-3.13	7.46	10.59	0.73	2.29	1.21	2.38	28.00	
	2Q	-2.21	-5.20	-2.78	7.51	10.29	0.97	1.02	1.46	-0.95	27.11	
	3Q	-0.94	-4.32	-2.73	7.46	10.19	1.37	1.40	1.31	-0.02	28.30	
	4Q	-1.76	-3.99	-3.02	7.87	10.89	1.33	-1.40	2.63	0.61	26.57	
2002	1Q	-2.30	-4.05	-2.59	6.93	9.52	0.48	2.79	0.98	1.47	27.06	
<b>Forecast</b>												
	2Q	-1.76	-3.78	-2.81	7.55	10.36	1.09	1.34	0.99	0.10	27.22	
	3Q	-1.52	-4.01	-2.88	7.57	10.45	1.32	1.37	0.95	0.25	27.34	
	4Q	-2.22	-4.22	-3.50	8.14	11.63	1.13	1.60	1.15	0.10	27.35	
2003	1Q	-2.79	-4.46	-3.53	7.67	11.21	0.82	2.24	1.08	0.59	27.32	
	2Q	-2.10	-4.62	-3.17	7.96	11.13	1.14	1.56	1.10	0.45	27.39	
	3Q	-1.79	-4.74	-3.28	8.00	11.28	1.38	1.48	1.15	0.10	27.52	
	4Q	-3.18	-5.17	-4.38	8.63	13.01	1.18	2.82	1.75	0.85	27.55	

Source: Data – NBP; forecasts – CASE.

Note: 1Q02 data – preliminary.

### Appendix 11. Selected items of the state budget, 1998–2003 (PLN billion)

		Revenues		Expenditures	Budget deficit	
		total	of which tax revenues		billion zlotys	% of GDP
1998	1Q-4Q	126.6	113.9	139.8	-13.2	-2.4
1999	1Q-4Q	125.9	112.7	138.4	-12.5	-2.0
2000	1Q-4Q	135.7	119.6	151.1	-15.4	-2.2
2001	1Q-4Q	140.3	119.0	172.9	-32.6	-4.5
<b>Forecast</b>						
2002	1Q-4Q	140.7	127.3	185.1	-44.4	-5.8
2003	1Q-4Q	150.9	136.5	193.5	-42.5	-5.2
1998	1Q	28.7	25.6	32.3	-3.5	-2.9
	2Q	29.3	26.3	35.1	-5.8	-4.4
	3Q	33.1	29.9	34.1	-1.1	-0.8
	4Q	35.5	32.2	38.3	-2.8	-1.8
1999	1Q	27.7	24.8	36.5	-8.7	-6.5
	2Q	28.8	25.2	31.4	-2.6	-1.8
	3Q	32.4	29.5	32.4	0.0	0.0
	4Q	37.0	33.2	38.2	-1.2	-0.7
2000	1Q	30.9	27.6	37.9	-6.9	-4.5
	2Q	33.3	26.7	37.0	-3.7	-2.2
	3Q	33.6	31.6	37.0	-3.4	-2.0
	4Q	37.8	33.7	39.1	-1.3	-0.7
2001	1Q	31.6	26.7	46.6	-15.0	-9.1
	2Q	36.1	26.2	39.9	-3.8	-2.2
	3Q	35.0	31.8	38.1	-3.1	-1.7
	4Q	37.5	34.3	48.2	-10.7	-5.4
2002	1Q	31.3	28.5	47.7	-16.4	-9.5
<b>Forecast</b>						
	2Q	31.2	27.7	43.4	-12.2	-6.6
	3Q	37.6	34.1	41.5	-3.9	-2.0
	4Q	40.6	37.1	52.5	-11.9	-5.6
2003	1Q	34.1	30.5	52.2	-18.1	-9.8
	2Q	33.2	29.6	44.7	-11.5	-5.8
	3Q	40.1	36.5	42.6	-2.5	-1.2
	4Q	43.6	40.0	54.0	-10.4	-4.5

Source: Data – Ministry of Finance; forecasts – CASE.

Note: Tax revenues include income from CIT and PIT taxes as well as from indirect taxes (VAT, excise duty, gambling licence, etc.).

## Appendix 12. Public sector balance, 1999–2003 (% of GDP)

	1999	2000	2001	2002 <i>Budget</i>	2002 <i>CASE</i>
<b>State budget</b>	-2.0	-2.2	-4.5	-5.2	-5.8
Local government	-0.2	-0.5		-0.6	-0.6
Funds and other items	-0.9	-0.1		-0.1	-0.1
Health Funds	-0.1	0.1		0.0	0.0
<b>General budget</b>	-3.2	-2.6	-5.3	-5.9	-6.5
Compensations	-	-0.5		-0.4	-0.4
II pillar in the pension system	0.5	1.1		1.5	1.5
Expenditures financed by revenues from UMTS licenses	-	-		-	-
<b>Total effect on domestic savings (i.e. economic deficit)</b>	-2.7	-2.0	-4.8	-4.8	-5.4

Source: Data – Ministry of Finance; forecasts – CASE.

Note: Estimates for execution of the 2001 budget – preliminary.

### Appendix 13. Interest rates, 1998–2003

		Rediscount rate	Lombard rate	3-month WIBOR	28-day repo rate
1998	1Q	24.50	27.00	25.10	23.00
	2Q	23.50	26.00	22.10	21.50
	3Q	21.50	24.00	18.80	18.00
	4Q	18.30	20.00	15.90	15.50
1999	1Q	15.50	17.00	13.20	13.00
	2Q	15.50	17.00	13.30	13.00
	3Q	15.50	17.00	14.30	14.00
	4Q	19.00	20.50	19.30	16.50
2000	1Q	20.00	21.50	18.44	17.50
	2Q	20.00	21.50	18.50	17.50
	3Q	21.50	23.00	19.55	19.00
	4Q	21.50	23.00	19.61	19.00
2001	1Q	19.50	21.00	18.00	17.00
	2Q	18.00	19.50	16.87	15.50
	3Q	17.00	18.50	14.69	14.50
	4Q	14.00	15.50	12.30	11.50
2002	1Q	12.00	13.50	10.40	10.00
<b>Forecast</b>					
	2Q	10.50	12.00	9.45	9.00
	3Q	10.00	11.50	8.57	8.50
	4Q	10.00	11.50	8.66	8.50
2003	1Q	10.00	11.50	8.67	8.50
	2Q	9.50	11.00	8.11	8.00
	3Q	9.50	11.00	8.09	8.00
	4Q	9.25	10.75	7.68	7.75

Source: Data – NBP; forecasts – CASE.

Notes: End-period data; WIBOR average for the last month of each quarter.

## Appendix 14. Money aggregates, 1998–2003 (PLN billion)

	MB	Cash	Deposits			Credits			Net liabilities of the government sector
			total	household	corporate	total	household	corporate	
1998 1Q-4Q	225.4	30.2	194.9	132.6	45.0	141.0	31.1	102.9	65.5
1999 1Q-4Q	270.2	38.1	231.9	152.6	55.3	181.5	44.9	122.4	68.2
2000 1Q-4Q	302.9	34.1	268.5	185.1	54.8	212.3	57.8	137.4	56.2
2001 1Q-4Q	330.6	38.2	292.1	196.0	64.9	232.1	66.1	144.2	68.6
<b>Forecast</b>									
2002 1Q-4Q	349.8	41.5	307.9	209.2	65.3	248.7	74.0	149.7	65.4
2003 1Q-4Q	374.1	43.6	330.0	220.5	71.9	266.8	81.2	155.0	65.8
1998 1Q	184.4	27.3	156.8	111.8	30.3	116.5	25.6	86.7	54.8
2Q	196.1	29.7	166.3	117.6	32.8	124.0	27.4	91.3	55.1
3Q	207.6	30.3	177.1	124.6	36.1	133.0	29.2	97.9	61.2
4Q	225.4	30.2	194.9	132.6	45.0	141.0	31.1	102.9	65.5
1999 1Q	237.9	32.0	205.8	142.6	41.2	151.1	33.1	110.2	71.8
2Q	243.5	33.6	209.7	145.2	41.3	158.3	36.5	113.1	72.7
3Q	253.1	34.2	218.8	150.6	45.5	170.1	40.7	120.0	68.8
4Q	270.2	38.1	231.9	152.6	55.3	181.5	44.9	122.4	68.2
2000 1Q	270.9	33.0	237.7	162.8	48.0	189.4	47.0	127.3	61.4
2Q	293.9	35.1	258.5	172.3	50.1	209.0	59.7	133.0	64.7
3Q	291.0	34.7	256.0	177.0	50.1	210.3	54.8	137.8	64.6
4Q	302.9	34.1	268.5	185.1	54.8	212.3	57.8	137.4	56.2
2001 1Q	311.3	33.5	277.3	196.2	51.1	216.1	58.3	141.5	53.4
2Q	316.6	35.0	281.4	200.5	50.4	219.0	60.5	142.0	56.5
3Q	328.0	36.6	291.1	207.3	54.2	234.4	65.0	148.7	56.8
4Q	330.6	38.2	292.1	196.0	64.9	232.1	66.1	144.2	68.6
2002 1Qe1	320.8	38.8	281.7	203.1	52.4	231.9	66.8	144.3	63.0
<b>Forecast</b>									
2Q	334.8	40.7	293.8	205.4	55.6	237.6	71.3	144.2	64.8
3Q	339.0	41.3	297.3	207.4	58.4	244.6	72.1	148.7	65.1
4Q	349.8	41.5	307.9	209.2	65.3	248.7	74.0	149.7	65.4
2003 1Q	351.2	40.9	309.8	214.9	61.1	251.9	74.7	150.5	63.8
2Q	359.5	42.9	316.2	216.6	62.1	258.6	78.5	152.1	65.2
3Q	363.0	43.5	319.0	218.7	65.0	262.4	79.3	153.6	65.5
4Q	374.1	43.6	330.0	220.5	71.9	266.8	81.2	155.0	65.8

Source: Data and estimates (e1) – NBP; forecasts – CASE.

### Appendix 15. Public debt and foreign debt of banks and enterprises, 1999 – 2001

	Public debt									
	(PLN billion)					(US\$ billion)				
	State	Other		Local	Government sector	Corporate sector	Foreign debt			
		Other	Local				Government sector	Banking sector	Corporate sector	Short-term debt
1999 1Q-4Q	263.54	3.65	6.19	32.12	24.88	0.15	2.72	5.25		
2000 1Q-4Q	265.89	5.21	9.38	32.98	30.07	0.16	2.22	5.71		
2001 1Q-4Q	-	-	-	29.36	33.67	0.23	2.62	5.79		
1999 1Q	259.04	0.73	4.47	32.55	20.15	0.35	2.45	4.07		
2Q	255.52	1.26	4.81	32.17	20.61	0.36	2.59	3.77		
3Q	260.78	3.51	5.13	32.31	22.98	0.22	2.66	3.93		
4Q	263.54	3.65	6.19	32.12	24.88	0.15	2.72	5.25		
2000 1Q	269.37	2.77	6.24	33.41	25.48	0.22	2.47	5.49		
2Q	278.76	2.90	6.48	33.31	26.84	0.14	2.70	5.63		
3Q	287.31	3.23	6.95	32.38	26.66	0.16	2.53	4.97		
4Q	265.89	5.21	9.38	32.98	30.07	0.16	2.22	5.71		
2001 1Q	272.88	4.92	5.78	33.53	31.05	0.13	2.40	5.95		
2Q	271.15	6.95	7.62	32.14	31.26	0.18	2.66	6.01		
3Q	-	-	-	32.78	32.37	0.23	2.65	5.78		
4Q	-	-	-	29.36	33.67	0.23	2.62	5.79		

Source: Public Debt Department at the Ministry of Finance, NBP.

Notes: 1. Cumulative data from the beginning of each year.

2. Other debts include those of Social Security Fund (ZUS), public health funds, governmental agencies, other budget funds, universities and medical centres.

3. Foreign debts classified according to debtor's residence criterion.

4. Foreign debts in the public sector include central and local governments (since the 4Q99).

5. Data consolidated (after exclusion of cash flows between entities of a given sector).