

PMI SURVEY DATA ON PRODUCER INPUT AND OUTPUT PRICES

This box considers the usefulness of information from the Purchasing Managers' Index (PMI) surveys on prices for understanding producer price developments in the euro area. These survey data, which are available for both the manufacturing and services industries, may provide an insight into the pass-through of movements in input costs to input price and producer output price developments.

The monthly opinion surveys in the euro area on recent developments in economic activity and prices (PMI surveys) are conducted by NTC Research, a private company. By means of questionnaires, purchasing executives in the manufacturing and services industries provide information on recent movements in input prices and prices charged by indicating whether these prices have gone up, down or remained the same as compared with the previous month. The responses are converted into diffusion indices in which a figure of 50 indicates an unchanged price level and results above (below) 50 signal increasing (decreasing) prices. PMI surveys are conducted mid-month and results for the euro area are published on the first working day (for manufacturing) and the third working day (for services) following the reference month.

The manufacturing survey is conducted in eight euro area countries, which account for 92% of euro area GDP. The services survey covers five euro area countries, which account for 81% of euro area GDP. For the manufacturing industry, the survey is conducted among some 3,000 companies and the average price developments for all goods purchased are covered by the question on input prices. In addition, respondents are asked to provide qualitative information on specific price developments for individual items and the reasons for these developments, if known.¹ For the services industries (data are collected among 2,000 companies covering various market services industries, but not the retail and wholesale trade), the average prices of all inputs – i.e. including purchases of goods and services, staff costs, rents – are covered by the survey question on input prices.

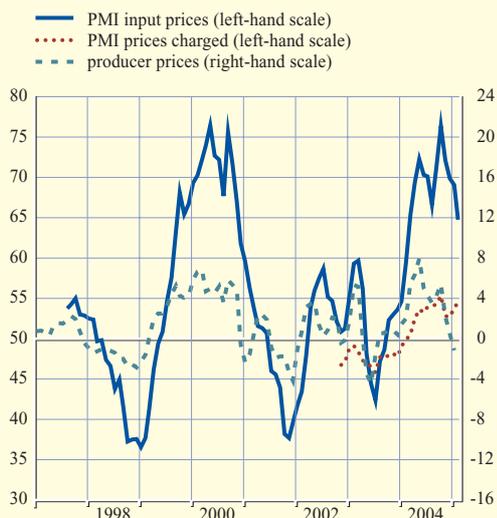
Chart 34 in this section of the Monthly Bulletin presents the input price and prices charged series for both manufacturing and services.² Given the relatively short time span of the available data, these developments should be interpreted with caution. The input price series for manufacturing has been more volatile than that for services, reflecting the fact that the latter refers to all inputs, including labour costs, rents and the like. At the current juncture the index for manufacturing input prices is higher than that for services input prices. This reflects purchasing managers' assessment that goods input prices have risen in line with the upward movement observed in (oil and non-oil) commodity prices since mid-2003. On the other hand, the lower level of the index for services input prices, while also increasing since mid-2003, reflects the fact that increases in labour costs, which are included in the service input price index but not in that for manufacturing, have been relatively moderate during the same period.

1 For example, in recent months, high energy and steel prices have been cited as factors behind the relatively high level of the manufacturing input price index. In the February release for the services sector, energy costs were also mentioned as being important, and motorway tolls were cited as a factor in Germany.

2 NTC Research compiles "composite" euro area series using manufacturing and services survey results, which are not presented here.

Chart A PMI survey data and producer prices for manufacturing

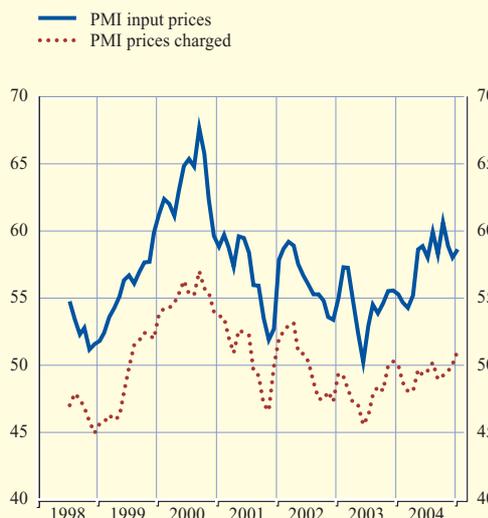
(diffusion index; three-month annualised percentage change)



Sources: Eurostat, NTC Research and ECB calculations.
 Notes: Purchasing Managers' Survey. An index value above 50 indicates an increase in manufacturing input or charged prices, whereas a value below 50 indicates a decrease.

Chart B PMI survey data for services

(diffusion index)



Source: NTC Research.
 Notes: Purchasing Managers' Survey. An index value above 50 indicates an increase in service input or charged prices, whereas a value below 50 indicates a decrease.

It should also be noted that the prices charged series for manufacturing has increased less than the input price series. This suggests that some of the increase in input costs may have been absorbed in profit margins. The decline in unit labour cost growth in the manufacturing sector since mid-2003 may also have been a factor behind this development.

Chart A presents the PMI survey data for manufacturing input prices and prices charged together with the developments in manufacturing output prices using official statistics. Given the relatively short time-span of data available for the prices charged index, it is difficult to draw firm conclusions. Nonetheless, there appears to be a fairly high degree of correlation between manufacturing output price data and the input prices and prices charged time series.

As stated above, for the services industries the PMI input price series includes all inputs, and not only purchased goods. Thus, the gap between the input prices and the prices charged data may provide a tentative insight into profit margin developments. However a number of caveats should be borne in mind. First, the PMI survey questions ("Are input prices/prices charged higher, the same or lower?") provide qualitative information. Second, data are at present only available for a relatively short time period. Third, it is noticeable that the input price series has been above that of the prices charged series over the entire period for which data are available. These observations suggest that relative movements in the survey series only signal directional developments in profit margins and not actual developments in the level of profit margins. The gap between the prices charged index and the input prices index (both shown in Chart B) suggests that the commodity price increases in 1999/2000 and since mid-2003 have placed

some pressure on profit margins in the services industries, despite the fact that these inputs account for a relatively small share of overall inputs for that sector. However, in some services sectors, such as airline services, margins are significantly affected by oil price developments.

In conclusion, PMI survey data on input prices and prices charged in the manufacturing and services industries provide a timely and useful insight into producer price developments, particularly in the case of services, where official producer price statistics are not yet available.³

³ Official euro area input price statistics do not exist. It is expected that euro area producer output price indices for the services industries will be implemented as from 2007 following a forthcoming revision of the Community regulation on short-term statistics.