Federal Reserve
Bank of
San Francisco

November 3, 1978

Surge in Raw Material Prices?

Measured by producer (wholesale) prices of non-food finished goods, the inflation pace decelerated modestly in the third quarter, to an 8-percent annual rate from the second quarter's 9-percent rate. This index measures price behavior for capital equipment and consumer non-food products, and thus it is considered more representative of underlying inflationary forces than the overall producer-price index, which includes food and is thus affected by the weather and other sources of volatility.

Measured by producer prices of crude industrial materials, however, inflation marched even further into double-digit territory in the third quarter, to a 15-percent annual rate from the second quarter's 13-percent pace. The same dismal story of accelerating inflation was evident also in the *Economist* price index of internationally-traded industrial materials valued in dollars. But before policymakers can decide how to deal with this situation, they must first decide whether the price upsurge represents the pressures generated by an incipient worldwide boom, or simply the pressures generated by a declining dollar.

Worldwide boom...
Based on the increase in the dollar price of these industrial materials, some observers have raised the possibility that the world's commodity market may be facing a boom in demand reminiscent of that experienced during the 1972-74 period. (William Wolman raises this possibility in the October 30 issue of *Business Week*.) Any such situation would be reflected in world prices of crude materials which are internationally traded, priced on world markets, and imported into the United States. They therefore conclude that a rise in such prices (valued in dollars) could be indicative of a rise in worldwide demand relative to available supplies, due to the continued expansion of both foreign and domestic economic activity.

But if overall demand pressures were actually at work, we would expect to see crude-materials prices rising not only in dollars but in other key currencies as well — just as happened in the 1972-74 period. We also would expect to see other pressures which were evident in that period but which are not visible today. During the 1972-74 period, for the first time in two decades, the economies of most industrial nations moved together in the expansion phase of a major business cycle. This synchronized expansion in worldwide economic activity stimulated employment and output. But as it reached boom proportions, it also strained the capacities of many basic industries, creating shortages and upward pressure on prices. Indeed, by the third quarter of 1973, U.S. production of basic industrial materials (petroleum, steel, nonferrous metals, forest products and textiles) reached 93 percent of capacity, the highest operating rate since World War II.

...or dollar depreciation?
Considering the scant evidence of a worldwide commodity boom at the present time, we might find that the explanation for the upsurge in crude commodity prices instead involves the declining value of the dollar. According to this view, crude materials may

(continued on page 2)

Federal Reserve
Bank of
San Francisco

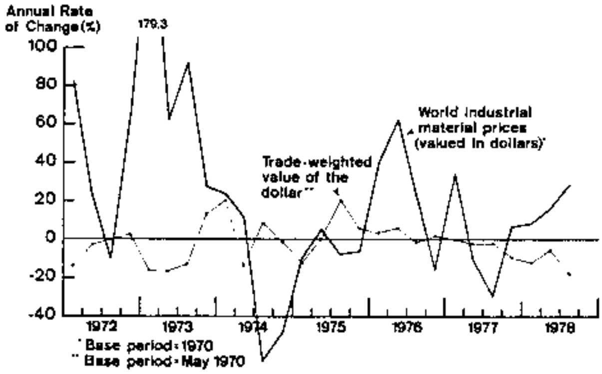
not even be rising in price when valued in currencies other than the dollar. Indeed, data comparing the behavior of industrial material prices valued in dollars over the past year with the average currency value of the dollar tend to support this conclusion. Those data show that the percentage increase in the dollar price of crude materials has mirrored the percentage decline in the dollar's exchange value throughout recent months, and over the past year as a whole. Crude-material prices rose 15 percent between the third quarter of 1977 and the third quarter of 1978, while the trade-weighted value of the dollar relative to other major foreign currencies declined 12 percent over that period. During the 1972-74 period, in contrast, the price upsurge far outpaced the amount of dollar decline, which suggests the impact of demand-related factors as well as dollar depreciation.

Indeed, we have seen little evidence recently to suggest the existence of strong worldwide demand conditions such as characterized the 1972-74 period. The U.S. economy has expanded at a faster rate since the end of the last recession than during any other peacetime expansion of the past generation, with real GNP rising at more than a 5-percent annual rate, but the recovery in other countries has been rather sluggish, relative to both the U.S. and their own performances during past recoveries. Because of the severity of the 1973-75 recession and the sluggishness of the ensuing recovery on a worldwide basis, non-Communist world consumption of many basic industrial materials still has not regained its peak levels reached during the earlier boom.

Low operating rates

Production capacity in these industries meanwhile has expanded since that period of booming commodity demand, so that their operating rates remain far below the boom-period peaks. This is true even in the United States, despite its strong recovery in overall economic activity. For example, capacity utilization in U.S. basic-materials industries by this August had reached only 86 percent, compared with the earlier peak level of 93 percent mentioned above. The operating rate in the metals industries was especially low, running only at about 83 percent, compared with the earlier peak of 98 percent reached in 1973. Again, U.S. deliveries of copper, lead and zinc have lagged behind earlier peak levels, and in some cases even behind the levels of a year ago.

The relatively low operating rate in the metals sector may be explained in part by the steady production cutbacks instituted by U.S. copper producers over the 1973-77 period. First they reduced production in reaction to the slowdown in demand associated with the recession, and then they sought to reduce the excess refinery inventories accumulated during that period and the subsequent economic recovery when worldwide production continued to outpace shipments. (This has led to reduced U.S. output of other metals as well, since lead, zinc and sil-



ver are often produced as byproducts of the copper-production process). Indeed, U.S. production of refined copper declined almost without interruption over the 1973-77 period. But foreign producers more than offset these U.S. production cutbacks, so that world refinery stocks continued to climb to a peak of over 1.7 million tons by early 1978.

Since that time, further production cutbacks at domestic facilities, plus strikes and political problems overseas, have helped reduce nonferrous-metals inventories moderately at refineries and commodity-exchange warehouses. These supply factors have triggered some hedge buying recently, thereby strengthening metals prices in terms of both dollars and other currencies. But inventories could begin to expand again as foreign supply problems are overcome, unless foreign producers follow the example of their American counterparts and curtail production rates.

Inflation impact

The most immediate impact of this upsurge in world industrial commodity prices valued in dollars has been to raise the price of these imported materials in the United States. But since domestic producers of these basic materials price their products so as to meet foreign competition, they have tended to react by bringing their prices into line with these foreign prices valued in dollars. The influence of dollar devaluation therefore has led not only to a sharp rise recently in domestic producer prices for a number of basic materials, but has also contributed to their price volatility.

U.S. copper producers have sought to benefit from the price run-up on world commodity exchanges by tying their selling price directly to the Comex (New York Commodity Exchange) quotation plus a delivery charge. In the process, they have abandoned their traditional practice of posting price changes on a less frequent basis through an announcement process. Reflecting this shift to commodity exchange-based pricing in May, the U.S. producer price for refined copper has risen from 65 cents a pound at that time to a current price of 70 cents a pound, up from 60 cents a year ago. U.S. producer prices for other nonferrous metals also have risen sharply in recent months as domestic producers have followed the dollar increases posted on world commodity exchanges.

U.S. producer-price indexes for non-food crude materials thus could come under strong upward pressure in coming months as a result of the recent run-up in commodity-exchange prices. The increase in the price of industrial raw material inputs in turn could place strong upward pressure on finished non-food goods prices. But in view of the fact that the commodity price upsurge reflects dollar depreciation more than worldwide demand pressures, any stabilization in the exchange value of the dollar could help stabilize dollar prices of imported as well as domestically-produced industrial materials.

Yvonne Levy

FRBSF Weekly Letter