Chapter VI ANNEX

(From USITC 1256, June 1982.)

Effects on imports.—During the 6-year period, the estimated reduction each year in the volume of steel imports attributable to the VRA's was large, ranging from 6.5 percent in 1973 to 32.8 percent of the actual imports in 1970. Over the whole period, the VRA's were estimated to have reduced imports by 19.04 million net tons, which were valued at \$6.10 billion in 1974 dollars. As a result of the upgrading of the product mix of steel exports by the restraining countries, the VRA's were relatively less effective in restraining the value of imports. Other factors also influenced imports during the years under the VRA's, including exchange rate fluctuations, domestic price controls, and changes in world demand for steel.

Effects on domestic prices and demand.—The imposition of the VRA's resulted in increases in the annual average producer price of steel mill products, estimated to range from \$2.84 per net ton in 1973 to \$11.83 per net ton in 1979. For the 6-year period, the average price of steel mill products would have been an estimated 3.8 percent lower if the VRA's had not been imposed. In addition to the VRA's, steel prices were also influenced by world and U.S. market conditions, increased energy and other production costs, and domestic price controls. Because prices were higher under the VRA's than they otherwise would have been, the quantity of steel demanded was reduced from what it would have been. The estimated effects of the VRA's on the quantity demanded ranged from a decrease of 0.59 million net tons in 1973 to a decrease of 2.82 million net tons in 1970. In total, the VRA's were estimated to have lowered the quantity demanded, because of the price increases, by 11 million net tons over the 6-year period.

Effects on domestic production and employment.—Although the VRA's reduced the volume of steel imports considerably, they had a relatively small effect on domestic production. For instance, although domestic production increased by 21 percent in 1973 compared with the 1972 production level, only 1.1 percent, or 250,000 net tons, of the 1973 increase was attributed to the VRA's according to the statistical model of the steel industry. Most of the fluctuation in production during the period was attributable to fluctuations in world market conditions. Estimated increases in steel production attributable to VRA's ranged from 0.14 million net tons in 1969 to 4.79 million tons in 1971. In total, the VRA's increased domestic production an estimated 9.7 million net tons over the 6-year period. The estimated increase was valued at \$2.79 billion in 1974 dollars. The actual cumulative increase in production over the period was 33.3 million net tons. About 29 percent was accounted for by the VRA's.

This study also investigated the effects of the VRA's on total domestic employment, including that in the steel and related industries, using input-output coefficients to convert production changes to employment changes. The estimated annual effects on domestic employment ranged from an increase of 1,657 man-years in 1969 to an increase of 55,223 man-years in 1971. On the average, the VRA's saved 19,117 jobs per year in the 6-year period.