

This procedure sacrifices the flexibility of the Leontief-Hoffenberg model but enables one to determine the effects of probable changes in the internal composition of the final demand components on the output levels of the processing sectors.

II. METHODOLOGY AND ASSUMPTIONS

1. FINAL DEMAND

To test the impact of varying compositions of material requirements with a static input-output model consistent with a reduction in defense expenditures to the exclusion of all other exogenously influenced variables, the disposition of final demand for the armed and disarmed economy should be based on well behaved aggregates. That is to say the impact on structure could be isolated more precisely if (a) resources were fully employed with labor at the controversial 4 percent unemployment rate and plant utilization in the vicinity of 90 percent of capacity; (b) Federal, State, and local budgets were reasonably balanced; and (c) all other cyclical influences were minimal. It is difficult to discern what the structural impact would be if one uses data based on aggregates derived from an economy with high rates of unemployment and excess capacity, or excess demand and rising prices. Consequently aggregate supply and demand were projected to 1970 so that all variables could be controlled and a well behaved economy simulated. In addition to minimizing cyclical variation, requirements based on projected estimates for 1970 permit evaluation of shifts in the composition of demand for the economy at a time when arms reductions might be enacted. Granted arms reductions may not take place in 1970, 1975, or ever, but they will not take place in 1959, 1960, or 1961 either and the relative values of some aggregates are expected to change independently by 1970, i.e., total purchases of goods and services by State and local governments should surpass Federal purchases by 1970 even if the present level of defense is maintained.

Aggregate supply for 1970 was projected based on the following assumptions: (1) the total labor force would reach 85.9 million with 3.3 million unemployed (4 percent of the civilian labor force), (2) the Armed Forces would remain constant at 2.5 million, Federal civilian employment would rise moderately from present levels of 1.7-1.9 million to 2 million, and that State and local employment would continue to advance at a faster rate from 4.9 million to 6.6 million, (3) the level of average real wages paid to government employees would increase during the decade—military from \$3,500 to \$5,000, Federal civilian from \$5,100 to \$6,700, and state and local from \$3,900 to \$4,200,² (4) private average weekly hours would decline to 37.5, and finally (5) the average annual rate of change in productivity for the private sector would be 2.68 percent per year.

A projection of aggregate demand was derived by independently estimating personal consumption expenditures, gross private investment, and government purchases of goods and services consistent with the increases in gross output and income implicit in the supply function.

²The estimates are given in 1959 dollars so that they will be consistent with the 1959 price structure implicit in the projection of the private sector. If the projection of compensation was based on current dollar payments, the real purchasing power of government employees relative to the private labor force would be overstated given the level of prices assumed.