Highlights of the recent national income and product account revisions

All the national income and product accounts back to 1968 were revised in late 1980 as part of a comprehensive revision of the accounts—the first such revision since 1976. The revisions are sizable. However, only a few components of gross national product (GNP) and national income are affected significantly.

Overview of the revisions

The revisions show that real GNP grew at a 3.2 percent average annual rate during 1968-79, 0.3 percentage point faster than reported earlier.[1] Only a few components of GNP and national income were adjusted up significantly. Both investment in producers' durable equipment and net exports were raised sharply, particularly in recent years. Because a large part of the upward revision in GNP resulted from changes in international transactions, GNP was raised by more than gross domestic product. For 1968-79, the revised data show that real gross domestic product grew at a 3.1 percent average annual rate, only 0.17 percentage point faster than reported earlier. On the income side of the accounts, corporate profits and personal saving also were raised substantially. Inflation, as measured by the GNP implicit price deflator, averaged 6.2 percent during 1968-79 or 0.2 percentage point lower than had been thought.

Neither the timing nor the length of postwar business cycles was affected by the recent revisions. The new data for the 1970s show that the recessions were somewhat less severe and the expansions somewhat stronger than reported earlier.

The higher level of domestic output in recent years indicates that worker productivity, or output per hour worked, has been greater than reported earlier. For the entire private business sector, the upward revisions of productivity growth are modest, averaging only 0.2 percentage point annually for 1972-79.[2] The upward revisions are concentrated in the manufacturing sector.

Business fixed investment

Prior to the latest revision, producers' durable equipment expenditures were calculated using both durables manufacturers' shipments data and the Commerce Department's plant and equipment expenditures survey. In recent years, estimates derived from the survey had been considerably lower than estimates based on shipments data. Because the higher estimates of equipment outlays are more consistent with newly available economic census data, only manufacturers' shipments data are being used in calculating producers' durable equipment spending beginning with 1973 estimates. Largely reflecting this change, real outlays for capital equipment were revised significantly, especially in recent years. In constant-dollar terms, the revisions raised equipment spending by 14 percent ($14 billion) in 1979.

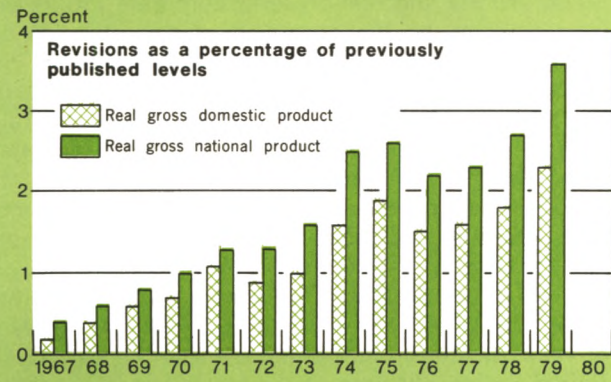
The new data show an even more pronounced shift of business fixed investment toward equipment. Moreover, the revised estimates indicate that outlays for high technology goods, such as computers and communications equipment, were much higher than had been thought, while spending for motor vehicles was lower.

Business outlays for structures also were affected by the revision. Hotel and motel construction, previ-

[1] For a technical discussion of the recent revisions, see "The National Income and Product Accounts of the United States: An Introduction to the Revised Estimates for 1929-80", *Survey of Current Business* (December 1980).

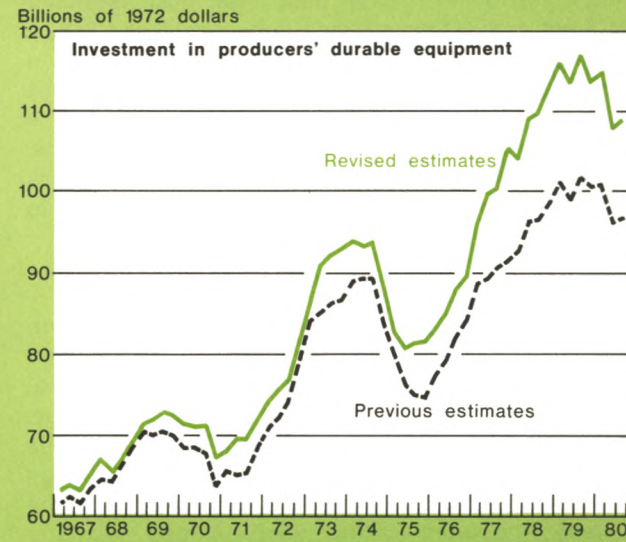
[2] Revised measures of productivity reflect new seasonal and other adjustment factors in addition to new and revised source data.

The revisions are larger for recent years.



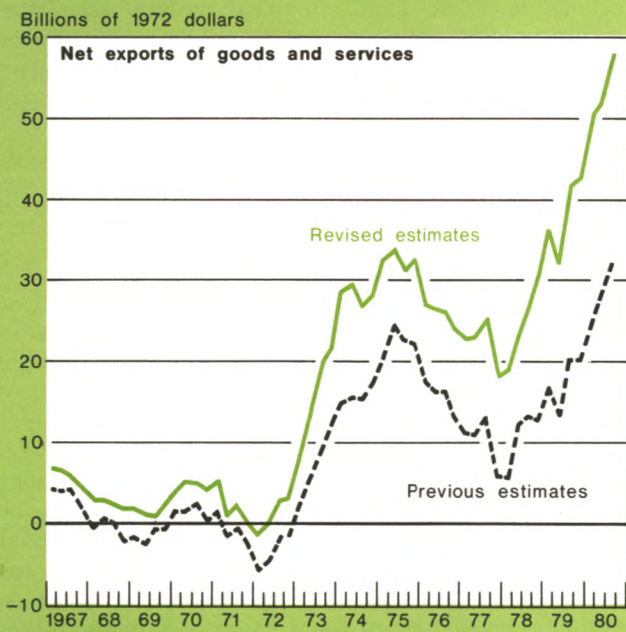
Because there was a large revision of income earned abroad by Americans, the revisions to gross national product (GNP) exceed the revisions to gross domestic product, which measures only production within United States borders.

Spending for new capital equipment was revised substantially.



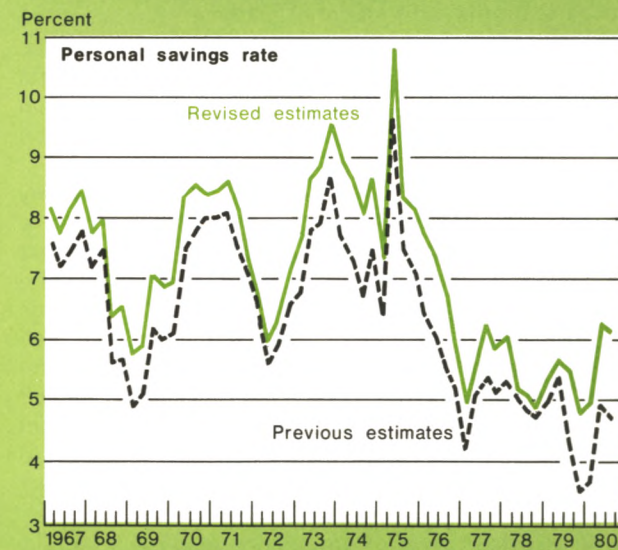
As a result, business fixed investment grew faster and amounted to a larger share of GNP than had been reported earlier.

Net exports were revised significantly.



This reflects primarily the inclusion of reinvested earnings and new procedures to adjust for price changes.

The rate of personal saving has been higher than previously thought.



In part, the higher savings rate reflects a shift in interest receipts from businesses to households, which raised personal income.

Source: United States Department of Commerce, Bureau of Economic Analysis.

ously classified as nonfarm residential structures, now is reported as nonresidential buildings.

According to the revised data, total business fixed investment grew at an average annual rate of 4.8 percent during 1972-79, 0.7 percentage point faster than reported earlier. But the rate of growth of business fixed investment in the 1970s is still less than in the preceding decade. Due to the relatively large revisions, the average share of real GNP devoted to business fixed investment was raised 0.4 percentage point to 10.4 percent for 1972-79.

Net exports

Net exports of goods and services were revised up substantially. For 1979, real net exports were raised about $20 billion. The major sources of this revision are:

Reinvested earnings of incorporated foreign affiliates. A major conceptual change was made in the accounts by including reinvested earnings of incorporated foreign affiliates of United States and foreign investors. In the past, only repatriated earnings were included in exports and imports of services. These reinvested earnings now are treated as part of gross product originating in the rest of the world. Therefore, this change affected GNP but left gross domestic product unchanged. On the income side of the accounts, these reinvested earnings are included in corporate profits originating in the rest of the world. As such, they are part of total corporate profits and national income. Because the inflow typically has exceeded the outflow of earnings, the addition of reinvested earnings raised net exports and GNP. In 1979, that revision amounted to $9.4 billion in real terms, or nearly 20 percent of the total revision in real GNP.

Export and import deflators. A modification in the way in which nominal flows of imports and exports are adjusted for price changes also raised constant-dollar GNP. In the past, the inflow of factor income was deflated by an implicit price deflator for imports of goods and selected services, and the outflow by a similar deflator for exports. Current-dollar values of both inflows and outflows now are divided by the implicit price deflator for United States net domestic product to obtain constant-dollar estimates. This change in deflation procedure raised real net exports by $8.7 billion in 1979.

Other. Revised data for net exports also reflect a new procedure for estimating the value of gold. Previously, changes in inventories of gold held for nonindustrial use were omitted from GNP. Under the new treatment, imports of gold include inventory investment in gold for nonindustrial use. Exports now are set at zero because historically United States gold production has not been sufficient to satisfy industrial needs.

Net exports and rest-of-world corporate profits also were affected by the exclusion of capital gains and losses of unincorporated foreign affiliates and a new treatment of undistributed profits. In the second quarter of 1980, capital gains and losses of unincorporated foreign affiliates were excluded from the accounts. This change now extends back to 1978. In the accounts, rest-of-world corporate profits now are more comparable with domestic profits, from which capital gains and losses have always been excluded.[3]

In the previous estimates, earnings of unincorporated foreign affiliates of United States investors—nearly all of which accrue to corporations—less the earnings of United States affiliates of foreign investors had been classified as undistributed rest-of-world profits. These earnings now are treated as dividends. While neither approach is totally accurate, a recent survey suggests that most earnings are repatriated, so that the new approach is more appropriate.

National defense purchases

While revisions to Federal Government purchases generally are relatively small, the reliability of the data and estimates of the composition of outlays have been improved. For example, real defense purchases from 1972 are now available for the first time. Constant-dollar estimates are based on prices paid by the Department of Defense, which were developed from a recent study. According to the newly available data, real defense outlays fell over 11 percent in 1973-76 and then rose about 3.5 percent during 1977-79.

Income and saving

A shift in interest receipts from businesses to households contributed importantly to upward revisions in personal income. Between 1968 and 1979, total personal income was raised $9.9 billion on average. For the same period, personal tax and nontax payments were little changed and personal outlays were revised up only $1.8 billion on average. As a result, personal saving, computed as a residual, and the savings rate have been higher in recent years than previously thought. During 1968-79, the personal savings rate averaged 7.1 percent, up from 6.4 percent as published earlier. Movements in the savings rate were largely unaffected by the revisions.

[3] Inventory valuation and capital consumption adjustments, which are made to profits earned domestically, are not made to rest-of-world profits because data for these adjustments are not available.

Deborah Jamroz