On the Construction of Regional Input-Output Tables with Imported Products inside the Transactions Matrix

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A number of recent papers discuss the accuracy of nonsurvey methods for the construction of regional input output tables (RIOTs). All these papers focus on RIOTs in which imports are allocated in a row in the South-West quadrant of the table (Type B tables). This means that, for example, the table shows how much the electricity sector spent on imported intermediate inputs, but it does not show how much of this was spent on coal, gas and oil. For certain applications, RIOTs of a different kind are preferable, with imported products included in the interindustry transactions matrix (Type A or E tables). These tables show precisely the value of imported coal, oil and gas. So far, the literature focusses almost exclusively on Type B tables and offers little advice on the construction of Type A or E RIOTs.

We aim at closing this gap by, first, highlighting the conceptual differences between the two types of RIOTs and, second, illustrating them by using the example of Baden-Württemberg, one of Germany’s federal states. The statistical office of Baden-Württemberg produced type A and B tables for 1990. From the federal statistical office we received corresponding tables for Germany as a whole. We use a variety of nonsurvey methods (SLQ, FLQ, CB, CHARM) to derive RIOTs of both types on the basis of the national tables and compare the derived tables to the official ones. Our findings suggest that LQ methods are better suited for deriving Type B tables, whereas CB methods including CHARM are better suited for deriving Type A or E tables.