Relevance of exports for the economies of Mexico mesoregions.

Topic: IO modeling: Computable General Equilibrium Modeling and Social Accounting Matrices
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Over three decades (1985-2016), NAFTA (effective from January 1th, 1994 to date) allowed the accelerated expansion of the real value of Mexican exports (9% annually), increasing its participation in the GDP from 15.3 to 35.2%. In 2016, more than four fifths of the value exported from Mexico (83.7%) is concentrated in US (80.9%) and Canada (2.8%).

In a rather rugged context, the new commercial agreement (renamed as USMCA by US government and T-MEC by the Mexican government) was renegotiated and signed (November 30th, 2018), pending ratification by the legislative bodies of the three countries.

In a previous work, based on the same methodology proposed below (Dávila and Valdés, 2018), quantified the total weight of exports in the main variables of the Mexican economy (43.7% of total gross production, 36.2 of employment, 32.9 of wages, 39.1 in indirect taxes on production, 43.6 in gross surplus, 40.5 of GDP and 39.7 of household income).

The main goal of this work is to determine the importance of exports for each one of seven economies of Mexico mesoregions. Those ones, cover the whole country. It is expected that the effects will be differentiated, depending basically on: their sectoral structure, the importance of exports in their final demand, as well as of the amount and composition of their intermediate consumption.

Specifically, over this paper we try to: 1. Quantify the importance of international sales for the main aggregates of those economies; 2. Subsequently, the multipliers are used as inputs for the computation of total elasticities for international exports. By doing so we can determine the sensitivity of main economic variables of the mesoregions to the unitary fluctuations in the value of exports. 3. Next, we apply the techniques of additive decomposition (Stone, 1985, cited in Miller and Blair, 2009) to determine the weight of different effects (initial, direct, indirect and induced), in the total export elasticities. 4. Finally, we measure the effects of the unit variations in exports of productive activities on the allocation of primary income and private consumption of households.

To do it, we build seven mesoregional expanded Leontief production models, based on the related Social Accounting Matrices (SAM’s), with data of 2013 year. Each of one includes 32 productive activities and five institutional sectors (Enterprises, Government, Rest of the World, Rest of the country and Households, the last ones are disaggregated into ten groups according to income levels).

This is an applied research on the Mexican mesoregional economies, whose main interest lies in addressing a relevant issue of the current economic situation.

Key words: Regional linear general equilibrium models; Regional Leontief extended models; Regional social accounting matrices.