Welfare effects of the Telecommunication Reform in Mexico

Topic: Policy Analysis in Developing Countries
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Up to 2013, the telecommunication sector in Mexico was characterized by a high degree of concentration; indeed the sector was fairly described by a dominant player, a rationed market (low density of services), high tariffs, a poor institutional design and weak regulator agents. The Herfindahl-Hirschman (HHI) index, that ranges from 0 (perfect competition) to 10, 000 (pure monopoly), was 5,859 for mobile telephone and 7,029 for fix telephone services, among the highest in the world. The Organization for Economic Cooperation and Development (OECD) released an assessment about the regulation and the design of public policies in the telecommunication sector in Mexico. The study estimates a dead-weight welfare loss of 1.8% of the Gross Domestic Product (GDP) annually occasioned by the lack of competition in the sector. In order to introduce more competition in the sector, a new reform for the sector was approved in 2014 by Congress establishing a new regulator who can impose asymmetrical rules in case of predominance of one of the firms. A declaration of preponderance of the dominant player was issued promoting the free of charge usage of its infrastructure for the rest of the suppliers. The new institutional design will induce more competition in the sector, bringing down the mobile and fix telephone prices, and increasing the coverage and penetration of these services. In this article, we build an extended input-output price model for the Mexican economy in order to assess the impact of the higher competition in the sector in the consumer welfare and the income distribution. The model is static, encompass 20 types of consumers (rural and urban and the ten income deciles), 44 sectors where 16 are disaggregate telecommunications industries, assumes a fix wage and capital rental and idle resources hence an increase in the volume of the telecommunication market should not shrink other sectors of the economy. The competition effects in prices are modeled according to Harris (1984) that assumes that liberalizing a market might depress the prices to a weighted average of monopoly and marginal costs. Thereby, we make some simulations about the economic effects of setting fix and mobile telephone services according to different scenarios; one of them is assuming that internal tariffs equilibrium resembles the average OECD level. We find the results are not minor, the drop in the telephone prices would reduce the general consumer price index in almost 3%, and value added would increase more than 2%, benefiting mainly household from the sixth to tenth income decile.