

Abstract for “Labor Quality in Market Services in India: Challenges in Constructing a Quality Index”

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The importance of services sector in the growth process of India has been strongly established in the last two decades and the economy is moving towards services dominated export growth. Even in 2008-09 when the merchandise export sector was severely affected by the global recession, services exports showed an upward trend. The emergence of services as the most dynamic sector of the Indian economy has in many ways been a revolution. The most visible and well-known dimension of the take-off in services has been in software and information technology (IT)–enabled services (including call centers, software design, and business process outsourcing), which to some extent also help increase innovation capabilities in the sector (Lema et al, 2012). However, growth in services in India has been much more broad-based than IT (Gordon and Gupta, 2004; Eichengreen and Gupta 2010; 2012.). The service sector is peculiar in its characteristics as it consist of many sub-sectors some of which produce market services-trade, transport, banking etc while some of the others are non-market services; e.g. public administration, education and health. Most of these service sectors also require relatively more skilled labour in terms of level of education, work experience and training.

The growth of the service sector depends fundamentally on the availability of skilled manpower. Many attribute the overall success of India’s service sector and its export growth since 2000 to its pool of technical and educated manpower which is cheap and competitive. The quality of labour force and its composition is a key consideration in any assessment of service sector performance in India. Thus, the key objective of the study is to measure the labor quality for service industries especially market services. One of the widely used methodology to capture changes in labour quality is given by Jorgenson, Gollop and Fraumeni; 1987, which is that the aggregate labour input L_j of sector ‘j’ is defined as a Törnqvist volume index of persons worked by individual labour types ‘1’. The index of aggregate labour quality measures the changes in the sex-age-education-occupation composition of the economy. It is the partial index corresponding to all characteristics. The use of this method is however data intensive and the data needed is for the distribution of persons employed by these characteristics as well as the earnings for each of these categories. This offers immense challenges in the construction of an appropriate measure of labor quality.

Because of large data set requirements it is very difficult to construct labour quality index for all the sectors of the service economy. Though the data on employment in the sub sectors of the service sector are available from NSSO, but at a more disaggregate level these become relatively less reliable with less data points. The challenge in constructing a labour quality index is in getting the estimates of labour earnings. These may be easy for regular salaried employees, somewhat difficult for casual labour but very difficult for self-employed persons who are generally large in non-market services as compared to market services. In many of the service sectors the proportion of self employed is quite substantial. We have used Mincer equation and the Heckman methodology to estimate the earnings of those employed persons whose earnings are not directly available from the data set.

Despite the limitations of data availability on earnings of employed persons, the paper attempts to construct a labour quality index covering the period 1983 to 2010 using mainly the data from NSSO rounds on Employment and Unemployment in India. The labour quality index is based on the Jorgenson, Gallop, and Fraumeni methodology. We estimate the labour quality index for market service sectors from both general and technical educational attainment of labour force. The components included in the aggregate index are the number of workers by education levels, age and experience. The labour quality indices which are calculated are similar to Jorgenson (2005)-the grand index, education index, age index and the gender index. The preliminary results of labour quality indices show that the quality changes among market services have been quite slow in wholesale trade, and hotels & restaurants and slightly faster in retail trade, transport services, post & telecommunication and real estate services.

The paper is structured as follows. Following the introduction, section 2 provides an overview of service sector in India with a focus on value added, employment and policy framework. The methodology for measuring labor input especially quality index is discussed with special reference to Indian service industries in section 3. Section 4 makes an attempt to portray the various data nuances and caveats from the National Sample Survey database (NSSO) of the Central Statistical Organization (CSO), Government of India used for measuring labor quality. In section 5, the estimates of labor quality for market service industries as well as service sector are documented and analyzed. The final section concludes the study by addressing the various challenges that need to be addressed in the construction of labor quality index for India.

Key Words

Educational composition, labour quality index, market services

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