Does growth in South Asia promote employment?

Selim Raihan and Nabila Tasnuva

The relationship between economic growth and employment is an important discussion in the economics discourse. Promotion of inclusive growth also requires economic growth process to be employment friendly. In South Asia, this issue is perhaps more burning. Usually, the employment effect of economic growth is captured by calculating the employment elasticity of economic growth. In this context, more robust approach is estimating the employment elasticity in a multivariate econometric regression model, where the effect of economic growth on employment can be estimated after controlling for other influencing factors.

In order to understand the long term effect of economic growth on employment in South Asia, we have estimated a cross country panel regression with 167 countries for the period of 1950 to 2011 with number of people employed being the dependent variable. Here, real GDP entered into the estimation as the key explanatory variable with a number of variables which are likely to influence employment e.g. share of gross capital formation in GDP, share of government expenditure in GDP, trade as a percentage of GDP and inflation level. The data are taken from the Penn World Table version 8. All variables are expressed in natural logarithm. With a view to exploring the employment and growth linkage for South Asian countries, we have interacted real GDP with South Asian country dummies (Bangladesh, Bhutan, India, Maldives, Nepal, Pakistan and Sri Lanka). The data point for Bangladesh starts from 1972. For Bhutan, Nepal and Maldives it is 1980 whereas the data point for India, Pakistan and Sri Lanka starts from 1960. However, the countries share the same ending point for data, which is 2011. To tackle the endogeneity problem between economic growth and employment we have run a two-stage regression model with lag real GDP as the instrument.

The regression results show that real GDP comes out as highly significant with positive sign in the fixed effect regression model, and 1% rise in real GDP would raise the number of employment by 0.28%. Our estimates suggest that, gross capital formation has a positive and statistically significant effect on employment, and a percentage point increase in government expenditure-GDP ratio would reduce employment by 0.04%. Trade-GDP ratio has also a significant negative effect on the dependent variable, and a percentage point increase in trade-GDP ratio would reduce employment by 0.03%. Rise in the price level has however a positive effect on employment. The highly significant and positive coefficient estimate of real GDP reveals that, in the cross-country panel setting, a 10% increase in real GDP would raise employment by 2.8%. A close look at the interaction dummies suggest interesting findings regarding the relationship between employment and the rise in real GDP of South Asian countries. The coefficients of the interaction dummies for all but Bhutan and Sri Lanka are positive and statistically significant, suggesting that real GDPs have found to have statistically significant different implications for employment of most of the South Asian countries, and for these countries the employment elasticities of economic growth are higher than the global estimate. Among the South Asian countries, the largest effect on employment is observed for Bangladesh, and a 10% rise in real GDP would lead to the rise in employment by 6%. Such effect is the least and lower than the global estimate for Bhutan, as its interaction dummy has a negative and statistically significant coefficient, and a 10% rise in real GDP in Bhutan would lead to the rise in employment only by 1.3%. For Sri Lanka, the effect is the same as the global effect, since its interaction dummy is statistically insignificant. The magnitude of such impact for India is 4%, 4.1% in the case of Maldives, 4.6% in the case of Nepal, and 5.1% in the case of Pakistan.

The aforementioned analysis leads to some important policy concerns and the necessity of revisiting the quality of growth processes of the South Asian countries. Concerning the regional context, in the long run, while for Bangladesh, Pakistan and, to some extent for Nepal, their economic growth processes have been somewhat employment friendly, for Bhutan and Sri Lanka, their growth processes generated very small employment momentum. For Maldives and India, the employment effect of economic growth has been rather low; and especially for India, it has been lower than those of its two major neighbours, i.e., Bangladesh and Pakistan.

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Dynamics of employment elasticities in Bangladesh

Selim Riahan and Syer Tazim Haque

This article presents calculated sectoral employment elasticities for Bangladesh, which to the best of our knowledge, have been rather unexplored, especially for the time horizon that we have considered (from 1995-96 to 2009-10).

Employment elasticity of output is the percentage change in employment divided by the percentage change in output. Employment data have been taken from the Labor Force Survey (LFS) reports of the years 1995-96, 1999-2000, 2005-06 and 2009-10. LFS report 1995-96 is considered as the base for sectoral disaggregation as it has the least number of sectors compared to other years. The sectors have been classified into 10 sectors following the classification of 1995-96 report. These sectors are AFF (Agriculture, Forestry & Fishing), MNQ (Mining & Quarrying), MNF (Manufacturing), EGW (Electricity, Gas & Water), CON (Construction), THR (Trade, Hotel & Restaurant), TSC (Transportation, Storage & Communication), FBS (Financial & Business Service), CPS (Community & Personal Service), and HNA (Household Sector & Not Adequately Defined). Sectoral level real GDP data (base price 1995-96) have been taken from different statistical yearbooks, where the 86 sectors were merged into the aforementioned 10 sectors. As we have four data points we calculated three respective elasticities for changes from 1995-96 to 1999-2000, from 1999-2000 to 2005-06 and finally from 2005-06 to 2009-10.

The findings of this exercise are presented in line with the idea depicted in Table 1. The real GDP data for the 10 sectors under consideration show that outputs of all the sectors experienced positive growth which confers our discussion to the left column of Table 1 only. The productivity of labor merely shows output per worker, and the relationship can be summarized as, for a given level of increase in output, if employment experiences a positive growth it must be met by an equal and opposite decrease in labor productivity. The upper left box of Table 1 contains sectors with positive output growth but negative employment elasticities indicating negative employment growth; hence these sectors have positive productivity growth. The middle left box represents the ideal scenario as it contains the sectors with positive output growth and positive employment elasticities between 0 and 1; thus these sectors experience both employment growth and productivity gains. The lower left box represents the scenario where employment elasticities are greater than one, indicating positive employment growth with negative productivity growth.

Table 2: Point Employment Elasticity of 10 Sectors

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Table 3: Point Elasticity of 12 Disaggregated Manufacturing Sectors

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Table 2 shows the calculated elasticity values and distribution of sectors in each of the three boxes for the data periods we have. From 1995-96 to 1999-2000 no sectors observed negative elasticity and only two sectors, namely MNQ and EGW had elasticity values greater than 1. Other eight sectors experienced positive employment growth but their elasticity values varied between 0 and 1. Among these sectors, AFF, TSC and FBS sectors seem to be observing higher employment elasticity values, and hence can be indicated as more employment intensive, and thus, from the analogy of the productivity, output and employment relations, they correspond to lower productivity. A different scenario is observed in the second period (from 1999-2000 to 2005-06). The sectors that observed elasticity values greater than 1 in the first period (MNQ and EGW) now have negative elasticity values. AFF, MNF, CON, THR, CPS and HNA remained in the same category but the magnitude of elasticity values changed dramatically for all but AFF. Elasticity for MNF, CON, THR, and HNA became greater than 0.5, and, in contrast, that of CPS reduced from 0.56 to 0.12. TSC and FBS experienced elasticity values greater than 1 during this period. During 2005-06 and 2009-10 only FBS was found to have a negative employment elasticity. MNQ, CON and EGW experienced elasticity values greater than 1, indicating, during this period, these sectors observed productivity falls. AFF, MNF, CPS and HNA remained in the same category as before but all four these sectors had employment elasticity values greater than 0.5. So far, we provided aggregated elasticity value for the MNF (manufacturing) sector. With available data only for the two periods (from 1999-00 to 2005-06 and from 2005-06 to 2009-10) we subcategorized the MNS sector into 12 sub-sectors and calculated their employment elasticity values in the same manner. These sub-sectors are FAB (Food and Beverage), TOB (Tobacco), TEX (Textile), WAP (Wearing Apparel), LEF (Leather and Footwear), WWP (Wood and Wood Products), PPP (Printing and Publishing), CRP (Chemical, Rubber and Plastic), MMP (Metal and Mineral Products), ELM (Electrical Machinery), and OMN (Other Manufacturing). The results are given in Table 3. Unlike the first part of our analysis, PPP had a negative output growth which means this sector would concern the right column of Table 1. During 1999-2000 and 2005-2006 both output and employment for PPP sector experienced negative growth, and elasticity was greater than 1, hence this sector belongs to the bottom right box of Table 1 reflecting a productivity growth. However, during 2005-06 and 2009-10, output growth of PPP was negative but its employment growth was positive with the employment elasticity value less than 1, putting this sector into the upper right box of Table 1 which shows a negative productivity growth. Looking into the other sectors, during 1999-2000 and 2005-2006, seven among the rest of the eleven sectors showed elasticity values greater than 1. FAB, TEX and OMN belonged to the middle box of Table 3, and they had elasticity values between 0 and 0.5. Only LEF and ELM had negative employment elasticity values. The scenario changed quite drastically during 2005-06 and 2009-10, when seven of the eleven sectors had negative employment elasticity values, and elasticity for TOB fell from greater than 1 to less than 0.5.

Employment elasticity of the TEX sector fell but the sector remained in the same category as before, whereas FAB experienced a rise in the employment elasticity moving from middle box to the lower box. The performance in the WAP sector was at the peak as the sector experienced employment elasticity greater than 1 in both the periods under discussion. The aforementioned results point to some important structural changes in the overall economy as well as in the manufacturing sector in Bangladesh. Dr. Selim Riahan is Executive Director of SANEM. Email: selim.riahan@gmail.com

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..job creation for growth to be inclusive..

SANEM had a conversation with Dr. Sher Verick on growth and employment issues related to South Asia. Dr. Sher Verick is Senior Employment Specialist in the International Labour Office’s Decent Work Technical Support Team for South Asia in New Delhi, India. Before that, he worked as a Senior Research Economist for the ILO in Geneva, at the United Nations Economic Commission for Africa, and at various research institutions in Europe and Australia. He holds a Master’s degree in development economics from the Australian National University and a PhD in economics from the University of Bonn.

SANEM: What is the linkage between economic growth and employment? How relevant is this issue for the South Asian countries?

SV: Without sustained and strong economic growth, it is very difficult for a country to generate sufficient jobs, especially decent jobs. However, the relationship between growth and employment is complex. Growth leads to new jobs through, for example, an increase in exports, investment or consumption. At the same time, employment contributes to growth as a factor of production. Most discussions are based on trends and differences in employment elasticities. However, this approach can be misleading because what matters is whether economic growth is accompanied by the creation of decent work, not just growth in employment at all costs.

Can countries in the region sustain high growth rates as witnessed in China and other fast-developing countries? This has proven to be elusive even in India, which has experienced periods of growth above 8 per cent in recent times. Therefore, countries need to increase growth through more investments in other sources of demand. However, whether this translates into decent jobs depends on the nature of growth, namely the sectoral and spatial distribution. For growth to be inclusive, job creation needs to benefit all, not only a select few.

SANEM: Do you think the process and progress of economic growth are favorable for employment generation in South Asia?

SV: Trends in GDP growth rates reveal both commonalities (a slowdown since 2011) and heterogeneity in countries’ growth paths in the region. Following a number of years of more spectacular growth rates, the region’s largest economy, India, experienced a sharp slowdown in 2012. The economies of Nepal and Pakistan have grown consistently below the regional average due to political, security and macroeconomic factors. In contrast, Bangladesh and Sri Lanka have been able to maintain more robust economic growth rates in recent years.

Growth in these countries does result in employment generation. After all, in the absence of social security systems, the majority of people across the region have little choice but to acquire a job (either domestically or in a foreign labor market). For this reason, the highest unemployment rates in South witnessed among the best educated, especially the educated youth – these jobseekers are able to wait for better employment opportunities in line with their own preferences or remain unemployed because they lack skills demanded by employers (i.e. a skill mismatch).

Economic growth can also be associated with a fall in employment as witnessed among women in rural areas in India in the 2000s. From 2004-5 to 2009-10, a period when the Indian economy was growing at around 8 per cent per annum, the number of women workers in India dropped by 21.3 million, of which 19.5 million were in rural areas. Though puzzling, the overall low level of female labor force participation in South Asia is a major challenge, and stronger economic growth has largely failed to generate more employment for women in the region, apart from Bangladesh.

Overall, while growth may improve wages, as witnessed in India in the mid-2000s, the quality of employment generated is poor. Many new jobs created in India have been in the construction sector or contractual work in the organized sector. Many women end up as domestic workers.

SANEM: What do you think about the quality of employment in this region? And how this should be for poverty alleviation and human development?

SV: Arguably the greatest problem facing South Asia is, therefore, the quality of employment. The region continues to have some of the highest rates of informality and vulnerable employment. According to ILO estimates, the share of workers in the agriculture sector in South Asia stood at 45.4 per cent in 2014. The share of the primary sector in GDP has, however, declined much faster (the regional average was just 18.9 per cent of GDP in 2013). The flipside of this trend is the growth of the services sector, which now accounts for 56.3 per cent of GDP (in 2013), but only 31.6 per cent of employment.

Thus, the overwhelming task in the region is to promote the manufacturing sector as a key driver of growth and job creation. In this regard, only 12.4 per cent of South Asian workers were engaged in this sector in 2013 (ILO estimates). At the same time, the share of manufacturing in GDP has, in fact, declined from 14.9 per cent in 2010 to 13.4 per cent in 2013. This worrying trend suggests that gains in productivity in manufacturing are lagging those witnessed in the service sector.

Thus, to accelerate poverty alleviation and promote human development in South Asia, it is essential that more people, especially the unskilled and youth, are able to make transitions from low to high productivity jobs.

SANEM: What changes in policies should the countries in this region adopt to promote economic growth which can generate employment both in number and quality?

SV: On the policy front, governments need to consider a multi-pronged approach. Critical is to accelerate economic growth. However, growth must be promoted in sectors, which will make a robust contribution to the creation of more productive employment. This requires supportive infrastructure, education and skills development, R&D and permissible incentives under the rubric of a strategic industrial policy. Efforts are also needed to improve agricultural productivity.

Moreover, special measures are required for those who do not benefit from growth and labor market outcomes. In this regard, gender must be one of the key priorities of all countries in South Asia as an economic and social objective, addressing interventions on both the supply and demand-side of the labor market.

A major topic of debate in the region is the impact of labor laws with many arguing that regulations constrain investment and job creation, especially in the manufacturing sector. However, the majority of workers are outside the purview of most laws since they operate in the informal sector. Furthermore, many laws are not enforced leaving workers unprotected. A more constructive path should be taken to develop effective labor market regulations and social protection systems that both protect workers and support employers to improve productivity and competitiveness. To achieve more harmonious industrial relations and fair outcomes in the labor market, social dialogue, which is weak in the region, should be strengthened.

Finally, given the complexity of employment, governments should take a comprehensive approach, assigning a greater priority to the objectives of job creation and decent work at all levels of policymaking. To formulate more relevant and effective policies, better data and monitoring and evaluation of interventions should also be given high prioritization.

SANEM: Thank you very much.

SV: You are welcome.
DECCMA project meeting held at BUET

SANEM representative Nafiz Iteakkar (Research Associate, SANEM) recently attended a meeting on 9 February, 2015 at the Institute of Water and Flood Management, BUET in connection with the collaborative research project titled “Deltas, Vulnerability and Climate Change: Migration and Adaption (DECCMA)”, funded by Canada’s International Development Research Council (IDRC) and UK Department for International Development (DFID). SANEM is a partner of this project. There are six separate work packages under this project and SANEM is mainly contributing in work package 4 of Economic Modeling of Impact of Climate Change. The main purpose of work package 4 is to provide a tool that allows policy makers to see how different climate scenarios affect the economic options in the delta, how these in turn affect vulnerability and sustainability in the region and also link economic factors to the availability of jobs and livelihoods in the delta and thereby to potential migration fluxes – all in the context of climate change and its effects on different economic activities in the delta. The objective of the meeting was to develop a conceptual framework under work package 5 of DECCMA project to integrate the output produced under the work package 2 – ‘Vulnerability, hazard and climate change hotspot mapping’, work package 3 – ‘Migration as an outcome and determinant of vulnerability in deltaic populations’ and work package 4 as described earlier; directed towards developing a model of bio-physical, economic and socio-economic drivers of migration, the potential migration fluxes of men and women, potential trapped populations, and the influence of other autonomous and planned adaptation processes and decisions, which is the sole purpose of work package 5.

GRoW-IDRC representative visits SANEM

On February 5, 2015, Ms. Madiha Ahmed (Senior Program Specialist) from Growth and Economic Opportunities for Women (GRoW), IDRC, Canada visited SANEM office to discuss about SANEM’s ongoing research projects with IDRC as well as its communication strategy. Dr. Sayema Haque Bidisha (Associate Professor, Dept. of Economics, University of Dhaka and Fellow, SANEM) was present during the meeting to discuss about the progress of the research papers on women labor force participation in Bangladesh under IDRC. Ms. Madiha Ahmed talked about the ongoing RCTs of GRoW and also she shed some light on other GRoW projects targeting women. Some research associates of SANEM, Syer Tazim Haque, Israt Jahan, Muhammad Mosshir Rahman were present in the meeting to discuss about the recent work on female labor force participation and SANEM’s RCT projects. Ms. Ahmed also had a conversation about the current communication framework of SANEM with the communication associate Raisa Tamanna Khan.

Research design seminar held in Kathmandu

The research design seminar on “The Sectoral Growth and Employment and the Role for Government Policies and Programs to Promote Structural Transformation in Nepal” was held in Kathmandu, on February 13, 2015. The chief guest for the seminar was Dr. Swarnim Wagle (Member, Nepal Planning Commission). Welcome remarks were provided by Jose Assalino (Country Director, ILO-Country Office for Nepal) and Dr. Sher Verick (Senior Employment Specialist, ILO Regional Office, New Delhi). Dr. Selim Raihan (Professor of Economics, University of Dhaka and Executive Director, SANEM) presented on the study design and the methodology during the seminar. The seminar also consisted of an interactive questions and answers session where the audience participated actively. The daylong seminar came to an end with closing remarks from the Chief Guest.

Public lecture at Ramjas College, Delhi University

Dr. Selim Raihan (Executive Director, SANEM) delivered a public lecture on “Multilateral Trading Regime under WTO: South Asian Perspectives” at the Ramjas College, Delhi University, New Delhi, India on February 4, 2015. In his lecture, he discussed about General Agreement on Tariffs and Trade (GATT) and how WTO emerged from GATT, five key principles in GATT, Generalized System of Preferences (GSPs), and duty free market access for LDCs. The lecture also included GATT and WTO rounds and their achievements, overview of WTO and key WTO negotiations, and the South Asian perspectives.