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# **Geography of Poverty and Industrial Clusters in Pakistan: Some Policy Implications**

The primary focus of this brief is on the role of what we call indirect approach to poverty alleviation or inclusive growth particularly through industrial clustering in the given geography of poverty in Pakistan. Such an analysis of the geography of poverty identifies several factors that can potentially explain the regional inequality and diversity in poverty and hence can be important in reducing poverty and inequality. This brief focuses particularly on the relationship between the clusters of poverty and the clusters of industry, drawing upon the key insights from the literature in the field, and some of the empirical analysis available on Pakistan. It identifies some of the key policy lessons to eradicate poverty and regional inequality in Pakistan.

The geography of poverty in Pakistan illustrates high rural-urban, inter-provincial and intra-provincial (between districts) inequalities in the incidence and intensity of multidimensional poverty (Naveed, Wood and Ghaus, 2016). One can see the geography of poverty from the simple fact that half of the poorest two quintiles of the districts (23 out of 56) are from Balochistan, 11 from Sindh, eight from KP, and only two from Punjab. This study shows that the largely rural districts and those with low population have the highest incidence of poverty. Rural and densely populated districts in South Punjab and interior Sindh also have high incidence of poverty. In contrast, most of the densely populated, urban districts with higher levels of industrialization in the north of Punjab up to Federal Capital and the adjacent districts of KP, as well as the major urban centers in all provinces are the least poor ones.

There are obvious reasons to think the growth of firms and industrialization as a source of poverty reduction. Firms are believed to offer stable jobs with relatively higher wages and better prospects for future income growth, which leads to poverty reduction. This correlation, of course, needs to be taken with caution in the context of developing countries. The growth of industry in developing countries may not always guarantee a poverty reduction as most of the firms are small, work in informal sector, pay low wages, and often offer jobs that are not stable. This provides subsistence level opportunities and not a potential for growth. The evidence on the impact of such small and medium enterprises (SMEs) on poverty reduction and household welfare is very limited (Ayyagari et al. 2011; ANDE, 2012). This lack of impact can also be viewed in the light of Bhagwati's (1988) work that sets preconditions on the very nature of industrialization to determine whether it can be a conducive strategy for poverty reduction. It suggests that the ideal sector for poverty reduction must intensively use the resources owned by the poor such as labor, land and indigenous knowledge, it must be competitive, and it must be dynamic to grow and sustain its competitiveness. This clearly indicates that not all types of firms and industries could be associated with pro-poor outcomes. Nonetheless, when firms offer stable employment and higher wages, McKenzie (2011) reports it is associated with poverty reduction.





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### Industrial clusters as a potential tool to poverty reduction

Significant to the geography of poverty, when compared to general industrialization, the industrial clusters can have significant poverty reduction impact even when clustered firms are SMEs. The presence of clusters enhances the ability of individual actors be it producers or workers to improve their livelihoods and wellbeing. Similarly, the firms in industrial clusters are believed to generate collective efficiency actively through joint actions as well as passively through external economies (Schmitz 1995; 1999; Schmitz and Nadvi 1999). The consensus that emerges from this literature is that geographic proximity matters; competitiveness is located at the collective level, and firms benefit from the opportunities for joint action and external economies in the cluster. Moreover, clusters also offer potentially important benefits of developing social capital and social protection through local trust-based relations. Such forms of social assets can be of significant advantage to firms and to labor (UNIDO, 2004).

To ensure stable and well paid employment prospects, both firms and clusters have to be dynamic to grow and sustain their competitiveness. There are multiple factors that affect a firm's growth dynamics, growth and competitiveness – innovation is the most important of these. An innovation refers to the market introduction of new and improved products and processes by firms, what is commonly called as technological innovation. Innovative firms are technologically superior and tend to be more profitable and, hence, stand a better chance to eradicate poverty by means of providing jobs and higher incomes (Kimura, 2011). This is where clusters are different and very relevant. Firms in clusters outperform isolated firms due to localized learning given the tacit nature of innovation related knowledge and its spillovers. A firm's social capital in clusters can also be very important in this context as it provides access to knowledge networks. A number of studies have found that firms in clusters have higher innovative capacity than the isolated ones (Porter, 1990; Baptista, 2000).

Based on this literature, one would expect labor to be more productive within clusters, which translates into higher income. There is ample evidence pointing towards clusters generating more and better paid jobs for the deprived communities in the developing countries (UNIDO 2004). Clusters are also shown to have a potential of eradicating poverty by decreasing the industrial isolation that small and medium enterprises face in developing countries (Mano et al. 2011; Weijland, 1999). Furthermore, rural clusters, especially in agro-processing and agro-service activities that rely heavily on casual, landless and family labour, can be potential providers of critical income for the rural poor (Das 2003; Saith 2001).

#### **Evidence from Pakistan**

There is a very thin literature on the cluster formation in Pakistan and its impact on firm performance, and even more sparse on development outcomes. There is also a gap in the literature on the relationship between industrial concentration and poverty reduction, and the pathways through which this relationship holds. There is evidence, however, of an indirect relationship: i) industrial clusters are shown to improve firms' performance, and ii) industrial clusters in Pakistan are located in the districts where the incidence of poverty is much lower. The study by Burki and Khan (2011) suggests that industrial agglomeration has significantly benefited firms as indicated by a strong negative association between the agglomeration index and technical inefficiency of firms. Haroon (2013) finds that agglomeration through localization and urbanization has a strong impact on the formation of new firms and their scale of operation in Punjab. In a more recent paper, Chaudhry et al., (2017) show mixed evidence of agglomeration in the form of localization in reducing unfavourable dispersion in total factor productivity in Punjab. Moreover, Nasir (2013) reports a higher firm turnover rate (higher firm entry and exit) in highly agglomerated industries of Punjab, linking it with the findings of Chaudhry and Haroon (2015) that firm entry has a positive impact on economic outcomes such as employment and school enrollment in Punjab. These evidences establish an indirect





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positive link between agglomeration, firm entry and socioeconomic outcomes, which can contribute to poverty reduction. By combining two recent works, the link between industrial and poverty clusters in Pakistan can further be strengthened. Mahmood et al., (2016) identify two existing sets of industrial agglomeration in Pakistan: first, the coastal strip around Karachi-Winder-Hub and Hyderabad-Dhabeji-Nooriabad which are agglomeration of multiple varieties of industries, and second, the Northern Corridor from Lahore-Faisalabad to Peshawar comprising Gujranwala, Wazirabad, Sialkot, Rawalpindi, Taxila, Haripur, and Nowshera. These districts constitute the quintile of least poor districts in Pakistan (Naveed, Wood and Ghaus, 2016). One important similarity in the clusters in these zones (especially in northern corridor) is that they are specialized in textiles, garments, leather products, food and light engineering that are very labor intensive suggesting higher employment and entrepreneurial opportunities resulting from industrial concentration. This may also point towards an important aspect of industrial clustering - the extent to which it evolves from and strengthens what is called cottage industry. The two industrial corridors are home to thousands of the units of cottage industries specializing in carpets, textiles and embroidery, ceramics, surgical instruments, jewelry, sports goods, woodwork and metal work. These family run enterprises are not only labour intensive, they preserve indigenous crafts and culture, offer unique skills training to the works, trigger supply chains by using local raw materials, develop rural-urban linkages, and are extremely labour intensive. Given these industries are particularly run by the poor, they offer an important opportunity for reducing poverty and regional inequality through a better understanding and geographically even promotion of the cottage industries.

#### **Conclusions and policy recommendations**

Several conclusions could be drawn from the literature discussed in this brief. First, a well devised industrialization policy can generate inclusive growth with reduced poverty. Second, the geographic/clustered dimensions of poverty in Pakistan necessitate tailored poverty reduction strategy. Third, industrial clusters can help generating more stable and well paid jobs with reduced poverty. Fourth, small industries particularly the cottage industries provide an entry point to simultaneously reduce poverty through supporting these enterprises and strengthening industrial clusters. Fifth, exploring the industrial potential of various regions particularly those with high levels of poverty can not only reduce poverty but also address regional inequalities. Lastly, there is a need for further understanding of the clusters and their interaction with other socioeconomic issues such as poverty and inequality in Pakistan.

There is a noticeable relationship between industrial clustering and poverty reduction in Pakistan. However, the nature and dynamics of this relationship require further analysis. There is also a need to understand the positioning of the cottage industry within these clusters in order to generate insights for promoting industrial clusters across the country with region specific specializations. There is thus a great need to support research to generate evidence that can broaden understanding about the best ways industrialization can pursue the goal of poverty reduction, and minimizing regional inequalities in Pakistan. A better understanding of the structure and properties of clusters would help in forming better-informed policies to achieve a higher and sustainable growth with reduced poverty and inequality.

Based on the arguments and evidences offered in this brief, it is suggested that the developing industrial clusters can be a promising policy for poverty reduction and rising incomes and employment. However, clusters are very heterogeneous in their nature and structure, thus can have very different effect on poverty eradication. It is thus important to focus on both developing and expanding the clusters that are in poor localities, are using labor more intensively, and are dynamic to sustain the rewards for workers within their given contexts. This needs a shift in focus of the cluster development policy from being productivity/efficiency centric to a more dynamic-efficient-people/poor centric that pays central attention to the people within clusters including entrepreneurs, workers and their households. One such policy initiative could be to focus and promote clusters in cottage industry, small traders, agro-processing and services, involving more of those who are vulnerable such as women, and into those localities that are marginalized and poor. A well devised cluster development





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policy will not only help in generating quality and stable employment for the poor, it can also help in empowerment and participation of marginalized groups that will further help in tackling the vulnerability of the poor. The overarching goal of poverty reduction can be achieved effectively if the poverty reduction programmes in the country move beyond supporting uncoordinated individual micro-enterprises towards developing and strengthening spatially appropriate, horizontally and vertically integrated clusters of industries of various size and scale by providing skills and capital and building networks.

#### References

ANDE, 2012. Small and Growing Businesses: investing in the Missing Middle for Poverty Alleviation, Aspen Network of Development Entrepreneurs, Washington, D.C.

Ayyagari, M., Demirgüç-Kunt, A. and Maksimovic, V., 2011. Small vs. young firms across the world: contribution to employment, job creation, and growth. World Bank Policy Research Working Paper 5631, Washington, D.C: World Bank.

Baptista R. (2000). Do innovations diffuse faster within geographical clusters? International Journal of Industrial Organization 18:515-35.

Bhagwati, J. (1988), "Poverty and Public Policy", World Development, 16 (5), May, pp. 539-555.

Burki, Abid and Khan, Mushtaq (2011). Agglomeration Economies and their Effects on Technical Inefficiency of Manufacturing Firms: Evidence from Pakistan. The International Growth Center working paper, November 2011.

Chaudhry, Theresa, Haseeb, Muhammad and Haroon, Maryiam", (2017). Economic geography and misallocation in Pakistan's manufacturing hub. The Annals of Regional Science

Das, K., 2003, "Can Firm Clusters Foster Non-Farm Jobs? Policy Issues for Rural India?", Working Paper 137, Gujrat Institute of Development Research, Ahmedabad.

FMC. (n/a). Cluster Development and Poverty Alleviation: Policy Suggestions. Foundation for

Fowler, C. S. & Kleit, R. G. (2014). The effect of industrial clusters on the poverty rate. Economic Geography, 90(2), 129-154.

Haroon, M (2013). The Effects of Agglomeration on the Formation and Scale of Operation of New Firms. CREB Working Paper No. 03-13.

Haroon, Mand Chaudhry, A. (2015), The Economic Impact of new Firms in Punjab. The Lahore Journal of Economics and Chaudhry, A. (2015), The Economic Impact of New Firms in Punjab. The Lahore Journal of Economics and Chaudhry, A. (2015), The Economic Impact of New Firms in Punjab. The Lahore Journal of Economics and Chaudhry, A. (2015), The Economic Impact of New Firms in Punjab. The Lahore Journal of Economics and Chaudhry, A. (2015), The Economic Impact of New Firms in Punjab. The Lahore Journal of Economics and Chaudhry, A. (2015), The Economic Impact of New Firms in Punjab. The Lahore Journal of Economics and Chaudhry, A. (2015), The Economics and Chaudhry, A. (2015),

Kimura, Y. (2011). Knowledge diffusion and modernization of rural industrial clusters: A paper manufacturing village in northern Vietnam. World Development, 39(12), 2105-2118.





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Mano, Y., Takashi, Y., Aya, S., and Tomoya, M. (2011). Local and personal networks in employment and the development of labor markets: Evidence from the cut flower industry in Ethiopia. World Development, 39(10), 1760-1770.

McKenzie, D., (2011). How can we learn whether firm policies are working in Africa? Challenges (and solutions?) for experiments and structural models. World Bank Policy Research Working Paper No. 5632

MSME Clusters. Retrieved from http://www.msmefoundation.org/folder/Publication/49.pdf

Naveed, A., Wood, G., Ghaus, M. U. (2016). 'Geography of Poverty in Pakistan 2008-09 to 2012-13: Distribution, trends and explanations'. Pakistan Poverty Alleviation Fund and Sustainable Development Policy Institute, Islamabad.

Nasir, M (2013). Agglomeration and Firm Turnover. CREB Working Paper No. 02-13

Saith, A., 2001, "From Village Artisans to Industrial Clusters: Agendas and Policy Gaps in Indian Rural Industrialization", Journal of Agrarian Change, vol. 1, no. 1, 81-123.

Schmitz, H. (1995). Collective efficiency: growth path for small-scale industry. Journal of development studies, 34(4), 529-566.

Schmitz, H. (1999). Collective efficiency: growth path for small-scale industry. Journal of development studies, 31(9), 465-

Schmitz, H., and Nadvi, K. (1999). Clustering and Industrialization: Introduction. World Development, 27(9), 1503-1514.

United Nations Industrial Development Organization. (2004). Industrial Clusters and Poverty Reduction. Towards a methodology for poverty and social impact assessment of cluster development initiatives. Vienna, Austria: UNIDO.

Weijland, H. (1999). Microenterprise clusters in rural Indonesia: Industrial seedbed and policy target. World Development, 27(9), 1515-1530.



