Constraints to the Growth of Small and Medium-Sized Enterprises in Khyber Pakhtunkhwa (KP), Pakistan: A District-Level Survey Analysis

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Abstract

The present study identifies barriers and constraints to growth for small and medium-sized enterprises in Khyber Pakhtunkhwa by using survey data from 341 SMEs operating across the seven districts of the province. The sample is represented by three main industries: agriculture, industrial, and service. The survey is conducted through trained manpower and the questionnaires were distributed through personal visits among the SMEs owner-manager. Within each district, the method of convenience sampling was employed in arriving at a significantly larger proportion of SMEs. Several factors have been identified as barriers to SME growth. The study has employed Principal Component Analysis, a multivariate statistical method, to rank the highest and lowest pertinent factors constraining the growth and development of these enterprises in KP. Among the range of internal and external variables identified by the study, lengthy-time duration to get approval for a loan, lack of collateral, corruption, and obstacles related to management are found to be the major factors that inhibit SMEs from becoming more successful in this region. The study further recommends several implications for policy not only for regulatory bodies and lending institutions but also for SME sector firms based on the findings from empirical investigation and survey results.

Keywords: *Small and medium-sized enterprises, collateral, corruption obstacles, management obstacles, principal component analysis*

1. Introduction

The South Asian countries are the cradle of small businesses and small-scale industries for centuries. The sub-continent region in particular has been the hub of civilization that has excelled in skills, innovation and art of craftsmanship. The craftsmanship passed on to from one clan or family to another can be seen in textile, wood

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work, leather work, foot work, precious stones and metals, architecture, embroidery and furniture. The craftsmanship became the focus of industrial revolution. It relied upon little mechanization but high level of customization and manual workmanship. Through industrial development, mechanization at different levels got instigated in production function. The economies of scale and size became a vital factor to the production cost and this became the first threat to the industry. The sector maintained to flourish and grow as a significant constituent of the economy due to its inherent traits of high entrepreneurship and strong determination to succeed. The support has been provided by means of government subsidies, regulations and/or control. Over the course of many years, the small-scale businesses have taken a novel shape in the form of small and medium scale enterprises. Globalization and economic liberalization induced in late eighties or early nineties brought in new challenges. Despite the range of policy reforms, assistance and incentives offered by successive governments in Pakistan, SMEs have suffered the most from multiple problems.

Estimates show that in Pakistan, SMEs account for over 90% of the total businesses with economic contribution of more than 25% to the country's net earnings, 30% to GDP and employs more than 70% of the labor force (Shah & Syed, 2018). The manufacturing value addition of SMEs is approximately 35%. The sector represents 25% of manufactured goods exports and nearly 53% of all the SME activities are in wholesale, restaurants, retail trade and hotel sector. Up to 22% of the SMEs activities are in service and 20% in industrial establishments (Pakistan Bureau of Statistics, 2011; IFC, 2012; Dar, Ahmed & Raziq, 2017). There is a broader agreement amongst academic scholars that SMEs have a major contribution to the competitiveness of our economy.

SMEs in Pakistan in general, and in the Khyber Pakhtunkhwa (KP) in particular, are trapped in low growth figures. Mostly, they are dealing in traditional products and have rarely adopted new technologies. SMEs form a major portion of the formal and informal economy in Pakistan. In some regions, SMEs also been developed with the objective of fostering their growth, such as leather in Charsadda and Bannu, gems in Peshawar and textiles in Swat. KP has not been a lucrative habitat for SMEs owing to the impact of recent war and terror on businesses and this has led to the migration of enterprises to other provinces (Haleem, Jehangir & Ullah, 2019). Furthermore, the prosperity and development of SMEs operating in KP has been inferior to that of other provinces such as Sindh and Punjab (Sherazi, Iqbal, Asif, Rehman & Shah, 2013). The KP government has initiated a project, Economic Revitalization of KP and Federally Administered Tribal Areas (ERKF), to offer support in the economic

revival and rehabilitation of the areas that are affected by crisis of KP and erstwhile Federally Administered Tribal Areas (FATA). The ERKF, a multi donor trust fund project, under Phase-II, is extending financial assistance to SMEs on typically 50 percent cost-sharing basis. The matching grant schemes consists of Rehabilitation Grant, Up-Gradation Grant, and Cluster Grant. In order to increase responsiveness of project, SMEDA arranged numerous sessions on awareness across KP province to provide hands on information to SMEs, together with women entrepreneurs. Between July 2018 to March 2019, the ERKF Project sanctioned a total amount of PKR 274.25 million to 372 SMEs in the region (Pakistan Economic Survey, 2018-19).

To the best of our knowledge, valid statistics are not available that could help in understanding the due economic role of SMEs in KP. KP and FATA region has continuously faced the brunt of the war on terror for more than a decade, which has adversely affected its business and industry, particularly the SME sector. The business dynamics and the constraints to growth of SMEs in this region need to be urgently identified, as authentic studies have not been carried out in the province in the recent past, and previous studies mostly focused on Karachi, Lahore and Gujranwala etc. Economic Census 2005 by Pakistan Bureau of Statistics excluded the census of economic establishments in FATA due to unrest in the region. This neglect is the reason that there is no authentic available information on SMEs in FATA.

2. Literature Review

Extant studies have used a variety of theories to explain the growth and survival of SMEs, for instance, theory of entrepreneurial opportunity exploitation, prospect theory and theory of threat rigidity. According to Gupta, Guha & and Krishnaswami (2013), the growth of enterprise can be recognized in four major theoretical viewpoints: a resource-based view, the approach to motivation, the configuration perspective and the strategic adaptation perspective. Five stages of firms' growth have been identified by (Churchill & Lewis, 1983). It begins with existence, followed by survival and success, next is take-off and last of all is resource maturity. A diverse set of characteristics is critical to the existence and success of firms in every stage of growth. The model gives an insight into the dynamics of SME development, including the distinctive characteristics, requirements and problems of growing enterprises and explicates the growth processes of business amongst SMEs. Knowing which growth phase an enterprise is in will assist investors, managers and advisors to make more informed decisions and prepare the firm for future challenges.

SMEs form a major fraction of net employment in many countries, still the reason they may perhaps not be able to add to the development of economy is because they come across higher obstacles to growth. Extant literature has identified a number of factors that influences the financial behavior of firms in SMEs sector. These consist of form of ownership and legal structure, size and age of a firm, geographical zone, asset structure, collateral assets and industrial sectors (Abdulsaleh & Worthington, 2013). Jasra, Hunjra, Rehman, Azam and Khan (2011) examined several factors that influence the SMEs success. Their findings suggest that government assistance, monetary resources, entrepreneurial skills, related market strategies and technology relevant resources have a significant and positive impact on the success of small and medium-sized businesses.

The access of SMEs to credit is the main concern in the years to come. Funding by banks is not well suited to the requirements of young firms and start-up ventures, established businesses and fast-growing innovative enterprises undergo a key transition, for which equity type financial instruments are often better adapted. Therefore, it is imperative for SMEs to be able to access a wide range of financing instruments (OECD, 2012). Critics argue that finance may not be the sole reason for the success of an SME. A study conducted in Bangladesh confirms that the characteristics of entrepreneur and gender are significant for business success of SMEs whereas firm characteristics are not significant (Islam, Khan, Obaidullah & Alam, 2011). There can be internal factors that impede growth like Lal Rohra, Junejo & Kanasro (2009) believe that there is dearth of strategic planning in Pakistani SMEs, which in view of the author is a main hindrance in the growth of this sector. External factors may have an influence like Shabbir (2012) in a research study reports serious implications of monetary policy on SMEs and believe that the overnight increases in rates reduces the net worth of SMEs. Tightening of monetary policy is reported to be responsible for the closure of around 7% of the sampled firms.

In developing nations, funds from family and friends play a much more important role than in developed nations. In general, small and medium-sized organizations in several developing economies get affected by the lack of formal institutions and multiple market failures (Herr & Nettekoven, 2018; Ndiaye, Razak, Nagayev & Ng, 2018). These enterprises form systems of private governance to establish long lasting associations and strong, ethnically-based, business networks for entrepreneurs. Though, there are variations in accessing finance to such networks across different ethnic communities. For instance, European companies in Southern Africa, Lebanese

enterprises in West Africa and Indian entrepreneurs in East Africa form business networks where members provide personal references, lend to one another, and ease transactions with informal reputation-based contract enforcement mechanisms. These set of connections help out in overcoming the issues of weak formal systems of contract enforcement and asymmetric distribution of information (Beck & Demirguc-Kunt, 2008).

The issues and challenges faced by SMEs in Pakistan are abundant, for instance, unskilled administration, insufficient financial resources, incapable labor force, shortage of newest technology, outdated manufacturing facilities, insufficient industrial infrastructure and exploitation of intangible assets (Raza, Minai, Zain, Tariq & Khuwaja, 2018; Soomro, Shah & Mangi, 2019). For that reason, many of the SMEs shut down within the few years after establishment and only 5% to 10% of the businesses endure, flourish and were able to achieve maturity stage (Mahmood, Kouser & Iqbal, 2017). A study by Khan (2015) suggests that the financing options available to SMEs are plentiful in Pakistan. However, one of the major issues faced by SMEs is access to credit. In our country, agrarian and rural SMEs rely on informal sources of finance for their credit necessities. Informal financing remains an important source for SMEs due to liquidity constraints. SMEs rely more on informal sources of finance due to bureaucratic lending procedures of financial institutions and banks.

Empirical research on SMEs has attracted growing interest in KP in recent years. Nadeem and Kakakhel (2016) used judgment sampling techniques to select a total of twelve (12) SMEs from three large cities of KP: Peshawar, Kohat and Mardan. They conducted a qualitative study to explore the practice, motivations, and obstacles to corporate social responsibility (CSR) in SMEs of KP. Ali and Shah (2017) investigated a range of challenges, and different barriers faced by the SME sector of KP, in their pursuit of implementation and dissemination of innovation for achieving their competitive advantage and development. The study observed the phenomenon by collecting data from eight (8) pharmaceutical enterprises through semi-structured interviews. Haleem, Jehangir and Ullah (2019) used a multi-case approach to determine the issues faced by manufacturing SMEs in KP. The study gathered primary data through sixty (60) semi-structured interviews from managers and chief executives of different manufacturing enterprises across the province. Khan, Kamal and Khan (2020) analyzed the constraints that hinder micro-scale, small-scale, and medium scale enterprises (MSMEs) from accessing finances from banks in KP. However, among the target population located in KP, the study selected MSMEs on random sampling

basis that were located only in Peshawar and Bannu. In this regard, the present survey research is paving a way to identify and analyze the constraints faced by SMEs in achieving sustainable growth. We The study seek a large dataset that covers 341 SMEs operating across the seven districts of KP. The sample is represented by three main industries: agriculture, industrial and service. Knowledge thus created could be handy in addressing some of the constraining factors which could hopefully improve the SME growth impediments. Findings of the study would also interest financing institutions as they could design their products more effectively. The study identifies open avenues for further academic research and can feed ideas to a variety of public and private enterprises.

3. Research Methodology

3.1. Sample size and data sources

Population size (i.e., number of SMEs in KP) differs as Pakistan Bureau of Statistics, Sarhad Development Authority, and SMEDA report different numbers about it. SMEDA has a walk-in facility for troubled SMEs; it is deemed as a most relevant sampling frame for this study. Their latest set of KP SMEs comprises of 2504 walk-ins which would be used as a most suitable population in getting a random sample for this study as it is believed that the core problem of a troubled SME is financial hardships. Since N=2504, we take the most common margin of error of 5% and a confidence interval of 95% is taken. Now utilizing the following standard objective procedure for sample size determination:

$$X = Z\left(^c/_{100}\right)^2 r\left(100 - r\right)$$

$$N = {}^{N\,x}/_{\left((N-1)E^2 + x\right)}$$

$$E = Sqrt\left[\,^{(N-n)x}/_{n(N-1)}\,\right]$$

Where N is the population size, r is the fraction of responses that we are interested in, and $Z(c/100)$ is the critical value for the confidence level c. Following this sample size determination procedure our computed sample size (n) is 377. According to Small Industries Development Board of KP following is the break-up of small industrial estates in the province (see the details mentioned in Table 1) which could be used as a reference for sampling SMEs from different districts:

Table 1: District Sample of SMEs in KP

District	No of Industrial Estates
Peshawar	7
Nowshehra	2
Mardan	3
Charsadda	1
Kohat	2
Karak	3
Swat	2
Chitral	4
Dir Lower	1
Abbotabad	2
Haripur	1
Mansehra	5
Batagram	1
Bannu	5
D.I.Khan	3

Adopting a stratified sampling procedure and keeping in view the greater concentration of small industrial business the following districts are suggested for sampling the SMEs. The detail is given in Table 2 below:

Table 2: Stratification by Districts

District	No of Industrial Estates
Peshawar	7
Mardan	3
Karak	3
Chitral	4
Mansehra	5
Bannu	5
D.I.Khan	3

The total industrial estates for these 7 districts is 30, which could be used for sampling SMEs proportionally from these major districts. According to proportional allocation sample size from each stratum is $n_i = (N_i/N_0)*n$. Where N_i is number of industrial estates in a district, n_i is number of sampled SMEs from each district, N_0 is the number of total industrial estates in all districts.

Firms to be sampled from each district = (No of industrial estates in a district/30)*377. This gives the following The sampling plan for surveying firms is given in Table 3 below:

Table 3: Total Number of SMEs Stratified By Districts (Target Survey Respondents)

District	Firms to be Surveyed
Peshawar	88
Mardan	38
Karak	38
Chitral	51
Mansehra	62
Bannu	62
D.I.Khan	38
Total	377

In KP, majority of SMEs are owned and managed by individuals who are not highly educated, thereby indicative of difficulty in obtaining data. We conducted the The survey was conducted through trained manpower and the questionnaires were distributed through personal visits among the SMEs owner-manager to make sure we get a sufficiently large sample in different sectors across the seven districts of KP. With-in each district, the method of convenience sampling was employed in arriving at significantly larger proportion of SMEs. The advantage of convenience sampling is that respondents are not chosen against their will and they do participate on their own volition. This method was preferred to enhance the response rate as the respondents in this industrial sector are hesitant to unveil information since they believed in one way or the other, the business information might get leaked to opponents and would also expose them to provincial tax authorities.

3.2. Measurement

The data is drawn from in-depth field work by using owner-manager of SMEs as the unit of analysis. Questionnaire survey is used as a core data collection technique.

The questionnaire is built upon the previous study conducted by Bari, Cheema and Haque (2005) and World Bank Group survey report on SMEs (Kumar, 2017). A structured questionnaire makes it easier for the respondents to specify their extent of agreement or disagreement. Using a five-point likert scale facilitates the enterprises to indicate their views on numerous factors hindering their growth in KP. Principal Component Analysis, a factor analysis technique, is applied to analyze the data set. Kaiser-Meyer-Olkin (KMO) test of appropriateness and Barlett Test of Sphericity (BTS) are carried out to ensure the use of PCA methodology. To detect and understand the structure in the relationship between the variables, PCA methodology has been used along with making use of other simple descriptive tools of statistics.

4. Results and Discussion

4.1. Descriptive analysis

Based on the responses received through the questionnaires, the survey covered 341 SMEs operating across seven districts of KP. Out of the total firms, a large number of SMEs are operating in Peshawar (75 firms), followed by Chitral (47 firms) and D.I. Khan (43 firms). The sample is represented by three (3) main industries: agriculture, industrial and service. Within the service sector, Peshawar makes up the largest share of firms (30 SMEs) followed by district Bannu (25 SMEs). Entrepreneurs in agriculture sector are more prominent in Peshawar (22 firms), Bannu (15 firms) and D.I. Khan (15 firms). The highest number of enterprises servicing the industrial sub-sectors such as electricity generation and distribution, gas distribution and construction, mining and quarrying are in Chitral (23 firms), Peshawar (22 firms) and Bannu (22 firms). The detail is mentioned in Table 4 below:

Table 4: Distribution of SMEs According to Different Districts and Sectors

	Peshawar	Mardan	Karak	Chitral	Mansehra	Bannu	D.I. Khan
Agriculture % of total	22 29.3%	10 27%	12 30%	9 19.1%	10 27.8%	15 23.8%	15 34.9%
Industrial % of total	22 29.3%	11 29.7%	14 35%	23 48.9%	12 33.3%	22 34.9%	16 37.2%

Service % of total	30 40%	16 43.2%	13 32.5%	14 29.8%	14 38.9%	25 39.7%	12 27.9%
Total % of total	74 98.7%	37 100%	39 97.5%	46 97.9%	36 100%	62 98.4%	43 100%
Missing % of total	1 1.3%	-----	1 2.5%	1 2.1%	-----	1 1.6%	-----

4.2. Validity and reliability tests – SMEs questionnaire survey

On the basis of convenient accessibility, the survey research pilot study is carried out on a group of 50 respondents from district Peshawar. The result for Cronbach's alpha reliability coefficient for the questionnaire related to SMEs owner-manager is 0.639, indicating an overall consistency and accuracy of the instrument that has been developed. The content validity of the instrument is established through the calculation of Content Validity Ratio (CVR). According to Lawshe (1975), with a panel of 10 experts, the minimum required CVR for each item is 0.62. In this study, the CVR for each item ranged between 0.8 and 1, pointing towards the significance and the need to add relevant items in the scale.

Table 5: Lawshe's Content Validity Ratio (CVR)

	N	Ne	CVR
Location of the business	10	9	0.8
Classifying the business under the different sectors?	10	10	1
Internal variables include obstacles encountered by SMEs in accessing external finance, collateral, gender, training obstacles and management obstacles	10	10	1
External variables include Economical and technological obstacles, Corruption Obstacles and Infrastructure obstacles	10	10	1

The study has identified five internal variables and three external variables affecting the growth of SMEs in KP. N is the total number of panel members; Ne is the number of panelists that point towards 'essential'; CVR= (Ne – N/2) / (N/2)

4.3. Principal component analysis (PCA)

The study has identified five (5) internal variables and three (3) external variables constraining the growth of SMEs. Factors included in internal environment are: obstacles encountered by SMES in accessing external finance, training obstacles, management obstacles, collateral and gender; whereas external factors include economic and technological obstacles, corruption obstacles and infrastructure obstacles.

The internal and external constraints are further sub-divided into multiple items (or factors).

To achieve the proposed objective, the present study has applied PCA, a factor analysis technique. The analysis of data becomes complicated and difficult due to large number of variables that are barriers to the expansion and development of SMEs. The purpose of PCA is to find reasonably small number of factors that account for the variability found in relatively large number of components. The percentage of variance explained by each variable is used to make a decision about the components that have to be retained; the total variance accounted for by every principal component and whether the factor can be interpreted in a meaningful way. PCA approach is used to rank the highest and lowest pertinent factors constraining the growth of SMEs in KP. Kaiser-Meyer-Olkin (KMO) and Barlett Test of Sphericity (BTS) are carried out to examine the appropriateness of data for PCA. Conducting a PCA is justified as the output in Table 6 shows that KMO value is greater 0.5 and the value for BTS statistic is also highly significant.

Table 6: KMO and Bartlett's Test

KMO Measure of Sampling Adequacy BTS	0.559
Approx. Chi-Square	1.763E3
Df	820
Sig.	.000

The fundamental output of PCA is component matrix. The component matrix shows the loadings onto the components. The component (or factor) loadings represent the correlations between the components and the variables. The widely-cited rule of the thumb is, the higher the loading value for a variable in a matrix, the more important that variable is to the component. However, the direction of the relationship is determined through the sign of the coefficient. The study has carried out one-factor solution to identify the key factor(s) for each of the eight categories representing the internal and external obstacles to the growth of SMEs across different districts of KP. For interpretation purpose, variables with component loadings above 0.6 are considered as significant items in understanding the underlying construct (Maskey, Fei & Nguyen, 2018). The results of PCA are given in Table 7.

The first component has seven (7) items representing the underlying dimensions of the obstacles encountered by SMEs in accessing external finance. The survey findings show that the components in the analysis with loading above 0.6 are: time to get external finance is too long (0.711), lack of knowledge of available sources of external finance (0.663) and high costs of accessing external finance (0.605). SMEs

Table 7: Principal Component Analysis

	Component
Obstacles Encountered by SMEs In in Accessing External Finance	
High costs of accessing external finance	0.605
Time to get external finance is too long	0.711
Lack of knowledge of available sources of external finance	0.663
High collateral requirements	0.194
Too much paperwork requirement	0.098
Complex application and processing procedures	-0.180
Lack of understanding of the various external finance available	-0.097
Training Obstacles	
I have no formal training in business management	0.550
Lack of training in HR/personnel management	0.696
Lack in formal training in financial management	0.485
I have no formal training in bookkeeping/accounting	0.629
I have no formal training in marketing	0.533
Management Obstacles	
I am not familiar with market/industry	0.672
I have no experience relevant to the venture	0.680
No prior experience in managing this type of business	0.700
I have no experience to attract and retain suitable staff	-0.009
I have no experience in small business management	0.237
Collateral	
Collateral or guarantee is key if credit is to be rendered	0.767
Value of collateral determines the fraction of the credit amount	0.563
No collateral, no credit	0.651
Collateral does not matter as long as other requirements are met	-0.008
Gender	
Gender is important in access to debt finance	0.688
Men are usually trusted with finance	0.511
Women are equally trusted with finance	0.589
On two applications a man's application for finance will be processed before that of a woman	0.384

Gender has nothing to do with issue of finance once other requirements are met	0.440
Economical and Technological Obstacles	
Poor telecommunication system for business	0.686
High inflation rate in economy is obstacle for firm	0.429
Business has High cost of production	0.487
Lack of technology availability is an obstacle	0.632
Government impose High taxes and other tariffs	0.522
Corruption Obstacles	
Government officials extort money from businesses	0.663
Bribery as a common means of getting Govt. contracts	0.562
Corruption is a major problem for businesses in country	0.700
Bribery is a common inducer for getting business loans	0.380
Using informal networks to arrange things	0.239
Infrastructure Obstacles	
Insufficient government support for business	0.655
Electric and Gas Load shedding problem for business	0.527
High Costs of registration and licenses of business	0.663
Bad roads are a major obstacle for businesses	0.438
Poor water supply is also major problem for businesses	0.463

Source: Adapted from Bari, Cheema and Haque (2005) and World Bank Group survey report on SMEs (Kumar, 2017)

are perceived as high-risk ventures. According to Nichter and Goldmark (2009) and Govori (2013), these enterprises often face difficulties due to higher transaction costs, lack of collateral and the inability to deal with complex policies and procedures of financial institutions. There is a lack of trust and general apathy which the financial institutions and banks carry in the quantum of the loan that can be sanctioned. SMEs time and again complain that large scale businesses can easily access other credit market instruments in capital markets which cannot be accessed by SMEs. Dasanayaka (2011) identified the issues affecting the SMEs in Pakistan and Sri Lanka with the special emphasis on conceptual and definitional elements and directions for future research. According to this study, some of the major causes for sickness in small scale industries have come from inadequate working capital, delay in between the approval and disbursement of working capital finance, gaps between the term loans sanctioned and working capital, and ineffective credit risk management.

The second component 'Training Obstacles' has five items. The items having the

highest factor loadings are lack of training in HR/personnel management (0.696) and I have no formal training in bookkeeping/accounting (0.629). The capacity of human resources forms one of the most considerable factors for the growth and development of small organizations. Firms with well-educated and skilled workforce are probably more competitive and productive. According to Chandler and McEvoy (2000), human resource capacities positively affect the growth of small enterprises, which improves the motivation and skills of employees, and ultimately result in increasing the long-term sustainability and productivity of small firms. There is poor quality of management in many developing countries. Halabi, Barrett and Dyt (2010) and Alattar, Kouhy and Innes (2009) findings suggests that the owner-managers of small organizations have a very basic understanding of accounting concepts and financial information and have serious issues with financial literacy and financial planning. On the similar theme, it has been claimed that the owner-managers of small and micro enterprises have a lack of knowledge in financial matters. Individuals with limited skills on financial planning do not even value the financial information extracted from books of accounts. Haleem et al. (2019) investigated the issues faced by manufacturing SMEs in KP. Their findings suggest that training and development programs in SMEs improve productivity and enhance the chances of success by building valuable entrepreneurial and technical in areas such as financial management, business development, marketing, human resource management, and strategic planning and management. In a developing country like Pakistan, educational institutions do not provide entrepreneurship education, which is imperative for innovation. In the same way, lack of research and development is also hampering small and medium enterprises in Pakistan. On the technical training and education side, these institutions are not producing human capital according to the industrial demand. There is need to bridge the gap between academic institutions and industries (Dar, Ahmed & Raziq, 2017).

The third component is labeled as 'Management Obstacles'. The items: no prior experience in managing this type of business (0.700), I have no experience relevant to the venture (0.680) and I am not familiar with market/industry (0.672) have the highest factor loading. The experience of management, knowledge, education and working experience in start-ups are used to gauge managerial competencies (Hisrich & Drnovsek, 2002). A study by Tushabomwe-Kazooba (2006) suggest that lack of quality record keeping and poor managerial skills are foremost contributors to the failure of small enterprises in Africa. Insufficient experience in management often makes it hard for business entrepreneurs to succeed. The survey findings by Ali, Jabeen, Qazi and Jabeen (2020) suggest that SMEs in KP have their own limitations and insufficiencies such as entrepreneurial styles and organizational structure, poor management, small-scale business operations, high level of owner dependency, absence of a brand identity and shortage of surplus cash flows. Bari and Cheema (2005) examined the

major constraints that the SME industry is facing in Pakistan. Their study suggests that the low levels of education, training, and skills among workers and managers, an outcome of the poor quality of learning and training offered in Pakistan, raises the firms' cost of capital. A noteworthy factor explaining this is the regulatory framework of education. Given the low quality of education in public sector, regulatory inspection and enforcement by the public sector are poorly designed and ineffectively enforced upon the private and public institutions.

The findings for the fourth component 'collateral' indicate that the items collateral or guarantee is a key if credit is to be rendered (0.767) and no collateral, no credit (0.651) have a high factor loading score. Small and medium enterprise sector is considered a high-risk industry because they lack the needed collateral to serve as a protection for lenders against a borrower's default. The loan process is often costly because the applicants from the informal business sector tend to apply for small credit loans which require the similar administrative processes, oversight procedure and other related costs that are requisites for a comparatively larger finance made by medium and large-scale organizations (Avevor, 2016). Qureshi and Herani (2011) examined the contributing role of SMEs in the social and economic stability of Karachi, an industrial city of Pakistan. The findings from their study showed that most SMEs are reluctant to borrow from financial institutions and/or banks due to high percentage markups, complex and prolonged documentation process, stringent requirements for collateral, and misconduct by financial institutions including banks. Considering the lack of collateral and the inability of enterprise to build up viable business plan. Ullah, Ahmad, Manzoor, Hussain and Farooq (2012) findings suggest that in KP, there is a need of more flexible policies by financial institutions to provide loan at lowest markup with easy debt repayment options.

The output further indicate that the item gender is important in access to debt finance (0.688) is a single factor in category gender with a loading score above 0.6. Developing countries are often characterized by lower levels of access to formal credit for both males and females. Strategies that improve and enhance financial inclusion are of great value for the growth and development of entrepreneurship (Demirgüç-Kunt, Klapper, Singer & Van Oudheusden, 2015). Chaudhuri, Sasidharan and Raj (2018) examined the relationship between owners' gender, firm performance and the ability of male and female owned enterprises to access credit from lending institutions by using a comprehensive dataset of micro, small, and medium sized businesses in India. According to the findings of this study, addressing the issue of gender inequality in the small business lending market could be of assistance, to a certain extent, in narrowing the performance gap between male and female owned enterprises.

In relation to the constraint 'Economical and Technological Obstacles' related to

the external environment, the findings indicate that the items poor telecommunication system for business (0.686) and lack of technology availability is an obstacle (0.632) represents the factors with the highest loading. The major reason small enterprises continue to face many growth challenges in developing economies, in spite of considerable support from governments and other partners is their insufficient technological capabilities (Arinaitwe, 2006). The findings of Singh, Garg and Deshmukh (2010) imply that many of the SMEs in India are operating at a small scale of production which ultimately reduces their ability to trim down the production costs and engage in upgrading their technology, which is viewed as a major obstacle. Raziq and Wiesner (2011) conducted a study on small and medium enterprises operating in manufacturing and service sector of Pakistan. Their findings suggest that only 44 percent of SMEs are making use of human resource information and management systems and barely 66 percent of the sampled enterprises have internet access services. Lack of advancement in technology impedes the growth of SMEs. In our country, many entrepreneurs are unable to expand into new territories due to the reliance of businesses on obsolete technology and outdated methods of production (Haneef, 2010).

Regarding corruption obstacles, the analysis specifies two items with the highest value of factor loading: corruption is a major problem for businesses in country (0.700) and government officials extort money from businesses (0.663). According to World Bank (2000) report, low levels of confidence in the justice system, complex structure of taxation, and the need to pay bribes in order to access public services, represents major impediment, particularly in South East Europe. Pakistan is at 117th spot out of 180 countries for year 2018 in Corruption Perception Index by Transparency International. Corruption is identified as one of the most important constraint by firms doing business in Pakistan. In KP, Haleem et al. (2019) findings suggest that 40 percent interviewees, senior managers and Chief Executive Officers (CEO) of manufacturing SMEs, perceive that corruption has badly affected the business environment in our country as the government authorities and regulatory watchdogs expect bribe in exchange for an approval or for a favorable decision. According to Hussain, Khan, Malik and Faheem (2012), after the energy crisis and macroeconomic instability, corruption has emerged as the third most critical constraint experienced by the manufacturing sector in Punjab, Pakistan. The most common means of corruption is through the ad-hoc application and the incoherent interpretation of government policies and regulation related to labor market, licensing and other issues regarding tax.

For the final category, the items with loading score above 0.6 are high costs of registration and licenses of business (0.663) and insufficient government support for business (0.655). SMEs face government constraints due to high licensing fees and other regulatory costs. The entry of new firms and the expansion of existing

businesses are lower if the regulatory compliance costs are unnecessarily high. Costs related with regulatory requirements and licensing fees are often unnecessarily high because of administrative inefficiency, rent-seeking behavior, or weak institutional frameworks (Hassan, 2014). Rahman and Rahman (2019) findings suggest that due to lack of skilled workers in KP, for the most part labor has been hired to work from outside the province which has been an impediment in maintaining the production facility, poor access to market and lack of infrastructure facilities not just add up to cost but also an influential cause of delay in supply to meet the immediate demand. In Pakistan, majority of SMEs strongly complain about the misbehavior and disruptions caused by government representatives due to excessive and needless regulations, challenges associated with the ineffective management of public sector organizations and problem of corruption. The grievances are mostly from the behavior of income tax administration and miserable conduct of government organizations established to assist SMEs. The law-and-order condition in our country is also unpleasant due to large scale terrorist attacks (Dar, Ahmed & Raziq, 2017).

5. Conclusion and Discussion

The survey covered 341 SMEs operating across the seven districts of KP: Peshawar, Mardan, Karak, Chitral, Manshera, Bannu and D.I. Khan. The sample is represented by three main industries: agriculture, industrial and service. Majority of the respondent enterprises belong to the service sector. The study has identified a range of internal and external factors that exert considerable influences on the growth and development of SMEs. Principal Component Analysis is applied to analyze the pertinent factors constraining the growth of small and medium enterprises in KP. Among the internal factors, we found the findings showed that collateral is one of the major obstacles for small and medium businesses in getting an access to finance. It has the highest component loading of 0.767. Regarding external factors, the analysis specify that corruption is a major problem for businesses in our country with the factor loading value of 0.700. Based on the findings from empirical investigation and survey results, several implications for policy have been recommended.

Small and medium businesses have their own inadequacies and limitations such as the organizational structure and decision making, small-scale operations, high level of dependence on owner, poor management, lack of brand identity, unfavorable balance of power and shortage of surplus funds. The inadequacies have now been accentuated under an advancing paradigm of competitiveness surface under globalization. Cooperation between companies can take a variety of forms. Enterprises can join hands to become a network of member firms and make a common offer to large set of clients as retail houses or shopping malls or for exports. In vertical alliance, the

businesses gain through the participation in the global value chain networks. In such linkages, multinational organizations and large corporations take all the needed steps to improve the technological know-how and capabilities of their suppliers. Business clusters are another form of an informal alliance where the firms get access to a wide range of experiences and skills. The association of business clusters supports one another. Over a period of time, the cluster units build their own brand name and gain the acceptance of customers. In Pakistan, the success story of many SMEs to a great extent is due to their successful collaborations and linkage initiatives with large firms' particularly in automobile, engineering, machine tools and power industries.

Government has to make genuine efforts to promote SMEs and needs to play an important role in shaping policy reforms in providing updates on domestic and international markets, access to low cost of financing capital, technological guidance and consultancy on product research and development, adequate manpower training programs, performance orientation in business transactions and particularly finding foreign markets through the members of diplomatic missions. A foremost drive to increase financial inclusion would entail a combined effort of State Bank of Pakistan, community and private sector, and donor fundraising efforts. The finest bet to rapidly scale up the access is to rely on gains in literacy, technology, financial re-engineering of products and processes, and an enabling institutional and legal framework. Future research could identify and examine the role of attitudinal factors in influencing the behavior and practices of SMEs owner-manager towards the adoption and use of financing products. Interviews with SMEs or credit officers/managers could further identify the demand side problems in obtaining funds from the lending institutions and would also draw attention to a number of supply side responses accordingly. Geographically, present study selected the respondents from seven (7) districts of KP, however, there is need to examine the demand-side and supply-side factors affecting SMEs in other regions of Pakistan too. include other cities of Pakistan particularly the industrial hubs such as Sialkot, Gujranwala and Faisalabad to develop a comprehensive understanding of the barriers and challenges faced by SMEs in our country.

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