

**THE EFFECT OF ABSORPTIVE CAPACITY ON THE RELATIONSHIP
BETWEEN INTELLECTUAL CAPITAL AND SMES PERFORMANCE IN
PAKISTAN**

Ahmad Imran Khan*¹ and Wan Fadzilah Wan Yusoff¹

¹Putra Business school, University of Putra, Malaysia.

Ahmad Imran Khan and Wan Fadzilah Wan Yusoff , The Effect Of Absorptive Capacity On The Relationship Between Intellectual Capital And Smes Performance In Pakistan , Palarch's Journal Of Archaeology Of Egypt/Egyptology 18(8), 2887-2901. ISSN 1567-214x.

Keywords: Human Capital, Social Capital, Relational Capital, Released absorptive Capacity, potential absorptive capacity, Small and Medium Enterprise Development Authority (SMEDA)

Abstract:

The ability to acquire and learn knowledge has been most important challenges faced by business around the world. Especially Small and Medium Enterprises (SMEs). SMEs is a backbone of any emerging economy. The aim of this research is to look at how Absorptive Capacity affects Intellectual Capital and SME efficiency in Pakistan. Partial Least Square (PLS 3.0) with Structural Equation Model (SEM) technique will be used to assess the impact of Intellectual Capital on SMEs performance with a mediating role of Absorptive Capacity in a developing economy like Pakistan. The data will be collected from top managers of SMEs of Pakistan through survey questionnaires with Likert scale items. The findings of the study will show how absorptive capacity will create impact between the relationship of Intellectual capital and performance of Small and Medium Enterprises in a developing country like Pakistan. The study will be a contribution to the literature on Intellectual Capital and SME performance of Pakistan and will help managers, practitioners to recognize the importance of exploitation and transformation of knowledge in small firms.

*Corresponding Author

1. Introduction:

In a fast changing, with the rapid advancement in technology, new information tools and emerging resources have become critical issues in economic knowledge. Drawing on the Resource-based View in small and medium-sized enterprises (SMEs) and competitive dynamics perspectives, there has been a recent rise in the number of practitioners and academics integrating the knowledge resources of SMEs, which are intellectual capital (IC) and absorptive capacity (ACAP) to achieve superior performance. As several scholars have pointed out, a firm's success is determined by a variety of factors. Scholars believe that intellectual capital is a driving force behind an important operation that helps SMEs progress in a variety of ways, including bootstrapping operations, competitiveness, and a work system.

In the existing competitive world of business, the intangible assets are the most important source of success (Haskel and Westlake, 2017). Knowledge management and keeping a competitive relation with stakeholders of the firm leads to importance of dimension of IC in the mind of researchers (Jones et al., 2018). (Rupcic,2019) mentioned that Intellectual capital has been a growing trend by the researchers. Intellectual Capital is a asset for the firm to create value as defined by (Stewart,1991). There are many classifications of Intellectual capital by the researchers, three dimensions were extensively used by the researchers i.e., Human Capital, Structural Capital and Relational Capital (Secundo et al, 2018).

Similarly, researchers agrees that these dimensions of Intellectual capital play a major role in leveraging performance of the firm (Mehralian et al,2018). IC is an important asset, which positively influences both financial and non-financial performance (Mubarik et al. 2016).Intellectual capital appears to be a critical success factor for firms in the knowledge-based economy (Khalique et al,2018). Although Intellectual Capital (IC) is the most important resource for a firm's success, it receives less attention in studies focused on developing countries, particularly SMEs. There are few studies in Pakistan that examine the relationship between intellectual capital and firm performance. (Khalique et al. 2018).

Cohen and Levinthal (1990) developed the idea of absorptive capacity and described it as the capability to gain, adapt, and incorporate knowledge and it has also been mentioned that keeping prior knowledge is essential for absorptive capacity. Researchers analysed the impact of absorptive capacity on the performances of the firms, majority of the relationships were examined with innovative and dynamic capability (Engelman et al, 2017).There are also studies which give less importance to the relationship of absorptive capacity and intangible assets (Walter, 2015). An absorbing ability appears to be one of the factors that may be involved in the relationship between three factors of IC and organizational output (Hussinki et al,2017).

Moreover, scholars claimed that AC was used as mediator between the relationship of Intellectual capital and organizational performance, while few argue for its importance as moderator (Mehralian et al,2018). In other words, these studies were inconclusive, showing that further investigation is needed to examine the role realized and potential absorptive capacity in IC success.Previously researchers started to investigate absorptive capacity as a mediator with knowledge assets like Intellectual capital with a specific sector not overall performance of the firm (Obeidat et al,2017). Few studies shows that the exploitation, acquisition and assimilationdepend on the existing knowledge of the organization (Aribiet al. 2016).

Small and medium enterprises (SMEs) regarded as the engine for the economic development and growth of any economy. Large corporations are important contributors to the economy's long-term development and progress, but SMEs are also important pillars (Wilkinson et al, 2018). Small and medium-sized businesses, by their very nature, tend to concentrate their resources and capabilities inwards, pursuing product development, while frequently ignoring opportunities such as gaining knowledge about their surroundings (Teece 2017). External information absorption activities are a key factor in increasing creativity (INNO) and, as a result, building an atmosphere of organisational learning (Zahra & George, 2002). Small and medium-sized businesses (SMEs) are an important part of the country's economic development and a major contributor to GDP.

SMEs are a significant contributor to national economic growth and a major source of job generation in emerging economies (Hughes et al, 2017). In the case of developing countries, the position of SMEs is amplified and boosted because the country's growth is not solely based on the shoulders of multinational corporations (MNEs) (Dundon et al, 2018). Since the significance of SMEs in the nation's economic growth has been widely recognised, there has been a substantial amount of literature developed models that depict the trend of SME growth. (Chiang, 2018). In Pakistan, SMEs face a labour shortage due to a scarcity of professional and experienced employees. It is the primary cause of their poor performance and company failures. In Pakistan, SMEs must also develop an understanding of intellectual capital and its application in their businesses to gain a market-based competitive advantage.

This paper investigates the effect of absorptive capacity as a mediator on relationship between Intellectual capital and Small and Medium Enterprise (SMEs) performance both financial and non-financial performance, it will enhance literature. There has been a lot of discussion on the wider implications of IC (Dzenopoljac et al, 2017). The objective of present study is to examine the influence of AC as mediator on dimension of Intellectual Capital and SMEs performance.

2. Review of Literature:

2.1 Intellectual Capital and SMEs Performance

Intellectual Capital is defined and expressed in various ways. For this study it has been classified in following three dimensions by (Inkinen, 2015).

- i. Human Capital
- ii. Structural Capital
- iii. Relational Capital

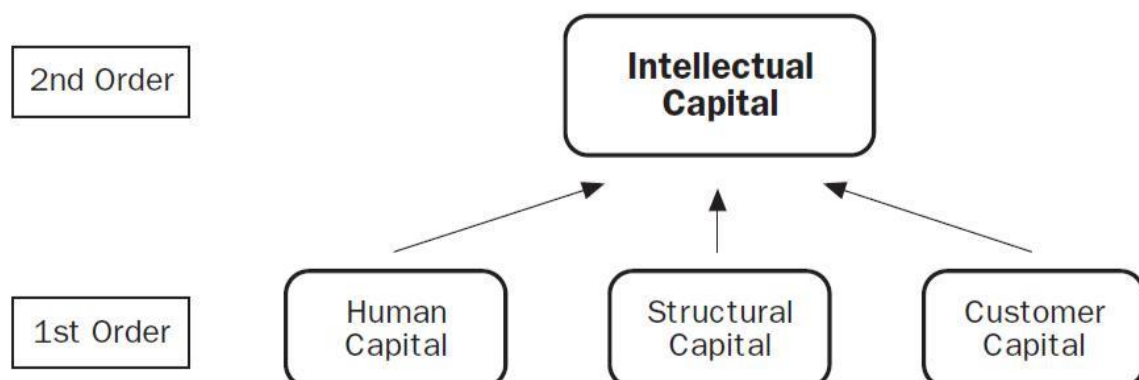


Figure 1: Dimensions of Intellectual Capital from Bonties, (1998. P: 66)

2.1.1 Human capital:

According to many researchers, this, human capital keeps information in both explicit and implicit memory as well as producing new knowledge for an organisation (Mubarik et al, 2018). Wernerfelt, 1984 introduced Resource based theory and extends the theoretical ground of the role of HC and explained that intangible assets can play a important role in getting the competitive edge. Intangible assets have four key attributes, which includes rare, valuable, inimitable and un substitutable and human capital have all these four to be an important factor of success.

Previous studies explore human capital which comprise of creativity, motivation, training, education, and trust of employees (Shrabati et al,2016).It has been claimed that business success is determined by effective use of human capital (Colombo, 2015). Human capital influences market processes and creativity, resulting in greater numbers of consumers, all of which means better results (Nosella, 2017).Furthermore, according to (Mubarik et al, 2018) human capital development leads to improved organisational capital, which, in turn, results in social capital and success.

2.1.2 Structural Capital:

Structural capital is defined as ‘Everything remaining inside the organization after employee left for home’ (Malone,1997).Specialists, for example, Kamukama, et al, (2011) clarified that structural capital is a stock of information, which is possessed by the organization and comprises of, unequivocal information, process streamlining, the association's way of life, item development, data innovation, and advancement, among others. Sydler et al, (2013) outlined that structural capital is identified with the firm all in all, and states it remains in the organization, regardless of whether the representative leaves the organization. Structural capital is a stock of information, which is claimed by the firm and incorporates, express information, process streamlining, association culture, development, and data innovation, (Kamukama, et al, 2011).

It alludes to how individuals are associated inside the firm (Sydler, et al 2013). What is more, representatives utilize this stock of information to help their business exercises and procedures. In this way, it has more spotlight on "the information installed inside the schedules of an association" (Bontis, 2002, p 45).(Ordónes, 2014) compared the strategic consequences of human resource (HR) architectures and concluded that structural capital influences greatly over human capital and relational capital. Similarly, strongly, structural capital is far better than other dimension of Intellectual capital. (Ling, 2017) investigate Intellectual capital as international market perspective and found a significant impact.

2.1.3 Relational capital:

The third dimension of Intellectual Capital included in this study is relational capital. Relational Capital is defined as integrated information, which specifies the interactions among its members, the most important role of relational capital is to help in the organisational networking and interaction with other cultures and groups (Ortiz et al.,

2018). Relational capital is seen as the estimation of the relationship inside firms and people with which to coordinate business.

(Sydler et al, 2013) reveals that relational capital contains relationship with waiting room affiliations, assistants, outside accomplices, sorting out with suppliers and distributors and customer associations. (Lavie, 2016) argues that resources are less important than relationships in networked environments. (Sydler et al, 2013) believes that employee-to-employee partnerships are more important than the workers themselves. Via external and internal tools, relational capital enables information acquisition and development. Problem-solving skills can be honed by increasing social capital, which boosts company efficiency. (Youndt et al., 2004).

2.2 Absorptive Capacity:

Absorption capacity comprises of three basic components, according to Cohen and Levinthal (1989).

- i. Recognition the value of new knowledge
- ii. Adopting that information
- iii. Applying that knowledge to commercial ends.

Moreover, they Cohen and Levinthal the significance of acquired information is stressed, rather than generated knowledge. The organization's learning capacity is held to a high standard when it comes to understanding, integrating, and applying new external information. They characterised organisation to gain a competitive advantage by acquiring new information, absorbing it, and applying it (Aribi, 2016). They argued that diversity would provide an organisation with a unique lens through which to view problems from different perspectives (Zahra and George, 2002). The ability of an entity to acquire, absorb, transform, and use knowledge is referred to as absorptive capacity. recognising two dimensions of it: potential absorptive capacity and realised potential capacity.

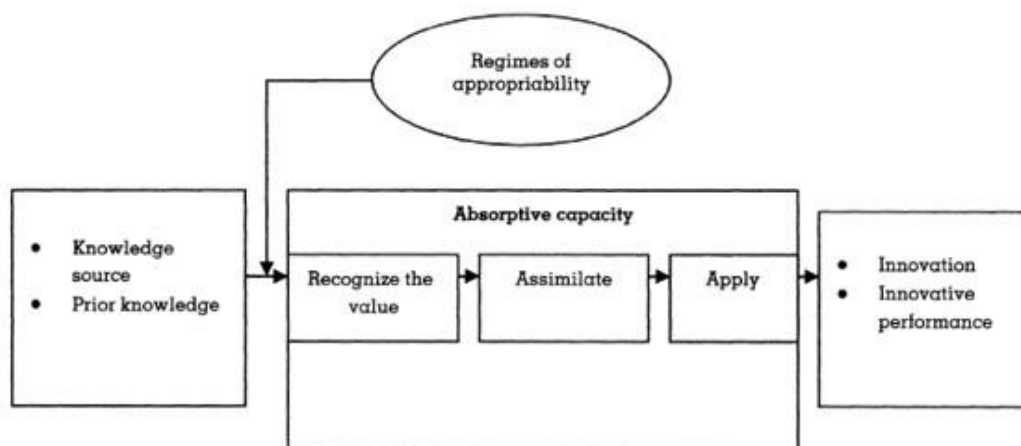


Figure 2. A model of Absorptive capacity Cohen and Levinthal, (1990)

2.2.1 Potential absorptive capacity:

According to (Zahra and George, 2002), it includes two components.

- i. The first is knowledge acquisition, which is described as an organization's ability to identify and acquire critical information from external sources for its processes and operations.

- ii. The second is information assimilation, which refers to an organization's ability to constrain and process acquired knowledge.

Large companies improve their efficiency through increasing their potential absorptive ability, which allows them to achieve strategic advantages such as having successful information to reconfigure processes at a lower cost and in less time (Chaudhary and Batra, 2018). As a result, when companies gain and refine potential absorptive capacity, this has a positive impact on realised potential capacity, resulting in improved business efficiency.

2.2.2 Realized absorptive capacity:

Absorptive capacity, identified as an organization's ability to transform and exploit information, has been realised. The number of novel measures taken can be used to measure transformation capability. The ability of an entity to turn and manipulate knowledge is known as realised absorptive capability. The number of novel measures taken can be used to measure transformation capability. Furthermore, gathering data isn't enough for companies to gain a competitive advantage; data must be assimilated, generated, and reconfigured to perform well (Schilke et al., 2018).

Organisational relations with business and government partners, according to (Flor et al. 2018), enable organisations to gain expertise. However, realised absorptive ability is critical for processing information and blending it with the organization's existing knowledge. As several studies have pointed out, the success of a company is affected by a variety of factors. Intellectual capital, according to scholars, is a guiding force behind a vital practise that helps SMEs progress in a variety of ways, including bootstrapping operations, competitiveness, and work systems.

2.3 Intellectual Capital and Absorptive Capacity:

Recruiting and selecting professional human resources is important for an organization's ability to absorb new information (Mubarik et al., 2018). (Cohen and Levinthal, 1990) assumed that the capacity to use and generate knowledge is inherited from previous experience. Employees' ability to learn and apply new information improves as they gain more education and training, according to (Minbaeva et al. 2014). Similarly, leaders must play a diverse role in the acquisition and management of new information (Shafique and Kalyar, 2018). Organizational structure is found to be very significant in information absorption and transition (Cohen and Levinthal, 1990). Storage and documentation are inextricably linked to an organization's resources.

Jansen et al, (2005) mentioned that business processes and procedures support in getting the better results by explicit knowledge. (Ortiz et al. 2018) suggest that in terms of the relationship between dimensions of Intellectual Capital and absorptive capacity, having a sufficient level of prior knowledge improves an organization's application of knowledge, both prior and pertinent, allowing for innovation. Moreover, according to (Soo et al. 2017), a firm's ability to learn and leverage outside information is directly related to its human resources. Similarly, Human capital, according to (Shih et al. 2016), is essential in knowledge formation and influences the other two intellectual dimensions. Structural capital not only defines the knowledge acquisition structure and processes, but also provides an opportunity for the transformation of acquired knowledge into organisational knowledge.

The active processes and internal capacity of an organisation, according to (Jansen et al. 2005), are a requirement for successful information acquisition, assimilation, and exploitation. It was discovered that social capital and realised absorptive capacity have a direct relationship. Employee relationships and interaction in companies promote information exploitation, which improves long-term success. According to (Soo et al. 2017), social capital isn't just about intra-organizational information sharing; it also contributes to improved knowledge implementation and efficiency. They also mentioned that speed and reactivity are important factors in the development of social capital, which contributes to the creation of new information for a company.

2.4 Conceptual Framework and Hypothesis Development:

The theoretical basis for this study is rooted from Resource Based View, the continuous maintenance of competitive advantage is the product of a firm's important, limited, imperfectly imitable, and irreplaceable resources and capabilities (Barney et al. 2001). Thus, these resources and capabilities have considerable meaning to direct firm's innovation efforts (Zhang et al., 2009), Which may reflect to some extent the similarity between innovation strategies in SMEs and large firms. Similarly, this research is getting details from (Bontis, 1998) and (Zahra and George, 2002) for the importance and impact of Intellectual capital and SMEs performance with a in between effect of absorptive capacity. Research pour light on the importance of small and medium firms in context of absorptive capacity and dimensions of IC.

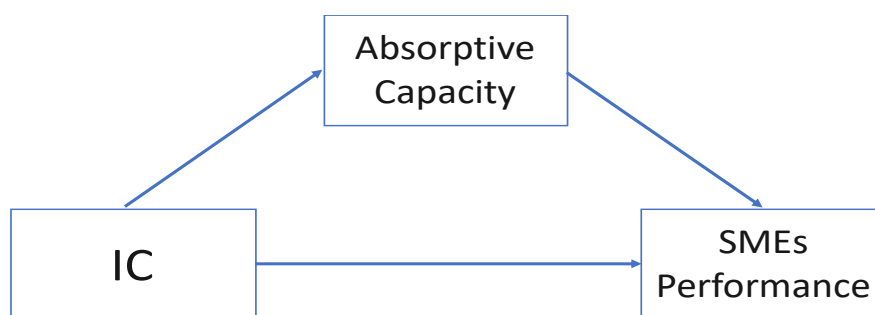


Figure 3. Conceptual Framework

H1. There is a positive relationship between intellectual capital and SMEs performance.

H2. Absorptive Capacity positively mediates the relationship between intellectual capital and SMEs performance.

As mentioned above, RBV (Wernerfelt, 1984) classifies four key functions to be an important factor of company's success and performance i.e. VRIN. The Intellectual capital have key elements to become a competitive source of an organization (Mubarik et al. 2019). Likewise, dimension of Intellectual capital enhances SMEs performance. Therefore, this research hypothesizes a direct effect and indirect effect of intellectual capital on SMEs performance. Moreover, absorptive capacity is basically a capacity of business to absorb outside knowledge, which give a firm competitive edge. Research questions are that whether dimensions of Intellectual capital have an impact on SMEs performance with a mediating role of absorptive capacity (Engelman et al, 2017; Mariani and Walter, 2015).

2.5 Underpinning Theories:

2.5.1 Resource Based View (RBV) Theory:

Resource Based View (RBV) theory has highlighted the powerful impact of dynamic capabilities on a firm's efficiency, such as process and product innovation, which drives and stimulates dynamic capabilities that improve the performance of SMEs (Rosenbusch et al, 2011). The resource-based view (RBV) believes that a firm's intangible assets are more likely to contribute to its performance (Bendickson and Chandler, 2017). Researchers discovered that intellectual capital and the interaction between (IC) dimensions have influenced productivity and innovative capability incrementally and radically (Chen Fu et al, 2014). As far as (RBV), two branches are advanced.

- i. The first is an assets-based view that RBV is dynamic abilities, and the subsequent branch is an information based view (KBV). In any case, to increase new information or ability verifiable and express information are required to be operationalized in firms, (Clarke, 2010; Huang, 2011). Scientists and inspired by the field of key administration and Intellectual Capital have contended that imaginative organizations, which accomplish high monetary and non-money related productivity are increasingly fit for changing and expanding the information on people and making intellectual funding to build up a "winding of cooperation" among its unsaid and express information. This happens with new outer information, which is gotten through two limits, potential and acknowledged, including four unique abilities of absorptive limit "securing, osmosis, change, and abuse" (Zahra and George, 2002; Jansen et al, 2005).
- ii. With respect to second part of RBV, which is KVB information, it is the most significant and basic for firms; notwithstanding it being made by people and put away in their minds. Henceforth, human capital is significant and stores information, (Wang, et al, 2009; Leiponen and Helfat, 2010).

As to first branches, RBV is worried about how firms' Intellectual Capital backings the picking up of new information from the outer condition through the working or creating of an association's dynamic capacities and utilizing them to upgrade the association's finished presentation. What is more, educated capital coordinates with different sorts of assets, and capacities, regardless of whether standard abilities or dynamic abilities, for example the "obtaining, digestion, change, and abuse" of information. Concerning SMEs assets, a considerable lot of the little and medium-sized business do not have all the essential administrative mastery or assets to cover their business prerequisites, (Ghobadian and Gallea, 1997).

The resource-based view (RBV) and its dynamic capability extension (ACAP) have been related as a moderator of the relationship between entrepreneurship orientation and firm success by (Engelen et al., 2014). They showed that absorptive capacity enhances the entrepreneur orientation-performance relationship in competitive markets. Likewise, (Wright et al, 1994) focused on reliance on RBV and asserted that in specific circumstances sustaining a competitive advantage can accrue from a core of human capital. The RBV theory reveals that firms assess the strength and weaknesses of their resources then decide to choose a strategy, which is achievable.

2.5.2 Organizational Learning Theory:

The theory of organizational learning is critical in understanding an organization's absorptive capability; organizations that are inclined toward learning should develop the capacity to gain

and implement external information, and then transfer that knowledge to satisfying customers. (Fabrizio, 2017) suggested that organizations that practiced new idea quest activity had invested in in-house research and that these organizations were superior to those that did not invest in research. In addition, modern technologies had a higher degree of relationship with university-based scientists. There was a clear connection between companies that invest in fundamental research and their partnerships with academic researchers, according to empirical evidence.

Organizational learning is an essential component of a company's long-term competitive advantage (Geus, 1988), as well as a key corporate success engine (Stata, 1989). Given the uncertainty of market environments, it is necessary to learn on a continuous basis to stay important that is, to perform effectively and survive (Burke et al, 2016). Absorptive capacity is about organizational and person learning, as well as implementation of that learning. According to Sun and Anderson (2010), absorptive ability is a form of organizational learning that focuses on the firm's interaction with external information. Even though scholarly works have yet to differentiate the relationship between the two concepts, the concept of absorptive capability has been closely linked to organizational learning since its inception.

Organizational learning is described by Fiol and Lyles (1983) as the process of using better information and understanding to improve behavior. A learning organization is described as "a group capable of creating, acquiring, and transferring knowledge, as well as modifying its behavior to reflect new knowledge and insights" (Garvin, 1993). These concepts emphasize the importance of acquiring and applying new information to enhance firm behavior. An essential component of knowledge-based thinking is organizational learning. Organizational learning is characterized as the integration of new knowledge into individual behavior, affecting behavioral behaviors and, as a result, improving outcomes. The ability to recognise the value of external information, adopt it, and apply it to commercial ends is described by the authors as absorptive power.

These theories are not only related, but they also influence an organization's absorptive capacity. The first is that prior experience expands or affects absorptive capacity in an organization, as well as defining managerial awareness. Managerial awareness, in turn, affects organizational learning, affecting absorptive capacity.

3. Research Design and Methodology:

The deductive method is used in this analysis to try to understand causal associations between the variables. This led to the creation of a set of hypotheses for which quantitative data will be collected in order to test the role of absorptive capacity as a mediating factor in the relationship between intellectual capital and SMEs performance. This study would take the form of a survey, which allows for the collection of quantitative data from a large group of people, which can then be statistically analysed (Saunders et al, 2009). This study explains the measurement, sampling, and data collection instruments in the sections below.

3.1 Measurement and sampling:

All the variables will be measured on Likert scales as the measurement scales are adopted from literature. For the construct of the components of IC: human, structural and relational capital, there are three measures available for intellectual capital, they were developed by (Bontis, 1998; Youndt and Snell, 2004; and Isaac et al, 2010). In this research the intellectual

capital measurements are based upon that chosen from (Isaac et al, 2010), due to it offering items to measure the firms’ level of intellectual capital. The scale for absorptive capacity is taken from(Zahra and George, 2002) whereit measures the two dimensions of absorptive capacity.i.e.Potential absorptive capacity and Realized absorptive Capacity. The ability of the organisation to recognise, learn, and assimilate new information from external sources will be measured as potential absorptive capacity (Zahra and George, 2002). For realised absorptive capacity, scale will be used to measure the transformation and use of new knowledge to produce new ideas and goods.

SMEs performance represents the main third variable or the dependent variable in this study. Financial and non-financial measurements have been applied to measure performance, such as profitability and employments growth (Solomon et al, 2013; Wood et al, 2015). Achieving profitability and growth in turbulent business environments were considered a major challenge for SMEs (Heilmersson, 2014; Seo et al, 2015).However, in this research firm performance can be define as the ability of transforming resources within the firm in an efficient and effective manner to achieve financial outcome through enhancing market share, profitability, sales, and cash flow and enhance employments growth through increasing the number of employees, Market share, sales, cash flow, and profit margin will be used to assess the financial performance of SMEs in this study (Solomon et al, 2013; Cillo et al, 2010). While for non-financial performance, employability growth is defined as an increase or decrease in the number of employees (Wood et al, 2015).

Table 1: Research used to design current research measurements.

Field of Research	Title of research	Authors	Research variables
ABSORPTIVE CAPACITY (ACAP)	Managing Potential and Realized Absorptive Capacity: How do Organizational Antecedents matter?	Jansen et al, (2005) Journal: Academy of Management	Potential ACAP Realized ACAP
INTELLECTUAL CAPITAL	Intellectual Capital Management Enablers: A structural Equation Modelling Analysis	Isaac et al, (2010) Journal of Business Ethics	Human Capital Structural Capital Relational Capital
FIRM PERFORMANCE	Market Information approaches, product innovativeness and firm performance: A empirical Study in fashion industry.	Cillo et al, (2010) Research Policy	FINANCIAL OUTCOMES
	Survival of the fittest: Technical Assistance, survival and growth of small businesses and implication for Public Policy	Solomon et al, (2013) Technovation	

	Roots reasons and resources: Situating optimism and firm growth in subsistence economies	Wood et al, (2015) Journal of Business Research	NON-FINANCIAL OUTCOMES
--	---	--	------------------------

The population for this study is SMEs of Pakistan from a South Punjab Sector. The list of SMEs is obtained from SMEDA (Small and Medium Enterprises Development Authority) (SMEDA, 2019). There are 2108 registered small and medium enterprises in Pakistan's South Punjab Area, according to the Small Medium Development Authority (SMEDA). This study uses probability sampling or representative sampling, which is most associated with survey-based research strategies. Each unit of the population has the same chance of being selected in this category of sampling, and the probability of selection is equal. (Sekaran and Bougie, 2010). Based on Krejcie and Morgan (1970), there are 327 sample required to represent the population. The respondents includes owners, CEO/managing director and senior manager of the randomly selected SMEs with main focus on the major perspectives of IC, AC and the role both areas to increase the firm's performance.

3.2 Analytical technique:

In this research partially least squares-structural equation modelling (PLS-SEM) will be used in this analysis. SEM is a multivariate method for studying structural relationships that is widely used. It enables several variables to be analyzed in an integrated model at once (Hair et al., 2016). PLS-SEM can help with the conceptualization of structures and hypotheses that can be evaluated using empirical evidence. It may also show the nuances of causal modelling. Another important reason to use it in this study, according to (Akter et al. 2017), is that it ensures the estimation of a model using a small sample with many latent variables. Because of the small sample size and non-parametric nature of the data, PLS was chosen over other techniques. PLS-SEM can calculate from a small sample size. This method is also useful for analysing data that is not normally distributed (Hair et al., 2016).

3. Significance and Discussion:

The importance of this study is twofold, theoretical, and practical. This study will extend previous studies that have investigated a firm's knowledge resources, intellectual capital and absorptive capacity. This research will extend previous research on ACAP and IC, as well as a firm's performance by considering two dimensions of absorptive capacity, three dimensions of (IC), and two dimensions of firm performance by focusing on the financial outcome and employability growth. The findings of this study will be used to better understand the impact of these factors on organizational efficiency. The SME sector, which is the most important sector in the economy as a source of economic dynamism, innovation, technological growth, and employment, is the subject of this research.

In terms of practical significance, the current study aims to find some answers that will help SMEs CEOs and managers concentrate and leverage internal and external information resources derived from intellectual capital and absorptive capacity. Admittedly, this research focuses on small and medium-sized enterprises in Pakistan, to highlight the processes of integrating newly acquired knowledge with the firm's base knowledge and dealing with new knowledge that is obtained through absorptive capacity, to develop a firm's efficiency in

utilizing these resources of knowledge and enhancing the firm's ability regarding the flow of the new knowledge.

As a result, the need to better realize and understand relevant processes and mechanisms in Pakistani SMEs necessitates investigating and exploring absorptive capacity with intellectual capital. Finally, the current research provides policymakers and managers in SMEs with useful findings. The current study adds to the existing body of knowledge by examining the effect of the entire construct of intellectual capital on SMEs' success through absorptive capacity, which is viewed as a resource for gaining a competitive advantage. When intellectual capital is viewed as the foundational information that underpins a company's employees and system, it becomes more valuable to contribute to the development of a company's absorptive capacity constructs.

The dynamism of intellectual capital has been illustrated by referring to absorptive capacity as a strategic resource. According to research, however, expanding absorptive potential in a dynamic way is expected to lead to improved financial performance and higher jobs. This suggests that connections and relationships between these important themes reflect the attention of managers and CEOs on a firm's expertise. Knowledge-based approaches that are used to enhance an organization's efficiency have been shown to be very successful. Various organizations with various scales like huge organizations and little medium-sized ventures all are executing previously mentioned two significant information base remedial measures.

Another side to investigate is that the total idea of IC as a distinct advantage with a non-physical presence and with a high chance of making worth can be spoken to as a wide range of assets and elements. These assets are viewed as corresponding to the estimation of financial capital. Nonetheless, in the present tempestuous condition firms need to accomplish more than endure, they must develop, flourish. As far as SMEs, the test is the way to have the option to endure and contend in a fierce domain. All the while IC spoke to the most significant creation factor, due to speaking to information, paying little heed to its tendency whether inner, outer, substantial, or immaterial. Information is an indispensable zone for most firms, particularly those, which are working in an information concentrated condition.

The primary point of business is to grow new items (administrations and merchandise) and SMEs assume a basic job in improving the mechanical framework that speaks to a significant methodology for firms in making development. SMEs are imperative to society in applying this examination and researching how an association's IC makes ACAP, or creates them and coordinates them to impact firm execution. However, the current research proposes and test a causal model on the relationship between intellectual capital and firm performance, mediated by absorptive capacity. The proposed model will serve as a useful tool for analyzing the integrated effects of intellectual capital and absorptive capacity upon financial and non-financial performance of SMEs.

References:

- Agostini, L. and Nosella, A. (2017), "Enhancing radical innovation performance through intellectual capital components", *Journal of Intellectual Capital*, Vol. 18 No. 4, pp. 789-806.
- Akter, S., FossoWamba, S. and Dewan, S. (2017), "Why PLS-SEM is suitable for complex modelling? An empirical illustration in big data analytics quality", *Production Planning & Control*, Vol. 28 Nos 11-12, pp. 1011-1021.

- Aribi, A. and Dupouët, O. (2015), "The role of organizational and social capital in the firm's absorptive capacity", *Journal of Knowledge Management*, Vol. 19 No. 5, pp. 987-1006.
- Aribi, A. and Dupouët, O. (2016), "Absorptive capacity: a non-linear process", *Knowledge Management Research & Practice*, Vol. 14 No. 1, pp. 15-26.
- Asiaei, K., Jusoh, R. and Bontis, N. (2018), "Intellectual capital and performance measurement systems in Iran", *Journal of Intellectual Capital*, Vol. 19 No. 2, pp. 294-320.
- Bontis, N. (1998), "Intellectual capital: an exploratory study that develops measures and models", *Management Decision*, Vol. 36 No. 2, pp. 63-76.
- Bontis, N. and Fitz-Enz, J. (2002), "Intellectual capital ROI: a causal map of human capital antecedents and consequents", *Journal of Intellectual Capital*, Vol. 3 No. 3, pp. 223-247.
- Cepeda Carrión, G., Cegarra Navarro, J.G. and Jiménez Jiménez, D. (2010), "Analyzing an absorptive capacity: unlearning context and information system capabilities as catalysts for innovativeness", *Documentos de Trabajo FUNCAS*, ISSN 1988-8767, Vol. 550, pp. 1-31.
- Chaudhary, S. and Batra, S. (2018), "Absorptive capacity and small family firm performance: exploring the mediation processes", *Journal of Knowledge Management*, Vol. 22 No. 6, pp. 1201-1216.
- Chen, Y.-S., Lin, M.-J.J. and Chang, C.-H. (2009), "The positive effects of relationship learning and absorptive capacity on innovation performance and competitive advantage in industrial markets", *Industrial Marketing Management*, Vol. 38 No. 2, pp. 152-158.
- Cohen, W.M. and Levinthal, D.A. (1990), "Absorptive capacity: a new perspective on learning and innovation", *Administrative Science Quarterly*, Vol. 35 No. 1, pp. 128-152.
- Curado, C. (2008), "Perceptions of knowledge management and intellectual capital in the banking industry", *Journal of Knowledge Management*, Vol. 12 No. 3, pp. 141-155.
- Dzenopoljac, V., Yaacoub, C., Elkanj, N. and Bontis, N. (2017), "Impact of intellectual capital on corporate performance: evidence from the Arab region", *Journal of Intellectual Capital*, Vol. 18 No. 4, pp. 884-903.
- Engelman, R.M., Fracasso, E.M., Schmidt, S. and Zen, A.C. (2017), "Intellectual capital, absorptive capacity and product innovation", *Management Decision*, Vol. 55 No. 3, pp. 474-490.
- Ferreras-Méndez, J.L., Fernández-Mesa, A. and Alegre, J. (2016), "The relationship between knowledge search strategies and absorptive capacity: a deeper look", *Technovation*, Vol. 54, pp. 48-61.
- Flor, M.L., Cooper, S.Y. and Oltra, M.J. (2018), "External knowledge search, absorptive capacity and radical innovation in high-technology firms", *European Management Journal*, Vol. 36 No. 2, pp. 183-194.
- Hair, J., Anderson, R., Black, B. and Babin, B. (2016), *Multivariate Data Analysis*, 7th ed., Pearson, Upper Saddle River, NJ.
- Han, Y. and Li, D. (2015), "Effects of intellectual capital on innovative performance", *Management Decision*, Vol. 53 No. 1, pp. 40-56.
- Haskel, J. and Westlake, S. (2017), *Capitalism without Capital: The Rise of the Intangible Economy*, Princeton University Press, Princeton.
- Hussinki, H., Ritala, P., Vanhala, M. and Kianto, A. (2017), "Intellectual capital,

knowledge management practices and firm performance”, *Journal of Intellectual Capital*, Vol. 18 No. 4, pp. 904-922.

- Inkinen, H. (2015), “Review of empirical research on intellectual capital and firm performance”, *Journal of Intellectual Capital*, Vol. 16 No. 3, pp. 518-565.
- Jansen, J.J., Van Den Bosch, F.A. and Volberda, H.W. (2005), “Managing potential and realized absorptive capacity: how do organizational antecedents matter?”, *Academy of Management Journal*, Vol. 48 No. 6, pp. 999-1015.
- Jones, T.M., Harrison, J.S. and Felts, W. (2018), “How applying instrumental stakeholder theory can provide sustainable competitive advantage”, *Academy of Management Review*, Vol. 43 No. 3, pp. 371-391.
- Leal-Rodríguez, A.L., Roldán, J.L., Ariza-Montes, J.A. and Leal-Millán, A. (2014), “From potential absorptive capacity to innovation outcomes in project teams: the conditional mediating role of the realized absorptive capacity in a relational learning context”, *International Journal of Project Management*, Vol. 32 No. 6, pp. 894-907.
- Lewandowska, M.S. (2015), “Capturing absorptive capacity: concepts, determinants, measurement modes and role in open innovation”, *International Journal of Management and Economics*, Vol. 45 No. 1, pp. 32-56, available at: <https://doi.org/10.1515/ijme-2015-0015>
- Mariano, S. and Walter, C. (2015), “The construct of absorptive capacity in knowledge management and intellectual capital research: content and text analyses”, *Journal of Knowledge Management*, Vol. 19 No. 2, pp. 372-400.
- Mehralian, G., Nazari, J.A. and Ghasemzadeh, P. (2018), “The effects of knowledge creation process on organizational performance using the BSC approach: the mediating role of intellectual capital”, *Journal of Knowledge Management*, Vol. 22 No. 4, pp. 802-823.
- Mubarik, M.S., Chandran, V.G.R. and Devadason, E.S. (2018), “Measuring human capital in small and medium manufacturing enterprises: what matters?”, *Social Indicators Research*, Vol. 137 No. 2, pp. 605-623.
- Mubarik, M.S., Govindaraju, V.G.R. and Devadason, E.S. (2016), “Human capital development for SMEs in Pakistan: is the “one-size-fits-all” policy adequate?”, *International Journal of Social Economics*, Vol. 43 No. 8, pp. 804-822.
- Mubarik, S., Chandran, V.G.R. and Devadason, E.S. (2016), “Relational capital quality and client loyalty: firm-level evidence from pharmaceuticals, Pakistan”, *The Learning Organization*, Vol. 23 No. 1, pp. 43-60.
- Mubarik, S., Naghavi, N. and Mubarik, M.F. (2019), “Governance-led intellectual capital disclosure: empirical evidence from Pakistan”, *Humanities and Social Sciences Letters*, Vol. 7 No. 2, pp. 141-155.
- Obeidat, B.Y., Tarhini, A., Masa’deh, R. and Aqqad, N.O. (2017), “The impact of intellectual capital on innovation via the mediating role of knowledge management: a structural equation modelling approach”, *International Journal of Knowledge Management Studies*, Vol. 8 No. 3, pp. 273-298.
- Ortiz, B., Donate, M.J. and Guadamillas, F. (2018), “Inter-organizational social capital as an antecedent of a firm’s knowledge identification capability and external knowledge acquisition”, *Journal of Knowledge Management*, Vol. 22 No. 6, pp. 1332-1357.
- Petti, C. and Zhang, S. (2016), “The role of absorptive capacity in Chinese firms”, *Measuring Business Excellence*, Vol. 20 No. 2, pp. 1-12.
- Rafique, M., Hameed, S. and Agha, M.H. (2018), “Impact of knowledge sharing, learning adaptability and organizational commitment on absorptive capacity in

pharmaceutical firms based inPakistan”, *Journal of Knowledge Management*, Vol. 22 No. 1, pp. 44-56.

- Rupcic, N. (2019), “Organizational learning in stakeholder relations”, *The Learning Organization*, Vol. 26 No. 2, pp. 219-231.
 - Schilke, O., Hu, S. and Helfat, C.E. (2018), “Quo vadis, dynamic capabilities? A Content-analytic review of the current state of knowledge and recommendations for future research”, *Academy of Management Annals*, Vol. 12 No. 1, pp. 390-439.
- Schultz, T.W. (1961), “Investment in human capital”, *The American Economic Review*, Vol. 51 No. 1, pp. 1-17.
- Secundo, G., Lombardi, R. and Dumay, J. (2018), “Intellectual capital in education”, *Journal of Intellectual Capital*, Vol. 19 No. 1, pp. 2-9.
- Shafique, I. and Kalyar, M. (2018), “Linking transformational leadership, absorptive capacity, and corporate entrepreneurship”, *Administrative Sciences*, Vol. 8 No. 2, pp. 1-17.
- Soo, C., Tian, A.W., Teo, S.T.T. and Cordery, J. (2017), “Intellectual capital-enhancing HR, absorptive capacity, and innovation”, *Human Resource Management*, Vol. 56 No. 3, pp. 431-454.
- Sumedrea, S. (2013), “Intellectual capital and firm performance: a dynamic relationship in crisis time”, *Procedia Economics and Finance*, Vol. 6, presented at the International Economic Conference of
- Sibiu 2013 Post Crisis Economy: Challenges and Opportunities, IECS 2013, Elsevier, pp. 137-144.
- Tseng, C., Chang Pai, D. and Hung, C. (2011), “Knowledge absorptive capacity and innovation performance in KIBS”, *Journal of Knowledge Management*, Vol. 15 No. 6, pp. 971-983.
- Van Dijk, A., Hendriks, P. and Romo-Leroux, I. (2016), “Knowledge sharing and social capital in globally distributed execution”, *Journal of Knowledge Management*, Vol. 20 No. 2, pp. 327-343.
- Welbourne, T.M. and Pardo-del-Val, M. (2009), “Relational capital: strategic advantage for small and medium-size enterprises (SMEs) through negotiation and collaboration”, *Group Decision and Negotiation*, Vol. 18 No. 5, pp. 483-497.
- Wernerfelt, B. (1984), “A resource-based view of the firm”, *Strategic Management Journal*, Vol. 5 No. 2, pp. 171-180.
- Zahra, S.A. and George, G. (2002), “Absorptive capacity: a review, reconceptualization, and extension”, *The Academy of Management Review*, Vol. 27 No. 2, pp. 185-203.