OWNER-MANAGERS' CHARACTERISTICS, FINANCIAL RESILIENCE AND MULTIDIMENSIONAL PERFORMANCE DURING COVID-19 PANDEMIC: A RESOURCE-BASED PERSPECTIVE

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ABSTRACT

The premise of this study is to investigate the impact of owner characteristics, i.e., financial literacy and financial inclusion, on the performance of small and medium enterprises (SMEs) in Pakistan. It adopts the snowball sampling technique and employs structural equation modelling (SEM) using SmartPLS. The findings reveal that financially literate owners outperform others during crises. Additionally, financially included SMEs remain resilient during crises. Theoretically, this research provides empirical support to the resource-based theory. Practically, it recommends that regulatory authorities initiate financial literacy programs mainly designed for financially illiterate owners.

KEYWORDS

Financial literacy, Financial Inclusion, COVID-19, Resource Based Theory, SMEs Performance

1. INTRODUCTION

The unprecedented coronavirus disease (COVID-19) tribulated the globe at the start of 2021 (Gourinchas et al., 2020). Although several pandemics, i.e., Severe Acute Respiratory Syndrome (SARS-2003), Middle East Respiratory Syndrome (MERS-2013) and many others emerged in the past, the recent pandemic, i.e., COVID-19, is unique in severity and complexity (Mather, 2020). According to World Health Organization statistics, until June 24, 2021, COVID-19 infected nearly 180 million and killed around 3.9 million people worldwide. While the previous pandemics, i.e., SARS & MERS, infected almost one million and killed less than 1300 people collectively. Additionally, Wang et al. (2020) reported that the genetic and clinical properties of COVID-19 in terms of the incubation period, reproductive number and nosocomial transmission made this pandemic more complex than previous ones.

Small and medium enterprises (SMEs) are the backbone of an economy (Soomro et al., 2019). These enterprises significantly contribute to Gross Domestic Product (GDP), employment level and exports, leading to economic development. For example, in advanced countries like the U.K., SMEs produce two in every three jobs (Savlovschi & Robu, 2011), whereas in developing nations like Pakistan, they contribute to GDP up to

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40% (Baig, 2019). Although their contribution is remarkable in both types of economies, they fit more in developing nations' contexts due to quick adaptation, less capital requirement, more labour intensity and low operational cost compared to large-scale enterprises (Keskgn et al., 2010). Thus, their role in a developing economy cannot be overlooked.

Besides their valuable contribution, SMEs are vulnerable to internal and external shocks due to resource constraints. Recently, the outbreak of COVID-19 has exposed their fragility (Kroeger, 2020). For instance, some empirical studies provided that SMEs are under crisis due to cash flow disruption, liquidity problems, increase in bankruptcy risk, the decline in operational activity etc. (Dangol et al., 2020; Mills, 2020; Wijaya, 2020). For example, in Pakistan, 95% of small businesses reported a decline in operations, 48% of enterprises laid off their workers, and nearly 90% of SMEs reported financial problems (SMEDA, 2020). Cognizant of these disruptions at a broader level, a deeper understanding is required, particularly regarding the Performance of SMEs in Pakistan and how it can be sustained during the crisis.

Performance is a multidimensional construct (Wang et al., 2017). The rapid change in today's environment has placed a challenge to sustain business performance. Unexpectedly, the outbreak of this pandemic tribulated the business world and drew heterogeneous effects on the Performance of SMEs. For instance, the tourism sector in Pakistan was adversely affected, while telecommunication performed well during the crisis (Papulová et al., 2021). Although some researchers have empirically investigated Performance. To fill this gap, this study views performance in three aspects; financial Performance, production performance and market performance.

It has been established that firms' resources are the key driver of their Performance (Barney, 1991). The central idea of the resource-based view emphasizes firm-specific internal resources that bring sustainable competitive advantage. Among the various internal resources, people-dependent capabilities significantly impact organizational Performance (Sembiring, 2016). This paper has hypothesized two intangible resources, i.e., financial literacy and financial inclusion, as sustainable performance during the COVID-19 pandemic. Financial literacy is basic knowledge of financial concepts, the ability to apply them and skills to manage resources (Hung et al., 2009). In contrast, financial inclusion uses formal banking services (Wafula, 2017).

Under prevailing circumstances, this paper seeks to answer some crucial questions. Firstly, it aims to explain how COVID-19 affected the financial, operational and market Performance of SMEs working in Pakistan. Secondly, it seeks to investigate the role of owner-managers capabilities, i.e., financial literacy and inclusion in protecting SMEs during the pandemic.

Theoretically, this study enhances the understanding of the Performance of SMEs during a novel crisis. Practically, it would be helpful for owners and managers in managing their ventures during an economic downturn. Furthermore, it claimed that SMEs' failure rate increased up to 10% during the crisis (Gourinchas et al., 2020). So, this study would aid regulatory authorities, i.e., the Small and Medium Regulatory Authority (SMEDA), in Protecting small businesses leading to controlling in failure rate in Pakistan.

2. LITERATURE REVIEW

2.1 Overview of SMEs Sector in Pakistan

The small and Medium Enterprise Development Authority(SMEDA) is the regulatory authority of SMEs in Pakistan. SMEs support the economy by accelerating exports and improving employment levels (Syed et al., 2012). There is more than 90% of SMEs in Pakistan. In addition to their existence span, SMEs share 40%t of the support to GDP. Moreover, these enterprises add total exports of more than 25%. Hence, SMEs have value role in economic development.

2.2 SMEs' Performance during Economic Downturns

Generally, SMEs suffer from crises due to resource constraints (Bourletidis & Triantafyllopoulos, 2014). Hodorogel (2009) states these enterprises are the most sensitive to the economic downturn. In the past, several crises have emerged, but the global financial crisis in 2008 hit extremely hard. During this period, the SME sector faced the worst financing conditions, i.e., increased covenants, high cost of financing, nearly 20% increase in bankruptcy rate, and capital shortfall (He et al., 2017). In Pakistan, COVID-19 put the SMEs under stress in the shape of shortage of goods, demand shock, disruption in operation and employee layoff. Thus, in light of the above debate, an inverse relationship exists between external crises and business performance. (Aftab et al., 2021).

However, on the contrary note, it has also been proved that some businesses gain under crisis. For instance, the telecommunication sector progressed in the COVID-19 pandemic because of an increase in internet usage during lockdown (Papulová et al., 2021). Therefore, it is inferred that the recent global crisis has brought mixed stories; some were good and most of them were terrible. Hence, this study seeks to broaden the understanding of SMEs' Performance during the ongoing economic crisis.

2.3 Owner-Manager Characteristics as SMEs Resources

Although a firm's resources don't have equal importance, owners' characteristics (e.g., skills, competencies and abilities) are a significant strategic resource (Kelliher & Reinl, 2009). The term competency means knowledge and skills that may lead to improved Performance. Previous studies have proved that competencies distinguish between high and low Performance (love et al., 2014). Infect competencies require knowledge and skill that enable a decision maker to make prudent decisions (Soejono et al., 2015). Consistent with Tehseen and Ramayah (2015), this study views owner-manager-related competencies as valuable and intangible SMEs resource. This paper uses financial literacy and inclusion as valuable resources.

2.4 Resources Building Resilience

The emergence of the concept of resilience is traced from the work of Bhamra et al. (2011), in which the authors claimed that it was firstly proposed by a Canadian ecologist named Holling in the 1970s. Resilience was defined as the ability of an ecosystem to deal with environmental changes and quickly return to a normal State. Later, it was applied to various disciplines such as physics, psychology, engineering, etc. Management science researchers have heeded it due to the increased economic crisis frequency and intensity

(Lampel et al., 2014). Organizational resilience has been defined as the ability of an enterprise to respond to an uncertain situation and bounce back to its normal state.

Resources promote resilience (Alberti et al., 2018). Although the concept of resilience has been less explored in management sciences, however, some studies have addressed different sources of resilience, such as value creation strategies (Ismail et al., 2011), competitive strategies (Sawalha, 2015), individual-level resources (Bhamra et al. 2011) and Organizational level resources (Pal et al. 2014). This paper encompasses individual-level resources wherein financial literacy and financial inclusion are included. Financial literacy is a life skill comprised of financial knowledge and ability that help decision-making (Lusardi & Mitchell, 2011). Financial inclusion is the owner's strategy of using financial services for business (Wafula, 2017).

This study seeks to apply the concept of resilience to SMEs, which are deemed economic backbone. Unfortunately, the outbreak of COVID-19 in Pakistan during the first quarter of 2022 has exposed the vulnerability of SMEs (Caballero-Morales 2021). Notably, up to 90% of Pakistani SMEs experienced severe financial problems, supply chain disruption, liquidity issues, and various other problems during the COVID-19 pandemic (SMEDA, 2020). In the light of the previous debate, the following hypothesis are framed;

- H₁: Financial literacy significantly contributes to building resilience during the pandemic.
- H₂: Financial inclusion significantly contributes to building resilience during the pandemic.

2.5 Resilience Derive Performance

Small and large organizations neither suffer equally from a crisis nor their Performance is always adversely affected. The literature shows mixed results in this regard. Most studies describe SMEs as vulnerable to shocks due to a lack of preparedness, limited resources, weak market position and higher dependency on the state (Runyan, 2006; Hong & Jeong, 2006; Herbane, 2013). However, some studies provide that SMEs respond to crises better than large enterprises due to their flexibility and quick adaptation (Gelbmann, 2010). Furthermore, as discussed earlier, resilience is a positive adaptation during adversity (Glantz & Johnson, 2006). Therefore, it may be argued based on Gelbmann's finding that a resilient organization would have performed well during an ongoing global crisis. There is a contradiction in views. The optimistic side considers SMEs vulnerable due to resource constraints, while the pessimistic side claims that SMEs can better respond to shocks due to flexibility. Thus, to better understand this phenomenon, the following hypotheses are drawn.

H_{3a}: Resilient SMEs have better financial Performance during the pandemic.

H_{3b}: Resilient SMEs have better operational Performance during the pandemic.

H_{3c}: Resilient SMEs have better market performance during the pandemic.

2.6 Resource-Resilience-Performance Framework

Figure.1 shows the conceptual framework, which includes financial literacy, financial inclusion (i.e., exogenous variables), organizational resilience (i.e., mediating variable), financial performance, operational performance and market performance (i.e., endogenous variables). Hereafter, this conceptual framework is named as Resource-resilience-performance framework.



Figure 1: Research Framework

3. METHODOLOGY

3.1 Measurement of Variables

This study used a survey strategy for data collection wherein a Self-administered questionnaire was handed over to SME owner-managers. The instrument contained six constructs measured with 28 items, each adapted from previous studies (See Appendix I). Among these constructs, financial literacy and financial inclusion have been taken as exogenous constructs, whereas financial, operational, and market Performance are endogenous constructs. However, economic resilience has been taken as an intervening construct characterized by mixed features of both endogenous and exogenous variables. Each construct except literacy and inclusion is measured on a 7-point scale wherein the response anchor 1 denotes 'strongly disagree, and seven denotes 'strongly Agree'. However, financial literacy and financial inclusion, on the other hand, are measured with a scoring technique (See Appendix I).

As stated earlier, SMEs are mainly unregistered businesses and don't have the regulatory requirement of producing audited annual records (Siddique et al., 2016). Notably, it becomes problematic to obtain the financial record in developing countries due to various reasons and missing regulatory requirements (Kazmi, S., & Mäntymäki, 2016). Therefore, this study used perceptual measures to test the SMEs' Performance following the work of Zulkiffli and Perera (2011). Furthermore, according to (Myers et al., 1996) high degree of correlation exists between the responses obtained by actual and perceived measures.

3.2 Data Collection and Sample

The target population of this research is Small and medium enterprises (SMEs) working in Pakistan. SMEs are unregistered businesses, unlike listed public companies, globally defined based on the size of employment, assets and turnover (see national SMEs policy 2021 of Pakistan). Although a contradiction in opinion exists in defining SMEs, this study follows the State Bank of Pakistan's perspective. A small enterprise is characterized by an employment size of up to 10 and a turnover of up to Rs. 75 million. On the other hand, a medium organization is characterized by employment size between 21 and 250 (for manufacturing & services concerns) and between 21 and 50 (for trading concerns) in addition to annual turnover ranging from Rs. 75 million to Rs.400 million (Sme Sbp, 2011).

The owner-managers were selected as survey respondents as they could have a better capacity to provide information about their ventures. After a careful inquiry, this study failed to obtain an updated list of existing SMEs in Pakistan (e.g., Hyder & Lussier, 2016) and opted snowball sampling technique. The translated-version questionnaire was distributed to 960 respondents, out of which 710 were found healthy, providing a response rate of 73.96%.

3.3 Data Analysis Technique

This study employs Partial Least Square (PLS) structural equational modelling (SEM) due to the prediction-orientated nature of the investigation, wherein resources are used as the predictor of SME performance. It analyses the resource-resilience-performance framework with SmartPLS 3.3.7 developed by Ringle et al. (2015). SmartPLS mainly works in two steps; PLS algorithm and Bootstrapping. The first step makes a measurement model analysis wherein the relationship of items with their respective constructs is investigated. Furthermore, it includes the assessment of reliability and validity. Afterwards, the second step makes structural model analysis wherein the relationship between the proposed constructs are investigated. Finally, it includes the assessment of hypothesis testing (Hair et al., 2019).

4. ANALYSIS & DISCUSSION

The sample is male-dominated (see table 1) with middle-aged owner-managers. The majority of respondents possess more than five years of teaching experience. Onethird of respondents are under-matriculated. Four in every five respondents belong to a business family background.

Profile of Owner-Managers						
Demography	Indicator	Frequency	%			
	Male	623	87.7			
Gender	Female	87	12.3			
	Total	710	100			
	18-35 years	210	29.6			
1 70	36-55 years	310	43.7			
Age	56 years & above	190	26.8			
	Total	710	100			
	0-5 years	113	15.9			
	6-10 years	235	33.1			
Business Experience	11-20 years	192	27.0			
_	21 years & above	170	23.9			
	Total	710	100			
	Under Matric	237	33.4			
	Matric	174	24.5			
	Intermediate	97	13.7			
Education Level	Graduation	70	9.9			
	Post-Graduation	60	8.5			
	Others	72	10.1			
	Total	710	100			
	Business Family	587	82.7			
Financial Background	Non-Business Family	123	17.3			
	Total	710	100			

Table 1 ~£1 . **.** .

Source: Authors' Calculations

As far as corporate characteristics are concerned, the most firms are services concerned in the sample (See table 2). Small firms are greater in number than micro and medium ones. However, most businesses are sole traders.

Laure 2 Characteristics of SMEs							
Characteristic	Indicator	Frequency	%				
	Services	380	53.5				
Desites and No former	Manufacturing	143	20.1				
Business Nature	Trading	187	26.3				
	Total	710	100				
	Less than 5	210	29.6				
Employment Size	6 to 50	310	43.7				
Employment Size	51 to 250	190	26.8				
	Total	710	100				
	Sole Proprietorship	376	53.0				
	Partnership	154	21.7				
Ownership Structure	Single Member Company	85	12.0				
-	Private Limited Company	95	13.4				
	Total	710	100				

Table 2				
Characteristics of SMEs				
Indicator				

4.1 Measurement Model Analysis

The measurement model analysis mainly investigates the relationship between constructs and their respective items (Hair et al., 2020). The premise of this analysis is to confirm the reliability and validity of the instrument. The current study used Cronbach alpha for measuring reliability, wherein the threshold value was set at 0.7, followed by Taber (2018). In table 3, each alpha value is more significant than 0.70. Hence, reliability is established. In addition to Alpha, this study also considered composite reliability (C.R.) as the measure of the reliability of internal consistency of measure due to some criticism on Cronbach alpha highlighted by Peterson & Kim (2013). The threshold value for C.R. is set to 0.7, and each value in table 3 in the C.R. column is greater than 0.7, leading to the establishment of reliability.

Kenusinity and Valuity Assessment								
Latent Variable	Items	Loadings	Cronbach's Alpha	Composite Reliability (C.R.)	Avg. Variance Extracted (AVE)			
Financial Inclusion	FI_Score	1.000	1.000	1.000				
Financial Literacy	FL_Score	1.000	1.000	1.000				
	FP_1	0.794						
Financial	FP_2	0.780						
Financial	FP_3	0.804	0.880	0.909	0.668			
Performance	FP_4	0.853						
	FP_5	0.852						
	FR_2	0.789	0.810	0.875	0.636			
Financial	FR_3	0.799						
Resilience	FR_4	0.790						
	FR_5	0.812						
	MP_1	0.707						
Morkot	MP_2	0.796						
Parformance	MP_3	0.745	0.830	0.880	0.596			
Performance	MP_4	0.776						
	MP_5	0.831						
	OP_1	0.806						
Operational	OP_2	0.780	0.810	0.877	0.641			
Performance	OP_3	0.741	0.010	0.077	0.041			
	OP_4	0.869						

 Table 3

 Reliability and Validity Assessment

Source: Authors' Calculations

The validity in this study has been segregated into content and construct validity, as Sekaran and Bougie (2016) suggested. Firstly, the content validity is established by three experts in the language translation phase of the instrument. However, on the other hand, construct validity has been further categorized into convergent validity and discriminant validity. Convergent validity is assessed by the average variance extracted (AVE) method, wherein the threshold value is set at 0.5, as suggested by Hair et al. (2016). In table 3, each construct has its corresponding AVE and all the values are greater than 5.0, which confirms the convergent validity.

Similarly, the study used Fornell-Larcker Criterion and Heterotrait-Monotrait Ratio (HTMT) to confirm discriminant validity. Fornell and Larcker (1981) proposed that the square root of AVE of a construct must be greater than its correlation with other constructs. Simply, the bold values in table 4 must be greater than the corresponding rows and columns. As each bold value is greater, convergent validity is established. Additionally, convergent validity has also been established with the HTMT criterion proposed by Henseler et al. (2015). The threshold value is 0.90, and the resultant value must be lower than the threshold value. In Table 5, each value meets this criterion, hence, discriminant validity is established. Furthermore, Table 6 presents cross-loadings of indicators wherein

	Fin_Inc	Fin_Lit	Fin_Prf	Fin_Res	Mkt_Prf	Op_Prf
Fin_Inc	1.000	-	-	-	-	-
Fin_Lit	0.707	1.000	-	-	-	-
Fin_Prf	0.764	0.668	0.817	-	-	-
Fin_Res	0.718	0.738	0.744	0.798	-	-
Mkt_Prf	0.717	0.637	0.693	0.640	0.772	-
Op_Prf	0.678	0.621	0.669	0.655	0.731	0.800

Table 4 Fornell-Larcker Criterion Assessment

Source: Author it can be seen that items are better loaded to their respective constructs.

neterotrait-wonotrait Ratio Assesment (Woder-1)								
	Fin_Inc	Fin_Lit	Fin_Prf	Fin_Res	Mkt_Prf	Op_Prf		
Fin_Inc	-	-	-	-	-	-		
Fin_Lit	0.707	-	-	-	-	-		
Fin_Prf	0.816	0.713	-	-	-	-		
Fin_Res	0.798	0.820	0.882	-	-	-		
Mkt_Prf	0.785	0.697	0.812	0.779	-	-		
Op_Prf	0.753	0.689	0.796	0.808	0.894	-		

 Table 5

 Heterotrait-Monotrait Ratio Assesment (Model-I)

Source: Author

Latant	010	bb Lloudin		cutors (in			
Constructs	Items	Fin_Inc	Fin_Lit	Fin_Prf	Fin_Res	Mkt_Prf	Op_Prf
Financial Inclusion	FI_Score	1.000	0.707	0.764	0.718	0.717	0.678
Financial Literacy	FL_Score	0.707	1.000	0.668	0.738	0.637	0.621
	FP_1	0.574	0.454	0.794	0.564	0.517	0.487
	FP_2	0.585	0.576	0.780	0.589	0.554	0.562
Financial	FP_3	0.642	0.526	0.804	0.615	0.576	0.581
I error mance	FP_4	0.665	0.596	0.853	0.656	0.568	0.553
	FP_5	0.650	0.572	0.852	0.612	0.614	0.550
	FR_2	0.577	0.578	0.569	0.789	0.545	0.507
Financial Posilioneo	FR_3	0.555	0.592	0.670	0.799	0.523	0.549
Resilience	FR_4	0.574	0.594	0.571	0.790	0.466	0.518
	FR_5	0.587	0.590	0.560	0.812	0.506	0.514
	MP_1	0.485	0.433	0.481	0.440	0.707	0.541
	MP_2	0.602	0.518	0.547	0.507	0.796	0.597
Market	MP_3	0.521	0.466	0.516	0.492	0.745	0.539
I error manee	MP_4	0.588	0.541	0.565	0.511	0.776	0.590
	MP_5	0.563	0.493	0.561	0.514	0.831	0.551
	OP_1	0.536	0.493	0.529	0.504	0.575	0.806
Operational	OP_2	0.519	0.519	0.544	0.526	0.536	0.780
reriormance	OP_3	0.531	0.438	0.529	0.500	0.638	0.741
	OP_4	0.582	0.535	0.542	0.565	0.595	0.869

 Table 6

 Cross Loadings of Indicators (Model-I)

Fin_Inc=Financial Inclusion; Fin_Lit=Financial Literacy; Fin_Prf=Financial Performance; Fin_Res=Financial Resilience; Mkt_Prf=Market Performance; Op_Prf=Operational Performance

4.2 Structural Model Analysis

The structural model analysis is used for hypothesis testing, wherein the relationships between latent constructs are investigated (Hair et al., 2022). For this purpose, this study applied bootstrapping technique using SmartPLS. Table 7 presents the results of the structural model analysis wherein the significance of the results was assessed with coefficients (β), t-values and p-values.

The overall research model contains five direct paths represented by H_1 , H_2 , H_3 , H_4 , & H_5 (figure 1). The first path (H_1) hypothesized the relationship between financial literacy and financial resilience. As shown in table 7, the results reported significant relationship at p < 0.01 level ($\beta = 0.461$, t-value =5.99). The second path (H_2) hypothesized the relationship between financial inclusion and financial resilience. According to results, a significant

relationship was found at p < 0.01 level ($\beta = 0.392$, t-value =5.32). Similarly, the third (H_{3a}) and fourth paths (H_{3b}) were found significant at a 1% significance level providing beta values 0.359 & 0.272 and t-values 4.44 & 2.88, respectively. However, fifth path (H3c: Fin_Res -> Mkt_Prf) was found significant at 5 % significance level ($\beta = 0.171$, t-value =2.24). In summary, each hypothesized path in figure 1 proved a significant and positive relationship.

	Hypothesis Testing								
Sr.	Code	Hypothesized Direct Paths	Beta (β)	Standard Error (S.E.)	T Statistics (O/SE)	P Values	Decision		
1	H ₁ :	Fin_Lit→Fin_Res	0.461	0.08	5.99	0.000***	Supported		
2	H ₂ :	Fin_Inc→Fin_Res	0.392	0.07	5.32	0.000***	Supported		
3	H _{3a} :	Fin_Res→Fin_Prf	0.359	0.08	4.44	0.000***	Supported		
4	H _{3b} :	Fin_Res→Op_Prf	0.272	0.09	2.88	0.004***	Supported		
5	H _{3c} :	Fin_Res→Mkt_Prf	0.171	0.08	2.24	0.025**	Supported		
	D	1	0.1						

Table 7 Hypothesis Testing

***:P<0.01; **:P<0.05; *:P<0.1

4.2.1 Mediation Analysis

The study employed a resource-resilience-performance framework wherein financial resilience is taken as a mediator. The summarized results of mediation analysis are shown in table 8 wherein six indirect paths are hypothesized coded as H_{4a} , H_{4b} , H_{4c} , H_{5a} , H_{5b} , and H_{5c} . According to statistics, financial resilience partially mediates the relationship between financial inclusion and performance (i.e., financial, operational & market performance denoted by H_{5a} , H_{5b} , and H_{5c}). Similarly, financial resilience partially mediates the relationship between financial literacy and performance (i.e., financial and operational performance denoted by H_{4a} and H_{4b}). However, the market performance had different findings. This relationship, i.e., H_{4b} ; Fin_Inc -> Fin_Res -> Mkt_Prf, had a full mediation effect which means that the relationship between financial literacy and market performance only passes through financial resilience.

4.2.2 Assessment of Predictive Power

Table 9 shows the coefficient determination values (R^2), which reveal the explanatory power of the research model used in this study. Following Chin (1998), this study categorized R^2 into strong ($R^2 > 0.66$), moderate ($R^2 > 0.33$), weak ($R^2 > 0.19$) and poor ($R^2 < 0.19$). According to statistics, three out of four endogenous constructs were moderately explained by exogenous constructs. However, financial Performance was strongly explained by exogenous constructs up to nearly 67%. Hence, each endogenous construct is well explained by its respective exogenous construct leading to conclude that the model has good explanatory power. In addition to R2, this study used a novel measure of explanatory power, i.e., predictive relevance, developed by Shmueli et al. (2019), which is particularly designed for SmartPLS. According to Shmieli, if the value of predictive relevance (Q2) using the blindfolding technique is found to be greater than zero, the model is said to have better predictive power. As shown in table 10, Q2 values are greater than zero; hence the model has good predictive power.

Assessment of Mediation								
Total Ef	fects	Direct Ef	fects		Indirect	effects		Deate
Path Coefficients	T- values	Path Coefficients	T- values	Codes	Hypothesized Path	Path Coefficients	T- values	trapping
0.235	5.534	0.145	3.209	H _{4a}	Fin_Lit→Fin_ Res→Fin_Prf	0.09	3.338	Partial Mediation
0.261	5.719	0.124	2.052	H _{4b}	Fin_Lit→Fin_ Res→Op_Prf	0.137	3.957	Partial Mediation
0.233	5.134	0.057	1.138	H _{4c}	Fin_Lit→Fin_ Res→Mkt_Prf	0.176	6.215	Full Mediation
0.556	13.226	0.475	9.684	H _{5a}	Fin_Inc→Fin_ Res→Fin_Prf	0.081	3.047	Partial Mediation
0.491	11.364	0.367	6.637	H _{5b}	Fin_Inc→Fin_ Res→Op_Prf	0.123	3.789	Partial Mediation
0.600	13.499	0.443	7.66	H _{5c}	Fin_Inc→Fin_ Res→Mkt_Prf	0.158	4.425	Partial Mediation

Table 8 Assessment of Mediation

Fin_Inc=Financial Inclusion; Fin_Lit=Financial Literacy; Fin_Prf=Financial Performance; Fin_Res=Financial Resilience; Mkt_Prf=Market Performance; *Op_Prf=Operational Performance*

Table 9
Coefficient Determination

Endogenous Variables	\mathbb{R}^2	R ² Adjusted	Status					
Financial Performance	0.663	0.661	Strong					
Financial Resilience	0.622	0.620	Moderate					
Market Performance	0.559	0.556	Moderate					
Operational Performance	0.528	0.524	Moderate					

 $R^2 > 0.66$, "Strong"; $R^2 > 0.33$, "Moderate"; $R^2 > 0.19$, "Weak";

 $R^2 < 0.19$, "Poor"

Source: Authors' Calculations

Predictive Relevant Assessment							
Constructs	SSO	SSE	Q ² (=1- SSE/SSO)				
Financial Inclusion	710	710	-				
Financial Literacy	710	710	-				
Financial Performance	3550	2349	0.338				
Financial Resilience	2840	1674	0.411				
Market Performance	3550	1933	0.455				
Operational Performance	2840	1871	0.341				

	Table: 10
Predictive	Relevant Assessment

SSO = Sum of the square of Observations; SSE = Sum of Squares of Prediction Errors



4.3 Discussion

This paper is a Pioneer in explaining the mediating role of financial resilience between financial resources and the three-dimensional Performance of SMEs in Pakistan during the outbreak of the novel COVID-19 pandemic. It has advanced the literature on resource-based theory by proposing a resource-resilience-performance framework. The findings are discussed in the previous section and summarized in table 1-10. The study proposed five main hypotheses, among which the first three represented direct paths (i.e., H_1 , H_2 & H_3) while the remaining two represented indirect paths (i.e., H_4 & H_5).

The first hypothesis (H_1) was supported by empirical results (see table 7), concluding that financial literacy builds financial resilience. The quality of financial decisions differentiates SMEs from others. It has already been established that good decision-making requires the ability to process information. In financial management, prudent financial decision-making requires reasonable financial literacy, particularly during times of crisis (Hassan et al., 2018). Thus, the owner-managers financial literacy helps protect SMEs from setbacks through building resilience. The findings are consistence with Setyorini et al. (2021).

The second hypothesis (H2) proved at a 1% significance level. Therefore, the conclusion may be drawn that more financially included SMEs tend to be more resilient, particularly during times of crisis. Financial inclusion broadly is the use of financial services by SMEs. During the COVID-19 pandemic outbreak, SMEs faced several problems, as reported by the Small and Medium Enterprise Development Authority (SMEDA), including financial and operational issues. However, those SMEs who had deep connections with formal banking services such as obtaining loans and transfer of payments were relatively secure in the face of the COVID-19 crisis compared to those who had not. Hence, financially included SMEs were found resilient during the crisis. The results are parallel to the work of Belayeth Hussain et al. (2019) and Pomeroy et al. (2020).

The third hypothesis (H3) has been accepted. Hence, it can be inferred that resilient SMEs perform well concerning financial (H3a), operational (H3b), and market performance (H3c). Moreover, resilient SMEs tend to be flexible and adapt to changes,

which is why these enterprises perform well during uncertainties. The findings of this study are in line with Liu et al., (2018) and García-Contreras et al., (2021).

As mentioned above, the last two hypotheses represent indirect relationships. The results of indirect paths are displayed in table 8, wherein H₄ represents the mediation of financial resilience between financial literacy and three aspects of Performance, namely financial, operational and market, represented by H_{4a}, H_{4b} and H_{4c}. According to Resource Based theory, firm-specific distinct resources, i.e., inimitable and not easily transferable, help organizations gain competitive advantage (Barney et al., 2001). Financial literacy has been taken as a distinct Resource. A financially literate owner-manager makes his SMEs resilient with prudent decisions, and resilient SMEs perform well during the crisis. Lastly, H₅ represents the mediating role of financial resilience in the relationship between financial inclusion and three-dimensional performance (i.e., financial, operational and market performance). As per statistics available in table 8, H₅ is supported. Hence it can be stated that owner-managers financial literacy makes SMEs financially resilient during times of crisis. Overall, the Findings are valuable and significantly contribute to RBV.

5. CONCLUSION

This research attempted to explain the role of SME resources in sustaining their Performance under the mediating role of financial resilience. The target population was SMEs working in Pakistan. The data was collected from 710 SME owner-managers, mainly from Punjab and Khyber Pakhtunkhwa divisions. Based on the resource-resilience-performance framework, this study concluded that resources build resilience, leading to sustaining SME performance. The findings broaden the understanding of crucial resources and their role in Performance during uncertain times.

5.1 Implication

Theoretically, this study used a resource-resilience-performance framework under the resource-based theory, particularly for the SME sector in Pakistan. This framework enhanced the understanding of how SMEs' resources contribute to sustaining their Performance during economic downturns. It has diverted attention toward human-related resources such as financial literacy (ability) and financial inclusion (strategy) that bring a competitive advantage. Furthermore, it used three-dimensional performance measures, i.e., financial, operational and market Performance, to capture internal and external in addition to financial and non-financial aspects extending the work of Wang and Wang (2012). However, on a practical note, this study guides owner-managers to use banking services, especially for the transfer of payment and access to debt finance. It would be beneficial, particularly during economic downturns.

Moreover, the policymakers (i.e., SMEDA) may protect SMEs from the crisis by initiating financial literacy programs. Such programs may be directed to those owner-managers who are financially illiterate. Indeed, these programs would help minimize Pakistan's business failure rate.

5.2 Limitations and Future Direction

This study contains some limitations. Firstly, it has provided a snapshot of SMEs during the third phase of the COVID-19 pandemic. Future research may take longitudinal data for a deeper understanding of the phenomena. Secondly, it has collected data from Pakistani SMEs only. Another study in future may be directed to other developing countries, and a comparison can be made with respect to Pakistan. Thirdly, this study has highlighted the role of financial resilience; however, the order dimension, such as cognitive resilience, has been ignored. Lastly, it used non-probability sampling techniques as SMEs are unregistered, and an updated list does exist (Khalique et al., 2015). Future efforts may be made to prepare an updated list and use probability sampling for generalizable findings.

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Table A-1 Scale Items

Constructs	Items	Source
Financial Performance	"Average return on investment of my business is better than key competitors."	Wang & Wang (2012), Gunday et al., (2011)
	"Average profit of my business is better than key competitors."	
	"Profit growth of my business is better than key competitors."	
	"Average return on sales of my business is better than key competitors."	
	"My business's average cashflows is better compared to key competitors."	
Operational Performance	"Quality development of my business is better compared to key competitors."	Gunday et al., (2011), Wang & Wang (2012)
	"Cost management of my business is better compared to key competitors."	
	"Responsiveness of my business is better as compared to key competitors."	
	"Productivity of my business is better as compared to key competitors."	
Market Performance	"My business satisfies its customers better as compared to key competitors."	Gunday et al. (2011)
	"The total sales of my business is better compared to key competitors."	
	"My business's market share is better than key competitors."	
	"Growth in sales of my business is better than key competitors."	
	"Value Creation of my business is better than key competitors."	

Constructs	Items	Source
Financial Literacy	"Suppose you had Rs.10000 in a savings account, and the interest rate was 2% per year. After five years, how much do you think you would have in the account if you left the money to grow?" "Imagine that the interest rate on your savings account was 1% per year and inflation was 2% per year. After one year, how much would you be able to buy with the money in this account?" "Please tell me whether this statement is true or false. "Buying a single company's stock usually provides a safer return than a stock mutual fund." "If interest rates rise, what will typically happen to bond prices?" "A 15-year mortgage typically requires higher monthly payments than a 30-year mortgage, but the total interest paid over the life of the loan will be less."	Lusardi & Mitchell (2011)
Financial Inclusion	 "I do have a bank account." No. of times I access my bank account in a month "I use my bank account for receipts and payments." "I use my bank account for savings." "I use my bank account for credit." 	Wafula (2017), Koomson et al. (2020)
Financial Resilience	"My business deals with financial shocks well." "Most of my business's operations are insured against shocks and uncertainties." "My business easily adjusts operating procedures in case of need." "My business can spot opportunities in the operating environment easily."	Salignac et al. (2019)