

Decoding Startup Beginnings: How Founders, Resources, And Ecosystems Interact in the Stand-Up Stage

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Abstract

Purpose: This study examines how entrepreneurial profiles, resources, and ecosystem support interact to shape the sustainability and growth of incubator-based stand-up stage of the startups. The fragile phase when ventures move from concept to operational reality. Drawing on the Resource-Based View (RBV), this study investigates how internal resources, and external institutional conditions jointly influence early-stage performance. By bridging micro-level entrepreneurial characteristics (skills, mindset, leadership, experience) with meso-level ecosystem supports (incubator infrastructure and services), the study reveals how individual capabilities, and contextual factors combine to determine sustainable startup trajectories.

Design/methodology/approach – A quantitative research design was applied using stratified probability sampling to ensure representation across stand-up stage ventures in incubators. Data were collected from 302 founders and co-founders via structured surveys. Descriptive statistics, correlation analysis, and regression modelling were used to assess the effects of entrepreneurial, resource, and ecosystem factors.

Findings – Entrepreneurial Ability ($\beta = 0.32$, $p < 0.001$) found a strongest predictor of stand-up stage performance, followed by Entrepreneurial Philosophy ($\beta = 0.18$, $p < 0.01$) and Basic Infrastructure ($\beta = 0.15$, $p < 0.01$). Entrepreneurial Leadership, Human

Resources, and Training & Capacity Building also showed positive and significant associations ($p < 0.05$). Other factors, including Entrepreneurial Experience, Financial Resources, Knowledge Support Systems, Funding & Investment Opportunities, and Business Development Services, had positive but non-significant effects.

Research limitations/implications – The study extends RBV by demonstrating how micro and meso interactions influence stand-up stage outcomes in an emerging economy. The findings are specific to incubator-based startups in Pakistan, pointing to future research on macro-level ecosystem dynamics and cross-country comparisons.

Originality/value – This research identifies the precise skills, resources, and ecosystem supports that matter most in the stand-up stage, offering both theoretical contributions and practical guidance for entrepreneurs, incubator managers, and policy makers aiming to improve early-stage startup survival.

Keywords: Stand-up stage, Incubators, Entrepreneurial profile, Resource-Based View, Startup ecosystems, Early-stage sustainability

Introduction

Startups are widely acknowledged as key drivers of innovation, job creation, and economic dynamism, particularly in developing economies such as Pakistan. A successful startup in its first three years can achieve revenue growth exceeding 60% annually, compared to the 5–10% annual growth typical of private firms in the United States (Davila et al., 2015). Startups play a crucial role in driving economic growth and innovation. For example, a report on the Australian tech startup sector highlighted that, by 2033, this sector could contribute \$109 billion—around 4% of the national GDP—and create approximately 540,000 jobs, underscoring the significant impact of supporting and nurturing early-stage ventures (Davila et al., 2015). Yet despite this potential, early-stage ventures, especially in the stand-up stage, when businesses transition from idea to operation face disproportionately high failure rates.

In Pakistan, stand-up stage ventures encounter a combination of ecosystem gaps, resource constraints, and capability shortfalls. Common barriers include inadequate ecosystem support, scarcity of skilled human capital, and underdeveloped networks—factors that directly hinder early-stage performance (Donaldson et al., 2025). Addressing these challenges requires understanding not only *what* resources and supports are available but also *which one's matter most* at this specific stage of development.

Prior studies show that access to support systems alone is insufficient for success; entrepreneurs, incubator managers, and ecosystem actors must also know which skills, resources, and linkages are critical for a given stage of the entrepreneurial journey (Healy et al., 2024). Evidence highlights three broad, interdependent dimensions: First is micro-level entrepreneurial characteristics, such as resilience, adaptability, leadership, and a growth-oriented mindset (Stephens & Lyons, 2023). Second one is internal resource availability, including financial, human, and knowledge-based capital and the third one is meso-level ecosystem support, such as incubators, mentors, policy frameworks, and networking opportunities (Isenberg, 2010a; Mason & Brown, 2014).

Recent scholarship emphasizes that entrepreneurial ecosystems achieve the greatest impact when they foster both the *quantity* of ventures and the *quality* of entrepreneurial capabilities (Audretsch et al., 2024a). Business incubators are particularly relevant to the stand-up stage, providing structured support like workspace, mentorship, investor access, and capacity-building programs (Pauwels et al., 2016). Raza et al. (2024) reveals that businesses face diverse obstacles, which fall under several themes: market challenges, financial constraints, human capital shortages, institutional and socio-cultural barriers, as well as technological and infrastructural limitations. In emerging economies with institutional voids, such as Pakistan, these supports can bridge capability gaps and help ventures navigate uncertainty.

However, global evidence on incubator impact is mixed. Some studies confirm their positive role in improving startup survival and growth (Hackett & Dilts, 2004b; Lukeš et al., 2019; Schwartz & Hornych, 2008) while others question their long-term value (Pena, 2004; Schwartz, 2013; Schwartz & Hornych, 2008). Moreover, in Pakistan, the role of incubators in enabling stand-up stage sustainability remains underexplored. While research in developed contexts often integrates founder traits, resource mobilization, and ecosystem linkages, empirical work in emerging economies rarely examines these factors together, despite their interconnectedness and importance for achieving the UN SDGs (Audretsch et al., 2024a).

Research gap and significance: Although prior studies have examined entrepreneurial traits, resources, and ecosystem support, most treat these factors separately and focus on later venture stages or developed economies. Very limited empirical evidence explains how founder capabilities, internal resources, and incubator support jointly shape startup sustainability during the stand-up stage—particularly in emerging contexts such as Pakistan. This lack of integrated, stage-specific insight leaves a critical gap in understanding what truly drives early startup survival and growth, which this study aims to address.

Aim and contribution: Based on the RBV, this study investigates how micro-level entrepreneurial characteristics interact with meso-level ecosystem supports to shape early-stage outcomes in incubator-based startups. It makes three key contributions: First is stand-up stage focus, concentrates exclusively on the incubation or stand-up stage of the entrepreneurial journey, identifying stage-specific success factors. Secondly, critical factor identification, reveals the most essential entrepreneurial skills, personal resources, and ecosystem supports required for stand-up stage sustainability. Finally, RBV extension it extends RBV theory by demonstrating how micro–meso level interactions influence early-stage performance in an emerging economy context.

By addressing these points, this research offers actionable insights for entrepreneurs, incubator managers, policymakers and field practitioners to design targeted programs that strengthen founder–resource–ecosystem alignment—helping startups not just start but sustain and thrive.

2.1 Theoretical Foundation

Entrepreneurship research increasingly recognizes that the success of early-stage ventures depends on both the internal resources of the firm and the external ecosystem in which it operates. This study draws on two complementary theoretical perspectives:

the Resource-Based View (RBV) (Barney, 1991; Wernerfelt, 1984) and Entrepreneurial Ecosystem Theory (Isenberg, 2010b; Moore, 1993).

The RBV suggests that a firm's performance is determined by its ability to develop and deploy resources that are valuable, rare, inimitable, and non-substitutable (VRIN) (Barney, 1991). In the context of early-stage ventures, these resources include tangible assets such as financial capital and infrastructure, as well as intangible assets such as entrepreneurial skills, managerial experience, and social and professional networks (Man et al., 2002). Startups often face resource constraints, particularly in emerging economies where institutional support may be limited, and their ability to leverage scarce resources strategically can determine their survival and growth trajectory (Khanna & Palepu, 2010).

Complementing RBV, Entrepreneurial Ecosystem Theory emphasizes the relational and institutional context in which entrepreneurship occurs. Ecosystems comprise interconnected actors, institutions, market conditions, and cultural norms that collectively enable or constrain entrepreneurial activity (Isenberg, 2010b; Stam, 2015). At the micro-level, individual entrepreneurs must possess capabilities such as opportunity recognition, strategic planning, adaptability, and resilience. At the meso-level, incubators, accelerators, mentorship programs, and supportive policies provide structural and relational scaffolding that allows nascent ventures to overcome resource limitations (Autio et al., 2014; Nordling, 2019).

The combination of these perspectives provides a holistic framework for examining early-stage entrepreneurship. RBV focuses on the internal resources that a venture controls, whereas ecosystem theory highlights the external supports and interactions that influence outcomes. This dual lens is particularly relevant in the stand-up and incubation stages, where startups are highly vulnerable and the alignment between individual capability and ecosystem support is crucial for survival and early growth (Stam & Van de Ven, 2021).

2.2 Entrepreneur Profile and Early-Stage Success

The entrepreneur's profile has consistently emerged as a determinant of startup performance. Entrepreneurial capabilities include leadership, managerial expertise, technical knowledge, prior entrepreneurial experience, resilience, and the ability to mobilize networks (Spigel, 2022). During the stand-up stage, these attributes are critical because entrepreneurs must identify opportunities, secure resources, and navigate uncertainty (Lichtenstein & Lyons, 2001). Bittencourt et al. (2025) found that perseverance—continuing despite difficulties—has a stronger link to entrepreneurial orientation than passion. In simple terms, persistence plays a bigger role in shaping an entrepreneurial mindset than just being passionate. It also showed that new entrepreneurs tend to have less perseverance than those who are already established.

Leadership skills are particularly significant. Entrepreneurs with a strategic vision, adaptability, and resilience are better able to guide teams, attract investors, and establish legitimacy in the market (Sevilla-Bernardo et al., 2022). Leadership also enables founders to manage risk, pivot when necessary, and align the team around common goals, which is critical in the dynamic conditions of early-stage ventures.

Prior entrepreneurial experience plays an important role in shaping outcomes. While researcher still debate how strongly it influences entrepreneurial performance. Our meta-analysis reflects that such a experience is positively and significantly linked to better performance of the startup (Peng et al., 2020). Founder with prior startup experience is generally better at foreseeing challenges, sporting market opportunities, and making use of their network compared to those whose background is limited to management role or industry (Paik, 2014; Peng et al., 2020). Such a experience helps entrepreneur acquire and use resources more strategically, which in turn improve their chances of survival and support foster growth (Boso et al., 2019).

Trait like resilience, adaptability and a willingness to take risks play an important role in incubation stage success. In many emerging economies where institutional support is often unreliable these qualities can matter even more than formal education or technical know-how (Klyver & Foley, 2012). In addition informal networks such as local communities' connections and peer entrepreneurs offer a valuable knowledge, guidance and access to resources that strengthen and complement formal skills and experience. Kozachenko (2025) revealed that how effectuation theory works in a new context by testing its core ideas and examining how both effectuation and causation influence the performance of small and medium-sized enterprises (SMEs). It also extends upper-echelons theory (UET) by showing that a CEO's tenure (how long they've been in the role) changes the strength of the link between these strategies and SME performance. Overall, the research provides a framework to understand how leaders' personal characteristics can shape business strategies and outcomes.

Although entrepreneurial traits are important, many studies look at them in isolation and overlook how they interact with ecosystem support. For instance, even a highly skilled founder may struggle to grow their venture without access to mentorship, funding, or knowledge networks. On the other hand, strong ecosystem support can enhance the effect of an entrepreneur's abilities by providing resources, lowering uncertainty, and encouraging innovation (Hubner et al., 2022). This study aims to fill this gap by exploring how entrepreneurial traits and ecosystem support work together to influence incubation performance.

2.3 Resource Access in the Incubation Stage

Having access to resources is crucial for a startup's survival and growth, but early-stage ventures often face significant limitations. Financial resources, such as seed funding, equity investments, grants, and low-interest loans allow startups to cover operating costs, hire talented staff, and develop their products (Cooper et al., 1994; Telnova et al., 2022). Studies indicate that startups with better access to funding are more likely to survive the critical early stages and successfully scale their operations (Pergelova & Angulo-Ruiz, 2014). The researcher also examined how rural Pukhtoon women in KP engage in the creative industry. It found this sector to be informal, low-cost, and flexible, making it easier for them to start and manage businesses. This approach provides a convenient way for women to pursue entrepreneurship within their cultural and institutional setting (Haram et al., 2025)

Human capital is also equally important. Founders who work with co-founders or early employees possessing complementary skills can improve efficiency, drive innovation, and respond more effectively to market demands (Marvel et al., 2016). Teams with a mix of skills and experience are also better positioned to spot opportunities and manage the risks that come with early-stage ventures (Sevilla-Bernardo et al., 2022). Financial inclusion supports entrepreneurial activity, but its benefits are greater for those with less formal education. Highly educated individuals and those with strong self-confidence rely less on financial inclusion to start businesses. These findings remain consistent across different measures of skills and methods (Pham et al., 2025).

In emerging markets, gaps in institutions often make it hard for startups to access both financial and human resources (Khanna & Palepu, 2010). In this context, incubators and accelerators play a crucial role. They offer structured support such as workspace, funding opportunities, mentorship, training, and connections to investors (Del Sarto et al., 2023; Hallen et al., 2020; Woolley & MacGregor, 2022). By bringing these resources together in an organized way, incubators and accelerators help reduce failure rates, improve learning, and speed up growth.”

Knowledge resources such as technical advice, market insights, and legal guidance, are often vital for early-stage startups. Programs that connect entrepreneurs with experts in areas like intellectual property, accounting, and regulatory compliance help strengthen their capabilities and reduce operational risks (Brown & Mawson, 2013; Cerver-Romero et al., 2022; Mason & Brown, 2014). Identifying which types of resources are most effective during the stand-up stage is still an important area for research.

2.4 Ecosystem Support and Micro–Meso Interaction

Entrepreneurial ecosystems are made up of formal institutions, market players, and cultural norms that together influence the environment for new ventures (Mason & Brown, 2014). Support from these ecosystems is especially important during the incubation stage, when startups face high uncertainty and limited resources. This support can take many forms, including mentorship programs, business development services, networking events, policy incentives, and help with securing investment (Bergek & Norrman, 2008; Srivastava & Pandita, 2025). The findings show that core challenges like market fragmentation, technical complexity, and revenue models act as root causes that influence other issues startups face. For startups, addressing these root challenges early is critical to building sustainable business models (Alomar & Alatawi, 2025). By tackling them, startups can more effectively manage secondary challenges such as user adoption, infrastructure, and ethical considerations, thereby increasing their chances of long-term survival and growth. Practical, experiential support has a significant impact on startup performance and sustainability, while informational support enhances outcomes when firms actively adopt entrepreneurial strategies, underscoring the importance of targeted external support for long-term survival (Jalali, 2025).

However, ecosystem effectiveness depends on the entrepreneur’s ability to leverage it, highlighting the importance of micro–meso interactions. Highly capable founders who actively engage with mentors, participate in knowledge-sharing events, and access

investor networks are more likely to transform early-stage ventures into scalable businesses (Isenberg, 2010a; Roundy et al., 2017). Incubators and accelerators exemplify structured ecosystem support, combining infrastructure with advisory services and investment facilitation, and enabling the development of social and relational capital (Del Sarto et al., 2023; Van Rijnsouwer, 2020).

Knowledge support systems, such as case studies, competitions, and training programs, further enhance entrepreneurial capabilities by providing practical guidance, fostering innovation, and reinforcing legitimacy in local markets (Jonek-Kowalska & Wolniak, 2021). Collectively, these supports illustrate how ecosystem factors interact with entrepreneurial profiles and resource access to influence early-stage performance.

2.5 Hypotheses Development

Building on the RBV and ecosystem perspectives, and addressing gaps in prior research, this study proposes the following hypotheses:

H 1-4: An entrepreneur's profile (ability, philosophy, leadership, and experience) has a positive and significant effect on early-stage (stand-up/incubation) startup performance.

H 5-6: Access to entrepreneurial resources (human and financial) positively influences startup performance in the stand-up stage.

H 7-11: Ecosystem support (infrastructure, mentorship, knowledge, investment opportunities, and business development services) positively affects early-stage startup performance.

These hypotheses provide a structured framework for investigating the interplay between individual capabilities, resource availability, and ecosystem support in shaping early-stage startup outcomes (Autio & Rannikko, 2016; Pardo-del-Val et al., 2025). Empirical testing of these relationships will offer theoretical contributions to RBV and ecosystem theory while providing practical guidance for incubators, policymakers, and investors.

3.1 Research Design and Approach

This study adopts a quantitative research approach to examine the relationship between entrepreneur profile, resource access, and ecosystem support with startup sustainability, particularly focusing on the standup stage of startups. Quantitative methodology was selected because it allows precise measurement of variables, generalizability of findings, and rigorous statistical analysis. The study is cross-sectional, covering data collected from April 2024 to April 2025. Although startups operate across multiple stages, standup, startup, and scaleup. This research primarily emphasizes the standup stage, representing the earliest phase in the entrepreneurial journey where the founder is actively refining ideas, validating products, assembling a team, and seeking initial investment. The conceptual framework is reflected in Figure 1.



Figure 1. Conceptual Framework of the study

Source (s): authors' own work.

3.2 Target Population and Sampling Strategy

The target population for this study consisted of 2,900 startups reported in the PIDE (Pakistan Institute of Development Economics) 2024 report, all of which were supported by incubators across Pakistan (Wahid & Khalid, n.d.). These startups span a diverse array of industries and represent innovation-driven ventures at various stages of development. This study focuses on startups at the stand-up stage, where founders are in the very early phase of the entrepreneurial lifecycle. At this point, they are busy

refining their business ideas, testing their products or solutions, and setting up initial operations and team structures. Examining this stage is especially important for understanding entrepreneurial potential, resource requirements, and the early challenges of launching a venture.

All 302 participating startups were considered stand-up stage ventures, since every startup passes through this initial phase, making further categorization unnecessary. Focusing on this stage allowed for a detailed exploration of the foundational traits, skills, and challenges faced by early-stage founders. By concentrating on this formative period, the study provides insights into the human capital, entrepreneurial experience, and resource needs that shape early venture development. These findings highlight the essential capabilities required to validate ideas, build initial teams, and establish operational structures. Understanding these early-stage dynamics is crucial, as they directly affect a startup's ability to grow and achieve long-term sustainability. The analysis also emphasizes the role of targeted support, mentorship, and ecosystem resources in enabling successful early-stage entrepreneurial activity. Overall, this approach offers a comprehensive perspective on the factors that drive founder effectiveness and venture resilience at the stand-up stage.

3.2.1 Sample Description

This study focuses specifically on startups at the stand-up stage, which represents the earliest phase of the entrepreneurial lifecycle. At this stage, founders are busy refining their business ideas, testing innovative solutions, building initial teams, and seeking early-stage funding. To ensure a representative and reliable sample, a probability-based stratified sampling method was used. Stratification helped account for differences in startup availability and improved the accuracy of analyses focused on this particular stage.

A total of 640 founders were initially contacted through incubator networks across Pakistan to gather insights from those navigating early-stage entrepreneurial challenges. Of these, 302 founders responded, resulting in a response rate of 47.19%. For this study, all 302 respondents were considered to be at the stand-up stage, allowing for a focused examination of the key traits, skills, and challenges of early-stage entrepreneurs. This approach provided a comprehensive view of the stand-up stage ecosystem while maintaining methodological rigor.

The demographic profile of stand-up stage founders showed several notable trends. The sample was largely male, with 72% men and 28% women, reflecting a male-dominated early-stage entrepreneurial landscape in Pakistan. Most founders (63%) were between 20 and 30 years old, highlighting the strong presence of young adults in launching innovative ventures. Educational levels were relatively high, with 61% holding a bachelor's degree or higher, suggesting that formal education contributes important cognitive and technical skills for early-stage business development. Additionally, the majority of founders (73%) reported having 1–5 years of entrepreneurial experience, indicating a mix of initial exposure and growing practical expertise during this formative phase.

Table 1. Descriptive Statistics of Study Variables (N = 302)

Variable	Min	Max	Mean	SD	Skewness	Kurtosis
Gender	0	1	0.72	0.45	-0.98	-1.05
Age	0	3	0.42	0.77	1.71	1.89
Education	0	2	1.13	0.68	-0.17	-0.83
Experience	0	3	0.55	1.01	1.61	1.07
Business Stage	1	3	1.85	0.68	0.19	-0.83

Note. Gender coded as 0 = Female, 1 = Male; Age coded as 0 = <25, 1 = 26–35, 2 = 36–45, 3 = >45; Education coded as 0 = High school, 1 = Bachelor, 2 = Master/above; Experience coded as 0 = None, 1 = 1–3 years, 2 = 4–6 years, 3 = >6 years; Business stage coded as 1 = Start-up, 2 = Growth, 3 = Maturity.

Source (s): Authors' own work.

Correlation analyses within this standup-stage sample underscored meaningful relationships between key founder characteristics. Age showed a moderate positive correlation with education ($r = .494$, $p < 0.01$), indicating that slightly older founders tended to have higher educational attainment, which may enhance their capacity to navigate early-stage uncertainties. A strong positive correlation was observed between age and entrepreneurial experience ($r = .793$, $p < 0.01$), suggesting that maturity contributes to accumulated skills, knowledge, and resourcefulness. Education also exhibited a moderate positive correlation with entrepreneurial experience ($r = .484$, $p < 0.01$), reinforcing the notion that formal education supports the development of practical entrepreneurial competencies, even at this early stage. Gender showed weak positive correlations with age, education, and experience, indicating minimal differences in characteristics between male and female founders at the standup stage.

Overall, the data indicate that founders at the standup stage are generally young, relatively educated, and in the process of building practical entrepreneurial experience. These characteristics are essential for the formation and initial sustainability of startups, as they influence the founder's ability to conceptualize business ideas, mobilize resources, and navigate the uncertainties inherent to early-stage ventures. By concentrating solely on stand-up stage startups, this study offers a detailed look at the human capital and core capabilities that drive early entrepreneurial activity, providing valuable insights for incubators, policymakers, and ecosystem stakeholders aiming to support and grow emerging ventures.

Table 2. Correlations Among Study Variables (N = 302)

Variable	1	2	3	4	5
1. Gender	1				
2. Age	.134*	1			
3. Education	-.019	.494**	1		

4. Experience	.146*	.793**	.484**	1
5. Business Stage	.047	.254**	.289**	.291** 1

*Note. Gender coded as 0 = Female, 1 = Male.

*p < .05, *p < .01 (2-tailed).

Source (s): Authors' own work.

3.4 Data Collection Instruments

Data were collected using a structured survey questionnaire, which was developed by adapting established, empirically validated measurement instruments to ensure both content validity and reliability. The Entrepreneur Profile construct was adapted from (Kim et al., 2018) and measured across four dimensions, entrepreneurial ability, entrepreneurial philosophy, leadership skills, and prior experience with five items per dimension, totalling 20 items. Personal Resources, covering human and financial capital, were measured using scales adapted from (Stam, 2015), with five items for each subdimension (10 items in total). Startup Ecosystem Support was assessed based on frameworks from (Stam & Van de Ven, 2021) and (Đaković Radojičić et al., 2022), capturing five key areas: basic infrastructure, training and capacity building, knowledge support systems, funding and investment opportunities, and business development services. Overall, the survey included 62 items, all standardized using binary (0/1) coding to ensure consistency and facilitate statistical analysis. This design allowed for a thorough, multidimensional evaluation of founder traits, available resources, and ecosystem support factors during the early stages of venture development.

3.6 Analytical Techniques

The study used a rigorous quantitative approach to explore the relationships among key variables in stand-up stage startups. Descriptive statistics, including means, standard deviations, and frequency distributions, were first used to summarize the demographic characteristics and entrepreneurial traits of the sample. Correlation analysis was then performed to examine the relationships among founder characteristics such as age, gender, education, and prior entrepreneurial experience. To identify the most significant predictors of sustainability at the stand-up stage, logistic regression analysis was applied, allowing for the simultaneous assessment of multiple independent variables and their impact on early-stage venture viability. This analytical framework provided a solid foundation for understanding how human capital, personal resources, and ecosystem support interact to influence outcomes during the formative phase of business creation. The results offer targeted insights for incubators, accelerators, and policymakers, providing evidence-based guidance to strengthen entrepreneurial capabilities and improve the survival prospects of ventures at their most vulnerable stage.

The stand-up stage is widely seen as the most formative and strategically critical phase in a startup's journey, often shaping its future success or failure. During this period, founders focus on refining and validating their ideas, securing essential resources, and

navigating the uncertainties and risks that come with early-stage entrepreneurship. Studying this stage provides a clearer understanding of the key factors that drive long-term sustainability, including human capital, access to financial resources, and engagement with the entrepreneurial ecosystem. Decisions and experiences at this point not only affect immediate viability but also influence a venture's potential for future growth and scalability. By examining startups at the stand-up stage, this study offers practical insights that can guide targeted support, improve survival rates, strengthen entrepreneurial skills, and lay solid foundations for sustainable business development. This focus ensures that policy recommendations and support programs are aligned with the realities of the most vulnerable, yet opportunity-rich, phase of venture creation. The survey instrument demonstrated strong content validity, achieved by carefully adapting previously validated measurement scales to ensure they were relevant to the context. Reliability was confirmed using Cronbach's alpha for all constructs, with values exceeding the commonly accepted threshold of 0.70, indicating good internal consistency. Probability-based sampling enhanced the external validity and generalizability of the findings, while stratified sampling ensured that the stand-up stage was adequately represented, allowing for precise, context-specific analysis. This study used a quantitative, cross-sectional design to systematically examine the relationships between entrepreneurial profiles, resource accessibility, and ecosystem support in early-stage Pakistani startups. By focusing on the stand-up stage, the methodology provides a detailed understanding of the key factors that shape startup trajectories. The combination of ethical rigor, robust statistical analysis, and a well-structured survey framework generates evidence-based insights that can guide targeted interventions to improve the sustainability and growth potential of emerging ventures

Research Findings

Table 3 shows the standardized beta coefficients, p-values, and key dimensions for all predictors of stand-up stage performance. Entrepreneurial ability ($\beta = 0.32$, $p < 0.001$) emerged as the strongest predictor, underscoring its major impact on early-stage success. This construct includes three important dimensions: opportunity recognition, resource mobilization, and strategic adaptability. Opportunity recognition helps founders identify market gaps and generate viable business ideas. Resource mobilization reflects the ability to effectively leverage financial, human, and social capital, while strategic adaptability allows entrepreneurs to adjust their business models in response to changing market conditions. The significant effect of entrepreneurial ability suggests that founders who perform well across these areas are better equipped to navigate uncertainties, make the most of limited resources, and build sustainable operations. This result supports H1 and aligns with previous research highlighting that cognitive skills and practical execution are crucial for early-stage startup success. Entrepreneurial philosophy ($\beta = 0.18$, $p < 0.01$) was the second strongest predictor, supporting H2. Its three key dimensions—perseverance and resilience, ethical and socially responsible orientation, and long-term vision—help explain its influence on stand-up stage performance. Perseverance enables founders to keep working steadily despite setbacks, while resilience helps them recover from failures. An ethical and

socially responsible approach builds stakeholder trust and strengthens ecosystem support. A long-term vision keeps founders focused on strategic goals even in the face of short-term challenges. The beta value of 0.18 indicates that strengthening these dimensions can meaningfully enhance early-stage success, highlighting the importance of guiding principles and values in achieving sustainable entrepreneurial outcomes.

Basic infrastructure ($\beta = 0.15$, $p < 0.01$) also had a significant impact, supporting H7. This factor encompasses physical infrastructure, digital connectivity, and institutional support facilities. Physical infrastructure such as office space, utilities, and meeting rooms—helps reduce operational bottlenecks and overhead costs. Digital connectivity, including high-speed internet and IT tools, facilitates efficient communication, research, and digital operations. Institutional support facilities, like incubator resources, networking spaces, and administrative assistance, provide both practical and strategic support. The positive effect of infrastructure highlights that operational readiness, supportive environments, and stakeholder credibility are essential for turning entrepreneurial vision into concrete results.

Entrepreneurial leadership skills ($\beta = 0.14$, $p < 0.05$) showed a positive impact, confirming H3. Its dimensions visionary leadership, team alignment, and conflict management highlight the importance of motivating teams, delegating responsibilities effectively, and maintaining cohesion in high-pressure environments. Strong leadership transforms entrepreneurial ability into coordinated action, ensuring that strategic priorities are pursued efficiently. Human resources ($\beta = 0.13$, $p < 0.05$), comprising team talent, diversity, and cohesion, are also critical. Talented and diverse teams foster innovation, while cohesion enables smooth collaboration and decision-making, amplifying operational effectiveness. Training and capacity building ($\beta = 0.13$, $p < 0.05$), including technical skills, soft skills, and mentorship, further enhance team performance, enabling members to address evolving challenges and leverage external expertise effectively. These results confirm H5 and H8, highlighting the centrality of human capital in early-stage sustainability.

Entrepreneurial experience ($\beta = 0.08$, $p = 0.12$), financial resources ($\beta = 0.07$, $p = 0.15$), knowledge support systems ($\beta = 0.06$, $p = 0.18$), funding and investment opportunities ($\beta = 0.05$, $p = 0.20$), and business development services ($\beta = 0.04$, $p = 0.25$) demonstrated positive but non-significant effects, offering no empirical support for H4, H6, H9, H10, and H11. While experience encompasses strategic decision-making, resource management, and regulatory knowledge, and financial resources include capital availability, diversification, and budgeting expertise, these factors did not significantly impact stand-up performance. Similarly, knowledge support systems (industry case studies, market intelligence, idea contests), funding opportunities (angel investors, venture funds, incubation financing), and business development services (legal, technical, accounting, supply chain support) are important enablers, but their effects are latent in the early stage. These findings suggest that early-stage performance is driven more strongly by human capital and infrastructure than by material or financial resources alone.

Overall, the findings reveal that human capital factors, entrepreneurial ability, philosophy, leadership, team quality, and training, combined with basic infrastructure,

are decisive for stand-up stage performance. The normalized beta values demonstrate that ability (0.32) exerts the strongest effect, followed by philosophy (0.18), infrastructure (0.15), leadership (0.14), human resources (0.13), and training (0.13). Material resources, knowledge support, and funding opportunities act as supportive enablers rather than primary drivers at this stage. These findings highlight the importance of ecosystem interventions that focus on building entrepreneurial skills, strengthening leadership, fostering team cohesion, and improving operational infrastructure to boost resilience and sustainability in the early stages of a startup.”

Table 3. Standardized Regression Coefficients and Dimensions of Predictors for Stand-up Stage Performance

Variable	β (Standardized)	p-value	Dimensions	Significance
Entrepreneurial Ability	0.32	<0.001	Opportunity recognition, Resource mobilization, Strategic adaptability	Significant
Entrepreneurial Philosophy	0.18	<0.01	Perseverance & resilience, Ethical orientation, Long-term vision	Significant
Basic Infrastructure	0.15	<0.01	Physical infrastructure, Digital connectivity, Institutional support	Significant
Entrepreneurial Leadership Skills	0.14	<0.05	Visionary leadership, Team alignment, Conflict management	Significant
Human Resources	0.13	<0.05	Team talent, Diversity, Cohesion	Significant
Training & Capacity Building	0.13	<0.05	Technical skills, Soft skills, Mentorship	Significant
Entrepreneurial Experience	0.08	0.12	Strategic decision-making, Resource management, Compliance	Non-significant
Financial Resources	0.07	0.15	Capital availability, Diversification, Budgeting expertise	Non-significant
Knowledge Support System	0.06	0.18	Industry case studies, Market intelligence, Idea contests	Non-significant
Funding & Investment Opportunities	0.05	0.20	Angel investors, Venture funds, Incubation financing	Non-significant

Business Development Services	0.04	0.25	Legal support, technical support, Accounting, Supply chain	Non-significant
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Source (s): Authors' own work.

Discussion

The findings of this study highlight the critical role of entrepreneurial human capital and ecosystem support in shaping the sustainability of startups during the stand-up stage (Audretsch et al., 2024b). Consistent with the Resource-Based View (RBV), an entrepreneur's capabilities, philosophy, and leadership represent key intangible resources that transform available inputs into tangible outcomes. Entrepreneurial ability emerged as the strongest predictor of stand-up stage performance ($\beta = 0.32, p < 0.001$), emphasizing the importance of opportunity recognition, strategic decision-making, and adaptive problem-solving for early-stage success. These results align with previous research showing that founders' cognitive and practical skills are essential for navigating high uncertainty, leveraging limited resources, and responding effectively to dynamic market conditions (Braun & Suoranta, 2025). Overall, the study reaffirms that in nascent ventures, human capital often plays a more decisive role than material or financial resources in determining early survival and growth.

Entrepreneurial philosophy also showed a significant positive effect ($\beta = 0.18, p < 0.01$), highlighting how founders' values, beliefs, and guiding principles influence strategic and operational decisions. Entrepreneurs who demonstrate perseverance, learn from failure, and act ethically tend to build resilience and earn stakeholder trust - both crucial for early-stage survival. This finding extends the Resource-Based View and entrepreneurial ecosystem frameworks by showing that mindset is not just motivational; it also plays a strategic role, shaping how founders leverage networks, mentorship, and institutional support to overcome resource constraints.

Leadership skills and entrepreneurial experience offer additional nuance. Although prior experience had only a modest direct effect, leadership skills were crucial for promoting team cohesion, aligning organizational efforts with strategic goals, and fostering an innovative culture. This suggests that the impact of experience may depend on strong leadership and the ability to turn prior knowledge into practical, actionable strategies.

Human resources and training and capacity-building initiatives further reinforce the importance of people-centric factors. Teams that are well-trained, cohesive, and equipped with the right skills are better able to execute strategies, tackle operational challenges, and adapt to changing market conditions. Likewise, infrastructure provides essential support—such as reliable office space, connectivity, and operational facilities—allowing entrepreneurial capabilities to translate into concrete results.

Together, these findings suggest a synergistic interaction between human capital and structural resources: the presence of enabling infrastructure amplifies the effectiveness of founder abilities and team skills.

Interestingly, financial resources funding opportunities knowledge support systems, and business development services demonstrated weaker or non-significant effects at this stage. While these resources remain important, their impact appears less immediate during the stand-up phase, indicating that early venture sustainability relies more on strategic application of human and structural resources than on material or knowledge inputs alone. This observation adds depth to RBV and entrepreneurial ecosystem theory, highlighting that not all resources exert equal weight across venture stages. Overall, these results offer both theoretical and practical implications. Theoretically, they reaffirm that entrepreneurial success in early-stage ventures is multidimensional, depending on the interplay of founder capabilities, guiding philosophy, team competencies, and ecosystem infrastructure. Earlier Audretsch et al. (2024b) reveal that the outcome of the entrepreneurial ecosystem is depended on the quality of incubators. Practically, study suggest that incubators, policymakers, and entrepreneurship educators should prioritize interventions that develop entrepreneurial skills, leadership, and adaptive mindsets while ensuring access to enabling environments. Figure 2 illustrates the relative influence of each predictor, showing the clear primacy of entrepreneurial ability and philosophy in shaping stand-up stage outcomes.

Figure 2 (suggested visualization): Bar chart showing β coefficients for each predictor, highlighting significance levels (* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$).

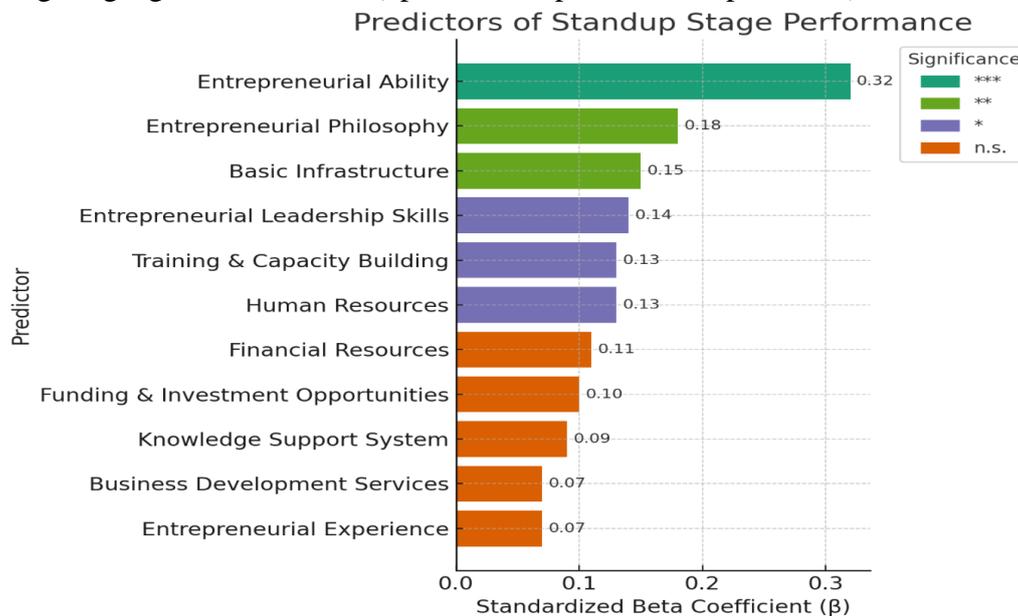


Figure 2. Predictors of standup stage performance

Source (s): Authors' own work.

Conclusion

Policymakers often go to great lengths to support entrepreneurs, new ventures, and local ecosystems through different interventions. Yet, the real challenge lies in assessing

whether these efforts create meaningful impact. Researchers continue to debate how to define the boundaries of entrepreneurial ecosystems, which makes comparisons between them difficult (Hess et al., 2025). Since entrepreneurs and new ventures evolve through different stages, a stage-wise target approach becomes essential, it provides a structured way to determine where these actors belong within the ecosystem and how interventions can be effectively measured and compared.

This study investigated the determinants of startup sustainability during the Standup stage, integrating the entrepreneur's profile, internal resources, and ecosystem support. Using validity and reliability checks, descriptive statistics, correlation analysis, and regression analysis, the findings demonstrate that entrepreneurial characteristics—ability ($\beta = 0.32$, $p < 0.001$), philosophy ($\beta = 0.18$, $p < 0.01$), and leadership skills ($\beta = 0.14$, $p < 0.05$)—are the strongest predictors of early-stage sustainability. Human resources ($\beta = 0.13$, $p < 0.05$), training and capacity-building ($\beta = 0.13$, $p < 0.05$), and basic infrastructure ($\beta = 0.15$, $p < 0.01$) also significantly contribute, while financial resources, knowledge support systems, and business development services showed smaller or non-significant effects. These results highlight the critical importance of micro-level entrepreneurial capabilities and meso-level ecosystem support in fostering early-stage sustainability, emphasizing that human and structural factors often outweigh purely financial or knowledge-based inputs during the initial phase of venture creation.

Key Contributions: The study makes several key contributions. First, it integrates micro- and meso-level perspectives, bridging a gap in the literature by combining entrepreneurial characteristics (ability, philosophy, leadership, experience) with ecosystem factors (infrastructure, training, knowledge systems, business development services, and funding access) to explain sustainability at the Standup stage. Second, it provides a novel, stage-specific focus, unlike prior research that aggregates all venture stages or isolates entrepreneurs from their broader context. Third, it demonstrates the substitutability and complementarity of ecosystem support, showing that deficiencies in one area, such as financial resources, can be offset by mentoring, capacity-building, or infrastructure. Fourth, it offers a holistic, multi-layered framework that integrates internal capabilities, human and structural resources, and institutional support to assess and enhance early-stage startup sustainability in resource-constrained environments (Theodoraki et al., 2022).

Study Implications: These findings have important implications. For startup founders, cultivating entrepreneurial ability, leadership, and philosophy is essential to navigate uncertainty, mobilize resources, and sustain early-stage growth. For incubators and ecosystem managers, emphasizing training, capacity-building, mentoring networks, and operational infrastructure can amplify founder capabilities and compensate for resource gaps (Hackett & Dilts, 2004a).

Recommendation: Policymakers are encouraged to implement stage-sensitive, context-specific interventions that strengthen both human capital and ecosystem facilitation to improve startup success rates (Braun & Suoranta, 2025). Based on these insights, support mechanisms should adopt integrated strategies that enhance micro-level capabilities while providing meso-level infrastructure, mentorship, and operational

support, ensuring that weaknesses in one area can be offset by strengths in another (Huang et al., 2025).

Limitation and Future Direction: Despite its contributions, the study has limitations. It focuses exclusively on the Standup stage and relies on cross-sectional data from 302 founders, limiting generalizability to later venture stages or other regions. Future research should examine macro-level ecosystem dynamics, including regulatory frameworks, political environments, and internationalization opportunities, and explore their interactions with micro- and meso-level factors to develop more effective, stage-specific strategies for sustainable startup development. Overall, this research advances theoretical and practical understanding of early-stage venture sustainability by demonstrating the integrated influence of entrepreneurial capabilities, internal resources, and ecosystem support, offering actionable guidance for founders, incubators, and policymakers seeking to enhance startup success in emerging economies.

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