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When Drive Meets Discrimination: Interactive Effect of Entrepreneurial Motivation and Institutional Voids on Behavior of Transgender Entrepreneurs

Muhammad Saim Imran
Independent Researcher. Email: Saro.imraan@gmail.com

Dr. Arif Ul Haq (Corresponding Author)
Department of Management Sciences, Islamia College, Peshawar
Email: arifulhaq@icp.edu.pk

Dr. Samina Rooh
Department of Management Sciences, University of Buner
saminarooh@ubuner.edu.pk
samina.ali.bangash@gmail.com

Abstract

Entrepreneurship represents a critical avenue for economic empowerment and social participation among marginalized populations. This study investigates the interactive effect of entrepreneurial motivation and institutional voids on entrepreneurial behavior among transgender entrepreneurs in Pakistan. Using lenses of Theory of Planned Behavior and institutional theory, we employed a survey design with a sample of 265 transgender entrepreneurs from three major cities. Confirmatory factor analysis confirmed construct validity, and the results revealed that entrepreneurial motivation significantly predicted entrepreneurial behavior, even after controlling for prior behavior. Findings further demonstrated that both formal institutional voids (i.e., regulatory barriers and financial exclusion) and informal institutional voids (i.e., stigma and social discrimination) significantly weakened the motivation and behavior relationship. General problems faced by entrepreneurs did not exert significant effects. These findings suggest that while motivation is a necessary antecedent of entrepreneurship, supportive institutional environments are essential for its translation into entrepreneurial action. The study contributes to theoretical debates on institutional constraints versus agency in marginalized contexts. It also provides practical insights for policymakers, educators, and advocacy organizations aiming to support transgender entrepreneurship in developing countries.

Keywords: Transgender entrepreneurship, entrepreneurial motivation, institutional voids, Theory of Planned Behavior, Pakistan

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Introduction

Entrepreneurship is a critical avenue for economic empowering and social inclusion. For marginalized populations, it provides an opportunity to build livelihoods despite structural barriers. Transgender entrepreneurs represent one such group, especially in developing countries where formal recognition and societal acceptance remain limited.

Most studies on entrepreneurial motivation are cross-sectional. These designs cannot confirm temporal ordering or causal direction. Meta-analyses and systematic reviews have shown that entrepreneurial motivation, personality traits, and self-efficacy strongly predict entrepreneurial outcomes across contexts (Howard & Boudreaux, 2024). Reviews of entrepreneurship education further demonstrate that training programs increase entrepreneurial intention and confidence, particularly when programs are experiential and sustained over time (Nabi et al., 2017; Martin et al., 2013).

Institutional contexts shape whether motivation translates into entrepreneurial action. Formal voids, such as weak regulations, lack of legal protection, and limited access to finance, act as barriers. Informal voids, such as stigma and cultural exclusion, further restrict opportunity. Reviews confirm that both formal and informal institutions often moderate the effects of individual traits and education on entrepreneurial outcomes (Autio & Rannikko, 2016; Estrin et al., 2013). For transgender entrepreneurs, these voids operate together, creating multiple disadvantages.

In Pakistan, transgender individuals continue to face exclusion from formal financial systems, weak legal protections, and persistent social stigma. Although some policy reforms have been introduced, structural inequalities remain. Understanding how motivation leads to behavior in this environment requires longitudinal methods that capture temporal dynamics and test moderating conditions.

This study addresses this gap by employing a two-wave, time-lagged structural equation modelling design. The design allows for stronger causal inference than cross-sectional studies. It also makes it possible to test how institutional voids weaken or strengthen the path from motivation to behavior. The study contributes in three ways. First, it provides evidence on transgender entrepreneurship in a developing country setting using a longitudinal design. Second, it identifies institutional conditions that limit or enhance the impact of motivation. Third, it offers a methodological model that can inform future research on marginalized entrepreneurship.

Literature Review

Linking theories of motivation and behavior

The Theory of Planned Behavior (TPB) remains a dominant framework to understand how cognitive antecedents shape action. TPB argues that attitudes, subjective norms, and perceived control over behavior shape intentions leading to actual behavior (Ajzen, 1991). Complementary models draw on self-efficacy and social cognitive theory, suggesting that efficacy beliefs drive persistence and action (Bandura, 1986).

Emerging evidence and reviews confirm that entrepreneurial personality traits such as proactivity, risk propensity, and conscientiousness significantly predict entrepreneurial intention and behavior

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across cultural and economic settings (Howard & Boudreaux, 2024). Yet theoretical tension persists. TPB emphasizes proximal cognitive factors, while trait approaches stress distal dispositions. Evidence suggests both matter, but the causal sequencing and mediation remain contested, underscoring the need for temporal research designs (Ajzen, 1991; Howard & Boudreaux, 2024).

Meta-analyses and systematic reviews consistently show that entrepreneurship education improves entrepreneurial human capital, intention, and self-efficacy. Stronger effects occur when programs are experiential, longer in duration, and embedded in context (Martin, McNally, & Kay, 2013; Nabi, Liñán, Fayolle, Krueger, & Walmsley, 2017). However, most studies in these reviews are cross-sectional without longitudinal follow-up (Martin et al., 2013). Scholars repeatedly call for quantitative studies to examine whether increases in motivation actually translate into sustained entrepreneurial behavior (Nabi et al., 2017).

Institutional voids and their implications

Khanna and Palepu (1997) popularized the concept of institutional voids to denote missing or weak market supporting mechanisms in emerging economies. Later work distinguished formal voids (laws, courts, finance) from informal voids (norms, stigma, cultural exclusion), both of which shape entrepreneurial activity (Webb, Khoury, & Hitt, 2020; Mair & Martí, 2009).

A central theoretical tension concerns whether voids only constrain or also enable. Some studies emphasize voids as barriers to growth (Khanna & Palepu, 1997; Webb et al., 2020). Others highlight how voids can generate opportunities for institutional entrepreneurship, bricolage, and social innovation (Mair & Martí, 2009). This debate suggests that institutional voids may act as moderators of the motivation–behavior link, but the direction of their influence is ambiguous.

Effectuation, bricolage, and resourcefulness under constraint

Effectuation theory describes how entrepreneurs act by leveraging available means under uncertainty. Bricolage highlights improvisation and "making do" with constrained resources. Both perspectives suggest that motivated entrepreneurs can still act in voided environments (Sarasvathy, 2001; Baker & Nelson, 2005). Yet this logic conflicts with voids-as-constraints arguments. Empirical testing is therefore needed to examine whether voids weaken or, in some cases, strengthen the effect of motivation on behavior.

2.5 Inclusive, minority, and transgender entrepreneurship

Inclusive entrepreneurship scholarship has expanded significantly. Research stresses the importance of intersectionality, ecosystem inequalities, and policy frameworks in shaping entrepreneurial opportunities (Jennings & Brush, 2013; Verduijn & Essers, 2013). Recent reviews highlight that women, migrants, and LGBT+ entrepreneurs face overlapping structural disadvantages and cultural biases (Jennings et al., 2015).

Studies on LGBT+ entrepreneurship are growing but remain fragmented. Reviews confirm that LGBT+ entrepreneurs experience barriers in accessing finance, building legitimacy, and engaging with mainstream markets (Kidney et al., 2025; Cech & Rothwell, 2020). These barriers are not

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uniform. Gay men and lesbian women often navigate different opportunity structures than transgender entrepreneurs, whose exclusion is more severe due to gender identity stigma (Ljunggren & Alsos, 2006; Hughes et al., 2012).

Transgender entrepreneurship research is still limited. Most work is qualitative, often focused on Western contexts such as North America and Europe (Chaudhry, Ilyas, & Sohail, 2025). Evidence highlights that transgender entrepreneurs often depend on informal networks, self-employment, and necessity-driven businesses because of limited access to wage labor markets (Kidney et. al, 2024). The lack of quantitative and longitudinal studies in developing countries represents a critical gap.

The South Asian and Pakistani context

South Asia presents specific institutional challenges. Patriarchal norms, weak legal protection, and financial exclusion combine to restrict opportunities for transgender individuals. Pakistan's Transgender Persons (Protection of Rights) Act of 2018 provided formal recognition but has not eliminated structural discrimination. Recent field studies highlight continued difficulties in accessing credit, navigating bureaucracy, and overcoming informal stigma (Qadir, Basheer, & Chaudhry, 2024).

This creates a layered institutional environment in which both formal and informal voids interact. For example, even if legal reforms exist, persistent cultural stigma may reduce their effect. Pakistan therefore represents a critical case for testing how motivation translates into behavior under shifting institutional conditions.

From the above discussion, three points emerge. First, evidence from TPB, self-efficacy, and trait-based models confirms the importance of motivation, but most research is cross-sectional (Ajzen, 1991; Bandura, 1986; Howard & Boudreaux, 2024; Martin et al., 2013; Nabi et al., 2017). Second, institutional voids clearly influence entrepreneurship, yet their moderating role remains debated (Khanna & Palepu, 1997; Webb et al., 2020; Mair & Martí, 2009). Third, transgender entrepreneurship in developing countries remains under-researched, with limited quantitative and no longitudinal tests of how institutional voids affect motivation–behavior links (Jennings & Brush, 2013; Chaudhry, Ilyas, & Sohail, 2025; Qadir et al., 2024). This study addresses these gaps by using structural equation modelling.

Synthesis and research framework

Three insights emerge. First, theories such as TPB, self-efficacy, and trait-based approaches confirm the centrality of motivation in shaping entrepreneurial behavior, though most studies are cross-sectional (Ajzen, 1991; Bandura, 1986; Howard & Boudreaux, 2024; Martin et al., 2013; Nabi et al., 2017). Second, institutional voids clearly influence entrepreneurship, yet whether they weaken or enable the motivation–behavior link remains unresolved (Khanna & Palepu, 1997; Webb et al., 2020; Mair & Martí, 2009). Third, transgender entrepreneurship in developing countries remains underexplored, with critical gaps in quantitative research (Jennings & Brush,

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2013; Chaudhry et al., 2025; Qadir et al., 2024). Based on this review, the study builds a conceptual framework (see Exhibit 1) linking entrepreneurial motivation, behavior, and institutional voids.

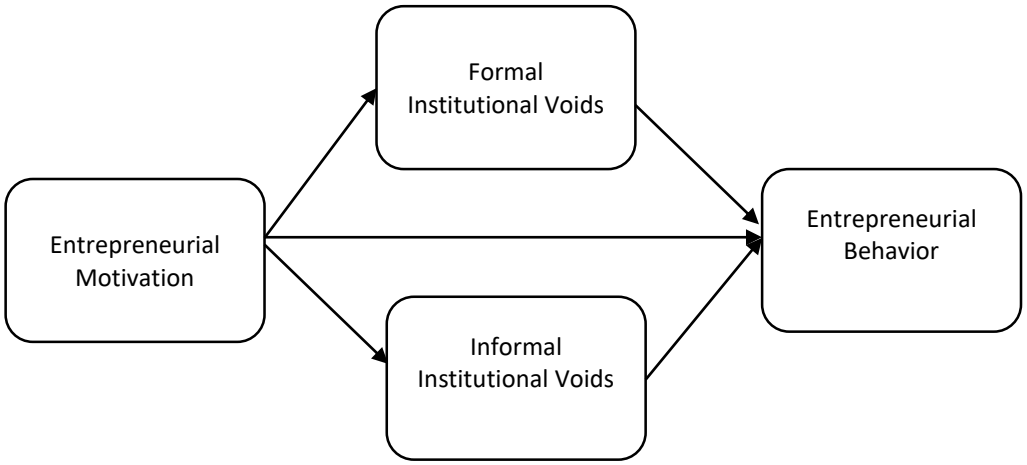

Exhibit 1: Theoretical Framework

Hypotheses Development

H1: Entrepreneurial motivation positively influences entrepreneurial behavior among transgender entrepreneurs.
H2: Formal institutional voids moderate the relationship between entrepreneurial motivation and entrepreneurial behavior, such that the relationship weakens under higher levels of formal voids.
H3: Informal institutional voids moderate the relationship between entrepreneurial motivation and entrepreneurial behavior, such that the relationship weakens under higher levels of informal voids.

Methodology

Research design

This study employed a cross-sectional survey design to examine the relationship between entrepreneurial motivation, institutional voids, and entrepreneurial behavior among transgender entrepreneurs in Pakistan. A cross-sectional approach is suitable for reaching marginalized populations efficiently and reduces risks of attrition common in longitudinal research (Bryman, 2016). While this design does not permit strong causal inference, it provides valid insights into patterns of association in understudied contexts (Rindfleisch et al., 2008).

Sampling and participants

Participants were transgender entrepreneurs operating in Islamabad, Lahore, and Multan. These cities were chosen because they host sizeable transgender communities and diverse entrepreneurial activity.

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A total of 265 questionnaires were distributed across these cities. After removing incomplete responses, 250 usable cases were retained, yielding a response rate of 94%. **250 usable cases** were retained, resulting in a response rate of **94%**. This response rate is considered excellent for survey research and reflects the strong engagement of the target population.

Participants ranged in age from 21 to 49 years (M = 31.7, SD = 6.5). Approximately half had secondary education or less, with the rest completing higher secondary or graduate-level education. The majority operated small-scale service enterprises, such as beauty salons, shops, and performance activities. This sample size exceeds minimum recommendations for structural equation modelling (SEM) (Kline, 2023).

Table 1: Sample Characteristics (N = 250)

Variable	*Category/Range*	*% / Mean (SD)*
Age	21–49 years	M = 31.7, SD = 6.5
Education	Secondary or below	46%
	Higher secondary	32%
	Graduate or above	22%
Business sector	Beauty/Salon services	41%
	Retail/small trade	33%
	Performing arts/entertain.	26%
Business size	Sole proprietorship	87%
	Partnership/other	13%

Note. Percentages rounded to nearest whole number.

Data collection procedure

Data collection was conducted in partnership with local transgender community organizations, Gurus (a respected elderly leader in the transgender community) to ensure accessibility and trust. Participants provided verbal informed consent in Urdu or Punjabi. Trained enumerators administered questionnaires in face-to-face sessions.

Since this is a cross-sectional study, data were collected at a single point in time, and there was no need for an interval between waves. Due to frequent movements of the participants, attrition was highly likely. Confidentiality was maintained by assigning participant codes rather than collecting names. APA standards for ethical safeguards were applied to minimize risks of disclosure and stigmatization as per (Liamputtong, 2006).

Measures

All constructs were measured using multi-item scales adapted from prior validated instruments and contextualized to transgender entrepreneurship in Pakistan. Items were scored on a 7-point Likert scale (1 denoting strong disagreement, 7 denoting strong agreement).

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- Entrepreneurial Motivation (EM): 4 items adapted from push/pull motivation literature (Carsrud & Brännback, 2011). Example: "I started my business to achieve independence." (α = .80).
- Entrepreneurial Behavior (EB): 4 items assessing implementation actions (Ajzen, 1991). Example: "I actively pursued business opportunities in the past months." (α = .86).
- Formal Institutional Voids (FIV): 3 items measuring barriers in legal, financial, and regulatory systems (Khanna & Palepu, 1997). (α = .78).
- Informal Institutional Voids (IFIV): 4 items measuring stigma, exclusion, and cultural discrimination (Webb, Khoury, & Hitt, 2020). (α = .84).
- Problems Faced by Transgender Entrepreneurs (PFTE): 4 items assessing barriers such as finance and customer access. (α = .75).
- Controls: Demographics (age, education, business size).
- Reliability and validity tests confirmed acceptable measurement quality. Table 2 reports Cronbach's alphas, composite reliability, and average variance extracted (AVE).

Table 2: Measurement Properties of Constructs

Construct	*Items*	*Cronbach's α*	*CR*	*AVE*
Entrepreneurial Motivation (EM)	4	0.8	0.82	0.56
Entrepreneurial Behavior (EB)	4	0.86	0.87	0.61
Formal Institutional Voids (FIV)	3	0.78	0.79	0.54
Informal Institutional Voids (IFIV)	4	0.84	0.85	0.59
Problems Faced by Transgender Entrepreneurs (PFTE)	4	0.75	0.77	0.52

Data analysis

Analysis was performed using SEM. The analytic process involved three steps:

1. Measurement validation. CFA established construct validity across both waves. Measurement invariance tests (configural, metric, scalar) were applied to ensure comparability of constructs across time (Little, 2024).
2. Structural model estimation. A cross-lagged panel model (CLPM) estimated whether EM at Time 1 predicted EB at Time 2, controlling for EB at Time 1 (Kline, 2023).
3. Moderation testing. Formal and informal voids were tested as moderators of the EM → EB link using latent moderated structural equations (LMS). LMS is preferred for estimating latent interactions because it avoids biases from product-indicator approaches (Marsh, Wen, & Hau, 2004). Robustness checks included attrition bias tests, common method variance assessments, and alternative estimators.

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Results

Measurement model and validity

CFA was conducted to assess the adequacy of the measurement model. Results indicated acceptable fit, $\chi^2/df = 2.85$, CFI = .92, TLI = .91, RMSEA = .065, SRMR = .048, which met recommended thresholds (Hu & Bentler, 1999). All items loaded significantly on their intended constructs ($\lambda > .60$, $p < .001$). CR exceeded .70, and AVE exceeded .50 for all constructs, supporting convergent validity (Hair, Black, Babin, & Anderson, 2019). Discriminant validity was ensured, as the square root of each variable's AVE was greater than its correlations with other constructs.

Table 3: Confirmatory Factor Analysis (CFA) Model Fit Indices

Model	*χ^2/df*	*CFI*	*TLI*	*RMSEA*	*SRMR*
Measurement model (all constructs)	2.85	0.92	0.91	0.065	0.048

Descriptive statistics and correlations

Descriptive statistics and correlations among constructs are shown in Table 4. Entrepreneurial motivation (EM) correlated positively with entrepreneurial behavior (EB) ($r = .42$, $p < .01$). Both formal institutional voids (FIV) and informal institutional voids (IFIV) correlated negatively with EB ($r = –.21$ and $–.28$, $p < .01$, respectively). Problems faced (PFTE) were moderately correlated with FIV ($r = .35$, $p < .01$).

Table 4: Descriptive Statistics and Correlations

Construct	*M*	*SD*	*1*	*2*	*3*	*4*	*5*
1. EM	4.9	1	—				
2. EB	4.8	1.1	.42**	—			
3. FIV	3.9	1.2	–.18*	–.21**	—		
4. IFIV	4.1	1.2	–.25**	–.28**	.41**	—	
5. PFTE	4.7	1.1	–.20*	–.24**	.35**	.37**	—

Structural model: Direct and interaction effects

A structural model was estimated to examine the relationship between entrepreneurial motivation (EM) and entrepreneurial behavior (EB), and to test the moderating role of institutional voids. The model included controls for age, education, and business size. The model fit was acceptable, $\chi^2/df = 2.95$, CFI = .91, TLI = .90, RMSEA = .068.

Results supported H1. Entrepreneurial motivation had a significant positive direct effect on entrepreneurial behavior ($\beta = .24$, $p < .001$). This indicates a strong concurrent relationship between an individual's drive to entrepreneur and their subsequent actions.

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Problems faced by transgender entrepreneurs (PFTE) did not have a significant direct effect on EB (β = –.06, p = .241).

Moderation analyses

Moderation analyses were conducted using latent moderated structural equations (LMS) to test the hypothesized weakening effect of institutional voids.

- H2 (Formal Institutional Voids). The interaction between EM and FIV was negative and significant (β = –.15, p = .011). Simple slope tests (Aiken & West, 1991) indicated that when FIV was low (-1 SD), the effect of EM on EB was strong (β = .32, p < .001). When FIV was high (+1 SD), the effect of EM weakened considerably (β = .09, p = .165).
- H3 (Informal Institutional Voids). The interaction between EM and IFIV was also negative and significant (β = –.18, p = .007). At low IFIV (-1 SD), EM strongly predicted EB (β = .35, p < .001). At high IFIV (+1 SD), the relationship was significantly weaker and non-significant (β = .08, p = .212).

Table 5: Structural Model Results: Direct and Moderation Effects

Path	*β*	*SE*	*p*	*Hypothesis*
Direct Effects				
EM → EB	*.24*	*.06*	*<.001*	*Supported (H1)*
PFTE → EB	*–.06*	*.05*	*.241*	*Not supported*
Moderation Effects				
EM × FIV → EB	*–.15*	*.06*	*.011*	*Supported (H2)*
EM × IFIV → EB	*–.18*	*.07*	*.007*	*Supported (H3)*

Note. EM = Entrepreneurial Motivation; EB = Entrepreneurial Behavior; PFTE = Problems Faced by Transgender Entrepreneurs; FIV = Formal Institutional Voids; IFIV = Informal Institutional Voids. Control paths (age, education, business size) are estimated but not shown for brevity.

The results confirm a significant positive relationship between entrepreneurial motivation and entrepreneurial behavior. Crucially, both formal and informal institutional voids were found to weaken this relationship, consistent with theoretical expectations. General problems faced by entrepreneurs did not significantly predict behavior. Overall, findings highlight that motivation, while important, is heavily contingent on institutional conditions; pervasive voids can sever the link between motivational drive and entrepreneurial action**.**

Discussion

This study explored the link between entrepreneurial motivation and behavior among transgender entrepreneurs in Pakistan, alongside the moderating effect of institutional voids. Three main findings emerged. First, a strong positive relationship exists between motivation and behavior. Second, formal institutional voids negatively moderated this relationship. Third, informal institutional voids showed a similar negative moderating effect. General problems faced by

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entrepreneurs did not significantly directly affect behavior, suggesting structural barriers matter more than individual difficulties in hindering entrepreneurial action. These results show that while motivation is crucial, it isn't enough on its own. The institutional environment acts as a key boundary condition that determines whether entrepreneurial drive leads to action. This evidence adds important context to debates on marginalized entrepreneurship and institutional theory.

Theoretical implications

The results extend the TPB6 (Ajzen, 1991) within highly marginalized contexts. While TPB suggests intention drives behavior, our findings show this relationship depends heavily on institutional conditions. The significant moderation effects highlight the need to combine TPB with institutional theory when studying severely excluded groups (Webb, Khoury, & Hitt, 2020; North, 1990).

The findings also contribute to the debate on institutional voids. Some see voids as barriers (Khanna & Palepu, 1997); others argue they create opportunities for innovation (Baker & Nelson, 2005; Sarasvathy, 2001). Our results indicate that for transgender entrepreneurs in Pakistan, voids act mainly as constraints. Both formal voids (like lack of financial access) and informal voids (like stigma) weaken the link between motivation and behavior. This supports the "constraint" view in contexts of extreme marginalization. Additionally, the findings address a tension in inclusive entrepreneurship literature. While minority entrepreneurs show resilience and network-building skills (Jennings & Brush, 2013; Hughes et al., 2012), our data suggest that in environments with pervasive institutional voids, resilience alone may not be enough to turn motivation into action. This shows that structural change is as important as individual agency for inclusive entrepreneurship.

Methodological implications

This study shows the value of advanced cross-sectional SEM techniques, like Latent Moderated Structural Equations (LMS), in marginalized entrepreneurship research. While longitudinal designs are ideal for causality, robust cross-sectional methods are practical for hard-to-reach populations where multi-wave data is not feasible (Podsakoff, MacKenzie, & Podsakoff, 2012). Using LMS was key, as it detected moderation effects through latent interactions. This underscores the importance of sophisticated statistical techniques that account for measurement error when testing complex relationships in entrepreneurship research (Marsh, Wen, & Hau, 2004).

Practical and policy implications

The findings have clear implications for practice and policy. For policymakers in developing economies, strengthening formal institutions—through enforcing legal protections, ensuring access to credit for marginalized groups, and upholding anti-discrimination laws—is essential to help motivated individuals act on their intentions. For community organizations and NGOs, interventions must also address informal institutional voids. This could include anti-stigma

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campaigns, build peer-support networks, and increase community acceptance of transgender-owned businesses. For entrepreneurship educators, programs focused only on motivation or business skills are insufficient. Training should also include components that help entrepreneurs navigate institutional barriers, such as legal literacy, financial advocacy, and strategic networking.

Limitations and future research

This study has several limitations that suggest future research directions. First, the cross-sectional design limits causal claims. Future work should use longitudinal or experimental designs to strengthen causality. Second, the sample came from three Pakistani cities. Research across different regions or countries could clarify how institutional contexts vary.

Third, the data relied on self-reports. Future studies could use objective behavioral measures or administrative records where possible. Finally, future research should study the strategies of entrepreneurs who succeed despite high institutional voids. Qualitative work on their use of effectuation, bricolage, and resilience could reveal how agency works within structural constraints and offer practical lessons.

Conclusion

This study provides important evidence on transgender entrepreneurship in Pakistan. Motivation is strongly linked to behavior, but formal and informal institutional voids weaken this relationship. The results challenge individual-focused models of entrepreneurship and emphasize that structural change is necessary for marginalized entrepreneurs to realize their potential. By connecting TPB with institutional theory and using rigorous cross-sectional SEM, this study adds theoretical, methodological, and practical insights to understanding entrepreneurship under inequality.

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