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SERVANT LEADERSHIP, ENTREPRENEURIAL MINDSET, AND PERFORMANCE: A MEDIATION MODEL IN THAILAND'S AGRO-INDUSTRIAL SECTOR

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Abstract

This quantitative study investigates the influence of servant leadership (SL) on employee performance (EP) through the mediating roles of entrepreneurial mindset (EM) and entrepreneurial orientation (EO) in Thailand's agro-industrial sector. Despite its economic significance, this sector faces challenges requiring leadership that develops human capital. Using Partial Least Squares Structural Equation Modeling (PLS-SEM) on data from 445 non-managerial employees at a major Thai agro-industrial firm, the study reveals that SL does not directly impact EP. Instead, SL significantly enhances both EM ($\beta = 0.562$, $p < .001$) and EO ($\beta = 0.624$, $p < .001$), which, in turn, significantly influence EP. Critically, SL exerts significant indirect effects on EP via EM ($\beta = 0.222$, $p < .001$) and EO ($\beta = 0.209$, $p < .001$), jointly explaining 51.6% of the variance in EP. These findings clarify SL's indirect mechanisms in hierarchical, collectivist contexts, contributing to organizational behavior theory. Practically, the study recommends integrating SL development with entrepreneurial capability-building to foster employee outcomes and competitiveness, aligning with Thailand's national strategy for sustainable agro-industrial growth.

Keywords: Servant Leadership, Entrepreneurial Mindset, Entrepreneurial Orientation, Employee Performance, Agro-Industrial Sector

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Introduction

Thailand's agro-industrial sector reveals a persistent paradox: it accounts for only 8% of GDP while employing nearly one-third of the workforce, reflecting deep structural inefficiencies (World Bank Group, 2022). The issue runs deeper as farmers age, young workers migrate to cities, and productivity stagnates. In contrast, Viet Nam's openness to trade and foreign investment has boosted productivity but increased import dependence (Organisation for Economic Co-operation and Development, 2024). The modernization challenge in Thailand is thus less technological than organizational—requiring leadership that sustains people, skills, and competitiveness.

At the firm level, Kasetphand Industrial, a CP Group subsidiary, doubled revenue from THB 2.47 to 4.19 billion between 2019 and 2023. However, profit margins fell below 1% (Department of Business Development, 2024), and over half of new hires left within three years, citing weak leadership and limited development opportunities. Kasetphand Industrial exemplifies a broader issue: expansion without sustainability, infrastructure without human capital—largely overlooked in leadership research (Kuanprasert & Phetsombat, 2019; Junkrapor & Chienwattanasook, 2025).

Servant Leadership (SL), first articulated by Greenleaf (1970), begins with a genuine desire to serve, placing follower development and moral stewardship at its center. Studies distinguish SL from transformational and transactional leadership and show that it predicts unique variance in satisfaction, trust, and performance (Hoch et al., 2016; Eva et al., 2019). However, recent evidence from hierarchical Asian firms shows inconsistent direct effects (Bai et al., 2023). This tension invites closer examination of how SL operates through cognitive and behavioral mechanisms in collectivist, high-power-distance environments.

Social Cognitive Theory (Bandura, 2001) provides an explanatory lens, proposing that leadership builds self-efficacy and shapes innovation through modeling and reinforcement. Extending this logic, SL fosters employees' entrepreneurial mindset (EM)—a cognitive orientation toward opportunity recognition, experimentation, and calculated risk-taking—which, in turn, promotes organizational entrepreneurial orientation (EO), characterized by proactiveness and innovativeness. Empirical work confirms that SL enhances innovation indirectly via psychological safety and learning orientation rather than direct control (Han & Zhang, 2024), suggesting that SL's strongest performance effects are mediated through EM and EO.

The Thai cultural context complicates this mechanism. Collectivist values rooted in Buddhist ethics—metta (loving-kindness) and karuna (compassion)—align with SL's emphasis on care and community (Hofstede et al., 2010). However, high power distance reinforces hierarchy and limits upward feedback (House et al., 2004). Thus, while followers value benevolence, they may hesitate to act autonomously. Cross-national studies indicate that collectivist norms can moderate SL outcomes by strengthening trust and cohesion (Ren & Bunchapattanasakda, 2025; Wei & Bunchapattanasakda, 2024). Comparatively, Viet Nam and Malaysia—though collectivist—have adopted flatter, innovation-oriented structures that may enable SL's mechanisms to operate differently.

From this synthesis, three research gaps emerge: 1) a sectoral gap—agro-industry remains underexamined; 2) a mechanism gap—SL's indirect EM-EO pathways under hierarchy are unclear; and 3) a cultural gap—the coexistence of compassion and hierarchy in Thailand remains insufficiently analyzed. Accordingly, this study investigates how SL influences employee performance in Thai agro-industrial firms through the mediating roles of EM and EO, using Kasetphand Industrial as a focal case. Theoretically, it clarifies SL's indirect mechanisms in hierarchical, collectivist settings. Practically, it identifies leadership levers—trust-building, talent development, and building an innovation culture—aligned with Thailand's 20-Year National Strategy (2018-2037) on human capital and agricultural

modernization (Office of the National Economic and Social Development Council, 2018), offering actionable pathways toward sustainable, ethical growth.

Literature Review

Servant Leadership

Servant leadership (SL) begins with a genuine desire to serve, placing follower growth, well-being, and moral stewardship at the center of leadership practice (Greenleaf, 1970). Empirical evidence shows that SL is distinct from other "new-genre" leadership approaches and explains additional variance in key outcomes beyond that explained by transformational leadership (Hoch et al., 2016). Meta-analytic syntheses further confirm SL's positive effects on trust, commitment, citizenship behavior, and performance, while calling for deeper exploration of underlying mechanisms and boundary conditions (Eva et al., 2019).

For measurement, the short-form SL-7 provides a concise, validated operationalization of core servant behaviors, such as building trust and empowering others. It complements the broader Servant Leadership Survey (SLS), which captures multidimensional attributes including humility, forgiveness, and stewardship (Liden et al., 2015).

SL in High-Power-Distance, Collectivist Contexts

In high-power-distance, collectivist cultures like Thailand, SL's follower-centric and moral orientation aligns with communitarian values but operates within hierarchical norms (Hofstede et al., 2010). Evidence from Asian contexts shows that SL influences outcomes mainly through capability-building rather than direct control—particularly in change-intensive work environments (Eva et al., 2019). Two consistent pathways illustrate this: (a) SL enhances innovation self-efficacy, which drives innovation performance, and (b) SL fosters team learning orientation and agility, leading to project success (Han & Zhang, 2024; Ren & Shen, 2024). When aligned with cultural expectations of fairness, respect, and benevolence, SL promotes climates where employees feel safe to learn and take initiative, regardless of hierarchy.

Entrepreneurial Mindset

Entrepreneurial mindset (EM) refers to a set of cognitions and orientations that enable opportunity recognition, experimentation, and persistence in the face of uncertainty. Recent reviews define EM as an interaction between dispositional beliefs (e.g., proactiveness, tolerance for ambiguity) and opportunity beliefs that translate into entrepreneurial behavior (Daspit et al, 2023; Pidduck et al., 2023). Grounded in Social Cognitive Theory, EM is driven by self-efficacy—beliefs in one's capability to execute effective actions—shaped by mastery experiences, modeling, and social persuasion (Bandura, 1997).

Evidence Linking SL to EM and Performance

In knowledge-intensive or high-turnover settings, SL builds innovation self-efficacy and learning climates that foster experimentation, enhancing creative and proactive behavior (Ren & Shen, 2024). Because EM represents cognitive readiness to pursue opportunities, SL's empowering and trust-based behaviors naturally strengthen EM. In turn, EM predicts both in-role and extra-role performance when resources and supportive norms are present (Daspit et al., 2023; Pidduck et al., 2023).

Entrepreneurial Orientation

Entrepreneurial orientation (EO) reflects a firm's strategic posture emphasizing innovativeness, proactiveness, and risk-taking (Miller, 1983; Covin & Slevin, 1989). Later research added autonomy and competitive aggressiveness as dimensions whose impact depends on contextual fit (Lumpkin & Dess, 1996). Recent studies highlight EO's connection with knowledge and information management capabilities that enhance adaptability and performance (Tajeddini et al., 2020).

Although EO was conceptualized at the firm level, employees' perceived EO—their experience of an organization's proactiveness and innovation support—can be shaped by leadership and team climate. Evidence indicates that SL enhances team learning orientation and agility, which serve as micro-foundations of proactiveness and experimentation in project and operational contexts (Han & Zhang, 2024). Consequently, SL can elevate perceived EO by creating psychologically safe, learning-rich environments that reward initiative—an essential condition for bottom-up innovation in hierarchical agro-industrial firms.

Employee Performance

Employee performance (EP) encompasses task quality, quantity, and timeliness, often measured by the Individual Work Performance Questionnaire (IWPQ) (Koopmans et al., 2013). In Thai organizations, the 13-item scale by Na-Nan et al. (2018) provides a validated, context-appropriate measure of quality, quantity, and efficiency.

Linking SL, EM/EO, and EP in the Thai Agro-Industry

Meta-analytic evidence shows that servant leadership (SL) affects employee performance (EP) primarily through indirect mechanisms—trust, commitment, learning, and innovation—rather than directive control (Hoch et al., 2016; Eva et al., 2019). In Thailand's agro-industrial sector, where workforce aging, turnover, and digital transformation remain key challenges, leadership that builds self-efficacy (fueling the entrepreneurial mindset, EM) and learning agility (supporting entrepreneurial orientation, EO) is likely to generate stronger, more sustainable performance than transactional control.

Accordingly, a dual-mediation framework is proposed in which servant leadership enhances employee performance indirectly through two mechanisms: 1) a psychological pathway, where SL develops employees' self-efficacy and entrepreneurial mindset (EM), and 2) a behavioral pathway, where SL fosters a supportive and innovative climate, reflected as perceived entrepreneurial orientation (EO). However, research in Thailand's agro-industrial context remains limited, particularly in testing these dual pathways under hierarchical and collectivist conditions. Understanding these mechanisms is essential for explaining how SL promotes sustainable employee performance in emerging-market organizations.

Therefore, the following hypotheses are proposed:

H1: Servant leadership has a positive influence on employee performance.

H2: Servant leadership positively influences employees' entrepreneurial mindset.

H3: Servant leadership has a positive influence on employees' perception of their organization's entrepreneurial orientation.

H4: Employees' entrepreneurial mindset positively influences their performance.

H5: Employees' perceived entrepreneurial orientation of the organization positively influences their performance.

H6: Employees' entrepreneurial mindset mediates the relationship between servant leadership and employee performance.

H7: Employees' perceived organizational entrepreneurial orientation mediates the relationship between servant leadership and employee performance.

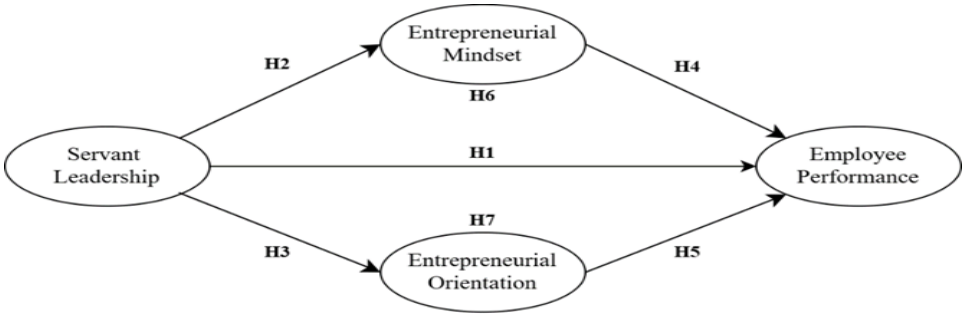

Figure 1 Conceptual Framework

Research Methodology

This study used a quantitative survey design to examine the relationships among servant leadership, entrepreneurial mindset, entrepreneurial orientation, and employee performance in a large Thai agro-industrial organization. The objective was to test the mediating roles of entrepreneurial mindset and entrepreneurial orientation. A cross-sectional approach was adopted because data were collected at a single point in time, which limits causal inference; therefore, results were interpreted as associative.

The population consisted of 525 non-managerial employees in the organization. A census survey was conducted through the company's internal email system. Of 525 distributed questionnaires, 467 were returned (88.95%), and 445 were valid after screening for completeness and patterned responses. Respondents were required to have at least one year of work experience under direct supervision to ensure adequate exposure to leadership practices. Non-response bias was assessed by comparing demographic proportions between the population and the sample ($\chi^2 = 0.93$, df = 1, $p > 0.05$), showing no significant difference. Following Hair et al. (2022), a minimum of 380 samples (20 × 19 observed indicators) was required for PLS-SEM; the final 445 cases exceeded this threshold, ensuring sufficient statistical power. Response bias was minimized through anonymous participation, random item ordering, and several reverse-coded questions.

The study examined four constructs. Servant leadership was measured using the SL-7 scale (Liden et al., 2015). The entrepreneurial mindset consisted of three dimensions drawn from the Entrepreneurial Mindset Profile (Davis et al., 2016). Entrepreneurial orientation was measured using six dimensions from the CENTORES scale (Ali et al., 2021). Employee performance was measured along three dimensions adapted from Na-Nan et al. (2018): work quality, quantity, and timeliness. All items were rated on a five-point Likert scale ranging from 1 = strongly disagree to 5 = strongly agree.

All scales were adopted from validated instruments widely used in management and behavioral research. Three academic experts reviewed their content validity to ensure consistency and appropriateness for the study context.

Data were collected during June-July 2025 through online forms distributed with clear consent information and confidentiality statements. Two reminders were sent to encourage participation.

Data were analyzed using Partial Least Squares Structural Equation Modeling (PLS-SEM), appropriate for complex models with mediating variables and non-normal data (Hair et al., 2022). The measurement model was assessed through indicator loadings (≥ 0.70), average variance extracted (AVE ≥ 0.50), composite reliability ($\rho c \geq 0.70$), Dijkstra-Henseler's rho ($\rho A \geq 0.70$), and Cronbach's alpha (≥ 0.70) (Hair et al., 2022; Henseler et al., 2015). Discriminant validity was verified using the Fornell-Larcker criterion (Fornell & Larcker, 1981) and the heterotrait-monotrait ratio (HTMT < 0.85) (Henseler et al., 2015).

For the structural model, path coefficients (β) and their significance were tested using bootstrapping with 5,000 subsamples, where t-values > 1.96 or $p < .05$ were considered statistically significant (Hair et al., 2022). Predictive and explanatory power were evaluated using R^2, effect size (f^2), and predictive relevance (Q^2) (Cohen, 1988; Geisser, 1975; Stone, 1974).

Although the cross-sectional design limits causal conclusions, the study provides empirical insights into how servant leadership may influence employee performance through entrepreneurial cognition and behavior within Thailand's agro-industrial context.

This study involved no collection of personally identifiable information, and all responses were fully anonymous. Participants were informed of the study's purpose, their voluntary participation, and the confidentiality of their data before completing the survey. Informed

consent was implied through participation. The study was conducted in compliance with ethical standards appropriate for minimal-risk, anonymous survey-based research.

Research Results

Table 1 presents the demographic characteristics of the 445 respondents. The majority were male (74.8%) and aged 25-44 years (72.4%), indicating a workforce in its prime working years. Most respondents held at least a bachelor's degree (65.2%), and the largest group occupied operational-level positions (56.6%), followed by specialists (24.5%) and experts (18.9%). Regarding tenure, 41.6% had worked between two and ten years, suggesting sufficient organizational experience for providing reliable responses. These characteristics reflect a mature, well-educated employee base, suitable for assessing leadership and performance perceptions.

Table 1 Demographic Characteristics of Respondents (n = 445)

Variable	Category	Frequency (n)	Percentage (%)
Gender	Male	333	74.8
	Female	112	25.2
Age (years)	Under 24	21	4.7
	25-34	169	38.0
	35-44	153	34.4
	45-54	99	22.2
	55 and above	3	0.7
Education	High school / Vocational	66	14.8
	Diploma / Associate	64	14.4
	Bachelor's degree	290	65.2
	Master's degree or higher	25	5.6
Position level	Operational employee	252	56.6
	Specialist (department-level)	109	24.5
	Expert (division-level)	84	18.9
Tenure (years)	Less than 2	86	19.3
	2-10	185	41.6
	11-20	128	28.8
	Over 20	46	10.3

Table 2 shows the descriptive statistics of the four main constructs. All variables had mean scores above 3.50, indicating generally high perceptions among respondents. Employee performance recorded the highest mean, followed by entrepreneurial mindset, servant leadership, and entrepreneurial orientation. The standard deviations were below 1.00 for all constructs, reflecting consistent responses across participants.

Table 2 Mean and Standard Deviation of Main Research Variables

Variable	Mean ($\bar{x}$)	S.D.	Interpretation
Servant Leadership (SL)	3.58	0.93	High
Entrepreneurial Mindset (EM)	3.77	0.71	High
Entrepreneurial Orientation (EO)	3.52	0.79	High
Employee Performance (EP)	3.91	0.68	High

Measurement Model

The evaluation of the measurement model focused on assessing indicator reliability, convergent validity, and discriminant validity, in accordance with established guidelines for

Partial Least Squares Structural Equation Modeling (PLS-SEM) (Hair et al., 2022). These procedures ensured the psychometric adequacy of all latent constructs prior to structural model estimation. Indicator reliability was verified by examining outer loadings; all items exceeded the 0.70 threshold, ranging from 0.809 to 0.948. These results affirm that the observed variables contributed substantially to their respective latent constructs, in line with the recommendations by Hulland (1999) and Chin (1998). Convergent validity was established by calculating the Average Variance Extracted (AVE), which ranged from 0.716 to 0.875—well above the minimum criterion of 0.50 (Fornell & Larcker, 1981). This suggests that a substantial portion of the variance in each indicator was captured by its underlying construct. Internal consistency reliability was concurrently assessed through multiple coefficients, including Cronbach's alpha (α), Dijkstra-Henseler's rho (ρA), and Jöreskog's rho (ρc). All values surpassed the 0.70 benchmark, indicating acceptable construct reliability across all dimensions (Hair et al., 2022).

Table 3 Factor Loadings, AVE, and Composite Reliability

Variables	**Loading**	**AVE**	**Dijkstra-Henseler's rho (ρ_A)**	**Jöreskog's rho (ρ_c)**	**Cronbach's Alpha (α)**
Servant Leadership		.716	.938	.946	.934
SL1	.831				
SL2	.851				
SL3	.863				
SL4	.859				
SL5	.845				
SL6	.834				
SL7	.841				
Entrepreneurial Mindset		.830	.900	.936	.898
EM1	.900				
EM2	.938				
EM3	.895				
Entrepreneurial Orientation		.785	.947	.956	.945
EO1	.809				
EO2	.901				
EO3	.906				
EO4	.925				
EO5	.862				
EO6	.908				
Employee Performance		.875	.934	.955	.929
EP1	.934				
EP2	.948				
EP3	.924				

Note: All constructs meet reliability and convergent validity thresholds.

Discriminant validity was evaluated using the Fornell-Larcker criterion. As shown in Table 4, the square roots of the AVE for each construct (diagonal values) exceeded the corresponding inter-construct correlations, thereby confirming the constructs' empirical distinctiveness (Fornell & Larcker, 1981).

Table 4 Discriminant Validity (Fornell-Larcker Criterion)

Variables	SL	EM	EO	EP
Servant Leadership (SL)	**.846**			
Entrepreneurial Mindset (EM)	.562	**.911**		
Entrepreneurial Orientation (EO)	.624	.619	**.886**	
Employee Performance (EP)	.519	.652	.634	**.935**

Note: Diagonal AVE values exceed inter-construct correlations.

To further corroborate discriminant validity, Heterotrait-Monotrait (HTMT) ratios were examined. All HTMT coefficients fell below the conservative threshold of 0.85, ranging from 0.547 to 0.712, as detailed in Table 5. These findings provide strong evidence against multicollinearity and suggest adequate discriminant separation among constructs (Henseler et al., 2015).

Table 5 Discriminant Validity (HTMT Ratio)

Variables	SL	EM	EO	EP
Servant Leadership (SL)				
Entrepreneurial Mindset (EM)	.606			
Entrepreneurial Orientation (EO)	.661	.673		
Employee Performance (EP)	.547	.712	.673	

Note: All HTMT values are below the 0.85 threshold.

Structural Model

The structural model was evaluated using SmartPLS 4.0, following guidelines proposed by Hair et al. (2022). Key evaluation criteria included the coefficient of determination (R^2), effect size (f^2), predictive relevance (Q^2predict), and significance of path coefficients, assessed via a bootstrapping procedure with 5,000 resamples. The R^2 values for endogenous constructs were as follows: entrepreneurial mindset ($R^2 = 0.316$), entrepreneurial orientation ($R^2 = 0.390$), and employee performance ($R^2 = 0.516$), indicating moderate to substantial explanatory power (Chin, 1998). These values are illustrated in Figure 2, which shows the finalized structural model and standardized path coefficients.

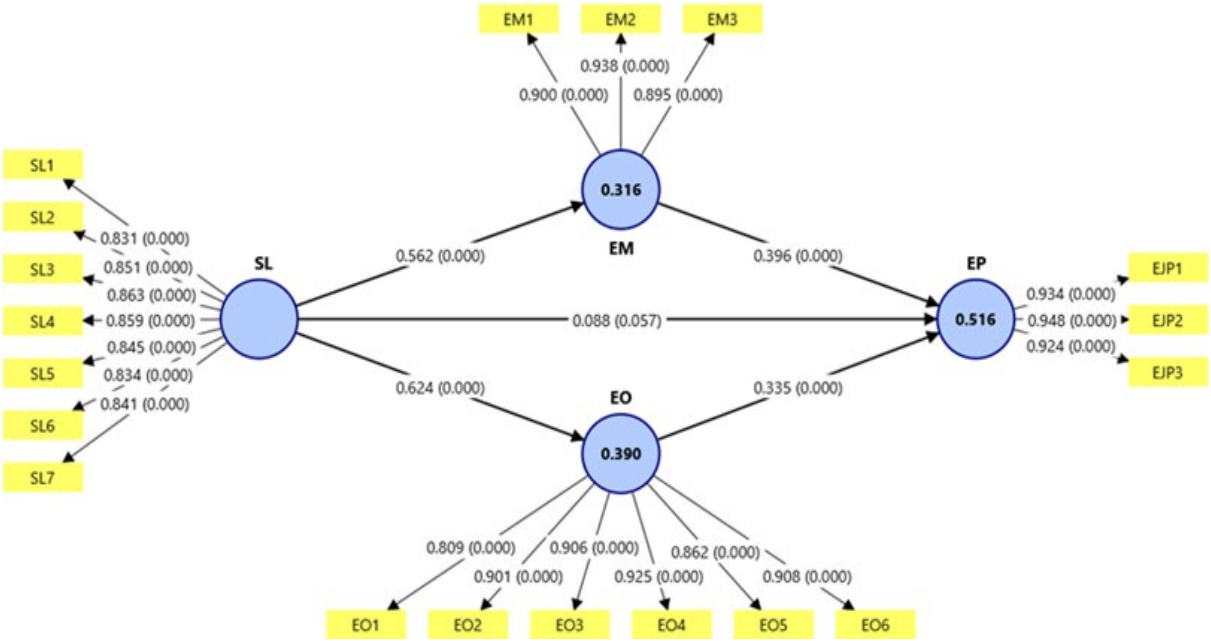

Figure 2 Finalized Structural Model with R^2 Values and Standardized Path Coefficients

The path coefficients (β) and their significance levels are presented in Table 6. Servant leadership had a significant positive effect on entrepreneurial mindset (β = 0.562, p < .001, f^2 = 0.462) and entrepreneurial orientation (β = 0.624, p < .001, f^2 = 0.639). However, the direct effect of servant leadership on employee performance was not statistically significant (β = 0.088, p = .057, f^2 = 0.009). Both entrepreneurial mindset (β = 0.396, p < .001, f^2 = 0.183) and entrepreneurial orientation (β = 0.335, p < .001, f^2 = 0.117) significantly influenced employee performance.

Table 6 Path Coefficients, t-values, p-values, and Effect Sizes

Path	β	t-value	p-value	Cohen's f^2
SL → EM	0.562***	15.066	.000	0.462***
SL → EO	0.624***	20.406	.000	0.639***
SL → EP	0.088	1.902	.057	.009
EO → EP	0.335***	6.515	.000	0.117**
EM → EP	0.396***	8.060	.000	0.183***

Note: ***p < .001; **p < .01; *p < .05; no asterisk = not significant

Mediation effects were examined using specific indirect effects, as shown in Table 7. Servant leadership exerted significant indirect influence on employee performance through entrepreneurial mindset (β = 0.222, p < .001) and entrepreneurial orientation (β = 0.209, p < .001).

Table 7 Specific Indirect Effects and Total Indirect Effect

Specific Indirect Path	β	t-value	p-value
SL → EM → EP	.222***	6.693	.000
SL → EO → EP	.209***	6.233	.000
Total Indirect Path			
SL → EP	.431***	11.783	.000

Note: ***p < .001; **p < .01; *p < .05; no asterisk = not significant

The structural model was assessed by evaluating explanatory power (R^2) and predictive relevance (Q^2) of the endogenous constructs. The R^2 values were 0.316 for entrepreneurial mindset, 0.390 for entrepreneurial orientation, and 0.516 for employee performance, indicating moderate to substantial explanatory power (Chin, 1998). Predictive relevance was confirmed by Q^2 values derived via blindfolding, all of which exceeded zero: 0.312, 0.386, and 0.265, respectively. These results demonstrate that the model provides an acceptable in-sample explanation and out-of-sample prediction. Detailed values are shown in Table 8, and visualized in Figure 2.

Table 8 Coefficient of Determination (R^2) and Predictive Relevance (Q^2)

Endogenous Construct	R^2	Q^2
Entrepreneurial Mindset	.316	.312
Entrepreneurial Orientation	.390	.386
Employee Performance	.516	.265

Note: All constructs show acceptable explanatory and predictive power.

The hypothesis-testing results indicated that six of the seven hypotheses were supported. Servant leadership did not directly influence employee performance (H1: β = 0.088, p = .057). However, it significantly affected entrepreneurial mindset (H2: β = 0.562) and orientation (H3: β = 0.624). Both mediators, in turn, had significant effects on performance (H4, H5).

Importantly, indirect effects via entrepreneurial mindset (H6: β = 0.222) and orientation (H7: β = 0.209) were significant, confirming the mediating role of entrepreneurial capabilities. These results highlight the indirect pathway through which servant leadership enhances employee performance in agro-industrial organizations. Full results are presented in Table 9.

Table 9 Summary of Hypothesis Testing Results

Hypothesis	Structural Path	β	t-value	p-value	Result
H1	SL → EP	0.088	1.902	.057	Not Supported
H2	SL → EM	0.562	15.066	.000	Supported
H3	SL → EO	0.624	20.406	.000	Supported
H4	EM → EP	0.396	8.060	.000	Supported
H5	EO → EP	0.335	6.515	.000	Supported
H6	SL → EM → EP	0.222	6.693	.000	Supported
H7	SL → EO → EP	0.209	6.233	.000	Supported

Note: All hypotheses are supported except the direct effect of servant leadership on performance.

Conclusion and Discussion

The findings of this study indicate an indirect-only mediation pattern: servant leadership does not have a statistically significant direct effect on employee performance but exerts influence through entrepreneurial mindset and entrepreneurial orientation. This result clarifies the complex mechanism underlying the relationship between leadership and performance. Although several meta-analytic studies have identified a positive association between servant leadership and performance outcomes (Eva et al., 2019), the present results demonstrate that, in structured and hierarchical environments such as Thailand's agro-industrial sector, the influence of servant leadership primarily operates through cognitive and behavioral mechanisms rather than through direct managerial control. This aligns with Zhao et al.'s (2010) conceptualization of the indirect-only model as a process in which mediators fully transmit the leader's impact to outcomes.

From a theoretical perspective, these results can be interpreted through the framework of Social Cognitive Theory (Bandura, 2001). Servant leaders cultivate psychological safety and trust, enabling employees to develop self-efficacy, intrinsic motivation, and proactive problem-solving capabilities. These internalized processes contribute to an entrepreneurial mindset—an individual's cognitive orientation toward creativity, risk-taking, and resilience—that drives higher performance. Simultaneously, servant leaders establish supportive structures and organizational climates that foster an entrepreneurial orientation, characterized by innovation, proactiveness, and strategic risk-taking (Ali et al., 2021). Together, these constructs serve as complementary mediators: the entrepreneurial mindset represents the individual-level cognitive mechanism, whereas entrepreneurial orientation embodies the collective behavioral outcome of that cognition. The stronger link between entrepreneurial mindset and performance ($\beta = .396$, $p < .001$) than between entrepreneurial orientation and performance ($\beta = .335$, $p < .001$) suggests that, in highly structured, process-driven environments, cognitive readiness precedes behavioral innovation.

A comparative review of prior research supports this interpretation. In more flexible or innovation-driven settings, servant leadership has been observed to enhance employee performance directly (Liden et al., 2014). However, recent studies have emphasized that when mediating psychological or capability-related variables are considered, servant leadership tends to influence outcomes indirectly (Eva et al., 2019; Davis et al., 2016). Other studies have revealed that servant leadership improves performance through mediators such as psychological safety, learning orientation, or creative self-efficacy rather than through

immediate directive authority (Edmondson, 2018). The present findings therefore refine existing theory by showing that servant leadership primarily strengthens the "capability infrastructure" of employees, enhancing their entrepreneurial cognition and orientation that, in turn, lead to improved performance outcomes.

Cultural context further explains this mediation pattern. Thailand's organizational culture reflects both collectivist values and relatively high power distance (Hofstede et al., 2010). These features generate a dual influence on leadership effectiveness. On one hand, collectivism reinforces servant leadership behaviors such as empathy, collaboration, and social responsibility. On the other hand, hierarchical structures can restrict employees' autonomy and willingness to act independently. Consequently, servant leadership may not directly translate into higher performance but rather exerts its influence through psychological and motivational channels. Studies conducted in Asian contexts have found similar effects, indicating that servant leadership enhances innovation and performance primarily through cognitive and cultural mechanisms rather than direct behavioral control (Ren & Bunchapattanasakda, 2025; Wei & Bunchapattanasakda, 2024). The present study extends this evidence by confirming the mediating role of entrepreneurial mindset and orientation within Thailand's agro-industrial organizations, sectors often characterized by procedural rigidity and centralized control.

The results also demonstrate that servant leadership positively predicts both entrepreneurial mindset ($\beta = .562$, $p < .001$) and entrepreneurial orientation ($\beta = .624$, $p < .001$). These relationships highlight servant leadership as a developmental rather than directive force. By prioritizing service, trust, and empowerment, servant leaders foster innovative thinking and risk-taking among employees. The observed indirect effect of servant leadership on employee performance through entrepreneurial mindset ($\beta = .222$, $p < .001$) and entrepreneurial orientation ($\beta = .209$, $p < .001$) confirms that leadership effectiveness in such contexts depends on fostering psychological and behavioral conditions conducive to entrepreneurship. This mechanism provides an integrated understanding of how ethical and people-centered leadership styles can yield performance gains without relying on hierarchical authority.

The implications for organizational practice are significant. Managers seeking to enhance performance through servant leadership should first cultivate an entrepreneurial mindset among employees. This can be achieved by encouraging creativity, providing psychological safety, and allowing autonomy in decision-making. Leadership development programs should emphasize micro-behaviors such as active listening, consistent ethical conduct, and empathetic communication (Spears & Lawrence, 2001). Furthermore, organizations should create structural conditions that support entrepreneurial orientation by implementing decentralized decision-making systems, cross-functional collaboration platforms, and performance metrics that reward innovation and learning rather than mere output. Integrating these elements ensures that servant leadership behaviors are systematically reinforced by organizational processes, allowing individual cognition to translate into collective entrepreneurial action.

At the human resource management level, performance evaluation systems should incorporate indicators that capture entrepreneurial behavior and learning agility, not only productivity or timeliness (Na-Nan et al., 2018). Incentive mechanisms can be adjusted to reward initiative, experimentation, and responsible risk-taking. These measures help institutionalize the pathways through which servant leadership enhances performance, ensuring sustainability and alignment with long-term organizational growth. Importantly, these strategies align with the ethical foundation of servant leadership, emphasizing development, collaboration, and social responsibility over short-term control or competition.

Despite its theoretical and practical contributions, this study has several limitations. The cross-sectional design restricts causal inference; longitudinal research is required to confirm the temporal order of servant leadership, entrepreneurial capabilities, and performance outcomes. The reliance on self-reported data introduces potential bias, although reliability and validity

indices were within acceptable thresholds. Future research should employ multi-source or objective performance data to enhance robustness. Additionally, entrepreneurial orientation was measured perceptually; integrating objective indicators, such as innovation output, R&D intensity, or new product launches, could enhance construct validity. Testing moderated mediation models that include contextual variables such as team climate, power distance orientation, or process rigidity would also clarify the conditions under which the indirect-only mediation is most pronounced. Comparative studies across ASEAN economies would further determine the generalizability of these findings within culturally similar yet economically diverse settings.

In conclusion, this study advances understanding of leadership-performance dynamics by demonstrating that servant leadership enhances employee performance indirectly through entrepreneurial mindset and orientation. The findings contribute to theory by explaining how servant leadership transforms cognitive and organizational mechanisms rather than exerting direct behavioral control. In practice, they emphasize the need for managers to empower employees, foster creativity, and build organizational systems that encourage innovation and responsible autonomy. Contextually, they show that servant leadership can thrive even within hierarchical, collectivist cultures when its cognitive and behavioral mediators are activated. Overall, servant leadership should be viewed not merely as an ethical ideal but also as a strategic resource that cultivates entrepreneurial capability and sustainable performance in dynamic, resource-constrained environments.

References

Ali, A., Aima, A., Bhasin, J., & Hisrich, R. (2021). Measuring entrepreneurial orientation in developing economies: Scale development and validation. *Jindal Journal of Business Research, 10*(2), 147-162.

Bai, M., Zheng, X., Huang, X., Jing, T., Yu, C., Li, S., & Zhang, Z. (2023). How serving helps leading: Mediators between servant leadership and affective commitment. *Frontiers in Psychology, 14*, 1170490.

Bandura, A. (1997). *Self-efficacy: The exercise of control*. New York: W. H. Freeman.

Bandura, A. (2001). Social cognitive theory: An agentic perspective. *Annual Review of Psychology, 52*, 1-26.

Chin, W. (1998). The partial least squares approach for structural equation modeling. In G. Marcoulides (ed.). *Modern methods for business research* (pp. 295-336). New Jersey: Lawrence Erlbaum Associates Publishers.

Cohen, J. (1988). *Statistical power analysis for the behavioral sciences* (2nd ed.). New York: Routledge.

Covin, J., & Slevin, D. (1989). Strategic Management of Small Firms in Hostile and Benign Environments. *Strategic Management Journal, 10*(1), 75-87.

Daspit, J., Fox, C., & Findley, S. (2023). Entrepreneurial mindset: An integrated definition, a review of current insights, and directions for future research. *Journal of Small Business Management, 61*(1), 12-44.

Davis, M., Hall, J., & Mayer, P. (2016). Developing a new measure of entrepreneurial mindset: Reliability, validity, and implications for practitioners. *Consulting Psychology Journal: Practice and Research, 68*(1), 21-48.

Department of Business Development. (2024). *DBD DataWarehouse+*. Retrieved from https://datawarehouse.dbd.go.th.

Edmondson, A. (2018). *The fearless organization: Creating psychological safety in the workplace for learning, innovation, and growth*. New Jersey: John Wiley & Sons.

Eva, N., Robin, M., Sendjaya, S., van Dierendonck, D., & Liden, R. (2019). Servant leadership: A systematic review and call for future research. *The Leadership Quarterly, 30*(1), 111-132.

Fornell, C., & Larcker, D. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research, 18*(1), 39-50.

Geisser, S. (1975). The predictive sample reuse method with applications. *Journal of the American Statistical Association, 70*(350), 320-328.

Greenleaf, R. (1970). *The servant as leader*. New Jersey: Robert K. Greenleaf Publishing Center.

Hair, J., Hult, G., Ringle, C., & Sarstedt, M. (2022). *A primer on partial least squares structural equation modeling (PLS-SEM)* (3rd ed.). California: SAGE Publications.

Han, H., & Zhang, X. (2024). Servant leadership and project success: the mediating roles of team learning orientation and team agility. *Frontiers in Psychology, 15*, 1417604.

Henseler, J., Ringle, C., & Sarstedt, M. (2015). A new criterion for assessing discriminant validity in variance-based structural equation modeling. *Journal of the Academy of Marketing Science, 43*, 115-135.

Hoch, J., Bommer, W., Dulebohn, J., & Wu, D. (2016). Do Ethical, Authentic, and Servant Leadership Explain Variance Above and Beyond Transformational Leadership? A Meta-Analysis. *Journal of Management, 44*(2), 501-529.

Hofstede, G., Hofstede, G., & Minkov, M. (2010). *Cultures and Organizations: Software of the Mind: Intercultural Cooperation and Its Importance for Survival* (3rd ed.). New York: McGraw-Hill.

House, R., Hanges, P., Javidan, M., Dorfman, P., & Gupta, V. (2004). *Culture, Leadership, and Organizations: The GLOBE Study of 62 Societies*. California: SAGE Publications.

Hulland, J. (1999). Use of Partial Least Squares (PLS) in Strategic Management Research: A Review of Four Recent Studies. *Strategic Management Journal, 20*(2), 195-204.

Junkrapor, M., & Chienwattanasook, K. (2025). Enhancing employee performance in Thailand's ICT industry: The roles of authentic leadership and work-life integration. *Asian Administration and Management Review, 8*(2), Article 7.

Koopmans, L., Bernaards, C., Hildebrandt, V., van Buuren, S., van der Beek, A., & de Vet, H. (2013). Development of an individual work performance questionnaire. *International Journal of Productivity and Performance Management, 62*(1), 6-28.

Kuanprasert, K., & Phetsombat, P. (2019). The Relationship between Servant Leadership of School Administrator and Job Motivation of Teachers under Saint Maria Academy. *Asian Political Science Review, 3*(2), 89-95.

Liden, R., Wayne, S., Liao, C., & Meuser, J. (2014). Servant leadership and serving culture: Influence on individual and unit performance. *Academy of Management Journal, 57*(5), 1434-1452.

Liden, R., Wayne, S., Meuser, J., Hu, J., Wu, J., & Liao, C. (2015). Servant leadership: Validation of a short form of the SL-28. *The Leadership Quarterly, 26*(2), 254-269.

Lumpkin, G., & Dess, G. (1996). Clarifying the Entrepreneurial Orientation Construct and Linking It to Performance. *The Academy of Management Review, 21*(1), 135-172.

Miller, D. (1983). The correlates of entrepreneurship in three types of firms. *Management Science, 29*(7), 770-791.

Na-Nan, K., Chaiprasit, K., & Pukkeeree, P. (2018). Factor analysis-validated comprehensive employee job performance scale. *International Journal of Quality & Reliability Management, 35*(10), 2436-2449.

Office of the National Economic and Social Development Council. (2018). *National Strategy 2018-2037*. Retrieved from www.nesdc.go.th/wordpress/wp-content/uploads/2025/05/02-National-Strategy-2018-2037.pdf.

Organisation for Economic Co-operation and Development. (2024). *Agricultural policy monitoring and evaluation 2024*. Retrieved from www.oecd.org/en/publications/agricultural-policy-monitoring-and-evaluation-2024_74da57ed-en.html.

Pidduck, R., Clark, D., & Lumpkin, G. (2023). Entrepreneurial mindset: Dispositional beliefs, opportunity beliefs, and entrepreneurial behavior. *Journal of Small Business Management, 61*(1), 45-79.

Ren, L., & Shen, H. (2024). The relationship between servant leadership and team innovation performance: Mediating effect of self-efficacy. *Heliyon, 10*(6), e27723.

Ren, Y., & Bunchapattanasakda, C. (2025). Impacts of Female Servant Leadership on Employee Engagement: A Case of Employees in Private Higher Education Institutions in Zhengzhou, Henan, China. *Asian Administration and Management Review, 8*(1), Article 10.

Spears, L., & Lawrence, M. (2001). *Focus on leadership: Servant-leadership for the twenty-first century*. New Jersey: John Wiley & Sons.

Stone, M. (1974). Cross-Validatory Choice and Assessment of Statistical Predictions. *Journal of the Royal Statistical Society: Series B (Methodological), 36*(2), 111-147.

Tajeddini, K., Martin, E., & Ali, A. (2020). Enhancing hospitality business performance: The role of entrepreneurial orientation and networking ties in a dynamic environment. *International Journal of Hospitality Management, 90*, 102605.

Wei, S., & Bunchapattanasakda, C. (2024). Impact of female servant leadership style on employee engagement in Beijing's public universities. *Asian Political Science Review, 8*(2), 99-105.

World Bank Group. (2022). *Thailand Rural Income Diagnostic: Challenges and Opportunities for Rural Farmers*. Retrieved from www.worldbank.org/en/country/thailand/publication/thailand-rural-income-diagnostic-challenges-and-opportunities-for-rural-farmers.

Zhao, X., Lynch, J., & Chen, Q. (2010). Reconsidering Baron and Kenny: Myths and truths about mediation analysis. *Journal of Consumer Research, 37*(2), 197-206.

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