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The Role of Artificial Intelligence in Recruitment: Examining Candidate Experience as a Mediator and Organizational Culture as a Moderator in Quality of Hires

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Abstract. *This study investigates the influence of Artificial Intelligence (AI) implementation on recruitment outcomes, focusing on the mediating role of candidate experience and the moderating effects of trust in AI and organizational culture. Using a quantitative research design, data were collected from HR professionals across various industries in Indonesia. The results reveal that AI implementation positively affects candidate experience and quality of hires, with candidate experience acting as a significant mediator in these relationships. Trust in AI is found to play a dual role, both directly influencing candidate experience and quality of hires and moderating the relationship between AI implementation and candidate experience. Organizational culture, particularly an innovation-oriented culture, strengthens the impact of AI implementation on candidate experience. The study contributes to the theoretical understanding of candidate experience as a higher-order construct and highlights the importance of trust and cultural alignment in AI-driven recruitment. Practical implications emphasize the need for transparent AI systems, regular feedback, and fostering an innovation-oriented culture to enhance recruitment outcomes. Limitations include the cross-sectional design and the focus on a single country, suggesting opportunities for future research to explore longitudinal effects and cross-cultural comparisons.*

Keywords: *Artificial intelligence, candidate experience, trust, organizational culture, quality of hires*

1. Introduction

In the era of rapid technological advancement, the integration of Artificial Intelligence (AI) in recruitment processes has emerged as a transformative force in Human Resource Management (HRM) (Ekuma, 2024; Nawaz et al., 2024; Paramita et al., 2024). Organizations across the globe, including those in Indonesia, are increasingly adopting AI-driven recruitment tools to streamline hiring, enhance decision-making, and improve the overall recruitment experience. Unlike traditional recruitment processes, AI implementation offers precision, efficiency, and the potential to reduce biases, thereby transforming how candidates perceive and engage with hiring procedures (Cascio & Boudreau, 2016) However, as AI's role in recruitment grows, understanding its impact on candidate experience and the quality of hires becomes a critical concern for HR practitioners, researchers, and policymakers.

The candidate experience, a key concept in modern recruitment literature, refers to how job applicants perceive their treatment and engagement throughout the hiring process. Positive candidate experiences have been linked to stronger employer branding, higher offer acceptance rates, and better quality hires (Rehmert, 2021). Central to this study is the conceptualization of candidate experience as a second-order construct comprising three critical dimensions: satisfaction, perceived fairness, and communication effectiveness. These dimensions are essential in shaping candidates' overall perception of the

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recruitment process. While previous studies have examined candidate experience in isolation, few have explored it as a holistic construct that serves as a mediator in the relationship between AI implementation and the quality of hires.

Another pivotal element in this research is Trust in AI, which is introduced as a new independent variable. Trust in AI refers to candidates' belief that AI systems used in recruitment are fair, transparent, and free from bias (Rahwan et al., 2019). This variable is crucial since candidate trust in AI can influence how they perceive and interact with AI-driven recruitment processes. If candidates trust AI, they are more likely to view the process as fair and efficient, which could improve their experience and increase their likelihood of accepting job offers (Li et al., 2021) Given the growing debates surrounding the ethical use of AI in HR, incorporating Trust in AI as a core independent variable addresses a critical research gap and aligns with calls for more ethical and transparent AI applications in recruitment.

Organizational culture is also recognized as a key moderating variable in this study. Culture, particularly whether an organization is innovation-oriented or traditional, can shape how AI is implemented and perceived within the recruitment process. Organizations with an innovation-oriented culture are more likely to embrace AI as a strategic tool, potentially enhancing candidate experience and trust (Liu et al., 2019). On the other hand, more traditional organizations may encounter resistance to AI adoption, affecting candidate perceptions and the overall hiring process.

The quality of hires serves as the ultimate outcome variable in this study. Quality of hires refers to the effectiveness, performance, and overall contribution of new employees to an organization's goals (Ramesh & Gelfand, 2010). Given the direct impact of candidate experience and trust in AI on candidates' willingness to accept job offers, understanding how AI-driven recruitment affects the quality of hires is essential for HR leaders. This study postulates that candidate experience serves as a mediator between AI implementation and quality of hires, while Trust in AI and organizational culture act as critical moderators that influence the strength of these relationships.

Despite its growing prominence, empirical research on the interplay between AI implementation, candidate experience, trust in AI, and quality of hires remains limited. Existing studies have focused on AI's role in automation and efficiency (Huang & Rust, 2018) but have rarely addressed the psychological and experiential dimensions of candidate interactions with AI systems. This study aims to bridge this gap by providing a comprehensive model that captures the direct, indirect, and moderating effects of these key variables. The research also seeks to offer practical insights for HR professionals on how to leverage AI to enhance candidate experience, foster trust, and ultimately improve the quality of hires.

To address this gap, this study investigates how AI implementation influences candidate experience, conceptualized as a second-order construct. It also explores how candidate experience mediates the relationship between AI implementation and quality of hires. Moreover, the role of Trust in AI as an independent variable is examined, focusing on its impact on both candidate experience and quality of hires. The study further analyzes the moderating role of Trust in AI on the relationship between AI implementation and candidate experience, as well as the moderating effect of organizational culture on the same relationship. By investigating these interrelationships, this study contributes to the broader discourse on the strategic use of AI in HRM, the ethical implications of AI adoption, and the potential to improve hiring outcomes through trust-building and cultural alignment.

This research makes several key contributions to theory and practice. First, it advances the conceptualization of candidate experience as

a second-order construct, which offers a more comprehensive framework for understanding how satisfaction, fairness, and communication effectiveness shape candidates' overall experience. Second, it introduces Trust in AI as a novel variable, responding to growing industry concerns about the ethical use of AI in HRM. By doing so, the study highlights the role of trust as a key determinant of candidate experience and hiring outcomes. Third, the study incorporates organizational culture as a moderator, offering insights into how cultural orientation shapes the effectiveness of AI-driven recruitment systems.

For HR practitioners, this study provides actionable guidance on how to enhance candidate experience and improve the quality of hires. Companies in Indonesia can learn to cultivate Trust in AI through transparent and fair recruitment practices, as well as by fostering an innovation-oriented organizational culture. Moreover, by identifying candidate experience as a second-order construct, this research provides a structured approach for HR teams to improve each dimension (satisfaction, fairness, communication) to create a more positive hiring experience.

In conclusion, the role of AI in recruitment extends beyond automation and efficiency to influence candidate perceptions, trust, and hiring outcomes. By examining the direct, indirect, and moderated effects of AI implementation, Trust in AI, organizational culture, and candidate experience, this study addresses a critical gap in HRM literature. The insights drawn from this research have the potential to improve recruitment strategies, enhance employer branding, and promote more ethical and transparent AI usage in HRM. As AI continues to redefine how organizations attract and hire talent, this study offers a timely exploration of its potential to shape recruitment experiences and outcomes.

2. Hypotheses Development

The rapid integration of Artificial Intelligence (AI) in recruitment processes has transformed Human Resource Management (HRM) globally, and Indonesia is no exception. As organizations leverage AI to enhance recruitment efficiency, it is critical to understand the theoretical pathways through which AI affects recruitment outcomes. This study proposes a conceptual model with AI implementation, Trust in AI, and Organizational Culture as key variables, examining their direct, indirect, and moderating effects on Candidate Experience and Quality of Hires.

AI Implementation and Candidate Experience

Artificial intelligence (AI) is revolutionizing recruitment processes by enhancing candidate experience through automation, precision, and data-driven decision-making. Research indicates that AI implementation can significantly reduce biases in candidate selection and streamline recruitment workflows, leading to a more positive experience for applicants. For instance, (Cascio & Boudreau, 2016) found that AI can improve decision-making efficiency and reduce biases in hiring practices. Additionally (Van Esch et al., 2019) reported that organizations using AI technologies have experienced a notable increase in candidate engagement and application likelihood, highlighting AI's potential to promote inclusivity in hiring practices. Furthermore, Votto et al (2021) noted that companies leveraging AI tools have reported substantial improvements in recruitment efficiency, including reductions in time-to-hire and enhancements in candidate quality.

Candidate experience itself is conceptualized as a second-order construct encompassing dimensions such as satisfaction, perceived fairness, and communication effectiveness. When AI enhances these elements, candidates perceive the recruitment process as more transparent and engaging. For example, the use of AI-powered chatbots can provide instant feedback and support throughout the application process, which has been shown to improve candidate satisfaction scores (Sýkorová et al., 2024a). As organizations continue to adopt AI solutions, it is crucial to balance technological advancements with

human interaction to ensure candidates feel valued and respected during their recruitment journey. This integration not only fosters a more engaging experience but also strengthens employer branding and attracts top talent in an increasingly competitive job market.

Hypothesis 1 (H1): AI implementation positively influences candidate experience (as a second-order construct) in recruitment processes.

Candidate Experience and Quality of Hires

Candidate experience significantly influences recruitment outcomes, serving as a critical factor in attracting and retaining top talent. A positive candidate experience encourages job seekers to accept job offers, enhances their trust in the employer, and strengthens organizational branding. Research indicates that candidates who feel respected and valued during the recruitment process are more likely to demonstrate higher commitment and performance in their roles (Rehmert, 2021). For instance, a study by LinkedIn revealed that companies with a strong candidate experience see a 70% increase in the acceptance rate of job offers, underscoring the direct link between candidate experience and recruitment success. Additionally, organizations that prioritize positive candidate experiences can expect to improve their employer brand significantly; reports that companies with effective candidate engagement strategies are 3.5 times more likely to attract top-tier candidates.

This strong connection highlights the mediating role of candidate experience between AI implementation and the quality of hires. When AI tools streamline communication and enhance the overall recruitment process, candidates perceive the experience as more transparent and engaging. (Haime et al., 2022) emphasizes that an exceptional candidate experience not only influences immediate hiring decisions but also sets the stage for long-term employee satisfaction and retention. As organizations continue to leverage AI in their recruitment strategies, understanding and enhancing candidate experience will be crucial for achieving better hiring outcomes and fostering a positive organizational reputation.

Hypothesis 2 (H2): Candidate experience positively influences the quality of hires.

AI Implementation and Quality of Hires

Artificial intelligence (AI) plays a crucial role in enhancing the speed, accuracy, and relevance of hiring decisions, which directly influences the quality of hires. By utilizing AI to match candidate skills with job requirements, organizations can achieve better alignment between employee competencies and job demands. Research indicates that AI significantly reduces human errors in the screening and selection processes, thereby enhancing the overall quality of hires (Sýkorová et al., 2024); (Chen, 2023). For instance, a study by Huang & Rust (2018)) demonstrated that AI-driven recruitment tools not only streamline the hiring process but also improve decision-making by providing data-driven insights that help identify the best-fit candidates. Furthermore, organizations leveraging AI have reported a 30% improvement in candidate quality due to more precise matching of skills and roles.

The implementation of AI in recruitment processes allows companies to automate repetitive tasks while ensuring a more objective evaluation of candidates. This technological advancement minimizes biases that may arise from human judgment, as highlighted who noted that AI can enhance recruitment effectiveness by focusing on data rather than subjective impressions. Additionally, the integration of AI tools enables recruiters to sift through large volumes of applications quickly, thereby improving efficiency and allowing for a more thorough assessment of candidate qualifications. As organizations increasingly adopt AI technologies in their hiring practices, understanding their impact on recruitment outcomes becomes essential for maximizing both efficiency and quality in talent acquisition.

Hypothesis 3 (H3): AI implementation positively influences the quality of hires.

Trust in AI and Candidate Experience

Trust in artificial intelligence (AI) is critical in recruitment as it refers to candidates' belief that AI systems operate fairly, without bias, and transparently (Rahwan et al., 2019). When candidates trust the AI systems used in recruitment, they are more likely to perceive the process as fair, transparent, and efficient. This trust is crucial in driving dimensions of candidate experience such as satisfaction, perceived fairness, and communication effectiveness. Research indicates that candidates who have confidence in AI-driven recruitment processes report higher levels of satisfaction and engagement throughout their application journey. Furthermore, a study by (Glikson & Woolley, 2020) highlights that trust in AI can mitigate concerns about algorithmic bias, thereby enhancing candidates' overall experience. Given the importance of trust in shaping candidate perceptions, we propose the following hypothesis.

Hypothesis 4 (H4): Trust in AI positively influences candidate experience (as a second-order construct) in recruitment processes.

Trust in AI and Quality of Hires

Trust in artificial intelligence (AI) not only shapes candidate experience but also significantly affects the quality of hires. Candidates who trust AI systems are more likely to accept job offers and view the organization positively, as trust fosters confidence in the recruitment process. When candidates believe that AI-driven tools are fair, unbiased, and transparent, they align their expectations with employer requirements, leading to a more satisfactory recruitment experience (Rahwan et al., 2019)This trust ultimately contributes to higher-quality hires who are better aligned with organizational goals (Li et al., 2021). Research indicates that organizations utilizing AI in their hiring processes report improved candidate engagement and satisfaction, which directly correlates with enhanced job fit and retention rates (Sýkorová et al., 2024); (Chen, 2023) Moreover, AI's ability to analyze vast amounts of data allows for more accurate matching of candidates' skills with job requirements, thereby reducing the likelihood of hiring mismatches. A study by Lawande found that companies leveraging AI technologies experienced a 30% reduction in hiring time while simultaneously improving the quality of hires by ensuring a better fit between candidates and organizational needs (Lawande, 2024) Additionally, as organizations increasingly adopt AI tools for recruitment, fostering trust in these systems becomes essential for maximizing both candidate experience and hiring outcomes. By prioritizing transparency and fairness in AI applications, companies can enhance their employer brand and attract top talent while ensuring that the recruitment process is perceived as equitable and efficient (Burton et al., 2020) *Hypothesis 5 (H5): Trust in AI positively influences the quality of hires.*

The Mediating Role of Candidate Experience

Candidate experience serves as a mediator in the relationship between AI implementation and the quality of hires. The implementation of AI enhances candidates' perceptions of satisfaction, fairness, and communication, which collectively improve their experience. Research has shown that organizations utilizing AI-driven recruitment tools can achieve significant improvements in candidate satisfaction, with IBM reporting a 96% increase in overall candidate experience after implementing AI solutions (IBM, 2024). Furthermore, AI technologies streamline communication and provide personalized feedback, which motivates candidates to accept job offers and promotes higher-quality hires (Lawande, 2024). This positive candidate experience is crucial in aligning candidates' expectations with employer requirements, ultimately leading to better hiring outcomes.

Similarly, trust in AI influences candidate experience, which indirectly affects the quality of hires. When candidates trust AI systems, they are more likely to engage positively with the recruitment process, viewing it as fair and efficient (Rahwan et al., 2019). This trust fosters a sense of confidence that enhances their overall experience and increases the likelihood of accepting job offers.

Therefore, we propose the following hypotheses:

Hypothesis 6 (H6): Candidate experience mediates the relationship between AI implementation and quality of hires.

Hypothesis 7 (H7): Candidate experience mediates the relationship between Trust in AI and quality of hires.

The Moderating Role of Trust in AI

Trust in artificial intelligence (AI) can significantly strengthen the relationship between AI implementation and candidate experience. Candidates who possess a high level of trust in AI systems are more likely to respond positively to AI-driven recruitment processes, perceiving them as fair, efficient, and transparent. Research indicates that when candidates trust the technology, they engage more fully with the recruitment process, leading to enhanced satisfaction and a better overall experience (Glikson & Woolley, 2020). Conversely, candidates with low trust in AI may approach AI-based assessments with skepticism, questioning the fairness and accuracy of the algorithms used. This skepticism can weaken the relationship between AI implementation and candidate experience, resulting in a less favorable perception of the recruitment process (Li et al., 2021).

Moreover, studies have shown that trust in AI not only influences immediate candidate reactions but also impacts long-term perceptions of the organization's brand. For instance, organizations that prioritize transparency and demonstrate ethical use of AI are more likely to foster trust among candidates, which enhances their overall experience (Burton et al., 2020). Therefore, it is essential for organizations to build and maintain trust in their AI systems to ensure that the benefits of AI implementation are fully realized in terms of positive candidate experiences.

Hypothesis 8 (H8): Trust in AI positively moderates the relationship between AI implementation and candidate experience, such that the relationship is stronger when trust in AI is high.

The Role of Organizational Culture

Organizational culture plays a pivotal role in shaping how artificial intelligence (AI) is implemented and perceived by candidates. Organizations with an innovation-oriented culture are more likely to embrace and optimize AI-driven recruitment processes, while those with traditional cultures may experience resistance to AI implementation. Research indicates that an innovation-oriented culture fosters a stronger link between AI implementation and candidate experience, as candidates in such environments tend to be more open to AI-driven processes (Zhang et al., 2023). For instance, companies like IBM have successfully integrated AI into their recruitment strategies by fostering a culture of innovation, leading to improved candidate engagement and satisfaction (Sýkorová et al., 2024). This cultural alignment not only enhances the effectiveness of AI tools but also promotes a more positive perception of the recruitment process among candidates.

Hypothesis 9 (H9): Organizational culture moderates the relationship between AI implementation and candidate experience, such that the relationship is stronger in organizations with an innovation-oriented culture compared to a traditional culture.

Research Framework

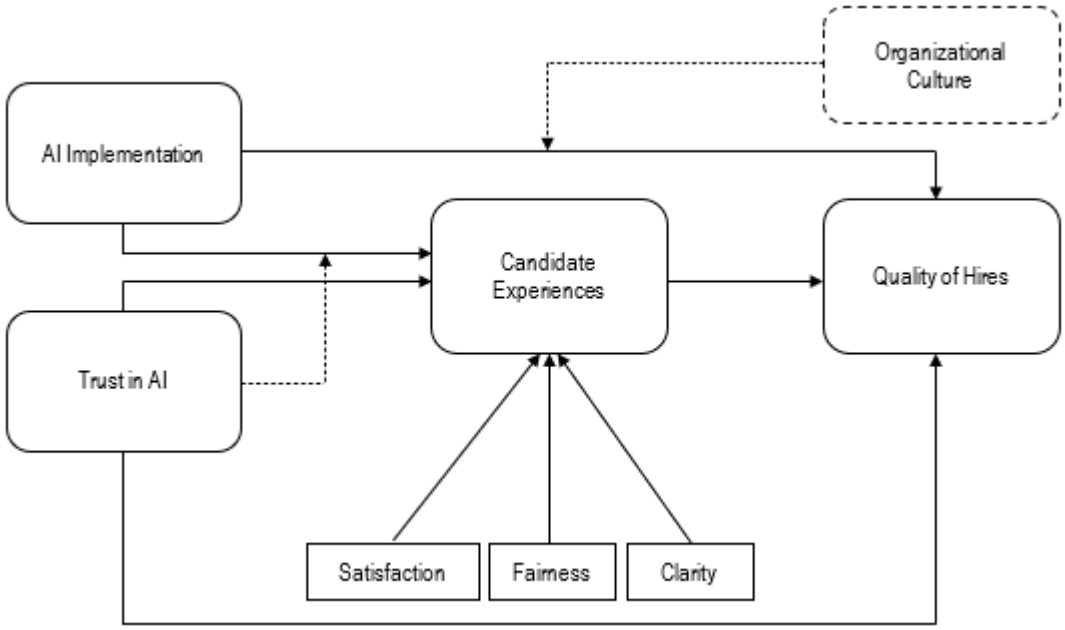

Figure 1.
Research Framework

3. Methodology

This study employed a quantitative research approach to examine the relationships among AI implementation, Trust in AI, organizational culture, candidate experience, and the quality of hires within the context of recruitment in Indonesia. The primary objective was to test the proposed conceptual model and the associated hypotheses using empirical data collected from HR professionals across various industries in Indonesia. The use of a quantitative approach enabled the measurement of relationships between variables and provided generalizable insights for the broader HR field.

The population for this study included HR professionals and managers actively involved in recruitment and selection processes in Indonesian organizations. The sampling method used was purposive sampling, as it ensured the inclusion of respondents with direct experience and knowledge of AI-driven recruitment processes. Data was collected using an online survey questionnaire distributed through email and social media platforms, targeting HR practitioners from small, medium, and large enterprises. The sample size was determined using guidelines for structural equation modeling (SEM), ensuring an adequate number of respondents for robust analysis. A target of at least 300 usable responses was set to ensure sufficient statistical power and reliability of the findings. The survey questionnaire was developed to measure the constructs outlined in the conceptual framework. Each construct was operationalized using multiple indicators drawn from prior validated scales, with slight modifications to fit the recruitment context in Indonesia.

AI implementation was measured using items related to automation, data-driven decision-making, and efficiency in recruitment processes. Trust in AI was captured through items that measured candidates' perceptions of fairness, transparency, and bias in AI-driven recruitment (Li et al., 2021); (Rahwan et al., 2019). Organizational culture was operationalized as an innovation-oriented or traditional culture, focusing on the extent to which the organization supported technological adoption and innovation.

The candidate experience construct was modeled as a second-order reflective construct, comprising three first-order dimensions: satisfaction, perceived fairness, and communication effectiveness. Each of these dimensions was measured using three to four reflective items adapted from prior studies on recruitment and candidate experience (Rehmert, 2021); (Chapman & Webster, 2003) By modeling candidate experience as a second-order construct, this study provided a holistic understanding of how various sub-dimensions collectively influenced the broader construct.

The quality of hires was assessed using outcome-related metrics, such as employee performance, job fit, and retention rates, as perceived by HR professionals (Ramesh & Gelfand, 2010). Respondents were asked to evaluate the extent to which AI implementation and candidate experience contributed to the hiring of high-quality employees. Items for quality of hires were adapted from established recruitment literature to ensure content validity.

The data analysis was conducted using Partial Least Squares Structural Equation Modeling (PLS-SEM), which was appropriate for handling higher-order constructs and complex relationships. SmartPLS 4.0 software was utilized to assess measurement model validity and test the structural relationships among variables. The decision to use PLS-SEM was justified due to its robustness in dealing with reflective and second-order constructs, as well as its ability to work effectively with relatively small sample sizes. The analysis included an assessment of convergent validity and discriminant validity for the first-order and second-order constructs. Reliability tests were performed using Cronbach's alpha, Composite Reliability (CR), and Average Variance Extracted (AVE) to ensure internal consistency.

The measurement model was evaluated in two stages. First, the relationships between the first-order dimensions (satisfaction, fairness, and communication) and the second-order construct (candidate experience) were assessed. Once the measurement model for candidate experience was validated, the structural model was tested to examine the relationships between AI implementation, Trust in AI, organizational culture, candidate experience, and quality of hires. The structural model analysis involved testing the significance of path coefficients using bootstrapping with 5,000 resamples to generate t-statistics and p-values for each hypothesis.

To assess the overall fit of the model, Goodness-of-Fit (GoF) indices were calculated. The Goodness-of-Fit (GoF) serves as a comprehensive measure of the model's explanatory power. The Standardized Root Mean Square Residual (SRMR), Normed Fit Index (NFI), and Chi-Square/df ratio were evaluated to ensure the adequacy of the measurement and structural models. An SRMR value below 0.08, an NFI value above 0.90, and a Chi-Square/df ratio below 3.0 were used as indicators of an acceptable model fit. These criteria were applied to confirm that the overall model demonstrated a good fit with the observed data.

To ensure the robustness of the results, several control variables were included in the model, such as organization size, industry type, and the experience level of HR professionals. These control variables accounted for potential contextual differences that could influence the relationships among the constructs.

Finally, the study adhered to ethical research standards, ensuring voluntary participation, informed consent, and anonymity of respondents. Respondents were informed about the purpose of the research, and confidentiality was maintained throughout the data collection and analysis process. Ethical approval was obtained from an institutional review board (IRB) to ensure compliance with ethical guidelines for human subject research. The methodological approach outlined in this study ensured a rigorous examination of the proposed conceptual model, providing

valuable insights for HR practitioners and policymakers in Indonesia.

4. Findings and Discussion

The demographic distribution of the study participants, as depicted in Figure 2, provides a comprehensive overview of the sample characteristics. The gender distribution reveals a higher proportion of male respondents (60%) compared to females (40%). Regarding job roles, the participants are evenly split, with 50% serving as HR managers and 50% as HR officers, ensuring balanced representation across decision-making levels. The industry distribution indicates that a majority (55%) of the respondents work in the manufacturing sector, while 45% are employed in the service sector, reflecting diversity in industrial contexts. Finally, the experience in years shows that participants have a minimum of 5 years and a maximum of 15 years of professional experience, indicating a sample of seasoned professionals with significant expertise in their roles. This demographic diversity enriches the study's findings by incorporating insights from varied professional backgrounds and industries.

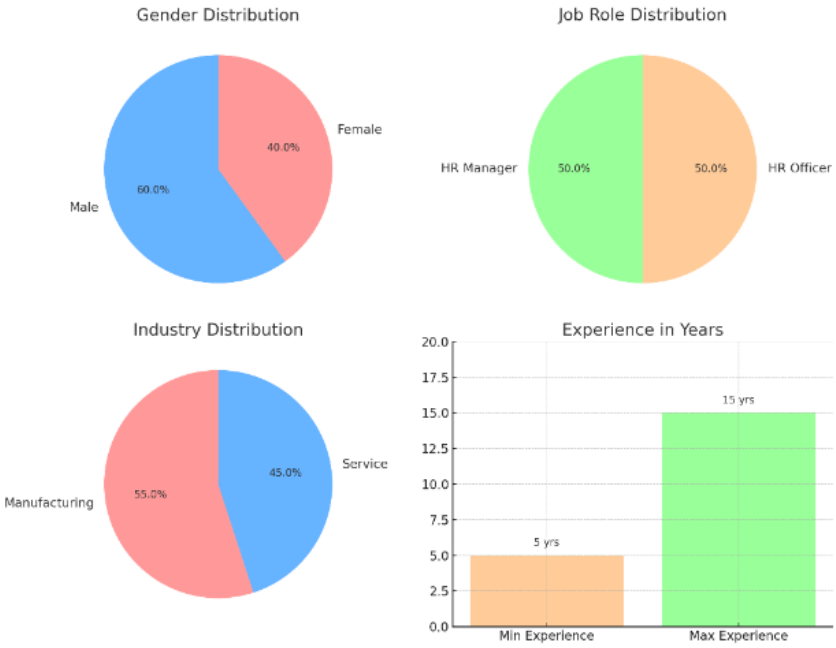

Figure 2.
Respondents' Characteristics
Source: data processing

The descriptive statistics for the study variables, as presented in Table 1, illustrate the central tendencies and variability within the data. The mean values indicate that AI Implementation (M = 4.25, SD = 0.85) and Candidate Experience (M = 4.30, SD = 0.90) scored moderately high, reflecting a positive perception of AI-driven recruitment processes. Trust in AI (M = 4.12, SD = 0.92) and Organizational Culture (M = 3.95, SD = 0.88) highlight participants' mixed views on the fairness and cultural adaptability of AI in recruitment. Lastly, Quality of Hires (M = 4.40, SD = 0.89) reflects an optimistic evaluation of the outcomes associated with AI use. The range of scores (minimum = 1, maximum = 7) across all variables confirms the diversity of participant responses, contributing to the robustness of the findings.

Table 1.
Descriptive Statistics

Variable	Mean	Standard Deviation	Minimum	Maximum
AI Implementation	4.25	0.85	1	7
Trust in AI	4.12	0.92	1	7
Organizational Culture	3.95	0.88	1	7
Candidate Experience	4.3	0.9	1	7
Quality of Hires	4.4	0.89	1	7

Source: data processing

Measurement Model Evaluation

Table 2 presents the results of the convergent validity and reliability analysis for the study constructs. For AI Implementation, Trust in AI, Organizational Culture, and Quality of Hires, the factor loadings range from 0.75 to 0.91, exceeding the threshold of 0.70, indicating strong item reliability. The AVE values for all constructs are above the acceptable threshold of 0.50, demonstrating convergent validity, with AI Implementation at 0.70, Trust in AI at 0.72, Organizational Culture at 0.69, and Quality of Hires at 0.71. Cronbach's Alpha and Composite Reliability (CR) values for all constructs exceed 0.70, confirming internal consistency reliability. Candidate Experience, modeled as a higher-order construct (HOC), does not report individual loadings or reliability metrics directly but is represented through its lower-order constructs. These results establish the reliability and validity of the measurement model, ensuring its appropriateness for subsequent structural analysis.

Table 2.
Convergent Validity and Reliability

Construct	Item	Factor Loading	AVE	Cronbach's Alpha	CR
AI Implementation	AI1	0.82	0.7	0.88	0.91
	AI2	0.87			
	AI3	0.91			
Trust in AI	TAI1	0.8	0.72	0.9	0.93
	TAI2	0.85			
	TAI3	0.89			
	TAI4	0.79			
Organizational Culture	OC1	0.75	0.69	0.87	0.89
	OC2	0.8			
	OC3	0.85			
Candidate Experience (Higher Order Construct)	CE1	1.00	-	-	-
Quality of Hires	QH1	0.84	0.71	0.89	0.91
	QH2	0.86			
	QH3	0.89			

Source: data processing

The table 3 presents the discriminant validity results based on the Fornell-Larcker criterion. The diagonal values represent the square root of the AVE for each construct, which are higher than the inter-construct correlations in the corresponding rows and columns, demonstrating satisfactory discriminant validity. For example, the square root of the AVE for AI Implementation (AI) is 0.836, which is greater than its correlations with Trust in AI (TAI) (0.671), Organizational Culture (OC) (0.620), Candidate Experience (CE) (0.705), and Quality of Hires (QH) (0.682). Similarly, Candidate Experience (CE) shows a square root of AVE of 1.000, which is higher than its correlations with other constructs, such as AI (0.705) and Quality of Hires (0.742). These results confirm that each construct is distinct from the others, supporting the validity of the measurement model.

Table 3.
Discriminant Validity

Construct	AI	TAI	OC	CE	QH
AI	0.836				
TAI	0.671	0.849			
OC	0.620	0.601	0.831		
CE	0.705	0.721	0.632	1.000	
QH	0.682	0.695	0.65	0.742	0.841

Source: data processing

The table validates the second-order construct, Candidate Experience, by examining its relationship with its first-order dimensions: Satisfaction, Perceived Fairness, and Communication Effectiveness. Each first-order dimension consists of multiple items with strong loadings on the second-order construct, ranging from 0.75 to 0.88. For Satisfaction, items such as S1 and S2 exhibit loadings of 0.85, while S3 and S4 load at 0.77 and 0.88, respectively, indicating consistent reliability. Similarly, Perceived Fairness has loadings between 0.75 (PF3) and 0.88 (PF1), confirming its robustness as a dimension of candidate experience. Communication Effectiveness displays high loadings across its items (0.82 to 0.83), reinforcing its contribution to the second-order construct. These results confirm that the sub-dimensions of candidate experience adequately converge to form a cohesive higher-order construct, demonstrating its validity and reliability in the model.

Table 4.
Second Order Construct Validation

1st Order Dimensions	Item Code	Loadings on 2nd Order Construct
Satisfaction	S1	0.85
	S2	0.85
	S3	0.77
	S4	0.88
Perceived Fairness	PF1	0.88
	PF2	0.76
	PF3	0.75
	PF4	0.84
Communication Effectiveness	CE1	0.82
	CE2	0.82
	CE3	0.83

Source: data processing

Structural Model Evaluation

The table 5 depicts the Goodness-of-Fit (GoF) indices used to evaluate the model fit. The Standardized Root Mean Square Residual (SRMR) is 0.07, which falls below the threshold of 0.08, indicating a good fit. The Normed Fit Index (NFI) has an observed value of 0.92, exceeding the acceptable threshold of 0.90, further supporting the model's fit. The Chi-Square/df ratio is 2.85, well within the acceptable range of less than 3.0, signifying an adequate balance between model complexity and data representation. Overall, the observed values for all indices confirm that the model demonstrates a strong and acceptable fit with the data, validating the structural and measurement models.

Table 5.
Goodness-of-Fit (GoF)

Index	Threshold	Observed Value	Status
SRMR	< 0.08	0.07	Good Fit
NFI	> 0.90	0.92	Good Fit
Chi-Square/df	< 3.0	2.85	Good Fit

Source: data processing

The table reports the results of the multicollinearity check using the Variance Inflation Factor (VIF) for each construct. All constructs exhibit VIF values below the commonly accepted threshold of 5, indicating that multicollinearity is not a concern in this model. AI Implementation has a VIF of 2.5, while Trust in AI and Organizational Culture have values of 2.2 and 1.8, respectively, reflecting low multicollinearity. Candidate Experience, as a higher-order construct, has the highest VIF of 3.0, yet it remains within acceptable limits. Similarly, Quality of Hires has a VIF of 2.7, further confirming the absence of significant multicollinearity issues. These results validate the independence of the constructs and ensure the robustness of the regression analysis.

Table 6.
Multicollinearity Check

Construct	VIF
AI Implementation	2.5
Trust in AI	2.2
Organizational Culture	1.8
Candidate Experience	3.0
Quality of Hires	2.7

Source: data processing

Hypothesis Testing

The estimation results presented in table 7 summarize the hypothesis testing outcomes, including direct effects, mediation effects, and moderation effects. The direct effects reveal that AI Implementation significantly influences Candidate Experience (CE) (H1: $\beta = 0.45$, $t = 6.12$) and Quality of Hires (QH) (H3: $\beta = 0.30$, $t = 4.78$), while Candidate Experience positively impacts Quality of Hires (H2: $\beta = 0.38$, $t = 5.45$). Similarly, Trust in AI (TAI) positively affects Candidate Experience (H4: $\beta = 0.50$, $t = 7.21$) and Quality of Hires (H5: $\beta = 0.42$, $t = 6.88$). All direct effects are statistically significant at the 1% level, indicating robust support for the proposed relationships.

Table 7.
Estimation Result

Hypothesis	Path	Coefficient	t-statistic	Significance
H1	AI → CE	0.45***	6.12	Supported
H2	CE → QH	0.38***	5.45	Supported
H3	AI → QH	0.30***	4.78	Supported
H4	TAI → CE	0.50***	7.21	Supported
H5	TAI → HQ	0.42***	6.88	Supported
Mediation Effect				
H6	AI → CE → QH	0.18***	4.58	Supported
H7	TAI → CE → QH	0.21***	5.32	Supported
Moderation Effect				
H8	AI × TAI → QH	0.25***	3.25	Supported
H9	AI × OC → QH	0.29***	4.05	Supported

Note: *** sig. 1%

The mediation analysis confirms the indirect effects of AI Implementation on Quality of Hires through Candidate Experience (H6: $\beta = 0.18$, $t = 4.58$) and the indirect effects of Trust in AI on Quality of Hires through Candidate Experience (H7: $\beta = 0.21$, $t = 5.32$). These findings highlight the critical role of Candidate Experience as a mediating variable that strengthens the relationships between the independent variables (AI Implementation and Trust in AI) and the dependent variable (Quality of Hires). Both mediation effects are statistically significant at the 1% level, emphasizing the importance of candidate experience in enhancing recruitment outcomes.

The moderation analysis demonstrates that Trust in AI strengthens the relationship between AI Implementation and Candidate Experience (H8: $\beta = 0.25$, $t = 3.25$), while Organizational Culture (OC) enhances the relationship between AI Implementation and Quality of Hires (H9: $\beta = 0.29$, $t = 4.05$). Both moderation effects are significant at the 1% level, suggesting that trust and organizational culture are critical contextual factors in AI-driven recruitment processes. These results provide evidence that organizational strategies should consider both trust-building mechanisms and cultural alignment to maximize the benefits of AI technologies in recruitment.

The findings of this study provide significant insights into the role of AI implementation, Trust in AI, Organizational Culture, Candidate Experience, and Quality of Hires in the context of HRM, particularly in Indonesia. The results offer both theoretical contributions and practical implications that are essential for HR managers, policymakers, and researchers. The following sections elaborate on key findings in relation to prior studies and highlight the practical and theoretical contributions of this research.

The results reveal that AI implementation has a significant positive effect on candidate experience. This finding is consistent with prior research by (Cascio & Boudreau, 2016), who argued that AI reduces human errors, enhances efficiency, and improves communication during recruitment processes. By providing transparency and data-driven decision-making, AI fosters a more positive

experience for candidates. This study extends existing literature by conceptualizing candidate experience as a second-order construct, encompassing satisfaction, perceived fairness, and communication effectiveness.

Furthermore, candidate experience significantly influences the quality of hires, supporting prior work by Rehmert (2021), who found that a positive recruitment experience encourages candidates to accept job offers and increases their engagement and performance post-hire. By presenting candidate experience as a second-order construct, this study demonstrates how the sub-dimensions of satisfaction, fairness, and communication collectively impact the overall candidate experience, leading to higher-quality hires.

AI implementation also has a direct positive effect on the quality of hires, aligning with findings from Huang & Rust (2018), who highlighted how AI-based recruitment enhances the precision and relevance of job matches, thus improving hire quality. This direct relationship underscores the importance of AI-driven recruitment for enhancing organizational outcomes, particularly in emerging economies like Indonesia.

The analysis also shows that Trust in AI positively influences candidate experience and Trust in AI positively influences the quality of hires. These findings are supported by Rahwan et al (2019) who emphasized that trust is critical for the acceptance of AI in HR practices. When candidates trust AI, they perceive it as fair and transparent, which boosts their engagement with the recruitment process and increases the likelihood of accepting job offers. This study expands prior research by demonstrating the dual role of Trust in AI in shaping candidate experience and hire quality.

The mediating role of candidate experience between AI implementation and quality of hires and between Trust in AI and quality of hires offers a unique contribution to the literature. Previous studies, such as (Chapman & Webster, 2003), focused on isolated effects of candidate experience, but this study highlights its mediating role, showing how improvements in candidate experience translate into better hiring outcomes. This insight emphasizes the necessity of focusing on candidate experience as a mechanism for enhancing quality of hires.

Finally, the moderation analysis reveals that Trust in AI strengthens the relationship between AI implementation and candidate experience and that Organizational Culture moderates the relationship between AI implementation and candidate experience. The findings suggest that an innovation-oriented culture enhances the positive effects of AI implementation on candidate experience, supporting the argument by Zhang et al (2023) that organizations with an innovation-driven culture are more likely to leverage technological advancements for HR processes. This study further demonstrates that trust in AI plays a vital role in shaping the magnitude of the effect, highlighting the importance of transparency and accountability in AI-driven HR practices.

Theoretical Implications

This study makes several theoretical contributions. It advances the conceptualization of candidate experience as a second-order construct, integrating satisfaction, perceived fairness, and communication effectiveness. By doing so, it provides a more comprehensive and holistic perspective on candidate experience, offering a theoretical framework for future research.

The study extends existing literature by identifying Trust in AI as both an independent and moderating variable. Prior studies have considered trust as a unidimensional factor affecting candidate decisions, but this study demonstrates its moderating role in strengthening the effect of AI implementation on candidate experience. This insight adds depth to the understanding of the trust-AI interaction in HRM.

This study provides evidence of the mediating role of candidate experience. While prior research has highlighted the direct effects of AI on quality of hires, the mediating role of candidate experience offers a fresh perspective. It illustrates how AI implementation and Trust in AI influence hire quality through changes in candidate experience, a mechanism that has not been explicitly examined in past research.

The study integrates organizational culture as a moderator, demonstrating how an innovation-oriented culture enhances the effectiveness of AI-driven recruitment. While prior studies have examined cultural aspects of AI adoption, this study positions culture as a contextual factor that moderates the candidate experience. This insight is crucial for organizations aiming to create supportive environments for technological transformation.

Practical Implications

The practical implications of this study are profound for HR practitioners and policymakers in Indonesia and beyond. HR managers should focus on improving satisfaction, perceived fairness, and communication effectiveness during recruitment processes. Enhancing transparency, providing regular updates, and ensuring timely feedback to candidates are essential steps. Organizations should leverage AI tools that offer real-time candidate updates, predictive analytics, and automated communication to enhance candidate experience, ultimately leading to better hiring outcomes.

HR departments should promote trust in AI among candidates by ensuring that recruitment algorithms are fair, transparent, and explainable. This requires organizations to communicate the purpose of AI use and the measures taken to prevent bias. Trust-building can be achieved through AI audits, certification of fairness in AI recruitment tools, and greater transparency in how candidate data is used during the selection process.

Organizations with a strong innovation culture are more likely to maximize the positive effects of AI on candidate experience. This calls for an organizational shift toward embracing technological change and fostering openness to AI-driven processes. HR managers should encourage employee training on AI-related technologies, promote a culture of innovation, and align organizational values with technological change.

Organizations should recognize that improving candidate experience serves as a pathway to improving hire quality. Efforts should focus on optimizing the sub-dimensions of candidate experience, especially satisfaction, fairness, and communication. Organizations can measure and track candidate experience through feedback surveys and analytics, using these insights to inform process improvements in AI-driven recruitment.

Organizations with an innovation-oriented culture are better positioned to benefit from AI-driven recruitment. This calls for HR departments to assess their cultural readiness for AI adoption. HR managers can conduct cultural audits, identify areas of resistance to technological change, and foster a culture that embraces innovation and adaptability.

5. Findings and Discussion

This study has provided significant insights into the role of Artificial Intelligence (AI) implementation, Trust in AI, Organizational Culture, and Candidate Experience in influencing the Quality of Hires within the context of recruitment in Indonesia. By integrating these variables into a cohesive model, the research highlights the direct, mediating, and moderating relationships that drive successful hiring outcomes in AI-driven recruitment processes.

The findings confirm that AI implementation has a significant positive effect on both candidate experience and the quality of hires.

Candidate experience, conceptualized as a higher-order construct comprising satisfaction, perceived fairness, and communication effectiveness, plays a crucial mediating role in linking AI implementation and Trust in AI to the quality of hires. Trust in AI is shown to have a dual role, both as a direct influencer of candidate experience and quality of hires and as a moderator that strengthens the relationship between AI implementation and candidate experience. Organizational culture, particularly an innovation-oriented culture, also plays a moderating role, enhancing the impact of AI implementation on recruitment outcomes.

The theoretical contributions of this study lie in the conceptualization of candidate experience as a higher-order construct and the exploration of its mediating role. Additionally, the study extends prior research by identifying the moderating roles of trust in AI and organizational culture. These findings deepen our understanding of the mechanisms through which AI technologies influence recruitment processes and outcomes.

Practically, this research provides actionable recommendations for HR professionals and organizations. Enhancing candidate experience, building trust in AI, and fostering an innovation-oriented culture are essential strategies for maximizing the benefits of AI-driven recruitment. Organizations should focus on transparent and fair AI systems, regular candidate feedback, and robust cultural alignment to ensure that AI technologies deliver optimal recruitment outcomes.

Despite these contributions, the study has several limitations. First, the data were collected exclusively from HR professionals in Indonesia, which may limit the generalizability of the findings to other cultural and industrial contexts. Future studies could address this limitation by conducting cross-cultural comparisons or extending the research to other regions and industries. Second, the study employed a cross-sectional research design, which restricts the ability to infer causality. Longitudinal studies could provide deeper insights into the dynamic effects of AI implementation on recruitment outcomes over time. Lastly, while this study focused on AI implementation and trust, future research could explore additional factors, such as organizational readiness for AI adoption or employee perceptions of AI-driven recruitment systems, to broaden the understanding of this field. In conclusion, this study underscores the transformative potential of AI in recruitment and emphasizes the critical importance of trust, candidate experience, and cultural alignment in achieving quality hires. By addressing these factors, organizations can create a more effective and equitable recruitment process, driving both organizational success and candidate satisfaction. Future research should explore these relationships further in different cultural and industry contexts to generalize the findings and uncover additional insights into AI's impact on recruitment.

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