



Challenges Faced by Ex-Offenders in Securing Employment in Green Job Sectors - Systematic Literature Review

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ABSTRACT

This systematic literature review explores the challenges ex-offenders face in securing employment within the growing green job sector, with a specific focus on studies published in Asia between 2000 and 2014. Guided by the ROSES (Reporting Standards for Systematic Evidence Syntheses) protocol, this study follows a structured and transparent process. Four relevant studies were selected from reputable databases, including Scopus, ScienceDirect, Google Scholar, and BASE-Search. This study identifies several recurring barriers: employer discrimination, limited access to green skills training, weak policy support, and persistent social stigma. These challenges not only reduce employment opportunities for ex-offenders but also hinder broader efforts to build inclusive and sustainable labour markets. The findings offer valuable insights for employers, policymakers, and rehabilitation programs. They emphasize the need for targeted training programs, supportive policies, and fair hiring practices. Ultimately, this study highlights the potential of green jobs as a pathway to successful reintegration, reduced recidivism, and a more socially just and environmentally sustainable society.

1. Introduction

Green jobs focus on protecting or restoring the environment, encompassing industries such as sustainable agriculture, waste management, energy efficiency, and renewable energy. As the demand for environmental sustainability grows, these industries create new work opportunities, offering a potential pathway for ex-offenders to reintegrate into society. Ex-offenders have served their sentences after being convicted of crimes and face significant challenges when seeking employment (Morzenti & Gringeri, 2021). These challenges are compounded by broader issues such as environmental sustainability, economic inequality, and social equity (Gantt-Howrey et al., 2024; Jones, 2016; Vickers & Lyon, 2014).

The green sector provides promising opportunities for individuals with unconventional backgrounds, including ex-offenders. Industries such as urban agriculture, recycling, and solar panel installation often

prioritise practical skills and work experience over formal educational qualifications (Kowalska et al., 2022). These roles are frequently accompanied by long-term training programs that equip ex-offenders with marketable skills, reducing their likelihood of re-offending. Additionally, green jobs offer a pathway for individuals facing systemic barriers to stable employment, fostering inclusivity and community support (Karachalios & Kotsios, 2023). Ex-offenders can contribute to climate change mitigation through these roles while building sustainable careers.

Green jobs foster a supportive community atmosphere, often rooted in collaborative workspaces and community-oriented projects (Araújo et al., 2018). Such environments combat isolation, encourage social connections and provide a structured support system for individuals reintegrating into society. For ex-offenders, engaging in meaningful work that benefits the environment and society can enhance self-esteem and reduce the risk of recidivism. Stable employment prevents re-offending (Chu & Daffern, 2024).

Promoting access to green jobs for ex-offenders aligns with social justice and equity principles. Individuals with criminal records often face systemic barriers that perpetuate generational poverty and inequality. Inclusive approaches within green industries address these challenges, offering solutions that benefit individuals and the planet (Phuchongpravech, 2020). Closing the gap requires job training, guidance, and support services tailored to ex-offenders' needs. However, significant barriers remain. The stigma surrounding a criminal history is a major obstacle for ex-offenders seeking employment (Ali et al., 2017; Anazodo et al., 2019; Feingold, 2021; Milfeld et al., 2021; Sheppard & Ricciardelli, 2020). Employers often perceive ex-offenders as untrustworthy or risky hires (Khasni et al., 2021). Additionally, many ex-offenders lack formal education or work experience, further reducing their employment prospects. Studies reveal that when comparing two otherwise identical candidates, an ex-offender has a 60–75% lower chance of being hired than a non-offender (Holzer et al., 2007).

Structural barriers, such as limited access to vocational training and education, further complicate matters (Handayani et al., 2020). The labour market increasingly demands specialised skills, leaving many ex-offenders, who often lack these qualifications, struggling to compete (Formon et al., 2018). Programs offering vocational training and job readiness support are critical for equipping ex-offenders with the skills needed to succeed (Bollinger & Yelowitz, 2021). Despite these challenges, the benefits of hiring ex-offenders in green jobs are becoming more widely recognised. Stable employment promotes reintegration, reduces repeat offences, and fosters a sense of purpose and belonging (Holloway & Wiener, 2020; Ramakers et al., 2015). Ex-offenders also bring unique perspectives and lived experiences that can contribute to innovation and diversity in the green economy.

Policy initiatives like the "Ban the Box" movement aim to reduce discrimination by removing questions about criminal history from job applications (Griffith & Young, 2017; Rose, 2021; Sherrard, 2020; Zhang & Li, 2022). While effective in some cases, care must be taken to prevent statistical discrimination, where employers infer characteristics about candidates based on demographic stereotypes (Solinas-Saunders & Stacer, 2017). Collaborative efforts involving environmentally conscious businesses, vocational centres, and community organisations can further support ex-offenders reintegration (Khasni et al., 2021).

The intersection of green jobs and ex-offender employment presents opportunities for environmental justice, social equity, and economic empowerment. While challenges persist, targeted policies and programs can harness the potential of this underutilised workforce to promote a more inclusive and sustainable future. Green jobs help ex-offenders build stable lives and foster community, belonging, and purpose, benefiting society and the environment (Sukabdi & Wheeler, 2024). Amidst this dynamism, the spotlight is increasingly turning towards women entrepreneurs, acknowledging their vital role in driving economic growth, fostering innovation, and promoting inclusivity.

2. Literature Review

There remains a significant gap in research on integrating ex-offenders into green job sectors. While prior studies have documented the challenges ex-offenders face, such as stigma and legal restrictions in the labour market (Ali et al., 2017; Griffith & Young, 2017), limited attention has been given to their inclusion in green jobs (Bennett et al., 2018). With the rapid growth of the green economy, new job opportunities are being created, and understanding how ex-offenders can access these positions is crucial for their rehabilitation and reintegration (Georgeson & Maslin, 2019). However, the skills required in green jobs and the specific barriers ex-offenders face in these industries remain underexplored.

This study identifies the legal, social, and economic challenges ex-offenders encounter when seeking employment in green sectors. Policies like "Ban the Box" aim to reduce discrimination (Griffith & Young, 2017). Yet, their impact on hiring practices in the green economy, particularly in addressing racial prejudice, has not been thoroughly investigated. The research focuses on understanding employer attitudes, the skills needed for green jobs, and the barriers preventing ex-offenders from accessing these opportunities.

The central question guiding this study is, "What challenges do ex-offenders face when seeking employment in green job sectors?" The study aims to identify obstacles ex-offenders encounter in Malaysia's green job sectors and explore how targeted programs and community support can enhance their workforce reintegration. This research examines how employer perceptions, legal frameworks, and socio-economic factors hinder hiring ex-offenders in green industries. It also explores strategies to reduce stigma in hiring processes, advocating for inclusive practices and community-based programs. Employers and policymakers are encouraged to adopt measures that lower entry barriers and promote equal opportunities in green sectors.

The potential for green jobs is particularly notable in Asia, with countries like the Philippines, Indonesia, and Malaysia experiencing growth in fields such as renewable energy, waste management, and sustainable agriculture (Ismail et al., 2020; Rangaswamy et al., 2023; Sukabdi & Wheeler, 2024). These industries offer numerous entry-level opportunities due to their labour-intensive nature. However, cultural stigma and limited vocational training in the green economy hinder the integration of ex-offenders. Mentorship and targeted skill development programs ensure this underrepresented group is not left behind (Rahmaningtyas et al., 2023; Rangaswamy et al., 2023).

The Malaysian government has launched eco-friendly projects to meet sustainable growth targets, including solar farms and national recycling initiatives (Kaliappan & Hamid, 2021). However, systemic issues, such as stringent background checks and ambiguous rehabilitation policies, make it challenging for ex-offenders to participate in these programs. Addressing these obstacles through public-private partnerships and inclusive hiring policies is essential for building a supportive legal and social foundation for ex-offenders in green jobs (Tharshini et al., 2018).

Community-based organisations and non-profits in Asia have been at the forefront of increasing representation in sustainable industries. Initiatives in the region, such as training inmates in organic farming and solar panel installation, offer scalable models for rehabilitation and skill development (Niyogi, 2022). Public-private collaborations can expand these programs, enabling broader participation and better outcomes. To create meaningful opportunities for ex-offenders, the societal stigma surrounding their employment must be dismantled. Public awareness campaigns can help shift perceptions by showcasing success stories of ex-offenders thriving in green careers. Emphasising the dual benefits of inclusive hiring—advancing social equality and promoting environmental sustainability—can foster widespread support, particularly in regions where negative stereotypes about ex-offenders persist (Zainal et al., 2024).

This study fills a critical gap in the literature by addressing the lack of research on the challenges and opportunities for ex-offenders in green job sectors. Its findings aim to provide valuable insights for employers, policymakers, and rehabilitation programs, promoting a more inclusive and sustainable workforce.

3. Methodology

3.1 The review protocol – ROSES

This section describes the methodology used in the systematic literature review (SLR) focused on hiring ex-offenders in the green jobs sector. The review follows the ROSES (Reporting Standards for Systematic Evidence Syntheses) framework. ROSES is helpful because it provides a clear and organised approach, which helps make the review process transparent and repeatable (Haddaway et al., 2015). Using ROSES ensures the review is thorough and methodologically robust, which is essential for addressing the challenges of hiring ex-offenders. This framework also allows for a consistent reporting format, improving the review's quality and making it easier to compare findings from different studies (Rani et al., 2022). This approach helps to understand the barriers and facilitators in hiring ex-offenders for green jobs.

The methodology section details the steps taken to conduct the SLR. It starts with creating straightforward research questions that guide the literature search. The author then selects relevant databases and keywords and sets inclusion and exclusion criteria to choose studies related to the topic. This careful process reduces bias and includes various perspectives (Khasni et al., 2021). The benefits of an SLR are considerable as it gives a complete overview of existing research, shows trends and gaps, and strengthens the reliability of the findings through a transparent approach (Nee et al., 2022). Additionally, SLR can help future research by pointing out specific challenges ex-offenders face in finding jobs, contributing to a better understanding of the green jobs sector.

Using the ROSES framework in this study improves the research process and provides valuable insights into hiring ex-offenders for green jobs. Following a structured methodology, the review offers reliable evidence to guide policy and practice, support ex-offenders integration into the workforce, and promote social justice (Drepper et al., 2022; Ibrahim & Mohd Sopian, 2023).

3.2 Formulation of research questions:

Research questions are another essential aspect that guides the scope of the study. The Research Questions Development Tool (RQDT) used in this research on hiring ex-offenders in the green jobs sector used the PICO, standing for Population, Interest and Context framework. This literature review method ensures that research questions are specific, clear and relevant. In this case, the population of interest is hired ex-offenders in green jobs, and the population of interest is hiring policies and related factors for these ex-offenders. Also, the program tries to look into employers' perceptions of ex-offenders with the ideal goal of getting them employed, as well as other efforts that can help them go back to most of the workforce (Wang et al., 2022a). (Q. Wang et al., 2022).

In particular, a literature review on barriers ex-offenders face in the job market (i.e., stigma and employer preferences) and potential advantages of hiring them in the green job sector informed how these research questions were developed. The current leading review fits closely within the broader public trend of sustainability and rehabilitation (Griffith & Young, 2017; Khasni et al., 2021). This process informed the refinement of the research questions to explore the barriers to, and opportunities for, employing ex-offenders in this expanding field. Applying the PICO framework provides a systematic way to formulate questions and confirms that the research is evidence-based, relevant and actionable (Freeman et al., 2022; Slager et al., 2017).

3.3 Systematic searching strategies:

Effective searching strategies are crucial to ensuring comprehensive coverage of relevant literature in a systematic literature review. The process typically involves three key stages which are identification, screening, and eligibility assessment.

3.3.1 Identification:

The search strategy was designed to identify peer-reviewed studies related to the employment of ex-offenders in the green job sector in Asia. A systematic keyword search was conducted using Boolean logic across four major academic databases: Scopus, ScienceDirect, Google Scholar, and BASE-Search. The search employed the following combination of keywords: (“ex-offender” OR “former inmate” OR “ex-convict” OR “returning citizen”) AND (“green job” OR “sustainable job” OR “eco-friendly work” OR “green sector” OR “environmental employment”) AND (“employment” OR “hiring” OR “recruitment”) AND (“Asia”). The use of Boolean operators “AND” and “OR” allowed for the expansion or narrowing of search results to ensure relevance (Tella et al., 2021). During the identification phase, an inventory of core keywords and their synonyms was developed to capture the multifaceted nature of the topic. This included terms related to ex-offenders, green skills, and green jobs. To further broaden the scope, additional synonyms such as “sustainable skills,” “eco-friendly skills,” “environmental competencies,” “former convicts,” and “ex-felons” were incorporated. This comprehensive approach ensured a wide coverage of literature concerning employment, sustainability, and the reintegration of ex-offenders (Duwe & King, 2013).

The search was performed using the following well-known databases: Scopus, ScienceDirect, Google Scholar, and BASE-Search. Each corresponding database had a reason for selection and relevance to the subject. An electronic database specifically used for its quality academic content was Scopus, known for containing an extensive collection of peer-reviewed journals and conference papers (Formon et al., 2018). ScienceDirect published many articles on environmental and social sciences about green jobs, and those studies were necessary for understanding green jobs (Griffith & Young, 2017). Google Scholar is well known for including a broad scope of grey literature (Darakai et al., 2017). This study chose BASE-Search, which has a wide coverage of open-access research and is known for having diverse perspectives (Woldoff & Washington, 2008).

Scopus and ScienceDirect are both Elsevier databases but their use was deliberate to provide the full coverage of both peer-reviewed journal articles and topic-specific content. This study chose Scopus for its wide range of coverage between areas of knowledge and for the indexed cited references from various publishers (Cortegiani et al., 2020). ScienceDirect was added due to its topical concentrations (environmental science and social policy) being part of study of green jobs model (Bartram & Setty, 2021). In the screening process, all references of the articles were read to remove duplicate studies. Google Scholar was included for its more expansive coverage beyond traditional academic publishers and its inclusion of grey literature (i.e., government reports and industry publications), which are necessary to capture a comprehensive view of the applicability of green skills in policy and practice across contexts (Haddaway et al., 2015). Finally, BASE-Search was chosen for its open-access orientation to enable the review of studies from various regions and research institutions that may not be covered in commercial databases (Li & Rainer, 2022). This provided an opportunity for eliciting a wider diversity of perspectives, notably concerning emerging trends in green jobs and rehabilitation for ex-offenders. Web of Science was initially considered for this. However, it is excluded due to limited access and its narrower indexing of region-specific literature on green employment in Asia.

Filters applied that limited the review to journal articles within this date range and limited references to those published between 2020 and 2024 to ensure that the most current research and developments

regarding ex-offender hiring practices specific to green job sectors were found. In addition, the selection was limited to research published in English to maintain a manageable analysis standard. It is also important to note that the review focused solely on studies in Asia reflecting this region's distinct social, economic, and cultural climate, which plays a significant role in hiring practices. This targeted approach ensures that the results are both contemporary and localised, consistent with the study's intent of investigating contemporary sustainable sector ex-offenders employment issues in the Asian region (Atkin & Armstrong, 2013). The comprehensive development of keywords and the targeted choice of databases demonstrate adherence to a systematic review process, which is key to improving knowledge and practice on ex-offender employment (Pager & Quillian, 2005).

3.3.2 Screening:

This screening process was vital to selecting relevant articles representative of a high-quality study for this study. This aspect of the screening was completed after the previous phase of identification, which involved reviewing the title and abstract of each article and the full text if necessary (Munn et al., 2018). This ensured that only literature that met the inclusion/exclusion criteria was examined.

The inclusion criteria for this study were: (1) Articles are to be about ex-offenders in green jobs, (2) Only journal articles published from 2020 to 2024 to restrict them only to relevant studies, (3) Articles are to be in English since they only focus on articles written in the English language for comprehend evidence by the research team and (4) Studies are to focus on Asia. A complete list of these criteria is in Table 1. Such criteria are essential to ensure that the characteristics of studies reflect those most likely to be used in answering the review questions and the most appropriate characteristics (Munn et al., 2018).

During the initial stage, five hundred fifty articles were retrieved from Scopus, ScienceDirect, Google Scholar, and BASE Search databases. Based on the inclusion criteria, seventy articles were selected for review. After a detailed screening process, which included reviewing abstracts and full texts, four hundred eighty articles were excluded because they did not fulfil the criteria, mainly because they were not relevant or did not focus on ex-offenders in green jobs.

Moreover, a duplicate check showed forty articles removed from the final dataset. These modifications led to thirty articles that would continue to be included in the analysis. Such a refined selection secures an adequate and applicable literature base for the study with a well-near dataset that contributes to a thorough comprehension while bridging a gap of adaptation regarding hiring ex-offenders in green jobs. The screening sequence was intentionally applied to eliminate irrelevant literature and get only high-quality studies (Mohd Abdul Kadir et al., 2022). This method improves the validity and reliability of the review, which will offer insights into the employment of ex-offenders in the green jobs sector (Beahler et al., 2000; Cooper et al., 2018)

Table 1: The Inclusion and exclusion criteria

Criteria	Inclusion	Exclusion
Timeline	2020 - 2024	< 2020
Publication Type	Journal Article	Book, Conference proceeding, Article review, etc
Language	English	Non-English
Regions	Asia countries	Non-Asia countries

3.3.3 Eligibility:

The eligibility procedure is vital to contain appropriate studies on hiring ex-offenders in the green jobs field. Initially, a total of five hundred fifty articles were retrieved from Scopus, ScienceDirect, Google

Scholar and BASE-Search; however, only articles written about ex-offenders employment in the green sector and published in a peer-reviewed journal between 2020 and 2024 were included (Chow et al., 2021; Mulugeta et al., 2023). Eligible studies must be conducted in Asia or offer findings that apply to the Asian.

Records were screened by title and abstract, excluding articles irrelevant to the research topic (i.e., vulnerability and employment or literature not carried out in Asia). Studies were also excluded based on data such as reviews, unclear methodology, and book chapters (Dieteren et al., 2023; Zhang et al., 2023). Out of these, four studies fulfilled the eligibility criteria after a full-text review and were subsequently included in the systematic review (Hiam et al., 2019; Y. Wang et al., 2022). This compels rigorously to pick only the most relevant and high-quality studies.

Table 2: Data Summary

Database	Total Publications	Publication (Journal Articles)	Publications (2020 -2024)	Language (English)	Region (Asia)
Scopus	150	120	45	45	20
ScienceDirect	120	100	30	30	15
Google Scholar	200	150	60	60	25
BASE-Search	80	60	20	20	10

3.4 Quality Appraisal

In this systematic literature review, quality appraisal played a key role in ensuring that only well-designed and relevant studies were included. A group of researchers with backgrounds in economics, green employment, and offender rehabilitation carried out the assessment using a checklist adapted from established systematic review tools (Munn et al., 2018).

This study focused on selecting studies that offered either empirical findings or theoretical perspectives on employing ex-offenders in green job sectors. To meet the inclusion criteria, studies had to be peer-reviewed journal articles published between 2020 and 2024, with a specific focus on the Asian context. Articles that lacked clear methodology or did not directly explore the link between ex-offender employment and green jobs were excluded from further analysis (Shaffril et al., 2021; Shaffril et al., 2019).

To maintain consistency and reduce bias, at least two reviewers independently evaluated each article (Shaffril et al., 2021). They looked at how clearly the research objectives were stated, the strength of the methodology, how data were collected, and how closely the study aligned with the topic. Any disagreements were resolved through discussion until the reviewers reached an agreement (Nguyen et al., 2022). Using a standard checklist helped keep the process consistent and transparent (Mohamed Shaffril et al., 2021).

In the end, four studies passed the appraisal process and were included in the final synthesis. This careful screening ensured that the review was built on solid, trustworthy evidence, which strengthened the thematic analysis and overall findings.

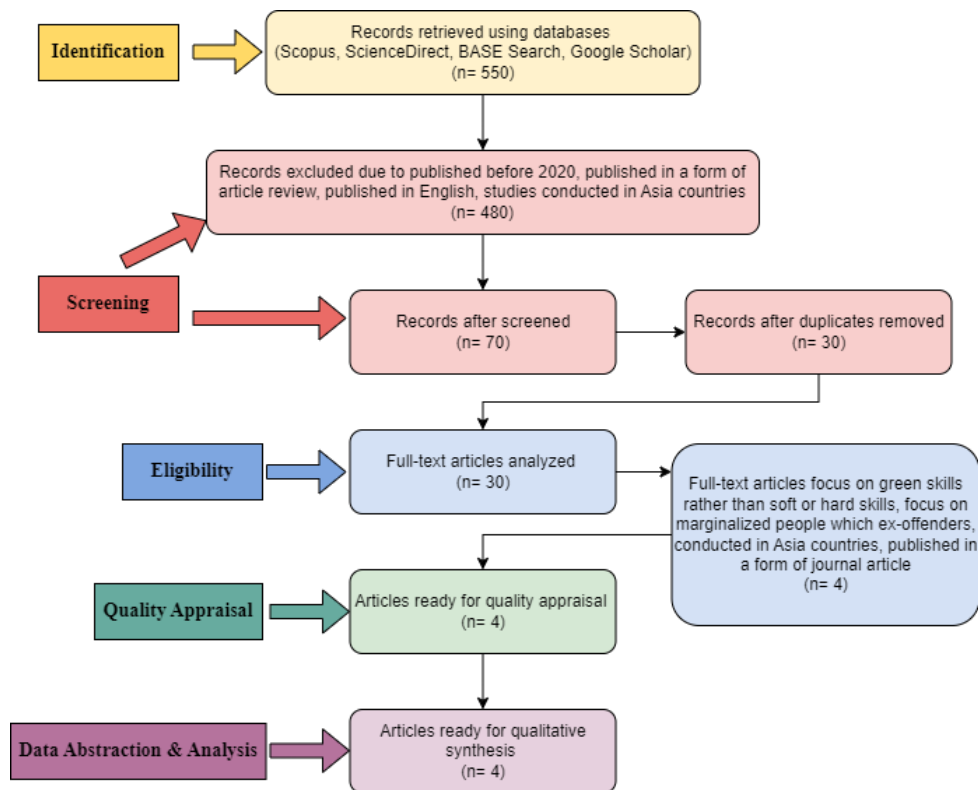


Figure 1: The Flow (adapted from Shaffril et al. (2019))

3.5 Data abstraction and analysis

This systematic literature review that deals with hiring ex-offenders in green jobs used a qualitative approach to synthesise the library's selected studies' results. This study used thematic analysis, a widely used qualitative analytic method for identifying, analysing, and reporting patterns (themes) within qualitative data (Braun & Clarke, 2006). As this method was selected for flexibility and depth, the interviews provide a rich exploration of the complex issues facing the employment of ex-offenders in green jobs. It allows researchers to elicit meaningful themes from the literature (Shaffril et al., 2021).

There were a few key steps in the process of abstracting the data. First, the articles found using the systematic search were examined to identify relevant details regarding barriers to employment for ex-offenders, employer attitudes and green jobs for reintegration. After reading each article in depth, relevant quotations were marked to ensure all data were included according to the review's goal. This procedure was done to be exhaustive and reduce bias as much as possible (Hoonakker et al., 2022).

Following Braun and Clarke (2006) study, the thematic analysis process involved familiarising oneself with the data, creating initial codes, looking for themes, evaluating themes, defining and identifying themes, and making the report. External discussions with employment, criminal justice, and environmental sustainability experts were carried out to validate the topics. These experts assessed and commented on the importance and relevance of the themes to the research context (Zelei et al., 2018). The validation of the themes in this way improved the quality of the review (Kandemir & Çakmak, 2021).

The methodology, including thematic analysis, constituted an organising framework for synthesising

the literature regarding hiring ex-offenders in green jobs. The data abstraction process was strict and extensively validated by experts to ensure the findings accurately reflect new knowledge relevant to the continuing debate on ex-offenders' employment.

4. Result

This section presents the findings from four studies that met the eligibility and quality criteria described in the previous sections. These articles were systematically selected using the ROSES protocol and focused on the employment of ex-offenders in green job sectors within Asia. The results are thematically analysed to highlight the main barriers, enablers, and implications for policy and practice. The findings from the literature review reveal a complex array of factors that influence the hiring of ex-offenders in green job sectors. These factors include employer attitudes, legal frameworks, social and economic contexts, and the importance of community support. The reviewed studies provide valuable insights into the unique challenges ex-offenders face, especially in industries prioritising sustainability and environmental care.

The selected studies span a range of countries in Asia, including Malaysia, Singapore, China and Vietnam. Most of the articles were published between 2020 and 2024, with research methodologies ranging from qualitative interviews and case studies to policy analyses and literature reviews. While the majority focused specifically on ex-offender employment, a few addressed related themes such as rehabilitation, skills development, and recidivism. This diversity provides a broad understanding of the challenges and opportunities in promoting green employment for ex-offenders in the region.

A key factor that emerged from the literature is the negative perception many employers hold toward ex-offenders, particularly regarding their abilities and trustworthiness. This bias often leads to discriminatory hiring practices, with employers reluctant to hire individuals with criminal records (Khasni et al., 2023). These opposing views are further exacerbated by societal attitudes toward crime and punishment, which shape employers' reluctance to consider ex-offenders as viable candidates. However, attitudes vary significantly depending on the type of crime committed, the background of the applicant, and the specific organisation in question (Tay, 2023; Zhang & Li, 2022). This suggests that while biases are prevalent, they are not uniform, and there is potential for targeted interventions to reduce discrimination based on criminal history.

Legal frameworks, such as the "Ban the Box" policy, are intended to mitigate the barriers ex-offenders face in hiring by removing questions about criminal history from job applications (Zhang & Li, 2022). While these policies can potentially reduce overt discrimination, some studies indicate that they may inadvertently result in other forms of bias. For instance, employers might search for alternative ways to assess a candidate's risk, such as looking at other personal or professional indicators (Tay, 2023). This highlights the complexity of addressing discrimination in hiring, showing that legal interventions alone are insufficient to eliminate the biases that ex-offenders encounter.

The social and economic context also plays a significant role in the employment prospects of ex-offenders, particularly in green job sectors. Many ex-offenders face substantial challenges when reintegrating into the workforce, such as a lack of education and relevant work experience. This is especially problematic in green job sectors, which often require specialised skills and qualifications (Tay, 2023). Moreover, the competitive nature of these industries further marginalises ex-offenders, who may struggle to compete with candidates with more relevant qualifications or experience (Nguyen et al., 2023). These findings suggest that addressing these barriers requires legal reforms and targeted educational and training programs that equip ex-offenders with the necessary skills to succeed in the green economy.

Community support also plays a crucial role in helping ex-offenders reintegrate into the workforce. Strong social networks and community-based resources have been shown to significantly improve the

employment prospects of ex-offenders (Zhang & Li, 2022). Programs that provide support before and after release can help reduce the stigma associated with having a criminal record, fostering a more inclusive job market (Khasni et al., 2023; Zhang & Li, 2022). In particular, community programs that offer skill-building opportunities tailored to green job sectors can help ex-offenders build the confidence and capabilities needed to re-enter the workforce successfully.

Psychological barriers also emerge as a critical factor in the hiring process. Ex-offenders often face anxiety and self-doubt when applying for jobs, which can hinder their chances of success. Many also use impression management tactics to downplay the stigma associated with their criminal history, emphasising their qualifications and skills instead (Nguyen et al., 2023; Tay, 2023). However, the effectiveness of these strategies is contingent on the employer's attitudes toward ex-offenders and their willingness to overlook past criminal offences in favour of the candidate's current qualifications (Khasni et al., 2023). This suggests that addressing psychological barriers is crucial, both in terms of supporting ex-offenders during the application process and in challenging employers' biases.

The intersectionality of race, gender, and criminal history is another significant theme influencing hiring decisions. Studies suggest that demographic factors, such as race and gender, can further complicate the hiring process for ex-offenders, with employers exhibiting different levels of willingness to hire based on these characteristics (Nguyen et al., 2023). For example, female ex-offenders may face additional challenges due to societal views on femininity and criminality, which can make their reintegration into the workforce even more challenging (Zhang & Li, 2022). This intersectionality requires that interventions be tailored to address the specific needs of different subgroups within the ex-offender population, such as women and racial minorities (Tay, 2023).

Education and training programs for employers are also critical in fostering more inclusive hiring practices. Research shows that when employers are educated about the potential for rehabilitation and the positive contributions that ex-offenders can bring to the workplace, their attitudes toward hiring ex-offenders improve significantly (Nguyen et al., 2023; Tay, 2023). Employer education programs emphasising the social and economic benefits of hiring ex-offenders, such as reduced recidivism rates and increased job stability, can help create a more inclusive job market, especially in green sectors.

From an economic perspective, hiring ex-offenders offers significant benefits. Stable employment provides financial stability for ex-offenders but also helps to reduce the likelihood of re-offending (Zhang & Li, 2022). Studies suggest that employment has a positive impact on the mental well-being of ex-offenders and their social relationships, which in turn reduces the likelihood of recidivism (Zhang & Li, 2022). These findings reinforce the importance of creating job opportunities for ex-offenders to enhance their well-being and contribute to public safety by reducing crime's social and financial costs.

Finally, the green job sector presents unique challenges for ex-offenders. Green jobs often require specialised skills and a deep commitment to environmental sustainability, which may not align with the experiences or values of some ex-offenders (Khasni et al., 2023). Additionally, the competitiveness of these sectors makes it more difficult for ex-offenders to compete against other candidates with more relevant experience or education (Tay, 2023). This highlights the need for targeted skill-building programs that prepare ex-offenders for the specific demands of the green economy, as well as employer initiatives that promote inclusivity in hiring practices.

This review emphasises the multifaceted challenges that ex-offenders face when seeking green job opportunities, such as social stigma, lack of access to training, and limited employment networks. It delves into various strategies that could be implemented to overcome these barriers effectively. Future research should prioritise comprehensive and actionable solutions, including developing inclusive job training programs, community outreach initiatives to reduce stigma, and partnerships between organisations that

facilitate workforce reintegration and green industry growth. Addressing these issues can foster more significant social equity, bolster the green job market, and support ex-offenders' efforts to reintegrate sustainably into society. Such initiatives benefit individuals and contribute to the larger aim of a more sustainable and equitable economy.

Table 3: Table of Summary Result

Author(s)	Country	Study Title	Methodology	Objective	Key Findings
Khasni et al. (2023)	Malaysia	A theory of planned behaviour: Perspective on rehiring ex-offenders	Qualitative	To understand employer attitudes toward ex-offenders	Employer attitudes are critical; stigma is a major barrier
Tay (2023)	Singapore	Addressing Employment Challenges for Ex-Offenders	Mixed methods	To explore challenges and hiring practices	Skills mismatch and lack of training inhibit
Zhang and Li (2022)	China	The Effects of "Ban-the-Box" in Frictional Labor Markets	Policy Analysis	Assess policy impacts on ex-offender hiring	Ban-the-Box helps reduce bias but leads to statistical discrimination
Nguyen et al. (2023)	Vietnam	Revisiting Employment and Recidivism	Quantitative	Study impact of age/employment on recidivism	Stable employment reduces re-offending

5. Discussion

Numerous challenges faced by ex-offenders seeking to be employed in green job sectors across Asia were identified by the systematic research. Employer discrimination, legal frameworks, restricted training opportunities, and psychological and socioeconomic factors are the causes of these issues. Each issue offers insights into how systemic issues affect ex-offenders' employability in sustainability-focused industries while including findings from the selected studies.

Employers' negative view of ex-offenders is a major problem in the reviewed literature. Tay (2023) and Khasni et al. (2023) highlighted that stigma and trustworthiness concerns are major obstacles to hiring people with criminal records. This prejudice is frequently exacerbated by underlying social perceptions that maintain exclusion from the labour market by associating a criminal background with a lack of work ethic or risk. The findings indicate that employer opinions differ according to the type of offense as well as the level of rehabilitation, suggesting the possibility of particular treatments.

To lessen discrimination in the hiring process, laws such as "Ban the Box" have been implemented. However, as Zhang and Li (2022) stated, these actions may unintentionally lead to statistical discrimination even though they reduce explicit bias. The goal of the policy may be undermined if employers use alternative demographic variables to determine risk. This study emphasizes the need for hiring managers to participate in educational activities in addition to legal improvements in order to address enduring biases.

The study found a significant skills gap between the skills needed by green job sectors as well as those of ex-offenders. Many ex-offenders lack the specialized technical skills needed for employment in sustainable agriculture, waste management, or renewable energy (Nguyen et al., 2023; Tay, 2023). Without targeted training and reskilling programs, these individuals cannot compete with more skilled applicants. Limited educational opportunities while incarcerated and insufficient support after release worsen this shortage.

In order to succeed at work, community and psychological support were found to be essential. Programs that offer mentorship, skills training, and psychosocial support significantly increase the confidence and

employability of ex-offenders, (Khasni et al., 2023; Zhang & Li, 2022). Reintegration requires addressing psychological barriers such as anxiety and self-doubt, which often hinder job-seeking attempts.

In addition, employment challenges are made worse by intersectional factors like socioeconomic status, gender, and ethnicity. According to Nguyen et al. (2023), racial minorities and female ex-offenders face more discrimination, emphasizing the need for targeted strategies that address overlapping forms of marginalization. Employer-focused educational initiatives could change perceptions and promote more inclusive hiring practices, according to the analysis. Nguyen et al. (2023) and Tay (2023) stated that certain companies were inspired to implement more equitable hiring practices by the social benefits of hiring ex-offenders, such as reduced recidivism and increased community safety. This means that organizing and policy efforts must concentrate on changing workplace culture and norms as well as removing legal barriers.

Incorporating ex-offenders into green industries has benefits from an economic standpoint. Stable employment encourages the growth of sustainable businesses while lowering the need for social services and recidivism expenses. According to Zhang and Li (2022), employment positively affects social reintegration, mental health, and public safety in general.

There are various limitations on this review. The review was restricted by the inclusion criteria to papers written in English, conducted in Asia, and published between 2020 and 2024. As a result, relevant research beyond this range could have passed overlooked. Furthermore, only four studies met all eligibility and quality standards, which limited how broadly the results could be applied. These restrictions suggest that the conclusions drawn should be interpreted cautiously, and that larger datasets including non-English and longitudinal studies should be used in future research to confirm and broaden these conclusions.

6. Recommendations

Drawing from the trends identified in studies on employing returning citizens in green sectors, several recommendations are proposed to advance this emerging field. These suggestions aim to address critical gaps in the existing literature, encourage innovative methodologies, and expand understanding of the broader implications of hiring ex-offenders in sustainable industries.

More research is needed to explore the long-term effects of green job employment for ex-offenders. While existing studies highlight immediate benefits such as reduced recidivism and improved social reintegration (Berg & Huebner, 2011), there is a pressing need for longitudinal studies. Tracking the career trajectories of ex-offenders over extended periods could reveal how sustained employment influences recidivism rates, overall well-being, and the durability of social reintegration. Such insights could also inform strategies to support ex-offenders beyond the initial job placement stage (Liem & Weggemans, 2018).

Future research should investigate how race, gender, and socio-economic status intersect to influence employment opportunities for ex-offenders. These factors significantly shape employer attitudes and hiring decisions, creating unique barriers to workforce participation. Scholars can develop a nuanced understanding of systemic inequalities by examining how these overlapping identities impact ex-offender experiences across different green job sectors. Such studies could inform equitable policy approaches that address these disparities and promote inclusive hiring practices.

Another critical area for future research is assessing the effectiveness of interventions designed to help ex-offenders access green jobs. While vocational training programs have demonstrated promise, there is limited evidence on the impact of programs that integrate training with job placement services. Additionally, research could explore how employer incentive programs encourage the hiring of ex-offenders in sustainable industries. Investigating the role of community organisations and social networks

in facilitating job placements could provide valuable insights into long-term employment outcomes and career advancement for ex-offenders (Berg & Huebner, 2011).

Organisational culture and green human resource management (GHRM) practices are pivotal in influencing employment in green sectors for ex-offenders. Studies suggest that organisations with robust GHRM practices are more likely to hire ex-offenders due to their emphasis on social responsibility and inclusiveness (Freire & Pieta, 2022). Future research could explore how GHRM strategies can be adapted to create tailored opportunities for ex-offenders, aligning organisational goals with reintegration objectives. These findings could provide actionable guidance for employers on effectively integrating ex-offenders into their workforce.

Scholars should prioritise engaging policymakers and industry leaders to highlight how existing green job standards can be adapted to facilitate ex-offenders hiring. It is essential to raise awareness about the benefits of employing ex-offenders, challenging stereotypes about their capabilities, and showcasing their contributions to sustainable industries (Solinas-Saunders & Stacer, 2017). Collaboration between academic, business, and government stakeholders can bridge the gap between theoretical research and practical application, enabling evidence-based policies that support workforce reintegration.

These recommendations underscore the importance of addressing gaps in the research on ex-offender employment in green industries. Key areas for future inquiry include longitudinal studies, intersectional analyses, evaluations of employment interventions, and examinations of organisational practices. Furthermore, fostering stakeholder collaboration can enhance understanding of barriers and facilitators, providing a more contextually informed framework for supporting successful reintegration and promoting inclusive hiring in green sectors. By pursuing these research directions, scholars can contribute to developing evidence-based policies and practices that benefit ex-offenders and advance the broader goals of sustainability and social equity.

7. Conclusion

This study explored employment opportunities for ex-offenders in green job sectors, focusing on the barriers they encounter and the potential benefits of their employment. It emphasised the critical influence of employer attitudes, legislative measures, and socio-economic factors on the hiring process for ex-offenders. While persistent challenges such as stigma and lacking relevant skills were identified, the review highlighted opportunities for positive change through targeted interventions and supportive policies.

The findings revealed that employer perceptions play a pivotal role in hiring ex-offenders. Negative stereotypes often lead to discriminatory hiring practices, creating significant barriers for individuals with criminal records. However, initiatives like "Ban the Box" policies, which remove criminal history questions from job applications, have shown promise in reducing bias. Despite some unintended consequences, these policies can mitigate discrimination and open doors for ex-offenders. The review also emphasised the importance of community support and vocational training in improving ex-offenders' employability, particularly in green sectors where specialised skills are essential.

Beyond identifying challenges and opportunities, the study stressed the broader societal impact of hiring ex-offenders in green sectors. As sustainability practices become more integral to businesses, green industries offer a unique opportunity for disadvantaged groups, including ex-offenders, to engage in sectors critical to the future economy. This provides meaningful employment for ex-offenders and strengthens industries dedicated to addressing environmental challenges, benefiting individuals and society.

The study highlighted the importance of collaboration between businesses, governments, and non-governmental organisations to support ex-offenders in green industries. For instance, companies could

partner with local community organisations to provide training programs that equip ex-offenders with the technical and interpersonal skills required for sustainable industries. Additionally, policymakers could offer incentives for companies that hire ex-offenders. Such policies would help individuals and foster broader community and economic growth.

The review recommended further research into how various green industries, such as sustainable agriculture, renewable energy, and environmental conservation, can better support ex-offenders. Tailoring vocational training and support programs to the specific needs of these sectors is crucial for improving employment outcomes. By addressing the unique requirements of each industry, future research can propose more targeted policies and programs to help ex-offenders achieve stable, long-term employment in diverse green job markets.

While integrating ex-offenders into the green economy presents significant challenges, progress is possible with focused interventions, strong community support systems, and enabling legislation. By addressing these barriers, advocates can promote a more inclusive labour market that benefits not only ex-offenders but also employers and society. This study contributes to the growing literature on ex-offender employment, emphasising the need for a multifaceted approach that includes employer education, supportive legislation, and community engagement. Future research should continue exploring these dynamics to enhance ex-offenders' reintegration into the workforce.

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Conflict of interest statement

No conflict of interest.

References

- Ali, A. A., Lyons, B. J., & Ryan, A. M. (2017). Managing a perilous stigma: Ex-offenders' use of reparative impression management tactics in hiring contexts. *Journal of applied psychology*, 102(9), 1271.
- Anazodo, K. S., Ricciardelli, R., & Chan, C. (2019). Employment after incarceration: managing a socially stigmatized identity. *Equality, Diversity and Inclusion: An International Journal*, 38(5), 564-582.
- Araújo, N., Cardoso, L., Fraiz Brea, J. A., & De Araújo, A. F. (2018). Green Jobs: The Present and Future of the Building Industry. Evolution Analysis. *Social Sciences*, 7(12), 266.
- Atkin, C. A., & Armstrong, G. S. (2013). Does the concentration of parolees in a community impact employer attitudes toward the hiring of ex-offenders? *Criminal Justice Policy Review*, 24(1), 71-93.
- Bartram, J., & Setty, K. (2021). Environmental health science and engineering for policy, programming, and practice. *Journal of Environmental Engineering*, 147(10), 03121002.
- Beahler, C. C., Sundheim, J. J., & Trapp, N. I. (2000). Information retrieval in systematic reviews: challenges in the public health arena. *American journal of preventive medicine*, 18(4), 6-10.
- Berg, M. T., & Huebner, B. M. (2011). Reentry and the ties that bind: An examination of social ties, employment, and recidivism. *Justice quarterly*, 28(2), 382-410.

- Bollinger, C. R., & Yelowitz, A. (2021). Targeting intensive job assistance to ex-offenders by the nature of offense: Results from a randomized control trial. *Economic Inquiry*, 59(3), 1308-1327.
- Braun, V., & Clarke, V. (2006). Using thematic analysis in psychology. *Qualitative Research in Psychology*, 3(2), 77-101.
- Chow, R., Huang, E., Li, A., Li, S., Fu, S. Y., Son, J. S., & Foster, W. G. (2021). Appraisal of systematic reviews on interventions for postpartum depression: systematic review. *BMC pregnancy and childbirth*, 21, 1-11.
- Chu, C. M., & Daffern, M. (2024). *Approaches to Offender Rehabilitation in Asian Jurisdictions*. Taylor & Francis.
- Cooper, C., Booth, A., Varley-Campbell, J., Britten, N., & Garside, R. (2018). Defining the process to literature searching in systematic reviews: a literature review of guidance and supporting studies. *BMC medical research methodology*, 18, 1-14.
- Cortegiani, A., Ippolito, M., Ingoglia, G., Manca, A., Cugusi, L., Severin, A.,...Manoj, L. (2020). Citations and metrics of journals discontinued from Scopus for publication concerns: the GhoS (t) copus Project. *F1000Research*, 9, 415.
- Darakai, A., Day, A., & Graffam, J. (2017). Public attitudes towards the employment of ex-offenders with a disability. *Journal of Intellectual Disabilities and Offending Behaviour*, 8(1), 3-12. <https://doi.org/10.1108/jidob-11-2016-0021>
- Dieteren, C. M., Patty, N. J., Reckers-Droog, V. T., & van Exel, J. (2023). Methodological choices in applications of Q methodology: A systematic literature review. *Social Sciences & Humanities Open*, 7(1), 100404.
- Drepper, B., Bamps, B., Gobin, A., & Van Orshoven, J. (2022). Strategies for managing spring frost risks in orchards: effectiveness and conditionality—a systematic review. *Environmental Evidence*, 11(1), 29.
- Duwe, G., & King, M. (2013). Can Faith-Based Correctional Programs Work? An Outcome Evaluation of the InnerChange Freedom Initiative in Minnesota. *International journal of offender therapy and comparative criminology*, 57(7), 813-841.
- Feingold, Z. R. (2021). The stigma of incarceration experience: A systematic review. *Psychology, Public Policy, and Law*, 27(4), 550.
- Formon, D. L., Schmidt, A. T., & Henderson, C. (2018). Examining employment outcomes of offender and nonoffender vocational program graduates. *International journal of offender therapy and comparative criminology*, 62(9), 2781-2800.
- Freeman, J. J., Yorkgitis, B. K., Haines, K., Koganti, D., Patel, N., Maine, R.,...Kasotakis, G. (2022). Vaccination after spleen embolization: a practice management guideline from the Eastern Association for the Surgery of Trauma. *Injury*, 53(11), 3569-3574.
- Freire, C., & Pieta, P. (2022). The impact of green human resource management on organizational citizenship behaviors: The mediating role of organizational identification and job satisfaction. *Sustainability*, 14(13), 7557.
- Gantt-Howrey, A., Park, C. J., Griffith, J. A., Jones, J. L., Robins, L. B., & Johnson, K. F. (2024). Addressing social determinants of health: Supporting ex-offenders' employment through use of the Systems Theory Framework. *Journal of Employment Counseling*, 61(1), 2-17.
- Georgeson, L., & Maslin, M. (2019). Estimating the scale of the US green economy within the global context. *Palgrave Communications*, 5(121), 1-12.
- Griffith, J. N., & Young, N. C. J. (2017). Hiring ex-offenders? The case of Ban the Box. *Equality, Diversity and Inclusion: An International Journal*, 36(6), 501-518.
- Haddaway, N. R., Collins, A. M., Coughlin, D., & Kirk, S. (2015). The role of Google Scholar in evidence reviews and its applicability to grey literature searching. *PloS one*, 10(9), e0138237.
- Handayani, M. N., Ali, M., & Mukhidin, D. W. (2020). Industry perceptions on the need of green skills in agribusiness vocational graduates. *Journal of Technical Education and Training*, 12(2), 24-33.

- Hiam, D., Moreno-Asso, A., Teede, H. J., Laven, J. S., Stepto, N. K., Moran, L. J., & Gibson-Helm, M. (2019). The genetics of polycystic ovary syndrome: an overview of candidate gene systematic reviews and genome-wide association studies. *Journal of clinical medicine*, 8(10), 1606.
- Holloway, C. P., & Wiener, R. L. (2020). Criminal History, Sex, and Employment: Sex Differences in Ex-Offender Hiring Stigma. *Analyses of Social Issues and Public Policy*, 20(1), 211-229.
- Holzer, H. J., Raphael, S., & Stoll, M. A. (2007). The effect of an applicant's criminal history on employer hiring decisions and screening practices: Evidence from Los Angeles. *Barriers to reentry*, 4(15), 117-150.
- Hoonakker, P. L., Carayon, P., Brown, R. L., & Werner, N. E. (2022). A Systematic Review of the Consumer Emergency Care Satisfaction Scale (CECSS). *Journal of nursing care quality*, 37(4), 349-355.
- Ibrahim, N., & Mohd Sopian, S. (2023). Factors influencing customers' selection of Islamic home financing: a systematic review. *International Journal of Housing Markets and Analysis*, 16(1), 59-84.
- Ismail, I., Hashim, N. A., & Hussain, W. (2020). Becoming social entrepreneurs: A proposal for uplifting the lives of ex-convicts in Malaysia. Proceeding of the 7th International Conference on Management and Muamalah, (pp. 173-187)
- Jones, S. R. (2016). Representing returning citizen entrepreneurs in the nation's capital. *Journal of Affordable Housing*, 25(1), 45.
- Kaliappan, A., & Hamid, H. (2021). Green technology: A must or a need in TVET education in Malaysia? *Journal of Technical Education and Training*, 13(1), 86-96.
- Kandemir, B., & Çakmak, E. K. (2021). Structure in distance learning: A systematic literature review. *Participatory Educational Research*, 8(4), 139-170.
- Karachalios, G., & Kotsios, V. (2023). Green Skills in the European Labour Markets. *HAPSc Policy Briefs Series*, 4(1), 111-126.
- Khasni, F. N., Keshminder, J., & Chuah, S. (2021). Hiring Ex-Offenders: An Application of Theory of Planned Behaviour. *Journal of International Business, Economics and Entrepreneurship*, 6(1), 78-86.
- Khasni, F. N., Keshminder, J., Chuah, S. C., & Ramayah, T. (2023). A theory of planned behaviour: perspective on rehiring ex-offenders. *Management Decision*, 61(1), 313-338.
- Kowalska, K., Szczygieł, E., Szyja, P., & Śliwa, R. (2022). Green skills in the field of Social Economy. In: Wydawnictwo Naukowe Uniwersytetu Pedagogicznego, Kraków.
- Li, Z., & Rainer, A. (2022). Academic search engines: constraints, bugs, and recommendations. Proceedings of the 13th International Workshop on Automating Test Case Design, Selection and Evaluation, (pp. 25-32)
- Liem, M., & Weggemans, D. (2018). Reintegration among high-profile ex-offenders. *Journal of developmental and life-course criminology*, 4(4), 473-490.
- Milfeld, T., Haley, E., & Flint, D. J. (2021). A Fresh Start for Stigmatized Groups: The Effect of Cultural Identity Mindset Framing in Brand Advertising. *Journal of Advertising*, 50(5), 603-621.
- Mohamed Shaffril, H. A., Samsuddin, S. F., & Abu Samah, A. (2021). The ABC of systematic literature review: the basic methodological guidance for beginners. *Quality & Quantity*, 55, 1319-1346.
- Mohd Abdul Kadir, J., Mhd Noh, N. A., Ramli, A. R., & Hamdan, R. (2022). Subsidies and consumer environmental awareness: a systematic review of aspects and impacts. *Journal of International Business, Economics and Entrepreneurship (JIBE)*, 7(2), 83-90.
- Morzenti, H., & Gringeri, C. (2021). Exploring Employer Perceptions of Hiring Ex-Offenders. *CrimRxiv*.
- Mulugeta, H., Sinclair, P. M., & Wilson, A. (2023). Prevalence of depression and its association with health-related quality of life in people with heart failure in low-and middle-income countries: A systematic review and meta-analysis. *PloS one*, 18(3), e0283146.
- Munn, Z., Peters, M. D., Stern, C., Tufanaru, C., McArthur, A., & Aromataris, E. (2018). Systematic review or scoping review? Guidance for authors when choosing between a systematic or scoping review approach. *BMC medical research methodology*, 18, 1-7.

- Nee, W. Y., Singh, J. S. K., & Kularajasingam, J. (2022). Exploring the Perceptions of Malaysian Employers Towards Hiring Ex-Offenders. *Journal of Public Administration and Governance*, 12(3), 118-118.
- Nguyen, A. D., McMahan, Z. H., & Volkmann, E. R. (2022). Micronutrient deficiencies in systemic sclerosis: a scoping review. *Open Access Rheumatology: Research and Reviews*, 309-327.
- Nguyen, H., Thomas, K. J., & Tostlebe, J. J. (2023). Revisiting the relationship between age, employment, and recidivism. *Criminology*, 61(3), 449-481.
- Niyogi, S. (2022). *Women, employment and stigma of crime: Narratives of former female convicts from West Bengal*. Institute for Social and Economic Change.
- Pager, D., & Quillian, L. (2005). Walking the talk? What employers say versus what they do. *American Sociological Review*, 70(3), 355-380.
- Phuchongpravech, T. (2020). *Beauty premium, information signaling and job opportunities of ex-prisoners in labour market* [Chulalongkorn University]. Chula Digital Collections. (pp. 1-177)
- Rahmaningtyas, W., Joyoatmojo, S., Kristiani, K., & Murwaningsih, T. (2023). Building a Sustainable Future: Unraveling the Link between Environmental Awareness and the Cultivation of Employability and Green skills-A Literature Review. *IOP Conference Series: Earth and Environmental Science*, (pp. 012021)
- Ramakers, A. A., Van Wilsem, J. A., Nieuwbeerta, P., & Dirkzwager, A. J. (2015). Returning to a former employer: A potentially successful pathway to ex-prisoner re-employment. *British Journal of Criminology*, 56(4), 668-688.
- Rangaswamy, E., Leon, C. K., & Joy, G. V. (2023). Reflections on a Green Economy with Reference to Green Skills for Green Jobs. In *Sustainable Boardrooms: Democratising Governance and Technology for Society and Economy* (pp. 71-82). Springer.
- Rani, N. D. M., Kamarunzaman, N. Z., & Liu, J. (2022). Pattern of Psychosocial Challenges among Oil and Gas Workers: A systematic review. *Environment-Behaviour Proceedings Journal*, 7(20), 431-438.
- Rose, E. K. (2021). Does banning the box help ex-offenders get jobs? Evaluating the effects of a prominent example. *Journal of Labor Economics*, 39(1), 79-113.
- Shaffril, H. A. M., Samah, A. A., & Samsuddin, S. F. (2021). Guidelines for developing a systematic literature review for studies related to climate change adaptation. *Environmental Science and Pollution Research*, 28, 22265-22277.
- Shaffril, H. A. M., Samah, A. A., Samsuddin, S. F., & Ali, Z. (2019). Mirror-mirror on the wall, what climate change adaptation strategies are practiced by the Asian's fishermen of all? *Journal of Cleaner Production*, 232, 104-117.
- Sheppard, A., & Ricciardelli, R. (2020). Employment after prison: Navigating conditions of precarity and stigma. *European Journal of Probation*, 12(1), 34-52.
- Sherrard, R. (2020). 'Ban the Box' Policies and Criminal Recidivism. *Available at SSRN 3515048*.
- Slager, S. L., Weir, C. R., Kim, H., Mostafa, J., & Del Fiore, G. (2017). Physicians' perception of alternative displays of clinical research evidence for clinical decision support—A study with case vignettes. *Journal of biomedical informatics*, 71, S53-S59.
- Solinas-Saunders, M., & Stacer, M. J. (2017). A retrospective analysis of repeated incarceration using a national sample: What makes female inmates different from male inmates? *Victims & Offenders*, 12(1), 138-173.
- Solinas-Saunders, M., & Stacer, M. J. (2017). Fighting labor market discrimination with ban the box (BTB): Are there racial implications? *Sociology Compass*, 11(11), e12535.
- Sukabdi, Z. A., & Wheeler, K. J. (2024). Rehabilitation of People Who Have Offended in Indonesia. In *Approaches to Offender Rehabilitation in Asian Jurisdictions* (pp. 145-162). Routledge.
- Tay, P. (2023). Addressing Employment Challenges for Ex-Offenders. *Singapore Labour Journal*, 2(01), 89-95.

- Tella, A., Oyeniran, S., & Ibironke, E. S. (2021). Determinants of web search effectiveness from the perspective of library and information science students. *International Journal of Library and Information Services (IJLIS)*, 10(2), 1-15.
- Tharshini, N., Ibrahim, F., Mohamad, M. S., & Zakaria, E. (2018). Challenges in Re-Entry among Former Inmates: A Review. *Sciences*, 8(4), 970-979.
- Vickers, I., & Lyon, F. (2014). Beyond green niches? Growth strategies of environmentally-motivated social enterprises. *International Small Business Journal*, 32(4), 449-470.
- Wang, Q., Liao, J., Lapata, M., & Macleod, M. (2022). PICO entity extraction for preclinical animal literature. *Systematic Reviews*, 11(1), 209.
- Wang, Y., Ge, Y., Xing, W., Liu, J., Wu, J., Lin, H., & Lu, Y. (2022). The effectiveness and safety of low-level laser therapy on breast cancer-related lymphedema: An overview and update of systematic reviews. *Lasers in Medical Science*, 37(3), 1389-1413.
- Woldoff, R. A., & Washington, H. M. (2008). Arrested contact: The criminal justice system, race, and father engagement. *The Prison Journal*, 88(2), 179-206.
- Zainal, S. N., Ibrahim, F., Zakaria, E., Sulaiman, W. S. W., & Kamaluddin, M. R. (2024). Reducing Recidivism through Entrepreneurship: A Systematic Literature Review.
- Zelei, T., Csetneki, K., Voko, Z., & Siffel, C. (2018). Epidemiology of Sanfilippo syndrome: results of a systematic literature review. *Orphanet journal of rare diseases*, 13, 1-11.
- Zhang, M., Wei, X., & Xu, A. (2023). Impact of investment in quality language education on green economic growth: case study of 23 Chinese provinces. *Humanities and Social Sciences Communications*, 10(1), 1-7.
- Zhang, S., & Li, D. (2022). The Effects of the “Ban-the-Box” Policy in Frictional Labor Markets. *Available at SSRN 4267901*.



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