

Multinational Companies' Approaches to Transfer of Skill Formation in Technical Vocational Education and Training; A Systematic Literature Review

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DOI: https://dx.doi.org/10.47772/LJRISS.2024.805086

Received: 25 April 2024; Revised: 06 May 2024; Accepted: 10 May 2024; Published: 08 June 2024

ABSTRACT

In the complex global economic environment, multinational companies (MNCs) hold tremendous power, not only in driving economic growth but also in changing host nations' skill formation systems and TVET landscapes. However, there is a gap in understanding the complex approaches MNCs use to practice the transfer of skill formation to these locations. This study investigates the strategies used by MNCs to transfer skills in TVET in their host countries, focusing on the impact of skill formation transfer on TVET program efficiency. Also identify the factors influencing the practice in their host countries. Three research questions guided the review. The study used a systematic literature review strategy following PRISMA guidelines. This study reveals a range of approaches used by MNCs, ranging from strategic collaborations, schoolbased collaboration, localization and integration of training programs, in-company training, apprenticeship empowerment, and transnational transfer of skill formation. The study also highlights the impact of local knowledge and skill formation, strategic industry-relevant skills workforce development, internal training provision, promoting apprenticeships, and encouraging multinational corporations to train in host countries. Factors influencing MNCs' transfer of skill formation include inconsistencies between their skills development practices and national goals, subsidiary discretion in training policies, uneven institutional resources, stakeholder collaboration, political conditions, legislative frameworks, etc. This review enhances academic knowledge and provides practical insights for policymakers, educators, and business leaders, enabling them to develop updated approaches to skill development and workforce improvement worldwide.

Keywords: multinational companies, skill transfer, skill formation, technical vocational education, and training (TVET), skill development

INTRODUCTION

The involvement of multinational companies (MNCs) in the practice of transfer of skill formation has garnered attention in recent years, they play a crucial role in the process of transferring skills, knowledge, and innovations across international borders [1]–[5]. However, there is still limited information on how these companies transfer skills, influence, acquire, or cooperate with skill institutions and resources. The issue of skill formation has drawn significant attention in recent decades, both in scholarly discourse and political arenas [6]. The globalization of the job market has led to a clear rise in the significance of standardized educational systems, particularly technical vocational education, and training (TVET) [7]. This relates to the global development and competitiveness of organizations engaged in TVET, as well as the significance of guaranteeing skills for worldwide skilled mobility and the independent living of individuals while facilitating lifelong learning. This is crucial in an ever-evolving societal and technological



environment. The phenomenon of internationalization is gaining significant importance in the field of TVET [7].

For decades, global collaboration in TVET has been recognized as a vital method of developing internationalization because the practice of transferring educational frameworks globally has been a long-standing tradition [7]. The development of specialized skills is becoming more important in defining an individual's employability as well as the competitiveness of an organization in this era of fast globalization and technological innovation [8], [9]. With the goal of providing individuals with the hands-on skills and knowledge necessary to flourish in a workforce that is becoming increasingly complicated, TVET is at the heart of this endeavor. It is important to note that MNCs not only benefit from skilled workers but also actively contribute to the creation and distribution of skill formation processes [10]. This is a crucial role that they play. Their capacity to transfer these skills across cultural, regional, and organizational borders is the pivotal aspect of their contribution to the field [1], [11], [12].

A skilled labor force that can adapt to new technology and industrial requirements is crucial for the modern, effective global economy [13]. The need for expertise elucidates why governments are keen on enhancing their labor forces with the assistance of multinational firms and foreign direct investment (FDI) [14]. This idea is largely accepted, and the officials of the country are taking action to establish hospitable conditions for international firms. The interactions between the home country and host country in respect of transfer of skill formation effects result in the blending of MNCs' human resource management methods and production systems [15].

A. Skill Formation System

The skill formation system encompasses a range of tactics and practices employed by societies or economies to augment workforce competencies via formal and informal learning approaches, apprenticeships, vocational training schemes, and professional development endeavors [16]. The skill formation system is designed to adapt to the changing needs of industries and the job market, guaranteeing that individuals have the necessary skills to make meaningful contributions to economic development and societal progress [6]. The system frequently entails cooperation among educational institutions, companies, industry groups, and government entities to develop and execute training programs that tackle existing and anticipated skill deficiencies.

The practices within a skill formation system include a range of approaches aimed at skill acquisition and refinement. These practices can encompass formal education and training, such as TVET programs, apprenticeships, and on-the-job training [4], [17]. It is possible for individuals to gain new skills, update current ones, and transfer between occupations via the use of skill formation procedures that are sensitive to the ever-changing demands of industries. Skill formation methods contribute to a workforce that is nimbler and more adaptable, allowing it to thrive in an economic landscape that is always shifting. This is accomplished by cultivating a culture of continual learning and skill development [6].

The development of skills has emerged as a key concern on national development agendas [13], [14]. The urgent need to support socioeconomic transformation and progress as well as the requirement for these countries to adapt to the changing needs of the modern era have driven the conversation around skills development, particularly for developing nations. As in[14], both directly through higher productivity, and indirectly, through increasing workers' and businesses' ability to adapt to new technology, skills support economic growth. To maximize the return on investment in skills, it is crucial to update skills to match new demands and trends, as well as to identify the kinds of skills that are pertinent and necessary at moments and the best approaches for developing skills to achieve national economic transformation and growth [13]. This brings up the significance of TVET.



B. Technical vocational education and training (TVET)

TVET is an educational program that aims to provide students with the necessary practical skills and knowledge required to succeed in expected industries or occupations [18]–[21]. It plays a vital function in meeting the needs of the labor market by generating a proficient workforce that can promptly contribute to economic expansion and technological progress [20], [22]–[24]. TVET plays a crucial role in connecting education and employment by providing individuals with opportunities to acquire industry-specific certificates and credentials. This makes it an essential part of a comprehensive and inclusive educational system [23], [25].

TVET institutions provide a great option for people who are looking for specialized training and education in certain careers. This helps to facilitate upward social mobility and decrease unemployment rates [20], [21]. Amidst the swift transformations of the worldwide economy, TVET assumes a crucial function in promoting innovation and flexibility. It empowers individuals to acquire contemporary abilities and remain pertinent in industries that are constantly evolving [21], [23], [26]. As industries advance, the importance of TVET is expected to grow. This emphasizes the necessity for cooperation among educational institutions, companies, and governments to guarantee that TVET curricula stay in line with industry requirements and technological improvements [13], [27], [28].

C. Multinational Companies (MNCs)

Multinational companies (MNCs), or multinational corporations, are expansive organizations that conduct business activities in numerous countries, extending beyond the limits of their native country [29]. These firms participate in many economic endeavors, such as manufacturing, advertising, distribution, and exploration, across multiple nations to access worldwide markets, resources, and skilled individuals. MNCs frequently create subsidiary companies, branches, or affiliated entities in foreign nations, all of which contribute to the MNC's whole value chain [30]. They primarily expand internationally to attain growth, diversify their market presence, reach new customer segments, and achieve cost savings by leveraging variables such as labor and resource availability.

MNCs have a huge impact on the global economy due to their worldwide presence and influence, which is both advantageous and detrimental for the host country [1]. On one side, they contribute to economic growth through the creation of employment opportunities, knowledge transfer, and the stimulation of local industries [13]. Conversely, there have been expressed concerns over their influence on local economies, cultural uniformity, and matters pertaining to labor norms and environmental policies [7]. MNCs frequently encounter intricate legal frameworks and cultural disparities while conducting business in several countries [1]. Their capacity to adjust to various markets, exploit economies of scale, and allocate resources to innovation has positioned them as pivotal actors in propelling global commerce, investment, and economic interconnection.

D. Transfer of Skill Formation

Companies with a global presence need to staff their local and international sites with qualified individuals [31]. Businesses that make intricate and high-quality goods and services are particularly vulnerable to this [32]. The amount of training required for these skilled professionals is high, and as in[32], it is frequently classified as "intermediate skill level" in scientific literature, which is commonly ranked lower than academic education. Recruiting and retaining qualified employees is a unique problem for MNCs [13]. This is because companies frequently face a "training culture" foreign to their home country, which might be different depending on the place [32]. "Training culture" refers to a company's approach to hiring and



developing employees, both in the near and far future, which is influenced by both internal priorities and external factors such as the local climate and economic climate [33]. The local TVET system, labor market, government restrictions, regional and local collaboration, culturally defined value of TVET, and so on are all examples of external circumstances [7], [32].

Labor geography acknowledges the exploitation of workers by subsidiaries of MNCs, yet studies in TVET demonstrate that these foreign subsidiaries provide education and training [31]. Subsidiaries of MNCs have two options: they may either utilize local expertise by hiring skilled workers from the local labor market or they can provide training to enhance the local knowledge base. MNCs frequently employ several strategies to promote the transfer of expertise between different places and circumstances. These practices seek to utilize the skills and information acquired in one area of the operations and efficiently apply it in other areas of the corporation [31].

Companies can go into international markets in a few different ways: by creating a completely owned subsidiary, by buying an existing firm, or by establishing an alliance with a local partner [34]. Companies and industries with highly standardized goods and production systems, like the automotive sector, frequently bring in individuals from their home countries to help standardize skill formation [5], [15]. Case in point as in[15], demonstrated how Volkswagen and Toyota have effectively transferred their skill-formation systems on a worldwide scale. What this means for Volkswagen is "institutional entrepreneurship," or the company's will to build TVET institutions in nations where it has manufacturing facilities. Like Toyota, several MNCs have transferred their standards based only on internal corporate policies, avoiding any interaction with the institutions of the host country. Other times, they've attempted to impose their own ideas on the institutions of the host country, most notably German companies [15].

As MNCs grow their activities in various geographical, cultural, and socio-economic settings, the necessity to transfer and adjust skill development approaches presents both a prospect and a challenge [9]. The increasing influence of the knowledge economy is causing significant changes in the way work is conducted. This has led to a greater focus on the relationship between multinational firms and TVET. This synthesis exemplifies a mutually beneficial relationship wherein employers derive advantages from a proficient workforce while concurrently influencing the structure of education and training [5]. The core of skill development is closely connected to the process of transmitting knowledge, experience, and skill [6]. As MNCs extend their operations across continents, they serve as effective channels for transferring skills and implementing TVET that goes beyond borders. Nevertheless, the essential research questions for this study within the current TVET ecosystem are:

1. What are the mechanisms employed by MNCs in facilitating the transfer of skill formation practices?

2. In what ways are the practice of skill formation transfer enhancing the efficiency of TVET programs for a competent workforce?

3. What are factors that influence the MNCs' transfer of skill formation to the host countries?

To have a complete understanding of the complexities of these study problems, it is completely necessary to acknowledge the ever-changing dynamics that are responsible for shaping the fields of both TVET and international company operations. MNCs have developed into global enterprises that exert a significant amount of influence across a variety of industries because of their quest for innovation, competitiveness, and market growth [35]. Concurrently, TVET has become an essential component for the development of skills, enabling individuals to align themselves with the ever-evolving requirements of the workforce [5]. This synergy between MNCs and TVET institutions serves as the backdrop against which the research question becomes more prominent.



Furthermore, it is crucial to comprehend how MNCs effectively manage the intricacies of skills transfer within the context of TVET [13]. This is because organizations function within an international corporate landscape, frequently including several countries and cultures. As businesses broaden their global operations, companies have the responsibility of not only obtaining a varied workforce but also guaranteeing that their personnel have the necessary skills to uphold consistent operating standards [14]. Furthermore, the variety inherent in the operations of these organizations emphasizes the necessity for versatile and adaptable ways of transferring skills that can accommodate differences in cultural norms, educational systems, and learning styles [33].

However, there is a lack of understanding of mechanism employed by MNCs from different countries to transfer their expertise in skill development to their host nations. The exploration of these many aspects of the connection has not been thoroughly examined. To thoroughly examine this subject and fill this void, a systematic literature review proves to be a useful method. A comprehensive review entails a thorough and systematic examination of current research to identify pertinent studies, rigorously evaluate their techniques and findings, and integrate the collected knowledge to derive significant conclusions. This review intends to gain a full knowledge of the several aspects related to how international companies transfer skill creation processes. It will do so by taking a systematic literature approach.

METHODS AND PROCEDURES

A. Search Strategy

A systematic search of the literature on MNCs' approaches to TVET and their practices of transfer of skill formation was conducted between 5th September 2023, and 17th November 2023, using Scopus database. This systematic review's search was conducted in accordance with the criteria outlined in PRISMA (Preferred Reporting Items for Systematic Reviews and Meta-Analyses), which is a set of quality standards for systematic reviews [36], [37]. Scopus database was searched using advanced search with the following terms Title-ABS-KEY (skill formation) OR (skill transfer OR skill development) AND (multinational compan*) AND (vocational education OR training OR technical). The search resulted in a total of 1372 articles. Search was limited to subject areas such as business management and accounting, social science, engineering, arts, and humanities. Additionally, documents type was limited to only journal articles and conference papers published in English language and all open assess. Furthermore, the search was confined to articles published within a period of ten (10) years (2014-2023). A total of 254 studies were finally retained. Furthermore, seven (7) studies were added from the same Scopus database using the same keywords. They are those articles that did not fall within open assess articles but can still be assessed in full.

B. Eligibility Criteria

Inclusion and exclusion criteria were set to further refine the 254 results obtained. The result was refined by only considering (a) articles that focus on transfer of skill formation practices of subsidiary MNCs (b) transfer of vocational education and training (c) challenges and factors influencing transfer of skill formation and VET by MNCs (d) the criteria also include only theoretical and empirical studies with quantitative, mixed, and qualitative approach. The criteria were first applied to the abstract and title of each article and in a few cases the full article. Secondly, to the full papers. Consequently, out of 254 articles that were initially selected, 214 articles were excluded. This is because the inclusion criteria were not met as regards findings from abstracts and titles. The remaining 40 articles were evaluated by reading the full articles. After considering the articles based on inclusion criteria 23 articles remained including the additional seven (7) studies selected through snowball search in Scopus database. **Figure 1** presents more detailed information.



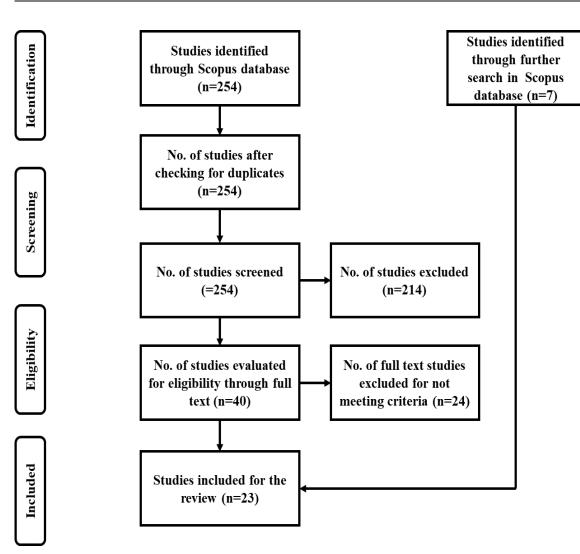


Figure 1 Flow chart of article screening derived from PRISMA [36], [37].

C. Categorization

To organize the review process, a customized spreadsheet file was utilized. This file had distinct categories and subgroups as columns, which facilitated the entry and retrieval of data obtained from the selected publications. The table presents data pertaining to the author, publication year, research methodology, country of study, and major empirical findings. Zotero, a reference tool program, was utilized for the purpose of compiling, managing, and documenting articles, citations, and references.

DATA DESCRIPTION AND FINDINGS

Regarding the reviews, about 34.8% of the studies focused on how MNCs engage in practices of transfer of skill formation and TVET mainly in their host or subsidiary countries. 30.4% of the studies focused only on the factors that influence multinational companies' practice of transfer of skill formation and TVET in their host countries. 17.4% of the studies focused on both transfer of skill formation practices, TVET and how the practices of transfer of skill formation practices of transfer of skill formation of competent work force. 8.7% of the studies focused on both the factors that influence MNCs' practices of skill formation and how the practices of transfer of skill formation practices of transfer of skill formation practices of skill formation practices of skill formation practices and factors that influence MNCs' practices of skill formation in the host country.



The table 1 shows the description of data findings.

Table I Description of Data

Findings	Studies	%
The mechanisms employed byMNCs in facilitating the practices of transfer of skill formation in TVET mainly in their host countries.	[3]–[5], [13], [15], [27], [38], [39]	34.8
Factors that influence MNCs' practice of transfer of skill formation inTVET in their host countries.	[1], [11], [14], [40]–[43]	30.4
Transfer of skill formation practices in TVET and ways in which the practices of transfer of skill formation practices of MNCs enhance and encouraged production of competent work force.	[31], [32], [44], [45]	17.4
Factors that influence MNCs' practices of skill formation and ways in which the practice of transfer of skill formation of MNCs enhanced and encourage production of competent work force.	[2], [46]	8.7
Transfer of skill formation practices and factors that influence MNCs' practices of skill formation in the host country	[30], [47]	8.7

The articles were thoroughly examined, and the results were organized based on the research questions. The findings were then categorized into coherent themes, which are provided in the subsequent tables.

A. RQ1. What are the mechanisms employed by MNCs in facilitating the transfer of skill formation practices?

From the findings, the studies showed MNCs approaches to TVET, skill development, and skill transfer strategies to subsidiary or host countries. **Table 2** summarizes these MNCs' various approaches and strategies. They manage complex global marketplaces, solve the problems of diverse and highly trained workforces, and optimize human resources across multiple geographical settings.

S/N	Mechanisms Employed	Articles
1	Strategic Collaborations	[13], [39]
2	School-based collaboration	[13], [27]
3	Localization and integration of training programs (VET)	[4], [15], [27], [30], [31], [44], [45]
4	In-company training	[31], [32]
5	Apprenticeship Empowerment	[31], [38]
6	Transnational Transfer of Skill formation and Training models	[3], [38], [47]

B. RQ2. In what ways are the practice of skill formation transfer enhancing the efficiency of TVET programs and competent workforce?

Table 3 presents the thematic outline of how skill transfer practices impact the efficiency of TVET programs, hence contributing to the creation of a trained and competent workforce.

Table 3 Ways of enhancing the TVET programs and competent workforce

S/N	Ways of enhancing TVET programs and competent workforce	Articles
1	Fostering local knowledge and skill formation	[44], [45]



S/N	Ways of enhancing TVET programs and competent workforce	Articles
2	Strategic industry-relevant skills workforce development and provision of internal training	[32], [46]
3	Promoting apprenticeships and encouraging multinational corporations to train in host country	[2], [31]

C. RQ3. What are factors that influence the MNCs' transfer of skill formation to the host countries?

Table 4 presents a comprehensive outline of the key factors that influence the MNCs transfer of skill formation to the host countries that have been identified in the existing literatures. Seven (7) key factors have been derived from the literatures after thorough examination that can facilitate or hinder the MNCs practice of transfer of skill formation to the host countries.

Table 4 Factors That Influence MNCs Transfer of Skill Formation

S/N	Influencing Factors	Articles
1	Inconsistencies between MNCs' skills development practices and national goals	[14]
2	Subsidiary Discretion in Training Policies, Uneven Institutional Resources and Skill Formation Systems	[2], [43]
3	Stakeholder Collaboration	[40]
4	Political conditions and Legislative frameworks	[1], [42], [47]
5	Country-of-Origin Image, Familiarity, and Individual Differences	[41]
6	Labor market conditions, and socio-cultural differences and language barriers	[1], [11], [42]
7	Absence of enabling institutions and a lack of strong national and industry-wide coordination,	[30]

Additionally, 82.6% of the studies reviewed utilized qualitative research method. 8.7% utilized the quantitative method. While 8.7% also utilized mixed method. This presents a methodological gap from the studies reviewed [48]. In other words, more studies in the area utilized qualitative methods. However, the research method used may be due to the type of data required. Figure 2 describes the percentage distribution of research methodology found utilized in the reviewed studies.

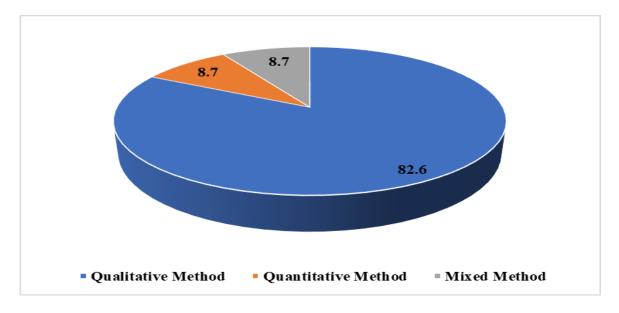


Figure 2 Publication by Methodology



Furthermore, the distribution of studies by country is described in the figure 3. The figure presented five (5) countries that have the highest research in this study area. In other words, more studies in this area were conducted in these countries with China having the highest, followed by Germany and Mexico, then Indian and United Kingdom. The high occurrence of research conducted on this subject matter in China, Germany, and India may be attributed to several factors, including the economic significance of these nations, their prioritization on vocational education and training, and the worldwide nature of companies operating within these geographical areas [2], [45], [49]–[52]. These elements, when considered together, may have the potential to establish these nations as significant research hubs in this field. However, paucity of study in the area mostly in the developing countries presents knowledge gap [48], [53]. The existence of this gap in developing nations emphasizes the necessity for research that investigates the approaches, difficulties and advantages encountered by MNCs when transferring skills and knowledge to these areas. Consequently, making developing countries more potential areas for further research in this area.

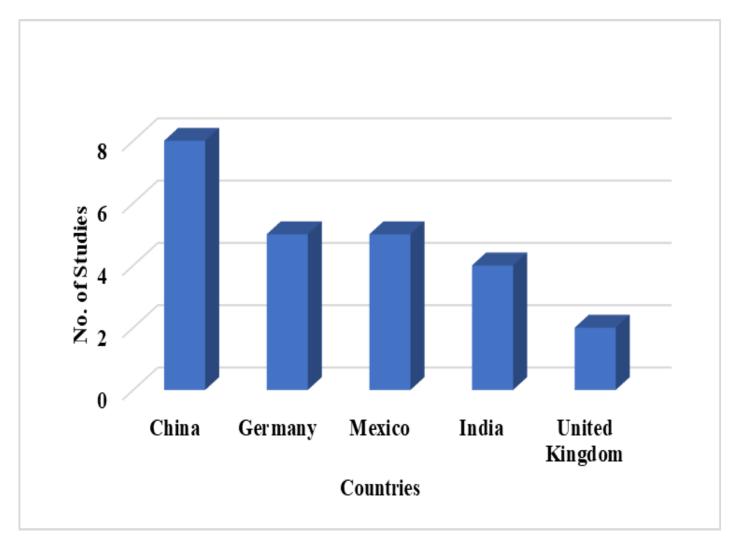


Figure 3 Publication by Country of Study

Moreso, the review revealed that about 70% of studies selected were published within the last four (4) years, with the highest number of articles been published in the year 2023 (figure 4). This is an indication of a constant evolving and growing research area, reflecting researchers' responsiveness to contemporary challenges of shortage of skilled workforce, advancements in technology, and deliberate priorities in TVET. This review's findings have provided a significant perspective on the dynamic nature of this study area and its prospect for further study and development.

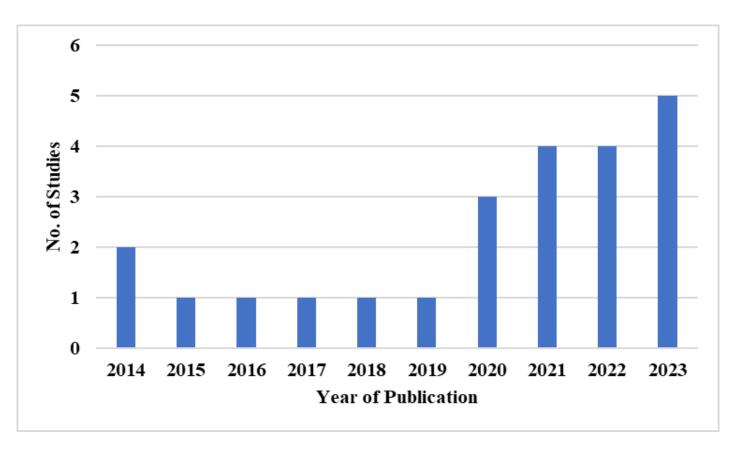


Figure 4 Publication by Year of Study

DISCUSSION OF FINDINGS

In response to MNCs' mechanisms employed in facilitating the transfer of skill formation in TVET in host countries, the review confirmed that MNCs engage in strategic collaborations with TVET institutions, aiming to establish partnerships that address the shortage of skilled workers in the local workforce [13], [39]. This exemplifies the strategic and deliberate approaches taken by corporations with an international ownership structure to interact with TVET institutions. The collaborative strategy is an acknowledgement of the need to eliminate skill set gaps and better match the local workforce with the requirements of the employer. The collaborations aren't only meant to fill up the gaps right now; they also want to help improve access to skilled employees in the long run.

Similarly, the German enterprises operating in China persisted in addressing their training requirements by adhering to the well-established German framework of vocational education and training [27]. The study demonstrates that German enterprises differentiate between basic and intricate industrial operations and align their training programs appropriately. The individuals in question exhibited a higher level of engagement in training activities. This was demonstrated by their establishment of training centers, their efforts to exert influence on school-based cooperative partnership, and their provision of comprehensive workplace training for a portion of their employees [13], [27].

Furthermore, the literature review reveals that MNCs actively participate in training, localization, and integration of TVET programs. German medium and high-tech companies, together with MNCs like Volkswagen, Audi, Siemens, and Bosch, have greatly increased their investment in countries like Mexico and the Greater Shanghai area [2], [40], [45]. There is a rising need for competent workers among the subsidiaries formed in these areas, necessitating creative responses. Notably, the German model served as inspiration for the Mexican government to implement the Mexican Model of Dual Education (MMFD).



Examples like these show that TVET transfer goes beyond individual initiatives and encourages cross-sector cooperation in host countries. Similar difficulties exist for German MNCs in the Greater Shanghai area when trying to find qualified local technicians, prompted some to develop dual apprenticeship training programs in the pattern of Germany's MNC to fill the void. MNCs are transforming the landscape of skill development in host nations through the localization and integration of TVET programs [4], [15], [27], [30], [31], [44], [45]. This revolutionary change influences the worldwide growth of skill development systems by placing a premium on knowledge-based production and guaranteeing that companies get contributions from persons with a middle level of competence.

The review found strategic adaptations in training strategies implemented by prominent German corporations such as Mercedes-Benz, Volkswagen, BMW, and Siemens, with particular emphasis on the incompany training strategy [31], [32]. The company offers comprehensive training programs for those with high-demand skills, employing a customized approach to effectively meet the specific skill requirements of the local region. The focus is placed on the strategic implementation of dual training and in-company training, acknowledging that those approaches aren't indistinguishable but rather demonstrate adaptable techniques that are in line with the educational and labor market conditions of individual countries.

Moreover, the studies revealed that successful TVET on a worldwide scale encompasses more than the transmission of technical expertise. It entails empowering and encouraging apprentices to assume responsibility for their own learning and personal growth [31], [38], [47]. The statement highlights the changing responsibilities of trainers and managers in MNCs who acknowledge the significance of fostering self-determination as a crucial element in the education and professional development of apprentices within varied international contexts. Furthermore, it highlights the significance of local integration and the proactive engagement of MNCs in promoting apprenticeship programs [31]. In addition, the results focus on the transnational transfer of skills through the adoption of German-style apprenticeship programs by MNCs like Volkswagen, Audi, and Schuler etc. in Puebla, Mexico and internationally [3], [38], [47]. This method highlights the concerted attempt to integrate and modify German-style TVET into the host countries, especially in the automobile sector. This shift is a result of successful apprenticeship programs and the growing awareness of the need of trained workers in modern industry.

One of the primary findings from the reviewed literatures is that the practice of skill formation transfer foster local knowledge and skill formation [44], [45]. In addition to increasing TVET's effectiveness, this localized strategy promotes community participation by making the workforce an essential component of the local economy. This finding describes the change that has been seen in the way foreign institutions work with Singapore[44]. It shows that they used to bring in global knowledge but now they focus on using local knowledge. The statement emphasizes the importance of participating in the host nation's knowledge-driven transformation initiative and promoting skill development within the local environment. It suggests that foreign institutions' newly established branches are more closely connected to the local skill development system, indicating a shift in the dynamics of interaction between foreign institutions and host nations.

The phenomenon of skill transfer, as seen in the strategic endeavors of MNCs, plays a substantial role in the advancement of the workforce and TVET sector. The influence is clearly seen by the deliberate emphasis placed on abilities that are pertinent to the sector [32], [46]. MNCs are not only acknowledging the specific skills required by the labor force but are also actively allocating resources towards complete training initiatives. This demonstrates a purposeful dedication to developing the skill sets of the prospective workforce. This highlights the crucial importance of firms in matching training activities with industry demands, therefore guaranteeing the cultivation of a competent and flexible workforce. Furthermore, the implementation of internal training programs inside various businesses contributes to the development of workforce competence. These programs provide workers with opportunities to engage with real-life difficulties, promoting a practical approach that complements theoretical knowledge and expedites the



application of skills in professional contexts.

Moreover, the findings of the study demonstrate that the implementation of skill transfer initiatives facilitate the promotion of apprenticeship programs, as well as the active involvement of multinational firms in providing training opportunities within the host country [2], [31]. These efforts play a crucial role in facilitating the transfer of skills and boosting TVET programs. The promotion of apprenticeships and skill development necessitates joint endeavors between multinational firms and host states on a worldwide scale. Apprenticeships serve to assist the transmission of specialized knowledge from seasoned experts to individuals who are new to the field, hence assuring a smooth transfer of skills within the respective sector [25], [52], [54]. In addition, the promotion of MNCs' investment in local training programs contributes to the cultivation of a global outlook among the labor force. The exposure to worldwide standards and best practices not only serves to strengthen the skill set of the workforce, but also contributes to their competitiveness on the international stage.

The inconsistencies between the skills development policy of MNCs and the host country's national goals have been recognized as a significant obstacle to aligning MNCs' skill-building efforts with the specific needs and objectives of the countries in which they are situated [2], [14], [43]. When the practices of MNCs are not in line with the development objectives of the host country, it might impede the successful transfer of skills. This mismatch between the skills required by MNCs and those emphasized by the host country can lead to a discrepancy, which in turn can impact the preparedness of the workforce and hinder economic development. In addition to this, the study shows the relevance of sub-national regulations in affecting the degree of discretion that is allowed to subsidiaries within MNCs in relation to training initiatives. Moreso, the training activities of MNCs are influenced by the uneven distribution of institutional resources and the skill creation system at the system level [2], [14], [43]. The independence of subsidiaries in creating training policies, together with differences in available resources, might result in differences in the quality and efficacy of skill transfer. Unequal skill development systems might hinder the uniformity of training methods in various regions.

Stakeholders' collaboration was recognized as an additional influential component in the review [40]. This highlights the need for collaborative endeavors involving many stakeholders, such as companies, vocational schools, and local entities, to effectively support the transfer of TVET to the host countries. Collaborative endeavors guarantee that the training offered is in line with the requirements and goals of the host nation, promoting a more comprehensive and mutually advantageous method to enhancing skills transfer. Political stability and legal frameworks are essential factors that significantly influence the conditions for skill development and transfer initiatives [1], [42], [47]. The presence of political instability has the potential to significantly impede the strategic development and implementation of TVET transfer initiatives. Additionally, legal frameworks that endorse the enhancement of skills and the acknowledgment of training programs play a crucial role in establishing the credibility and long-term viability of MNCs' endeavors. A well-defined criteria and acknowledgment bolster the legitimacy of endeavors to develop skills, as perceived by both employees and local authorities.

Findings showed that familiarity, individual variations, and perceptions of the country of origin all influenced how MNCs approached skill transfer [41]. Employee uniqueness, familiarity with the host nation's culture, and the perception of the MNC's home country can all determine how well skill creation programs work. MNCs' skill development programs are more likely to be accepted and integrated when there is cultural harmony and favorable attitudes. Studies also found that MNCs encounter notable difficulties primarily related to cultural disparities, language obstacles, and local factors such as labor market conditions affecting both their professional and personal spheres [1], [11], [42]. Furthermore, for the sustainable implementation of MNCs' skill formation initiatives, it is necessary to adapt training programs to local labor markets, handle cultural distinctions, and overcome language barriers. Similarly, the study



identified how the lack of supportive institutions and ineffective coordination mechanisms affected the situation [30]. In the absence of robust institutional frameworks and comprehensive industry-wide coordination, the execution of skill development programs may be impeded by a lack of required infrastructure and support, hence hampering their success.

CONCLUSION

The study examines how MNCs bring skill-building systems in TVET in the host countries, highlighting the complexity of these methods. It highlights the significant influence of these methods on the effectiveness of TVET programs for cultivating a skilled workforce. Factors such as alignment with national goals, collaboration among stakeholders, political stability, and cultural issues influence the effectiveness of skills transfer projects. Strategic partnerships between MNCs and TVET institutions, particularly in Germany and the Greater Shanghai Area, demonstrate dedication to addressing skills deficiencies and promoting sustainable workforce growth. The implementation of German-style vocational education systems in other countries, such as the Mexican Model of Dual Education (MMFD), demonstrates the global impact of multinational firms' collaborative efforts on skill development.

The effect of skill transfer in TVET programs is evident in the shift towards local knowledge and skills development. Community involvement and apprenticeship initiatives foster skilled labor force growth and global competitiveness. However, challenges exist in coordinating skill development initiatives with host nation development goals, such as lack of consistency in policies, sub-national restrictions, and differences in institutional resources. Cultural compatibility and the ability to adapt to local labor markets are crucial for the long-term success of skill development projects. The study underscores the complex nature of skills transfer programs implemented by multinational firms and the need for ongoing research and strategic initiatives to ensure that multinational firms connect their activities with host nation developmental objectives.

IMPLICATION OF THE STUDY

This research makes a significant contribution to the current body of knowledge by offering a comprehensive view of the complex relationship that exists between MNCs and the nations in which they operate in the field of skill creation. It is possible to get insight into the elements that drive MNCs in their approach to transferring skills to the nations that they are based in by revealing the strategies that they use to transfer skills. Moreover, the study provides insights that can guide policies and strategies that support sustainable development and foster mutually beneficial relationships between MNCs and the nations they operate in. The findings illuminated the implications and provided a comprehensive understanding of how multinational firms' practice of skill development transfer benefited the nations in which they operate.

FURTHER STUDY

This systematic review provides a solid foundation for future research that might concentrate on a few key areas.

- 1. Assessment of MNCs' approaches to transfer of skill formation and TVET system using quantitative, qualitative, or mixed method.
- 2. Fostering the participation of MNCs in the transfer of skill formation to host countries: An Analysis of Policy issues.
- 3. Evaluation of the impact of MNCs practice of transfer skill formation on the efficacy of TVET program. A mixed method approaches.
- 4. Challenges of cultural adaptation of MNCs in the Context of transfer of skill formation practice.



Qualitative research approach

5. The place of policy on effective transfer of skill formation by MNCs to the host countries. Mixed method research approach

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