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Reframing the Role of Leaders Navigating the Challenges and Opporunities of Tomorrow's Workplace in the Age of Artificial Intelligence

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Abstract:- Digital technologies are always changing and evolving. In the Fourth Industrial Revolution, Digital Transformation encompasses the transition of enterprises and societies from the Third to the Fourth Industrial Revolution, where digital technologies like AI is used to create new products and services. The majority of people nowadays believe that Artificial Intelligence will replace human labor. In fact, while many tasks will undoubtedly be automated in the near future, this new type of intelligent machine is more likely to work alongside people. The objective of the present study is to assess and reframe the roles of leadership of tomorrow in navigating this paradigm shift in the workplace. A quantitative study was conducted to evaluate the influences of new skillsets that leaders should possess in an AI driven workplace. A total of 337corporate leaders in various industries and sectors were sought out to participate in the survey questionnaire in order to assess the impact and test the relationship between Ethical Decision Making, Emotional Intelligence, Spiritual Intelligence and Digital Competence on AI Ready culture leading to Organizational Performance of tomorrow's workplace. It was found out that Ethical Decision Making has a positive impact on AI Ready Culture and AI Ready Culture has a positive impact on Organizational Performance. In contrast, Digital Competence has a negative impact on AI Ready Culture and lastly, Emotional Intelligence and Spiritual Intelligence effects on AI Ready Culture were not supported and it was statistically validated by the results of this research.

Keywords:- *Ethical Decision Making-Emotional Intelligence-Spiritual Intelligence-Digital Competence-Organizational Performance.*

I. INTRODUCTION

Today's world is experiencing a paradigm shift as a result of rapidly evolving economies and technologies. Deep and ongoing organizational transformation is a reality in the business environment. Stability gives way to uncertainty, and unpredictability becomes the new standard. Rapid technological advancement and shift in business model are inevitable in the era of artificial intelligence (AI). During this period of transformation, businesses have to align how they operate with emerging technology such as artificial intelligence. In the past four decades, there have been numerous digital revolutions; new technologies have emerged, evolved to its pinnacle, and engulfed humankind in a novel way of thinking, only to be eclipsed by yet another innovation. It has been a time of technological births, advances, deaths, and rebirths in a more developed way.

Artificial intelligence (AI) has become a topic that touches every element of society and has the potential to change organizational leadership due to recent advancements. The contentious impact of AI on unemployment has spurred a great deal of study in the social sciences in recent decades. According to Pentland et al. (2019, p. 2), the capacity to use artificial intelligence—such as machine learning, computer vision, and autonomous systems—and integrate it with the workforce to form symbiotic human–machine teams will determine the strategic advantage of the future. Prior to this, AI was almost exclusively discussed in technical departments. In the upcoming years, artificial intelligence is predicted to become more prevalent and grow rapidly, thus business leaders will need to become more prepared, flexible, and ready for these new technologies. AI will play a significant role in improving production and service-based operations as well as roles involving strategic decision making. AI will need to be integrated with the human element and soft elements of leaders, such as the ability to critically evaluate any decision. To tackle the challenges it presents, leaders must cultivate and strengthen their dynamic strategic capabilities. As a result, in order for humans and machines to collaborate and strengthen one another's shortcomings, leaders must foster a supportive environment in their organizations where learning never stops. Keeping up with the most recent advancements in AI is crucial because the field is constantly evolving. By fostering an environment of transparency and ongoing learning, leaders can ensure that their teams are prepared to fully utilize AI and stay competitive in a rapidly changing world.

II. BACKGROUND OF THE STUDY

A. Job disruption and Artificial intelligence

Artificial intelligence (AI) will most certainly expose and disrupt jobs across most industries in the coming years. As AI, particularly generative AI, becomes more widely adopted, the way people work will unavoidably change, with tools complementing or replacing specific jobs and prompting a rethinking of some traditional job profiles. AI-

enabled devices may result in the loss of a significant number of employment, particularly in automation and data entry. Nonetheless, it is inevitable that new positions will arise. In 2021, China installed 268,200 industrial robots, accounting for over 52% of all new industrial robot installations worldwide. Overall, Asia accounted for 74% of industrial robot installations in 2021, while Europe and the United States climbed by roughly 24% and 14%, respectively in 2021. According to their most recent AI job loss forecasts, 19.8% of jobs have the greatest possible exposure, while 34.6% face the lowest potential exposure.

- AI has the potential to replace 300 million full-time employment.
- AI will affect at least 10% of the tasks performed by 80% of the US workforce.
- 77% of firms are already employing or investigating artificial intelligence.
- AI would replace politicians for 75% of Chinese population.
- CEOs of AI firms such as OpenAI have signed an open letter warning about the threat of extinction from AI.

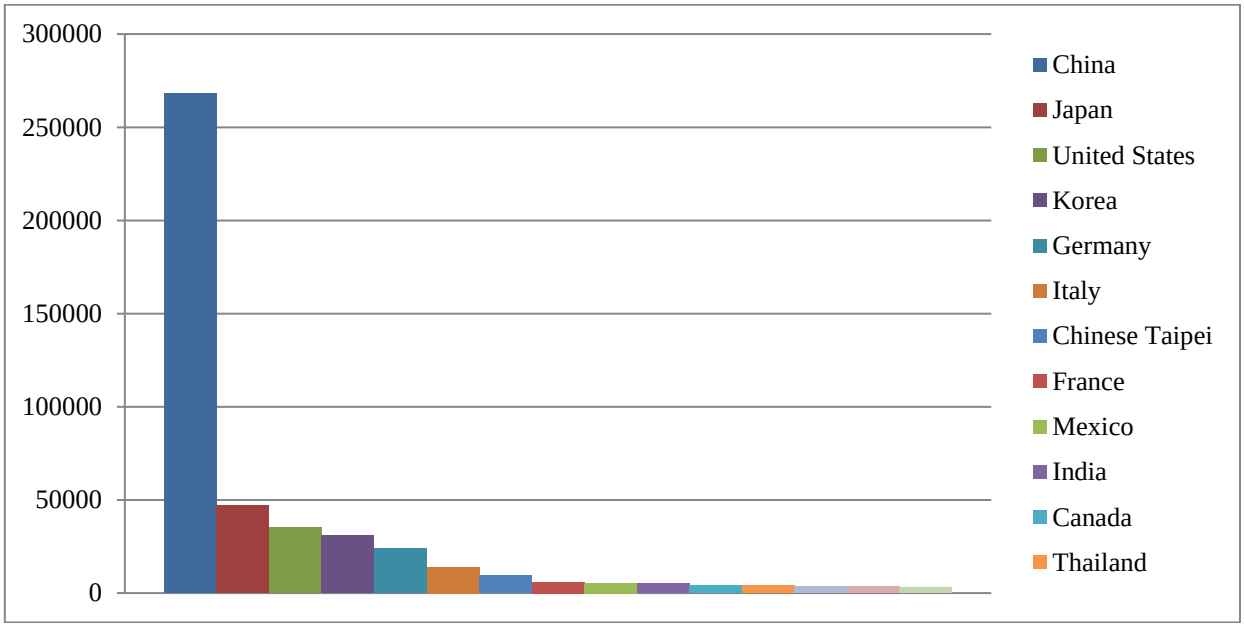

Fig. 1: Industrial Robot Installation by Country
Source: www.statistica.com

B. Leadership in the era of Artificial intelligence

Artificial intelligence is a powerful tool that may enhance human talents and help with improved decision-making, not a threat to human leadership. We need to embrace change, act morally, encourage collaboration, and focus on promoting the facets of humanity that AI cannot replicate if we are to succeed as leaders in this new era. Leadership has a bright future in this era of limitless options because artificial intelligence and human potential work harmoniously to achieve incredible success and innovation. Among other things, this means that the leader's roles will shift. This is especially apparent in how the interaction is shaped. It is the responsibility of leaders to influence how staff members and AI interact. The objective is to leverage AI to increase the company's competitiveness in order to boost the business's capacity for innovation. What AI really offers is the potential to enhance collaboration rather than replacing effort.. Furthermore, according to Robert (2019), as AI gets more widely used, it will significantly change what it means for leaders to recruit, develop, and support their teams. It will also become an increasingly important component of business strategy. They mandate that in order to uphold the ideals of their company and foster innovation and productivity, leaders must use both AI and human resources in tandem.

According to Chen & Decary (2020), leadership is actively encouraging organizational transitions to close the gap between the old and the new developments in the corporate environment. Sreejesh, Mohapatra, and Anusree (2014) claim that leaders need to acknowledge that although artificial intelligence may seem to be boosting automation, human talent will really increase in value as technology progresses. They need to intuitively and empoweringly coach one another in order to turn into machines and teams collaboration. The leadership of the future will be formed by today's agile idealists in an increasingly sophisticated and AI-driven society. Their adaptable AI techniques need to change quickly to keep up with the ever shifting political, sociodemographic, and corporate landscapes. Leaders in the current day must, however, be able to provide risk models that are based on data, factors, and correlations rather than gut instincts thanks to artificial intelligence. They must be capable of carrying out stress tests in a variety of settings and responding shrewdly and securely even in an unforeseen circumstances. To prepare for the implementation of AI, leaders must possess the flexibility to let go of some used and tested organizational development ideas. AI-friendly mentality is essential since it forms the basis for all other concepts. Along with going beyond the traditional approach of only streamlining corporate processes, they also need to reconsider how they function and how tasks are

accomplished. AI can help them advance their careers and make better decisions by helping them develop their skills. AI may offer leaders individualized coaching and feedback to assist them pinpoint their areas of weakness and strengthen their leadership abilities. AI can be used to evaluate data and spot trends that help guide their choices. For instance, leaders can receive feedback on their decision-making, emotional intelligence, and communication style from AI-powered tests. They can use this feedback to pinpoint their areas of weakness and create focused programs to strengthen their leadership abilities. Additionally, by analyzing massive volumes of data and seeing patterns and trends, AI may assist leaders in making data-driven decisions. This can support decision-making and strategy development for them by providing data and insights.

C. The need for AI Regulation

One of the biggest concerns for the next 10 years is expected to be the regulation of artificial intelligence and the "big data" that underpins AI (Featherstone, 2017). In the future, authorities would be hesitant to approve AI systems if they cannot provide a detailed explanation of how and why choices are made, given the complexity of AI applications and the fact that many leaders are not familiar with them (Protiviti, 2019). In order to prevent this, company executives must make sure that their AI systems aim for "explainability," which allows them to be transparent and offer justification for choices and actions taken (Ai Hleg, 2019). Ultimately, even while artificial intelligence (AI) has the potential to upend the labor market, it's also critical to take into account the numerous ways in which technology may both augment and improve the capabilities of human workers as well as open up new and better job prospects. According to Stanford University studies, given the current state of ambiguity in the area, any attempt to control artificial intelligence would be inappropriate (Marr, 2022).

Artificial intelligence development can be hindered by regulation, but ethical growth of AI would be ensured by proper and well-planned regulation, which would also foster public confidence (Rakhecha, 2023). This strategy seeks to minimize any potential threat to human rights while enabling the development of AI. These principles can be found in the following list, which was developed by the OECD: the first requires artificial intelligence to advance society by promoting equitable growth, sustainable development, and shared welfare; the second calls for AI programs to be created with human rights and legal requirements in mind while maintaining safeguards; the third principle mentions transparency; the fourth requires AI systems to function steadily; and lastly it mandates that organizations that distribute and use AI be accountable for ensuring that their AI complies with the other principles (Cataleta, 2020). Similar to the changes brought about by the industrial revolution, artificial intelligence leads to structural unemployment and affects the skill sets that employers require. The labor market and the nature of labor demand saw significant changes as countries transitioned from agrarian to industrial economies in the 20th century (Government White Paper, 2016). As the era of artificial intelligence draws near, laws pertaining to education and training will become the most potent kind of regulation.

III. PROBLEM STATEMENT

The development of artificial intelligence has the potential to boost economic growth, but it also raises concerns since it could lead to structural unemployment. The development of AI technology poses a risk to human rights, could lead to discrimination, and eventually replace human labor. With predictions that AI will replace around 800 million jobs globally by 2030, it's no surprise that the world is abuzz. The economic forecast is equally astounding, with AI's predicted economic impact totaling $15.7 trillion by the same year. Furthermore, retraining is becoming increasingly necessary. Over 120 million jobs are projected to be retrained in the coming years as artificial intelligence reshapes industrial expectations. However, the majority of businesses anticipate that computers will replace human labor over the next 50 years, suggesting that, while AI is a fact, it has not yet fully realized its potential for job replacement. Tesla and SpaceX CEO Elon Musk has referred to AI as the "biggest existential threat to humans." As noted by Yuval Noah Harari : "AI will create a useless class of humans." Another statement from the late Stephen Hawking shared similar concerns that advances in AI "could spell the end of the human race."These concerns stem from the revolutionary advancements in machine learning, where technology is augmenting, if not completely replacing, human intelligence. Because artificial intelligence aims to augment, develop, and/or eventually replace human intelligence, which is the fundamental ability of humans, it is easy to view AI as a danger to human leadership. Leaders in the AI ecosystem have an obligation to disprove these concerns. The way we do business will shift, and future successful leaders will require a slightly different set of talents than those who are currently in the leadership role. Artificial Intelligence (AI) holds promise as a more reliable, efficient, and unstoppable substitute for human labor.

As automated technology advances, it can surpass human capabilities, making it a more advantageous choice for companies. The threat that AI poses to job security is rooted in these issues. But artificial intelligence also generates job prospects. In an AI-driven environment, leading firms will necessitate new perspectives on executive leadership knowledge and competencies (Chamorro-Premuzic et al. 2018; Dixit & Maurya 2021; Watson et al. 2021). For firms to prosper in the future, fundamental leadership abilities will need to evolve (Chamorro-Premuzic et al. 2018; Fountaine et al. 2019). Although considerable academic study has been conducted to understand how leadership is evolving in the context of AI, there is still a vacuum in knowing how leaders must prepare and respond (Brock & von Wangenheim 2019; Chatterjee et al. 2021; Frick et al. 2021; Loureiro et al. 2021; Watson et al. 2021). A new kind of leader is needed to successfully manage the complexities of intelligent automation in light of the AI revolution. The definition of a great leader will change and needs to be reframed as a result of this technological transformation. Therefore, it makes sense that corporate executives will have to adapt, adjust and reinvent their

business capabilities as a result of the intelligence revolution.

IV. RATIONALE OF THE STUDY

Artificial intelligence (AI) has caused a significant shift in our economy. However, the field of artificial intelligence-driven leadership has not received much scholarly attention and remains mostly unexplored. Nevertheless, there are numerous articles in magazine covering this topic. A small number focus on the relationship between AI and leadership, however these have limitations that don't explain the shift in leadership's roles. Due to the continuously evolving nature of AI, there is relatively little theoretical study on the essential leadership competencies for effectively directing an AI-driven enterprise (Watson et al. 2021). Although certain models are emerging to address leadership in the context of a larger digital revolution, there has been limited research into the intricacies of artificial intelligence. Models on agile leadership, such as Neubauer, Tarling, and Wade's (2017) approach, have been examined and should be regarded appropriate to AI. Based on academic research, Watson et al. (2021) created a model of leadership capabilities for the AI era. Dixit and Maurya (2021) give observations on a variety of attributes required by AI leaders. According to Acemoglu and Restrepo (2019), the majority of research and practitioner efforts to far have been on implementing AI at the operational level of businesses. Few researches are looking into how AI will affect organizational governance and how leaders might need to upgrade their skills to effectively lead their company in this new, rapidly changing AI-based era. Businesses should be aware of impending changes before implementing AI in particular industries. The results of the present study should open the door to further research in this field. The results will also benefit practitioners because they might have a big impact on how they approach AI in leadership and what changes they need to undertake. This study is useful to academics and practitioners since it aims to analyze and document the changes that artificial intelligence (AI) brings to corporate contexts. Additionally, these results can aid researchers and companies in developing and assessing strategies pertaining to the future of jobs. The findings of this research also can help to see how prepared leaders are for the changes the future implies. The study fills the gap by evaluating and debating current notable opinions on necessary leadership traits and appropriate technology adoption strategies.

V. RESEARCH OBJECTIVES

This study aims to explore the expectations of current leaders on how the leadership roles will change with the implementation of AI in the workplace. By exploring these expectations, it can contribute to a better understanding of how AI affects the leadership role in the future. In order to achieve the study aims, the following research objectives are posited :

- **RO1:** To evaluate the impact of Emotional Intelligence and AI Ready Culture
- **RO2:** To evaluate the impact of Spiritual Intelligence and AI Ready Culture
- **RO3:** To evaluate the impact of Ethical Decision-Making and AI Ready Culture
- **RO4:** To evaluate the impact Digital Competence and AI Ready Culture
- **RO5:** To assess the relationship between AI Ready Culture and Organizational Performance

VI. RESEARCH QUESTIONS

Can robots replace human leaders? Is the first question that frequently comes to mind when addressing leadership and artificial intelligence. In order to reframe and test the abilities of the future roles of leaders, the following research questions will be answered throughout the development of the present study.

- **RQ1:** To what extent does Emotional Intelligence influence AI Ready Culture ?
- **RQ2:** To what extent does Spiritual Intelligence influence AI Ready Culture ?
- **RQ3:** To what extent does Ethical Decision-Making influence AI Ready Culture ?
- **RQ4:** To what extent Digital Competence influence AI Ready Culture ?
- **RQ5:** To what extent does AI Ready Culture influence Organizational Performance ?

VII. LITERATURE REVIEW

A. The advent of Artificial Intelligence

In the beginning, there were several waves of scientific inquiry and public curiosity about artificial intelligence (Dwivedi et al. 2021). The true origins of AI in society are frequently discussed, with ideologies ranging from ancient mythology (Buchanan 2006; Elliott, 2019) to more modern depictions in intelligent machines (Loureiro et al. 2021). Despite early philosophical and logical ideas, the term artificial intelligence (AI) was formally coined in the 1950s at a major conference at Dartmouth University (McCarthy et al. 1955). For several decades, academic research was the primary focus of AI (Daugherty & Wilson 2018; Haenlein & Kaplan 2019). The early 2000s saw significant advances in information technology, particularly in data collecting, storage capacity, and analytics (Marr, 2015). Conversations about what "big data" is and what it can do began to spread throughout the business world (Borges et al. 2021; Duan et al. 2019; Haenlein & Kaplan 2019). As a result, many social apps and websites evolved into commercial platforms, and businesses began capitalizing on the data they had been gathering on users for years (Van Dijck 2013), paving the road for artificial intelligence.

Today, technology is evolving in a broad sense all over the world, and humanity is now experiencing what Brynjolfsson and McAfee (2016) titled the second machine age. Artificial Intelligence is not only used by high tech companies, but by people in their everyday life. The computer is now able to affect society in the same way the

steam engine did during the first machine age. However, the power of the computer will continue its growth, and one of the areas where it is still developing is in the field of Artificial Intelligence. Global professionals from a variety of industries have forecast that artificial intelligence (AI) will impact the globe more than any other digital technology, surpassing even the internet (PWC, 2019). According to Libert, Beck, and Bonchek (2017), there is a prediction that artificial intelligence (AI) will serve as the foundation for a crucial competitive advantage when utilized for strategic and operational decision-making. But most business executives still don't fully understand artificial intelligence (AI), and most don't know when or how to fully optimize it (EY, 2018).

B. AI in business organization

There is significant academic and management interest in understanding AI (Borges et al. 2021; Brock & von Wangenheim 2019; Dwivedi et al. 2021; Kitsios & Kamarioutou 2021; Ransbotham et al. 2017) and how it is revolutionizing business today (Chiu et al. 2021). AI is proving to be one of the most interesting technological phenomena in history and yet possibly one of the most elusive (Berente et al. 2021; Haenlein & Kaplan 2019; Ransbotham et al. 2017). AI is being utilized in transforming businesses, industries, and economies at an unprecedented rate, thus making management more complex (Berente et al. 2021; Dwivedi et al. 2021; Loureiro 2021). The most distinctive feature of AI, which sets it apart from other technology, is its ability to process vast amounts of data and provide real-time guidance on critical management decisions (Cubric 2020; Duan et al. 2019; Dwivedi et al. 2021; Schneider & Leyer 2018). Due to a power shift produced by a realignment of the decision-making process, the AI revolution also resulted in changes in the way firms manage and lead workforce (Duchessi, O'Keefe, & O'Leary, 1993). Algorithms are increasingly interfering in corporate decision-making processes. Managerial decisions that are typically marked by uncertainty, ambiguity, and complexity can now benefit from the participation of AI agents (Jarrahi, 2018).

AI has been shown to outperform humans in situations that require processing high levels of information and variables at extremely fast and rigorous rates, reducing the complexity of these situations, and to be objective and free of self-interested agendas, which is not always the case with humans. Humans, on the other hand, have emotional and social intelligence to deal with employees in organizational environments, which is necessary to persuade, motivate, and develop interpersonal relationships with others, surpassing AI agents in these situations (Jarrahi, 2018). As a result, humans and AI have partnered, and managerial decisions are increasingly being made with the assistance of AI agents (Jarrahi, 2018; Wilson & Daugherty, 2018). AI helps corporate leaders in firms with a variety of assignments, including hiring, performance reviews, predicting employee turnover, assigning tasks to staff members, and giving them feedback (Lee, 2018).

The nature of employment and jobs will probably change if individual functions are widely substituted (Frey and Osborne, 2013). Human workers will have more time to devote to complementary tasks where they have a comparative advantage, like those involving creativity and human interaction, as machines begin to replace routine manual and routine cognitive tasks (Autor, 2015; Finnigan, 2016; Arntz, Gregory and Zierahn, 2016). Furthermore, machines will work alongside humans for a large number of these tasks, and increased technological-human cooperation is anticipated (International Federation of Robotics, 2017). For instance, in the coming decades, a physician will probably still be in charge of making the ultimate diagnosis for a patient, but they will have the option to partially rely on the AI-generated diagnosis recommendations. Jobs will thus demand greater training and a deeper comprehension of technology. Furthermore, while the integration of technology boosts output, human workers may devote less time to their jobs, leading to reduced workweeks. A growing number of people believe that in the next few decades, advancements in robots and artificial intelligence (AI) will drastically change the workplace (Brynjolfsson, McAfee, 2014, Ford, 2015). At Symbolic LLC's automated distribution centers, robots load, unload, collect, and ship goods with little assistance from humans. AI systems are now employed as teaching assistants, paralegals, and accountants, and millions of truck, bus, and taxi driver employment could soon be eliminated by self-driving cars.

C. The rise of automation in the workplace

Estimates of the likelihood of job automation vary widely throughout previous studies. Up to 46% of all US employment contain more than 70% duties that can be automated, making them highly automatable, according to estimations by Frey and Osborne (2013). Using the same methodology but focusing on tasks rather than professions, Arntz, Gregory, and Zierahn (2016) find that just 9% of US employment has a potential for automation of more than 70%. Even if they do not use 70% as a threshold for significant automation potential. It is obvious that accurately estimating the potential for automation is challenging and heavily reliant on opinion regarding the capabilities of various technologies and the task-related organization of various professions.

However, despite this variation, a number of broad conclusions can be drawn. First of all, occupations that are fully automatable are probably made up of repetitive manual and repetitive cognitive tasks that don't call for human interaction or manual dexterity. Order clerks and sewing machine operators are two examples of these kinds of jobs. Second, jobs with a high automation risk also tend to have a high degree of routine cognitive and manual labor, but they also almost certainly involve some degree of human interaction or unpredictable with high precision physical labor. Occupation categories that include a lot of highly automatable jobs include manufacturing and production due to the high amount of routine tasks that need to be done by hand, as well as sales, office, and administrative support jobs due to the high reliance on gathering and processing information (World Economic Forum, 2016). Transportation, material movement, food and lodging services, and other career categories all include a significant

amount of repetitive manual labor as stated by Frey and Osborne (2016). Manyika et al. (2017) even claimed that out of all the categories, the latter offers the greatest potential for automation. Finally, the automation potential of a work decreases with the proportion of non-routine tasks. This effect is amplified if one possesses talents like creativity, logic, emotional intelligence, and natural language processing, among others.

D. Divergent views of the threats of automation

The idea that we are about to witness a robot revolution has generated a lot of discussion among technophiles, journalists, and economists over how automation would probably affect income distribution and growth. In general, there are two parties that have radically divergent expectations for the future. "Without ownership stakes, workers will become prisonniers working on behalf of robots' overlords in a new form of economic feudalism," predicts technology pessimists, who worry that we are heading toward an economic dystopia of severe inequality and class conflict (Freeman, 2015). Even proponents of technology acknowledge that automation will cause disruptions in the near future. They do, however, point out that historically, times of fast technological advancement have raised wages and per capita income roughly proportionately and created more employment than they have eliminated. Although the AI revolution will be different, there are good reasons to think that a resilient and adaptable economy will once again defeat the threat of technological unemployment: increasing incomes drive up demand for labor in manual labor-intensive industries and in sectors that produce non-automatable goods; increased productivity encourages capital input investment across the economy; and while automation replaces some jobs, it enhances many others, particularly those that value creativity, adaptability, and abstract thought.

According to Stevenson (2019), the use of AI boosts economic growth by increasing productivity, which in turn increases the amount of money that can be earned in the future. Additionally, he demonstrates that this beneficial effect is legitimate as long as artificial intelligence's benefits can offset the earnings lost by the workers who are negatively impacted. It is anticipated that technological advancement would eventually enhance human abilities through the creation of new vocations. Actually, using AI opens up new avenues for utilizing human abilities. A positive view suggests that unemployment is reduced by artificial intelligence as AI and other emerging technologies are similar of that they both lead to increased productivity. As a result, when the economy grows, more jobs are created, which lowers the unemployment rate. Although isolated instances of structural unemployment are recordable, they are only permanent because they disappear as soon as the labor market reaches equilibrium. The second kind of impact is detrimental, since artificial intelligence contributes to a rise in joblessness. "If it does create more work, this work can also be performed by artificial intelligence devices without necessarily implying more jobs for humans," as stated by Nilsson (1984).

E. Reframing the roles of leader in an AI-driven Organization

Leadership in the AI era is a thrilling journey with challenges and opportunity. Instead of threatening human leadership, artificial intelligence is an effective tool that could bring out human skills and facilitate better decision-making. To succeed as leaders in this new era, leaders must welcome change, behave decently, promote teamwork, and concentrate on highlighting the aspects of humanity that AI cannot duplicate. In this age of infinite possibilities, leadership has a bright future since human potential and artificial intelligence combine to produce amazing achievement and innovation. To effectively lead an AI-driven organization today, the role requires rebalancing specific established qualities and perhaps generating new ones (Chamorro-Premuzic et al. 2018; Marr 2020; Ransbotham et al. 2017). According to previous research, visible, dedicated executive participation in digital transformation is critical to successful technology adoption (Brock & von Wangenheim 2019; Jöhnk et al. 2021; Schiuma et al. 2021). The study by Chatterjee et al. (2021) revealed that if good leadership was visible in AI initiatives, AI adoption would be expedited. Being outwardly present and participating in AI projects, however, is insufficient.

Today's corporate executives require unique skills to instill trust in their firms and steer them through the AI revolution. In order to help organizations to fully benefit from the technology, leaders must overcome a number of hurdles posed by the emergence of AI in the workplace. Brynjolfsson & McAfee (2017) contend that leaders must be able to adapt to the rapid advancement of technology, recognize potential new issues that may arise from it, identify those issues, and come up with the best solutions. Therefore, it will be clearer how AI will affect the leadership role in the workplace of the future with the help of leaders' insights into the field of knowledge. With every successful cycle of information processing, artificial intelligence (AI) systems get wiser since every interaction enables the system to test and measure solutions and improve skills in the given task. Delponte and Tamburrini (2018) contend that effective leadership requires the ability to make decisions in a timely and sufficient manner. Artificial intelligence (AI) is useful in this situation because it makes decision-making easier by turning vast amounts of data into insightful information. Because AI analytics can manage massive volumes of data, it can assess a wide range of performance metrics for an individual or remote team and provide recommendations to improve coordination and collaboration. AI analytics can be applied in a variety of ways to enhance worker's well-being, including eliminating monotonous or low-value work and offering guidance and consultations on mental or physical health. By assessing an employee's potential and skill set, artificial intelligence (AI) can assist in talent management. AI-powered assessments may examine a worker's skills, personality, and previous jobs to help corporate executives better assess a candidate's potential and identify areas for improvement. This can help them find employees that have a lot of potential and provide them with opportunities to grow.

Leaders in AI-integrated systems are able to hear the opinions of their subordinates with their ears and see AI decisions with their eyes. In order to develop an ecosystem of shared relationships and procedures, using AI necessitates altering crucial job responsibilities and collaborating across organizational boundaries. An open AI culture requires adaptation, according to Zhang, Wang, and Liu (2018). Getting human workers and AI to work together efficiently is one part of this. Transparency, trust, and openness are three essential qualities and leaders need to have the flexibility to let go of some used and tested organizational development strategies in order to get ready for the deployment of AI. An AI-friendly mindset is crucial since it serves as the foundation for all other ideas. Leaders must reevaluate how they operate and complete tasks in addition to moving beyond the conventional strategy of only optimizing company processes (Winston, 1984).

While AI can offer data-driven insights and decision-making powers, human leadership is still required to provide vision, empathy, and strategic direction. Leaders must strike a balance between the applications of AI and the necessity for human discernment and judgment. Even as the use of AI technology in the workplace increases, they still need to make sure that their staff members feel appreciated and involved. Fostering a culture that rewards initiative and creative thinking is a key component of effective human leadership. It also entails being aware of and responsive to the needs and worries of staff members, including offering assistance with their psychological and emotional health. It is imperative for leaders to establish communication channels that are transparent and open, enabling staff members to voice their issues and offer suggestions. In addition, human leadership plays a vital role in promoting innovation, which is necessary for any firm to survive. It is imperative for leaders to foster a culture of experimentation and risk-taking in order to inspire creativity and innovation. Leaders who foster a healthy work environment and take proactive steps to resolve conflicts can increase employee happiness and productivity. Communication remains at the core of leadership, and this is still the case in the AI era. Leaders need to properly communicate the vision of the company in order for their people to understand how AI fits into the bigger picture.

F. AI Ethical Challenges

In modern organizations worldwide, a crisis of meaning and crumbling moral authority is a common occurrence (Brown and Tervino 2006; Brown and Mitchell 2010; Bolman and Deal ; 2017). Therefore, in order to foster the ethical qualities of innovativeness in digital-era enterprises, Riivari and Lämsä (2019, p. 233) argue that "leadership by example and ethical role modeling" are just as important as having a positive outlook. Epley and Kumar (2019) claim that in modern businesses, where leaders can play decisive roles with straightforward yet effective decision making, ethics is in fact a "design problem" as much as a "belief problem." They claim that designing ethical organization systems can be as easy as incorporating moral values into a company's plans and guidelines, giving ethical leadership practice a top priority, creating a culture that rewards moral behavior, and promoting moral standards in day-to-day operations. Nonetheless, a results-driven ethical framework or system design in the digital age necessitates consistency and alignment of individual, organizational, and regulatory preparedness and commitment, as argued by Filabi and Haidt (2017) and Floridi et al. (2018).

Furthermore, globalization, climate change, terrorism, cybersecurity, and organizational restructuring are no longer solely the domain of public policy and international diplomacy; they also influence corporate culture and leadership ethics, or at least how much ethical thinking is considered in organizations according to Singer (2002, pp. 1–13) and Groarke (1998). In addition, Caruso (2017) claims that among other issues, the fourth industrial revolution and digitalization pose an impending social challenge in the form of the potential emergence of "knowledge workers" as the "new elites." Additionally, the technology sector's inability or unwillingness to foresee "prescribed consequences" to organizational design and employment constitutes a significant obstacle to leadership work. According to Capurro (2017), there is a "digital class divide" in this case. This opinion is also expressed by Chernyak-Hai and Rabenu (2018), who go on to say that in this new reality, leadership must balance power dynamics within organizations and ensure "social justice" in order to prevent "counter-productive behavior" and "reproduction of employee inequality."

Digitization has both benefits and drawbacks, especially for leaders. For example, default digital designs or a demand for constant availability, efficiency at the expense of privacy, unfair monetization of personal data, and the growing public concerns regarding the "spying eyes" of various digital technologies such as IoTs, biometrics, VR, and AR technologies have made it more difficult for leaders to strike a balance between traditional organizational management practices and the urgent need for the adoption of new technologies, as noted by Entschew and Suchanek (2017), Capurro (2017), and Royakkers et al. (2018). It is the responsibility of leaders to guarantee dependable digital infrastructure for data and privacy protection prior to the implementation of "smart services," as stated by Davenport and Katyal (2018) and Park (2018). According to Clavell (2018), who also holds this opinion, among the other challenges facing organizational leaders are "complications in data sharing among authorities," "securing support and digital readiness among the personnel involved in the process," and "developing a response mechanism for potential mismatches or unintended results from the use of new technology." However, Brynjolfsson and Kahin (2000), McAfee and Brynjolfsson (2012), and Brynjolfsson and McElheran (2016) noted that data-driven decision-making (DDD) has in fact supplanted conventional reliance on "intuition" along with the emergence of the new "platform economy." But in this "new normal," how can leaders find and use "better data" to make "better decisions"? That is the crucial question. Thus, it is difficult for organizational leaders to monitor how AI-based digital technology is changing leadership roles and employment. Furthermore, as argued by Dijck (2014), managers and leaders must resist the "objective quantification" of social interactions and

human behavior that is made feasible by "big data analytics."

The World Economic Forum (2019) has identified "cybersecurity" and "data fraud or theft" as the two main issues facing modern firms. Their insight makes the argument that, although it is impractical to anticipate "complete immunity" from these kinds of threats and assaults, it is the responsibility of leadership to maintain the risks at an "acceptable level." The digitalization of leadership and e-leadership have been the subjects of writings by authors such as Brynjolfsson and Saunders (2010), Avolio and Kahai (2003), and Avolio, Kahai, and Dodge (2001). For example, they argue that the advent of digitalization has put traditional power structures in businesses under strain, which has placed a great deal of pressure on those in management and leadership. These authors advise striking a balance between the new e-leadership model and conventional leadership methods, making moral decisions, and employing technology responsibly so that it can "touch" and "reach" all stakeholders.

The IEEE (2017, pp. 61-65 and 182-190), The EU (2019), Havens (2018) and Davenport and Katyal (2018) propose that an ethical framework for AI-based digital systems, which is already a desperate need of our times, can be built upon the same foundations as ‘classical ethics’ as well as ‘computer and information ethics’ by embedding fundamental human rights, values and wellbeing metrics in their design and operation. An EU white paper on AI urges member states to assume leadership roles and formulate new national legislations on AI technology in order to ensure citizens’ trust and confidence. However, laws are not always up to the speed with technological developments so AI-based digital technologies should adhere to ethical norms in the first place. Not only that ethical organization systems design and leadership excellence can benefit from careful consideration of the human dimension of digitalization and compliance with basic ethical concepts, but they also reinforce the argument for the continued development of advanced digital technologies in and for themselves. The global ethical leadership practice is facing significant challenges due to the interwoven nature of the ongoing digital disruptions, the emergence and dominance of multinational business corporations, and supranational governing agencies that pose a serious threat to the traditional roles and power dynamics carried out solely by nationstates.

G. Implication of emotional intelligence in Driven-AI workplace

Artificial intelligence (AI) transforms organizational structures and opens up new growth prospects by automating repetitive work and streamlining decision-making procedures. Even while AI is capable of handling complicated tasks, it is lacking in a vital component that is necessary for human-to-human communication: emotional intelligence (EQ). Within the field of leadership literature, academics have given considerable consideration to and emphasis on emotional intelligence (Ashkanasy & Daus, 2002; Brown & Moshavi, 2005; Cote et al., 2010; George, 2000). In leadership research, emotional intelligence (EI) is a rapidly and strongly developing component that ultimately proves to be utterly indispensable in understanding how people feel and react. Being emotionally intelligent increases one's ability to understand emotions and how they affect behavior. Since businesses are primarily focused on people, anything that has an impact on people also has an impact on businesses. Every corporate institution employs a workforce that is diverse in terms of nature, temperament, and experience, which has an impact on the overall pattern of work. The innate ability to perceive, make use of, communicate, differentiate, recall, describe, classify, learn from, arrange, understand, and explain emotions is known as emotional intelligence (Wong & Law, 2002). Every human being possesses some sort of undetectable emotional intelligence. Additionally, it directs how we control and manage our behavior, handle typical problems, and reach conclusions about our own actions that have positive outcomes.

In the workplace and in one's personal life, emotional intelligence plays a major role in the daily surroundings. Numerous studies have established emotional intelligence as a measure of a person's aptitude and professional success (Lanser, 2000). Emotional intelligence is deemed essential for successfully understanding and preserving relationships with people, which is regarded as the organization's bottleneck. Unfortunately, organizations have not yet given much attention to the term "Emotional Intelligence." Nevertheless, factors like a higher turnover rate, a more diverse workforce, frequent mergers and acquisitions, globalization, changes and modifications to the work environment, and competitive pressures have made it vital and practically necessary to understand and value the use of it. Many crucial appointment holders are quitting firms as a result of cutthroat and unemotional leadership and management. Furthermore, a diverse workforce necessitates emotional intelligence in order to harmoniously handle such challenges in today’s enterprises (Scarnati, 2001). Emotional intelligence is equally important in one's personal life as it is in one's professional life. According to previous research literature, the majority of employees are fired from organizations owing to a lack of emotional intelligence rather than a lack of professional expertise. Given their diverse origins, emotional intelligence is absolutely essential for accurately managing and regulating the workforce. Teams who operate together on a daily basis and show respect for one another's sentiments and emotions execute and perform remarkably well (Harminder & Jaya, 2011).

As artificial intelligence (AI) continues to change many aspects of our life, it is imperative that we consider the significance of emotional intelligence (EI or EQ) in this digital age. AI performs exceptionally well in tasks involving data processing and logical reasoning, but it is unable to understand or respond to human emotions. Emotional intelligence, which enables people to recognize, understand, and regulate their emotions, fills this gap. This makes interactions between humans and AI more meaningful. While AI provides several benefits and potential, it also poses unique obstacles to human interactions and mental health. This makes emotional

quotient (EQ), or the ability to perceive, analyze, and control emotions, even more vital. In the age of AI, emotional intelligence (EI), also known as emotional quotient (EQ), is critical for developing empathy, making moral decisions, and increasing human-AI collaboration. Empathy, or the ability to identify and feel another person's feelings, lies at the core of human connection. However, if AI is incorporated into our daily lives more and more, there's a threat that empathy between people could diminish. When communication and connection are exclusively through technology, real comprehension and emotional depth may be lost. Emotional intelligence can counteract this potential deterioration because of its emphasis on empathy. People can develop empathy in the digital age by developing EQ. By being conscious of their own emotions as well as those of others, people can build strong relationships and transcend the emotional divide brought forth by AI. EQ cultivates kindness and compassion, fostering a culture where people value and respect interpersonal interactions.

H. Spiritual intelligence in the AI Era

Spiritual intelligence, or "the human capacity to ask questions about the ultimate meaning of life and the integrated relationship between us and the world in which we live," is necessary for the development of artificial intelligence in the future. When people allow artificial intelligence to take the place of their spiritual intelligence and neglect to protect their freedom of conscience, opinion, and religion, it becomes a threat to humanity. The debate surrounding artificial intelligence (AI) was presented in an engaging manner: maybe the advent of large-scale language models and intricate algorithms like ChatGPT in our daily lives will provide a chance to reexamine the long-standing query of what exactly human consciousness is, particularly in light of potential uses for "spiritual intelligence." This type of awareness is associated with both intuitive and theoretical reasoning abilities.

One of the major assumptions of cognitive psychology is that the brain serves as an information-processing mechanism (Anderson, 1980). There is still one unsolved question: which types of intelligence correspond to which brain regions? As is generally known, S-intelligence is interested in the inner workings of the mind and spirit, as well as its relationship to "being" in the universe. As a result, it is strongly indicated that certain brain regions may be associated with spiritual powers. Although S-experience has physiological correlations in the brain, this does not mean that the brain is the source of the experiences (Nael, 2004). To some extent, S-intelligence might be defined as the brain's ability to use S-resources and S-abilities to solve critical challenges (Emmons, 1999).

According to Zohar and Marshall (1994), S-intelligence can be defined as a super-process that integrates information into the left and right brains, which cross-cue each other and pose questions about the importance of the current circumstance. S-intelligence has numerous approaches for determining the overall mode of thinking. Spiritual intelligence relies on analogy to recognize harmonies, synchronicities, and sympathies, while artificial intelligence is powered by algorithms. Spiritual intelligence is attuned to the intangible, paradoxical, and mythological, while artificial intelligence (AI) processes the concrete and known. Spiritual intelligence is dependent on touch with reality, which is why embodied activities and experiencing longing, suffering, bewilderment, and love are so important. In contrast to artificial intelligence (AI), which depends on abstractions generated from reality in the form of data and models. While artificial intelligence (AI) thrives in digital domains because it is conceptual, spiritual intelligence understands that the conceptual supports the intuitive and hence needs evaluation in regard to morality, aesthetics, and relationships.

For synchronous neural oscillations that integrate, unify, and potentially modify material emanating from the two fundamental processes—reason and emotion—S-intelligence offers a viable third brain activity. The whole brain receives data unification from these oscillations. S-intelligence facilitates communication between emotion and reason as well as between the mind and body. The boundary between chaos and order, or more precisely, "chaorder," which divides the known from the unknown, is where S-intelligence is located. It also self-organizes the frontier of information generation (Selman, 2005). It is feasible to argue and link some of the characteristics and talents of S-intelligence, such as wisdom, self-awareness, creative thinking, integrity, and asking "why" questions (Sisk & Torrance, 2001), to a much broader spectrum of issues and problems than existential or S-matters. S-intelligence manifests as consciousness that evolves into a deeper comprehension of matter, life, body, mind, soul, and spirit. S-resources and expert systems are related, and both can assist us in selecting the most effective path from a multitude of possibilities. S-intelligence is an important context for developing a comprehensive approach to address these difficulties. Separating spiritual challenges from other problems necessitates the use of multiple problem-solving strategies. Our three basic intelligences (IQ, EQ, and S-intelligence) should ideally collaborate and assist one another, but each has its own set of strengths and can function independently. When the concerns of meaning and value are addressed in the context of a bigger picture, the potential of S-intelligence becomes clearer.

I. Digital Competence in Business Organization

Drawing from a variety of sources, digital competence can be viewed as a multifaceted notion (Ala-Mutka, 2011; Ilomäki, Kantosalo & Lakkala, 2011b; Gallardo-Echenique, 2012; Ferrari, 2012). It is not the same as literacy approaches, although it is closely connected. Although it's considered a fundamental skill in policy documents, digital competence is still evolving (Ilomäki, Kantosalo & Lakkala, 2011a; Gallardo-Echenique, 2012). Because of these disparate ideas, there are still no precise standards for evaluating digital competency (Ananiadou & Claro, 2009). Some people define digital competence as using ICT technically, while others define it more generally as applying knowledge or as 21st-century abilities. According to Somerville, Lampert, Dabbour, Harlan, and Schader (2007) : the Information and Knowledge Society emphasizes the necessity of having "an educated citizenry capable of accessing, evaluating, organizing, interpreting, and

disseminating information in increasingly digital formats exchanged over enabling technologies." People need to acquire a newfound sense of self-assurance in order to be proficient with digital services and technology. Fostering citizens' development of the knowledge, abilities, moral compass, and self-assurance that will serve them well in the future should be our mission as educators and researchers (Jenkins, 2006; Jenkins, Clinton, Purushotma, Robison & Weigel, 2006).

The following competencies were found in a recent study that sought to identify, select, and analyze existing frameworks: technical operations, information management, collaboration, communication and sharing, content and knowledge creation, ethics and responsibility, assessment and problem-solving, and technical operations. Ferrari (2012) suggests the definition that follows: When using ICT and digital media to perform tasks, solve problems, communicate, manage information, collaborate, create and share content, and build knowledge effectively, efficiently, appropriately, critically, creatively, autonomously, flexibly, ethically, reflectively for work, leisure, participation, learning, socializing, consuming, and empowerment, one must possess a set of knowledge, skills, and attitudes known as "digital competence".

Table 1 : The components of Digital Competence

Digital competence areas	Sub-competences
1 Information and data literacy To communicate information requirements, discover and retrieve digital data and content. Evaluate the relevance of the source and its material. To store, manage, and organize digital data and material.	1.1 Data, information, and digital content browsing, searching, and filtering 1.2 Assessing information, data, and digital content 1.3 Information, data, and digital content management
2 Communication and collaboration To connect and collaborate using modern technology while respecting cultural and generational diversity. Participate in society by accessing public and private digital services and engaging in participatory citizenship. Manage one's digital identity and reputation.	2.1 Using digital tools to interact 2.2 Utilizing digital tools for sharing 2.3 Using digital tools to engage in citizenship 2.4 Using digital technology to collaborate 2.5 Etiquette on the Internet 2.6 Taking care of one's digital identity
3 Digital content creation Create and edit digital content. The goal is to enhance and integrate knowledge while adhering to copyright and licensing guidelines. Demonstrating proficiency in providing clear computer instructions.	3.1 Content development for digital platforms 3.2 Reworking and incorporating digital content 3.3 Licenses and copyright 3.4 Programming
4 Safety To safeguard devices, personal data, and privacy in digital contexts. Protecting physical and psychological health, as well as understanding the impact of digital technology on social well-being and inclusion. To understand the environmental impact of digital technologies and their use.	4.1 Safeguarding devices 4.2 Safeguarding private information and privacy 4.3 Safeguarding health and welfare 4.4 Preserving the environment
5 Problem solving Identify and overcome conceptual challenges in digital contexts. Use digital tools to innovate operations and products. Keep up with the digital transformation.	5.1 Resolving technological issues 5.2 Determining requirements and technology solutions 5.3 Making inventive use of digital tools 5.4 Finding gaps in digital competency

Source : Shokaliuk, S. V., Bohunenko, Y. Y., Lovianova, I. V., & Shyshkina, M. P. (2020, March). Technologies of distance learning for programming basics on the principles of integrated development of key competences. In CTE Workshop Proceedings (Vol. 7, pp. 548-562).

J. Ethical Decision Making

Trevino offers a "interactionist" approach for studying ethical decision-making in businesses that takes situational and individual factors into account. According to Trevino, this decision-making is explained by the interplay between situational and individual factors. It is important to note once more that neither her work nor any of the other reviews address what may be called the "integrative capacity" of the "integrator," which is a variable in and of itself. To put it another way, there is a lack of virtue (and vice), the mechanisms that reinforce (or undermine) integrative competence. The first step in Trevino's paradigm is the recognition of an ethical conundrum. The person then responds with cognitions that clarify his moral and ethical beliefs. This portion of the model, which is the primary contribution of Trevino to the body of work on ethical decision-making models, is based on Lawrence Kohlberg's model of cognitive moral growth (1969; 1976). Prior to cognitions having the ability to influence unethical behavior, they are influenced by situational factors like organizational culture, work characteristics, and the immediate job context as well as individual factors like ego strength, field dependence, and locus of control. It is also proposed that the situational factors/moderators influence and feed back on cognition, hence influencing the formation of cognitive morality.

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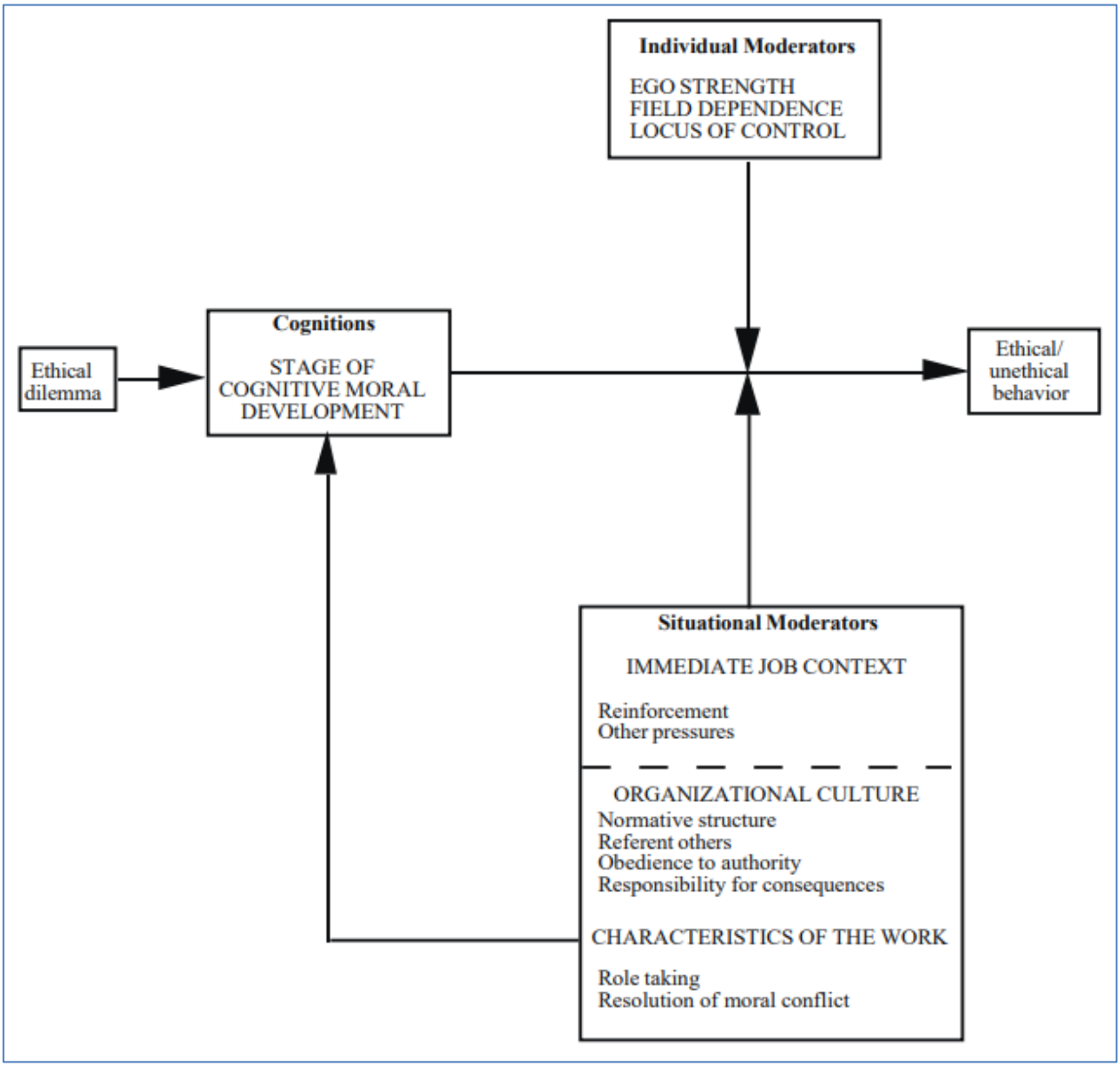

Fig. 2 : Interactionist Model of Ethical Decision Making in Organizations
Source: Adapted from Trevino, L. K. (1986) Ethical Decision Making in Organizations: A Person-SituationInteractionist Model. *Academy of Management Review*, 11(3), 603

The first step in Trevino's paradigm is the recognition of an ethical conundrum. The person then responds with cognitions that clarify his moral and ethical beliefs. This portion of the model, which is the primary contribution of Trevino to the body of work on ethical decision-making models, is based on Lawrence Kohlberg's model of cognitive moral growth. Prior to cognitions having the ability to influence unethical behavior, they are influenced by situational factors like organizational culture, work characteristics, and the immediate job context as well as individual factors like ego strength, field dependence, and locus of control. It is also proposed that the situational factors/moderators influence and feed back on cognition, hence influencing the formation of cognitive morality. Jones (1991, p. 367) defines an ethical decision as one that is both legal and morally acceptable to the community, while an unethical option is either illegal or morally unacceptable. Trevino et al. (2006) define behavioral ethics as individual behavior that adheres to established moral norms. Trevino is significantly more comfortable using a psychological construct as the major independent variable than normative philosophy, as Hunt and Vitell do. According to Fritsche and Becker's (1984) research, normative ethical theory is not especially useful in explaining or predicting ethical decision making. While the majority of their manager respondents demonstrated a utilitarian orientation, judging behavior based on its societal effects, such knowledge was not particularly useful in explaining and predicting ethical behavior. Trevino argues that normative theory cannot explain or predict conduct because it represents "ideals" rather than fact and lacks "face validity." That is, managers do not appear to view their daily decisions as guided by normative ethical frameworks.

Table 2 : Six Stages of Moral Development According to Kohlberg (Trevino)

Stage	What is considered to be right
LEVEL ONE - PRECONVENTIONAL	
Stage One - Obedience and punishment orientation	Following the guidelines to avoid physical punishment. Obedience for its own sake.
Stage Two - Instrumental purpose and exchange	Observing regulations solely when it serves one's immediate benefit. A fair transaction is an equal exchange.
LEVEL TWO - CONVENTIONAL	
Stage Three - Interpersonal accord, conformity, mutual expectations	Common "good" conduct. living up to the expectations of those closest to you.
Stage Four - Social accord and system maintenance	Carrying out the responsibilities and tasks you have agreed to. Upholding the law unless there is a clear and present conflict between it and established social duties. making a communal or societal contribution.
LEVEL THREE - PRINCIPLED	
Stage Five - Social contract and individual rights	Understanding that people have different values and that group norms apply. respecting the law because it is part of the social pact. upholding rights and nonrelative ideals in the face of popular opinion
Stage Six - Universal ethical principles	Choosing and adhering to one's own ethical principles. Act in line with ideals when laws transgress them.

Source: Adapted from Kohlberg, L. (1976) Moral Stages and Moralization: The Cognitive-Developmental Approach. In T. Lickona (Ed.), Moral Development and Behavior: Theory, Research, and Social Issues, 34-35. NY: Holt, Rinehart & Winston.

K. Ethical leadership in AI-driven organization

The technique through which an individual persuades a group of people to accomplish shared objectives is called leadership. Hence, encouraging others to act in a way that aligns with principles, beliefs, and values is the process of ethical leadership. Consequently, ethical behavior is defined as "what is considered legally and morally acceptable to the larger community" according to Trevino (1986). It appears that there are several components to ethical leadership, yet it still seems unclear. Prominent writers in this field argue that moral leadership should be understood as enabling and supporting others to act morally rather than as preventing people from doing tasks that are inconsistent with their values. The vast majority of the time, ethical leadership appears to be unwavering in its commitment to conducting organizational daily tasks in a proper manner. From a personality standpoint, ethical leaders ought to be self-assured, impartial, and fair-minded toward others; they also shouldn't be biased in any circumstance. The primary duty of ethical leaders is to inform their subordinates of the need to be straightforward, resourceful, impartial, and reasonable in their day-to-day tasks. They also have a need to be meticulous, diligent, and trustworthy. At its core, ethical leadership answers all of the fundamental questions about who we are, what makes us special, how we survive and grow, and how we have been raised throughout history. In addition, this instructs us on how to proceed in a stepwise manner towards its advancement to a higher level (Freeman & Stewart, 2006).

According to Brown et al. (2005), ethical leaders educate others about the benefits and advantages of acting morally as well as the costs associated with acting and thinking inconsistently. Additionally, they create flawless and unblemished standards. Simultaneously, they implement a fair, impartial system of rewards and penalties to hold subordinates accountable for their moral conduct. Whether it is "value-based leadership," "authentic leadership," or "servant leadership," ethical leadership is depicted as a "moral umbrella" in leadership literature because it embodies the moral aspect of leadership philosophies (Ahmad et al., 2018). Because they incorporate morality and ethics into the decision-making process and make optimal efforts to reach reasonable decisions by paying attention to the moral implications of their statements, they are regarded as effective leaders (Ciulla, 1995). Leaders that are ethical instill positive behaviors and attitudes in their workforces and establish a sense of duty and pride in their organizations by emphasizing fairness, unity of purpose, and honesty in both workforces and business dealings. Furthermore, according to Piccolo et al. (2010), ethical leaders inspire and assist staff members in understanding the work viewpoint. Furthermore, ethical leaders are an important source of inspiration since they are well-researched, dependable, honest, and trustworthy (Miao et al., 2020). Following this, leaders turn into genuine and reliable role models by acting morally and projecting an ethical image (Zhao et al., 2020).

L. AI deployment and Organizational Performance

Artificial intelligence can improve efficiency, reduce costs, improve product quality, and provide better customer service (Bag et al., 2021c). Enterprise competencies are important for discovering business prospects (Yao et al., 2021). While artificial intelligence capability (AIC) has good potential to increase a company's performance (Mikalef and Gupta, 2021), these firms face substantial challenges when implementing AI (Yu et al., 2021). Businesses can use AI to improve customer service by providing more relevant recommendations and less expensive solutions (Payne et al., 2021). According to the resource-based view (RBV; Majhi et al., 2021), artificial intelligence's applied capability is an ensemble of implicit resources (Bag et al., 2021c). These resources include support resources, labor skills, and organizational coordination (Kim, 2019; Selz, 2020). A thorough analysis of AI's potential and effects on corporate performance has

been published (Denicolai et al., 2021; Mikalef and Gupta, 2021). The literature that has already been written about the effects of AI on various industries, including marketing (Keegan et al., 2022), coaching services (Kim et al., 2021b), manufacturing (Bag et al., 2021c), banking and finance (Huynh et al., 2020), logistics (Chien et al., 2020), and customer relationship management (Chatterjee et al., 2021a). By contrast, the focus of these studies was on technological innovation, the influence of AI on business innovation processes and management practices, and the connection between AI learning and entrepreneurial performance (Liu et al., 2020a; Khalid, 2020).

AI is a collection of fundamental methods that allow agents to behave intelligently (Russell et al., 2016). Thus, businesses may employ AI-based technologies for a range of applications, including virtual assistants, driverless cars, and medical diagnostics (Bughin et al., 2017). AI can be classified as a GPT due to its extensive application in solving current issues and creating new economic prospects (Bresnahan and Trajtenberg 1995; Bränjolfsson et al. 2017). Specifically, the nature of AI as a GPT indicates a whole new way to address challenges of all kinds and allows for a big influence on a variety of businesses (Magistretti et al. 2019). As a result, companies can use AI to achieve a wide range of adoption factors, including goals and objectives for the technology's use in particular application circumstances. Organizations must comprehend AI as a technology and determine the appropriate degree of ambition for prospective applications due to its wide range of potential (Davenport, 2018).

Similarly, enterprises must establish the required framework and use managerial techniques for the successful adoption of AI due to its diverse range of adoption goals (Brynjolfsson and McAfee 2017; Hofmann et al., 2020). Unlike other digital technologies, artificial intelligence is difficult to describe as being simple to use or implement (Lokuge et al., 2018). Adoption of AI involves both non-technical (such as a lack of leadership assistance) and technical challenges (such as restricted technological capabilities) that must be overcome before and during deployment. Successful AI adoption necessitates coordinated operations across the organization by nurturing their AI preparedness initially, given these difficulties and new organizational requirements (Alsheibani et al. 2019; Baier et al. 2019; Gallivan, 2001). "The preparedness of organizations to implement change involving applications and technology related to AI" is how Alsheibani et al. (2018) define AI ready.

Organizations can proactively identify potential gaps for successful AI adoption, especially with the help of the AI readiness assessment conducted prior to adoption decisions (Alshawi, 2007). This kind of evaluation minimizes uncertainty around the choice to use AI by providing information that is relevant to decision-making.According to Yao et al. (2021), enterprise creativity plays a crucial role in producing novel concepts, goods, and services. It can also potentially be used to optimize business performance (Mikalef and Gupta, 2021). In order to maximize organizational performance, AI-related business management solutions are crucial (Rahman et al., 2021). The existing literature hardly ever discusses the relationship between company creativity, artificial intelligence management (AIM), and artificial intelligence-driven decision making (AIDDM), even though AI technologies have a significant deal of promise to improve firm performance.

Table 3 : Literature Review Matrix of AI and Organizational Performance

Citations (category order)	Context AI & OP	Research aims	Summary main outcome	Relationship between AI & OP	Benefit of AI & OP
(Huwe & Kimball, 2000)	Performance	A system for managing employee performance that considers their contributions to the company and uses metrics that increase productivity	Using key performance indicators (KPIs) to quantify how much each person has contributed to the company	The benefit of recommending KPIs during the organization's conceptual stage	A system for managing performance that takes into account all current KPIs
(Liebowitz, 2006)	Strategic Intelligence	Organizational tactics are developed and experimental intelligence is applied	The productivity and efficiency of the organizational system are declining. Strategic intelligence allows for renewed competitiveness and improved performance	By analyzing industries where intelligent strategy can be applied, the intelligent system supports organizational strategies	For improved organizational performance, intelligent systems within the organization are essential

(Chen & Chen, 2013)	Innovation technology	Technology that uses artificial intelligence (AI) to support the services sector	The service sector continues to be competitive and adopts new technologies and learning system	A suggested decision-support tool that incorporates ideas that encourage creativity	A service industry innovation paradigm that can be applied to other industries
(Pavlou, 2018)	Internet of Things	Creation of a hybrid intelligent system to assist in the process of organization strategy. This system's objectives are to improve strategically intelligent data on setting planning	The system was evaluated empirically by decision-makers from the organization. The hybrid system supported the essential elements of developing an organization's strategy, according to the results	A network of artificial intelligence is created to forecast and analyze the expansion of an organization while its strategy is being formulated. The evaluation of problem-solving occurs via interactions.	Fuzzy logic, expert systems, and system thinking make up artificial intelligence
(Lombardi, 2019)	Knowledge Management	Models of strategy that combine business operations and corporate strategy with a knowledge base	This holistic approach has generated comparisons between knowledge-driven business processes and traditional business processes	The benefits of knowledge management aligned corporate strategy and business operation	An all-encompassing strategy that focuses on new ideas in organizational business processes

VIII. CONCEPTUAL FRAMEWORK

A. Resource Based-View

According to the RBV, a firm's performance is determined by its essential resources (Barney, 1991; Chatterjee et al., 2021b). Within a corporation, resources can be both tangible and intangible assets (Mikalef and Gupta, 2021). This idea states that by adding value and enhancing business performance, valuable, uncommon, unique, and irreplaceable resources can create a competitive advantage (Barney, 1991; Ghasemaghaei, 2021). Long-term benefits of this kind are possible (Bag et al., 2021c). Because complementary resources have a greater combined value than the sum of their individual values, businesses can increase the value of their resources (Ghasemaghaei, 2021; Mikalef et al., 2021). The capacity to use artificial intelligence is becoming a more important and intangible resource for improving corporate performance (Belhadi et al., 2021; Lou and Wu, 2021; Mikalef and Gupta, 2021). It implies that firms might benefit from artificial intelligence in terms of a competitive edge (Chaudhuri et al., 2021). Businesses can obtain valuable, rare, unique, and priceless resources through AI Culture (AIC) (Ghasemaghaei, 2021). As a mediator between resources and company performance, "firm capability" has been found in numerous studies (Belhadi et al., 2021; Lou and Wu, 2021; Mikalef and Gupta, 2021). According to Yao et al. (2021) firm competencies are essential qualities needed for business operations. These talents support the deployment of additional resources required to raise company performance (Yao et al., 2021). Because AIC can strengthen a firm's skills and boost firm performance, this study concentrate on the firm's potential to create value (Chatterjee et al., 2021a). The relationship between a firm's resources, capabilities, and performance is commonly illustrated using RBV (Barney, 1991; Chen and Lin, 2021; Hossain et al., 2021; Rahman et al., 2021). Consequently, the RBV will be used in the following procedures in this investigation.

B. Normative ethical theories

The word "teleological" comes from the Greek word telos, which means "end," "goal," or "purpose." This term has already been mentioned in relation to the Design Argument for God's Existence, also called the Teleological Argument, which holds that God's purposes are evident in the things that the cosmos allows us to witness. The term "end," "goal," or "purpose" in ethics refers to our obligations in achieving particular moral ends or goals. According to teleological ethical theories, you must choose the ultimate purpose of ethics in order to determine how you should live properly. In addition to being focused on an ultimate aim or purpose, teleological ethical theories can also be consequentialist since they aim to produce the best result possible in each given circumstance. This will be done for the straightforward reason that achieving the finest outcome in a given circumstance will usually advance the main objective.

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C. Consequentialist theories of ethics

According to consequentialist views of ethics, an action's moral worth should be determined by its effects. Therefore, the optimum course of action in a given circumstance is the one that results in the best overall outcomes. Therefore, there are circumstances in which a consequentialist would be willing to tell lies if they believed that doing so would result in the best outcomes. As an example of "act-consequentialism," the most well-known consequentialist theory is utilitarianism, which holds that the ideal courses of action are those that maximize the "happiness" of sentient creatures, or entities with the capacity for thought, reason, feeling, and experience. For various utilitarians, happiness can signify different things, such as pleasure, wellbeing, personal preferences, and interests. Moral norms can be introduced into consequentialist theories even when they are not their primary focus. For instance, rules can be utilized to maximize the best outcomes. This is because, historically, regulations have been demonstrated to have the best effects on society, and hence, they tend to become the norm. Simple laws (like those that forbade stealing and murder) were discovered by our forefathers to typically result in a happier community as a whole. The focus of consequentialist ethics is on the worth of the rule's result, as opposed to deontological systems, which emphasize the inherent value of the rule itself. No action is intrinsically right or evil. The reason consequentialist theories need to be "predictive" is that we need to be able to forecast the likely outcomes of an action in order to maximize its benefits.

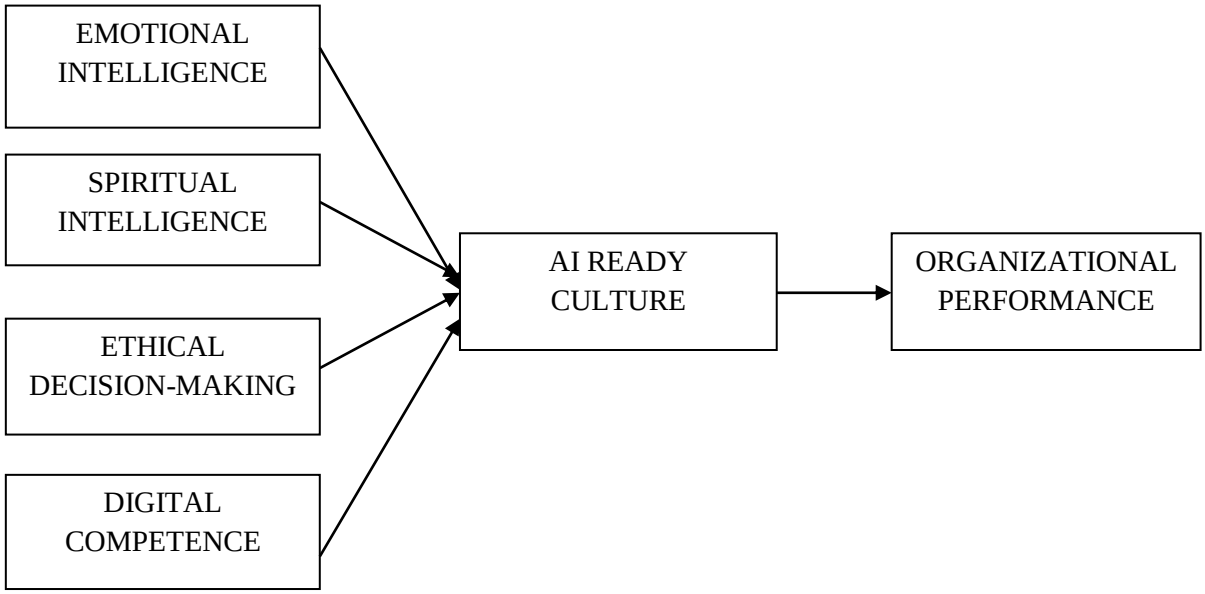

Fig. 3 : Theoretical Framework

D. Emotional Intelligence:

With the advent of changing role and nature of Leadership, EQ will be one area still Desired and required in the execution the role of Leadership. Though cognitive aspect will be taken care by AI, Motivation, Employee Engagement, could be delivered by Human side of leadership. Leaders with high EQ will still continue to be desired.

Hypothesis 1: *Emotional Intelligence significantlly influences on AI Ready Culture*

E. Spiritual Intelligence:

As soft element of Leadership will be domain of Leadership - Humility, Compassion, Values, Character, Inner peace, Adaptability, Creativity, Change Management, Ethics, Authencity which are components of Spiritual Intelligence. Such Competencies will play major role while executing Leadership role while aligning with AI.

Hypothesis 2: *Spiritual Intelligence significantlly influences on AI Ready Culture*

F. Ethical Decision Making:

With great power comes great responsibility. Leaders must be aware of the ethical implications of AI, including privacy, bias, and job displacement, and ensure their decisions reflect these considerations.

Hypothesis 3: *Ethical Decision-Making significantlly influences on AI Ready Culture*

G. Digital competence :

Digital competence involves the confident and critical use of Information Society Technology (IST) for work, leisure and communication. It is underpinned by basic skills in ICT: the use of computers to retrieve, assess, store, produce, present and exchange information, and to communicate and participate in collaborative networks via the Internet.

Hypothesis 4: *Digital Competence significantlly influences on AI Ready Culture*

H. AI-Ready Culture:

Leaders should create an environment within their organizations that is ready to embrace AI. This includes promoting AI literacy, addressing fears and misconceptions about AI, and facilitating initiatives to upskill or reskill employees.

Hypothesis 5: *AI Ready Culture significantlly influences Organizational Performance.*

IX. METHODOLOGY

A. Overview of the Research Methodology

This chapter of the study explains the techniques or procedures which are used for identification, selection, process and evaluation of data and statistics analysis. It also permits the researcher to critically assess the validity and reliability of the research work. The research methodology explain the practice of scientific methods to investigate a variety of phenomenon related to any of the aspect of life including areas of science and those involving pure phenomenon (Mouton, 1996). There are diverse approaches and techniques to conduct research on the subject matter. In general, the choice of these approaches and techniques is subjected to the underlying factor and the type of research that best fits the study material. The unit of analysis for this study was corporate leaders or executives in various industry deploying AI into their operations.

B. Research Philosophical Foundation

The research philosophy deals with the attitudes, values, and principles that underpin a detailed investigation. Philosophy comes from the Greek term for "love of wisdom" (Cavalier, 1990). Wisdom captures the essence of philosophy. It entails thinking about problems, making interpretations, trying out ideas and considering possible arguments for and against them, and pondering how concepts actually operate (Ruona, 1999). It also provides a framework for thinking, supports in the development of cognitive capacities, and promotes the alignment of an individual's thoughts and actions (Paul, 1993; Honderich, 1995). Philosophy is fundamentally concerned with the methodical investigation of the assumptions and conventional wisdoms that underpin cognition and conduct (Root 1993). To realise the potential utility of philosophy, a system of thought and action must be examined (Berg, 2001). These philosophical knowledge assertions convey essential assumptions about the world and the researcher. Denzin and Lincoln (2000) suggested that the assumptions pertinent to research philosophy are: being (ontology), knowing (epistemology), and acting (axiology).

Some studies follow a positivist epistemology, in which no objective reality is accepted and truth or meaning is generated via social interaction with the world (Crotty, 1998). In this perspective, the investigator or researcher and the investigated or researched object are thought to be separate entities, with the researcher able to analyze the object without affecting or being influenced by it. In this way, positivism can be characterized as a research method based on the ontological notion that reality is independent of the observer. In other words, a study could fall within positivism's transactional and subjectivist assumptions, which hold that knowledge is formed by interaction between the investigator and the respondents (Paul and Elder, 1997).

Artificial intelligence (AI) and AI technology solutions seek to replicate human intellect in machines. Its research objects are thus extremely complex, embracing both the material and spiritual domains. The challenging path AI development takes is determined by intelligence features, and many of the challenges AI faces have philosophical roots. It is apparent that many AI scientists are passionate about philosophy, and the philosophical community has expressed strong interest in AI research discoveries. To duplicate human consciousness, artificial intelligence must first learn about its components and functions. How is consciousness made possible? This enables cognitive science to further artificial intelligence development. Because philosophy and cognitive psychology, cognitive neuroscience, brain science, artificial intelligence, and other disciplines complement one another, computer science and technology will always advance, whether through physical symbol systems, expert systems, knowledge engineering, biological computers, or other means.

C. Epistemological perspectives of xenoaccelerationism

It Is a novel and forward-thinking philosophical worldview. By accepting diversity, advocating for the rapid and exponential progress of technology, society, and knowledge viewpoints, cross-disciplinary insights, and external influences. It aims to catalyze transformative change and holistic understanding by combining innovative ideas, cultural diversity, and cutting-edge technologies, with the objective of moving mankind toward a positive, sustainable, and inclusive future. A pluralistic and inclusive approach to knowledge acquisition would likely describe Xenoaccelerationism's epistemology. To achieve a thorough understanding of complex events, it would emphasize the integration of multiple sources of knowledge, perspectives, and approaches. The following essential aspects of Xenoaccelerationism's epistemology may be included:

- **Integrative Knowledge :** The epistemology of Xenoaccelerationism would value the integration of knowledge from many fields, cultural backgrounds, and philosophical traditions. It acknowledges that various types of knowledge can provide unique insights and contribute to a more complex view of the world.
- **Empirical Inquiry :** Xenoaccelerationism will highlight the value of empirical evidence and data-driven methodologies to validate and support its assertions while embracing multiple opinions. It aims to anchor its ideas by combining theoretical insights with actual observations.
- **Reflexivity and Self-Awareness:** The epistemology of Xenoaccelerationism would urge scholars and thinkers to critically reflect on their own preconceptions, prejudices, and cultural circumstances that may influence their thinking. This self-awareness would encourage a more impartial and open-minded approach to knowledge acquisition.

- **Dialogical Engagement:** Xenoaccelerationism would encourage dialogue between academics, practitioners, and intellectuals from various disciplines. Discussions like this one would promote idea sharing, intersection discovery, and teamwork-based knowledge enhancement.
- **Speculative Inquiry:** Xenoaccelerationism's epistemology may include speculative inquiry as a philosophy that aims to question the status quo and imagine alternative futures. It would investigate speculative situations and mental exercises to stretch the bounds of conventional wisdom and broaden the range of possibilities.
- **Non-Dogmatic Approach:** The epistemology of xenoaccelerationism is probably non-dogmatic, which means it is still subject to change and modification in light of new information and understanding. It would adopt a mindset of constant learning and adjustment to improve its comprehension of the outside environment.
- **Diversity and Inclusivity:** Xenoaccelerationism's epistemology values the contributions of marginalized and underrepresented voices in the search for knowledge. It embraces diversity and inclusivity. It acknowledges that a variety of viewpoints improves our comprehension of complicated things.

In general, Xenoaccelerationism's epistemology would seek to advance knowledge by accepting pluralism, overcoming disciplinary barriers, and encouraging a dynamic and reflective interaction with the always changing nature of human cognition. Within Xenoaccelerationism, practical philosophy entails confronting moral dilemmas pertaining to the synthesis of information from various sources, honoring cultural diversity, and making sure that technological breakthroughs are beneficial to humanity.

D. Ontological perspectives of xenoaccelerationism

By recognizing that the future is not final, xenoaccelerationism deters people from holding inflexible, deterministic beliefs that could impede development and restrict human potential. It inspires people and communities to reject the limitations of a predetermined fate and adopt an attitude that emphasizes continuous discovery and adaptability. This is how the philosophy encourages a dynamic interaction with the world's complexities, leading to ongoing evaluation and development in light of current information and evolving conditions. The ontology of xenoaccelerationism embraces the idea of nonfinality in place of the notion of a predestined destiny. This viewpoint encourages ongoing research and development by fostering a pragmatic and adaptable mindset.

Xenoaccelerationism promotes an attitude that celebrates continuous change and creative potential by accepting the dynamic nature of reality. This allows for the pursuit of a more prosperous and inclusive future for humanity. Its ontology may emphasize the role of technology as a mediator of human relationships and societal transformations given its emphasis on technological innovation and acceleration. It admits that technology has a big impact on how people live and how civilizations evolve and thrive. The ontology of xenoaccelerationism acknowledges the critical role that technology plays as a mediator in social relations and the development of societies. It recognizes that technology is a transformative force that has a significant impact on how people interact with one another and how societies operate. This viewpoint highlights how it is not neutral; rather, it is an active agent that influences social environments and human experiences, going beyond the status of a simple tool. The ontology's perspective emphasizes the importance of technology as a potent mediator in affecting human experiences and societal developments. The ideology encourages a discriminating and reflective approach to technological progress, ensuring that it contributes to the collective well-being and advancement of mankind as a whole by appreciating its transformational nature and the reciprocal interaction between humans and technology. Even if xenoaccelerationism does not specifically address ontological issues, it would probably be aware of the moral and ethical ramifications of its ontological assumptions. It would take into account the moral obligations to accelerate technical development and change in order to guarantee favorable results and the welfare of society. The emphasis of its philosophy would be conscious of the ethical implications and values associated with its emphasis on rapid technological growth and societal transformation, even if it would largely focus on ontological assumptions.

E. Research Paradigm

Research paradigms connotes with the ideas of a mental picture or pattern of thought (Walsham, 1995). A paradigm may be viewed as a set of basic belief that deals with ultimate or first principles. It represents a worldview that defines for its holder, the nature of the "world", the individual's place in it, and the range of possible relationships to that world and its parts. The beliefs are basic in the sense that they must be accepted simply on faith; there is no way to establish their ultimate truthfulness. While Hesse-Biber (2009) defines a paradigm as "a theory or hypothesis", a paradigm is rather a framework within which theories are built, that fundamentally influences how we see the world, determines our perspective, and shapes our understanding of how things are connected. Holding a particular world view influences our personal behaviour, our professional practice, and ultimately the position we take with regard to the subject of our research. Research paradigms define for the researcher what it is they are about as well as what falls within and outside the limits of legitimate research" (Guba and Lincoln, 1994). This Research Approach can also be seen as the collective set of attitudes, values, beliefs, procedures and techniques that create a framework of understanding through which theoretical explanations are formed." (Trochim and Donnelly, 2006).

F. Research design

A Theory aims to reveal a cause-and-effect between variables to lead to a deeper explanation and prediction. Merga et al. (2020), argues that quantitative research methods are mostly used to either form a theory or to test a theory. Before forming a theory, researcher gathers data based on observable or measurable variables and link the

patterns between the variables (De Vaus 2002). For the purpose of data gathering, this study employs quantitive research approach, using deduction and induction. Quantitative research is usually associated with a deductive approach, in which the main focus is on deductive reasoning process to gather and analyze data to test a particular theory. Furthermore, deductive research approach starts off with formulating the hypothesis and then develops a strategy to test the particular theory. While on the contrary, the inductive research approach that begins with the researcher making observations and then he or she begins with an observation on a fact or an event in an environment, and then gathers data to develop a theory.

Suddaby (2006), states that it is possible to apply a combination of both elements, deduction and inductions within the same study. Deductive approach offers the following the possibility to explain causal relationships between concepts and variables, the possibility to measure concepts quantitatively and generalize research findings to a certain extent. Structural Equation Modelling (SEM) can be seen as a statistical procedure that takes a confirmatory method (i.e., hypothesis-testing) to the analysis of a structural theory on a given phenomenon (Byrne, 2013a). Usually, SEM can be seen as a theory that reveals "causal" techniques that present observations on multiple variables (Gefen, Straub, & Boudreau, 2000; Hair, Ringle, & Sarstedt, 2011). This technique represents two essential concepts: a) that a group of structural equations, by considering the measurement error, provide the studied causal processes, and b) that these structural relations can be modelled visually to simplify and facilitate a clearer conceptualisation of the theory and studied hypotheses (Roldán & Sánchez-Franco, 2012; Wong, 2013).

The empirical measures allow the researcher to compare the theoretically established measurement and structural models with reality, as represented by the sample data. In other words, the empirical measures enable the researcher to determine how well the theory fits the data. Therefore, using PLS-SEM enabled the researcher to measure the model's predictive potential and competences to judge the quality of the model (Hair et al., 2014). In general, Structural Equation Model (SEM) is composed of two sub-models, the measurement model and the structural model (Hair et al., 2014; Jung, 2007). The measurement model identified the nature of the relationship between the manifest indicators and latent variables. The structural model identified the causal relationships among the latent variables. It also specified whether particular latent variables directly or indirectly affect certain other latent variables in the model (Byrne, 2013b; Jung, 2007; Weston & Gore, 2006).

G. Sample Unit

According to Sekaran (2003), a population is defined as any group of people, events, or objects pertaining to the study likewise a sample is a subset of that population which consists of a specific selection of members to represent the entire population. Chandler (2007) states that the sampling provides the population with equal opportunities to be chosen as the research subject. The study's sample embraces business executives who are already integrating AI into their processes.

H. Sampling method

For several reasons, it will be impossible for the researcher to gather or analyze all of the data available due to time, money, and often access.Many researchers, such as Mitchell and Jolley (2009), argue that employing sampling allows for greater overall accuracy than a census due to time and cost savings. The sample size is chosen to include a relatively large number of cases in a study. As suggested by Saunders, Lewis, and Thornhill (2009), sampling methods can be divided into two categories:

- "Probability or representative sampling"
- "Non-probability or judgmental sampling"

Probability sampling is most commonly associated with survey-based research, in which the researcher seeks to draw conclusions about a population in order to answer research questions or achieve research objectives. In contrast, purposeful or judgmental sampling enables the use of judgment to select cases that will best respond to the research questions and achieve the study's objectives. In this study, probability sampling will be used because it is deemed the most appropriate method with the greatest ability to represent the population under consideration. This study chose a stratified sampling method from several types of probability sampling "because it ensures that the resulting sample will be distributed in the same way as the population in terms of the stratifying criterion" (Bryman, 2008).

I. Sample size

According to Roscoe (1975), the appropriate sample size for most research should be fewer than 500 and larger than 30. For this study, the researcher will collect 400 responses from the target respondents. A self-administered questionnaire will be used to collect the data, 400 survey questionnaires will be sent to the target respondents yielding 85% responses rate. Data collection will be done via face to face method and online and will be sent to corporate executives in an AI-driven workplaces.

J. Data Collection

Saunders et al. (2007) stated that two main types of data collection, are quantitative data collection and qualitative data collection. Qualitative data is expressed in forms of non- numerical data and provides and in-depth understanding of a problem. Whereas, quantitative data is used to emphasize mathematical and numerical data, arranged in various numerical forms (John and Vicki, 2007). This study will adopt a quantitative data collection in achieve the research objectives.

K. Pilot study

A Pilot study was conducted among 30 corporate leaders in an AI-driven organizations. Data will be analyzed utilizing the (SPSS) version 20.0 and Excell for adjustments of some items before the final distribution. A pilot test is useful to prevent bias from the questionnaire being methodologically flawed. Furthermore, the pilot study enables researchers to amend fewer mistakes and ascertain

respondents's level of understanding about the given instructions in the research instrument (Creswell, 2009).

L. Reliability and validity

Upon completion of data entry and recoding processes, calculation of reliability and validity of all measures were undertaken through purification. According to Sekaran (2003), it is important to assess the "goodness" of the measurement model. In fact, the researcher should be assured that the instrument used in the study precisely measures the study variables. The technical value of any study can be determined by measuring the quality of the validity and reliability of the used instrument. Validity refers to how well the instrument performed at measuring the variables or phenomenon to be measured in each study. The validity of a research projects depends on the degree to which the research method is able to address the research question and objectives of the study. Whereas, reliability is associated with the accuracy of the research procedure and measuring instruments.

X. RESULTS

The research findings and discussions pertaining to the data that were gathered during the study are presented in this chapter. The data was examined using SmartPLS 4.0. According to the goal of this investigation, the analysis's findings were utilized to decide whether or not the research hypothesis was supported. The measurement model in PLS-SEM path modeling evaluates the study's latent constructs. This modeling and measuring model's constructions include a number of reflective components. The construct of the study framed as Emotional Intelligence, Spiritual Intelligence, Ethical Decision making, Digital competence, AI Ready Culture and Organizational Performance.

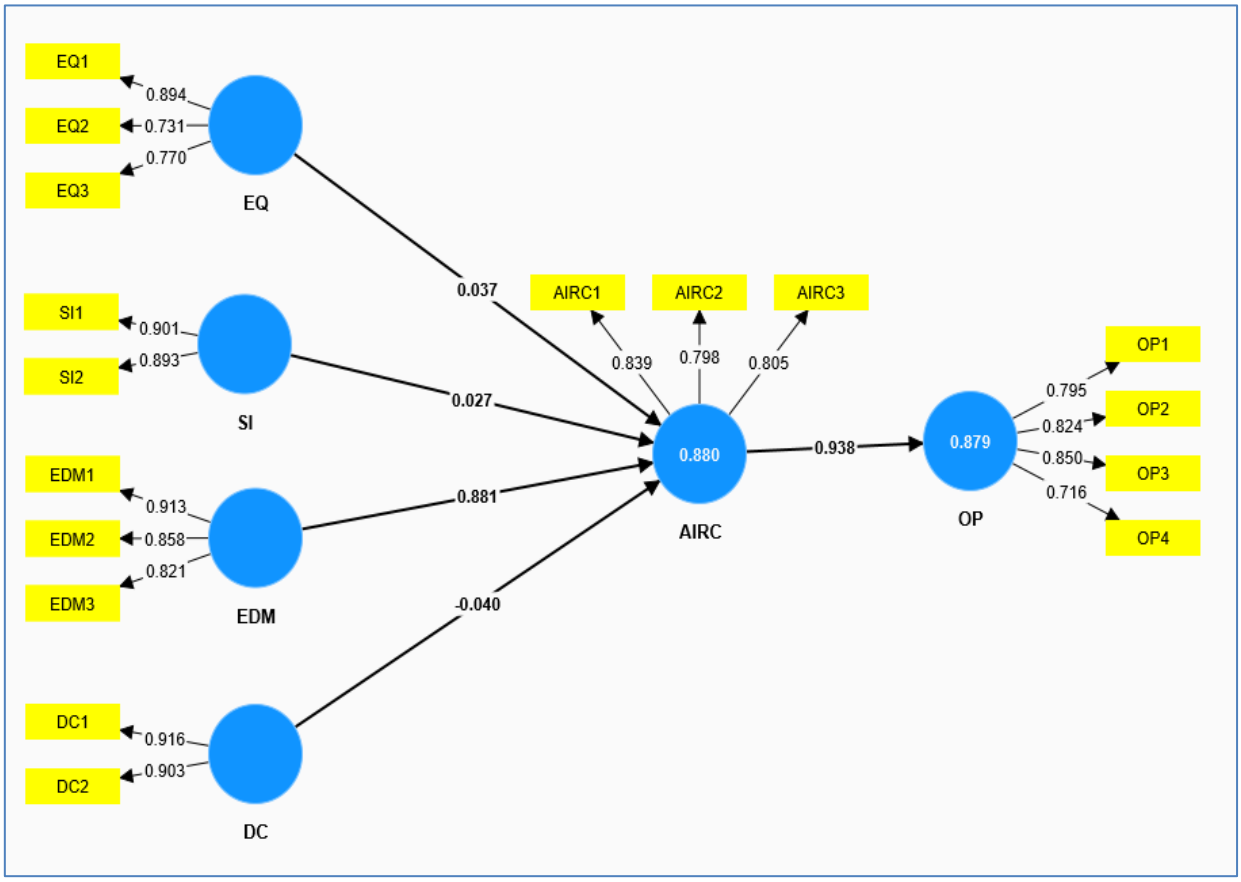

Fig. 4: PLS Algorithm Test Result

The outer loading results indicate the measuring model's dependability. The outer loadings indicate the link between the reflective components and the measured indicator variables. Confirmatory research requires outer loading values of 0.7 or greater.

Table 4: Path Coefficients

	Path coefficients
AIRC -> OP	0,938
DC -> AIRC	-0,040
EDM -> AIRC	0,881
EQ -> AIRC	0,037
SI -> AIRC	0,027

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Table 5: Outer Loadings

	AIRC	DC	EDM	EQ	OP	SI
AIRC1	0,839					
AIRC2	0,798					
AIRC3	0,805					
DC1		0,916				
DC2		0,903				
EDM1			0,913			
EDM2			0,858			
EDM3			0,821			
EQ1				0,894		
EQ2				0,731		
EQ3				0,770		
OP1					0,795	
OP2					0,824	
OP3					0,850	
OP4					0,716	
SI1						0,901
SI2						0,893

It is evident that all of the indicator variables' outer loading values have reached the necessary 0.7 level, meaning that none of the variables need to be removed.

Table 6: Fornell-Larcker criterion

	AIRC	DC	EDM	EQ	OP	SI
AIRC	0,814					
DC	-0,373	0,910				
EDM	0,936	-0,359	0,865			
EQ	0,461	-0,239	0,455	0,801		
OP	0,938	-0,329	0,869	0,558	0,798	
SI	0,862	-0,308	0,914	0,492	0,909	0,897

The study tested the constructs' reliability (CR) using Cronbach's Alpha and Composite Reliability as part of the measuring model evaluation. Every CR was higher than the recommended value of 0.700 (Faraj and Wasko 2005). The Cronbach's alpha for each construct was more than 0.700. Given that the extracted average variance (AVE) was higher than 0.500, convergent validity was considered appropriate. The factor loadings for the items and the reliability and validity results are displayed in Table 7.

Table 7: Loadings, Reliability, and Validity- Composite Reliability and Convergent Validity

	Cronbach's alpha	Composite reliability (rho_a)	Composite reliability (rho_c)	Average variance extracted (AVE)
AIRC	0,746	0,750	0,855	0,663
DC	0,792	0,794	0,906	0,827
EDM	0,830	0,830	0,899	0,748
EQ	0,727	0,807	0,842	0,642
OP	0,811	0,826	0,875	0,636
SI	0,758	0,759	0,892	0,805

Global Goodness of Fit (GoF) of the Model The Goodness-of-Fit (GoF) was used to assess the overall model fit. To measure Goodness-of-Fit, the PLS-SEM has only one method that was defined to be the global fit measure, presented by Tenenhaus et al. (2005). The Goodness-of-Fit was defined as the square root of average R2 for the endogenous latent variables (reflective) multiplied by the average cross-validated communality, or the average variances extracted (AVE) values (Tenenhaus et al., 2005).

Table 8: R-square and R-square adjusted

	R-square	R-square adjusted
AIRC	0,880	0,878
OP	0,879	0,879

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A structural model is evaluated using coefficients of importance (R2, Q2, F2, and significant routes). Briones Penalver et al. (2018) found that the intensity of each structural path determines the model's quality, with an R2 value of 0.1 or above (Falk and Miller, 1992). Table shows that R2 is greater than 0.1, or 0.880 for AIRC and 0.879 for OP. Consequently, the ability to predict is established.Q2 demonstrated the value of intrinsic components for inference. The model is predictive when Q2 is bigger than 0. The findings highlight the significance of the constructions' predictions.

Table 9: Goodness of fit

	Saturated model	Estimated model
SRMR	0,120	0,124

The GoF values must be at least above 0.1, and depending on the size, values are separated into three categories of large (0.36), medium (0.25) and small (0.10) (Wetzels, Odekerken-Schröder, & Van Oppen, 2009). Additionally, SRMR was utilized to assess the model's fitness. The SRMR value of 0.120 is higher than the required value of 0.10, indicating that the model fits (Hair et al., 2016).

A. Structural Equation Modelling (Inner Model)

The inner model, frequently referred to as the structural model, is evaluated next. According to Wong (2014), it outlines the connections between the latent variables that are independent and dependent. The coefficient of determination (R2) and path coefficients can be used to evaluate the measurement of the PLS SEM structural model. The output from a bootstrapping process is displayed in Figure 5. In this process, a large number of subsamples are extracted from the original sample and replaced to provide bootstrap standard errors. These standard errors, in turn, provide approximations of T-values for the structural path's significance testing. The data's approximate normality is shown by the Bootstrap result.

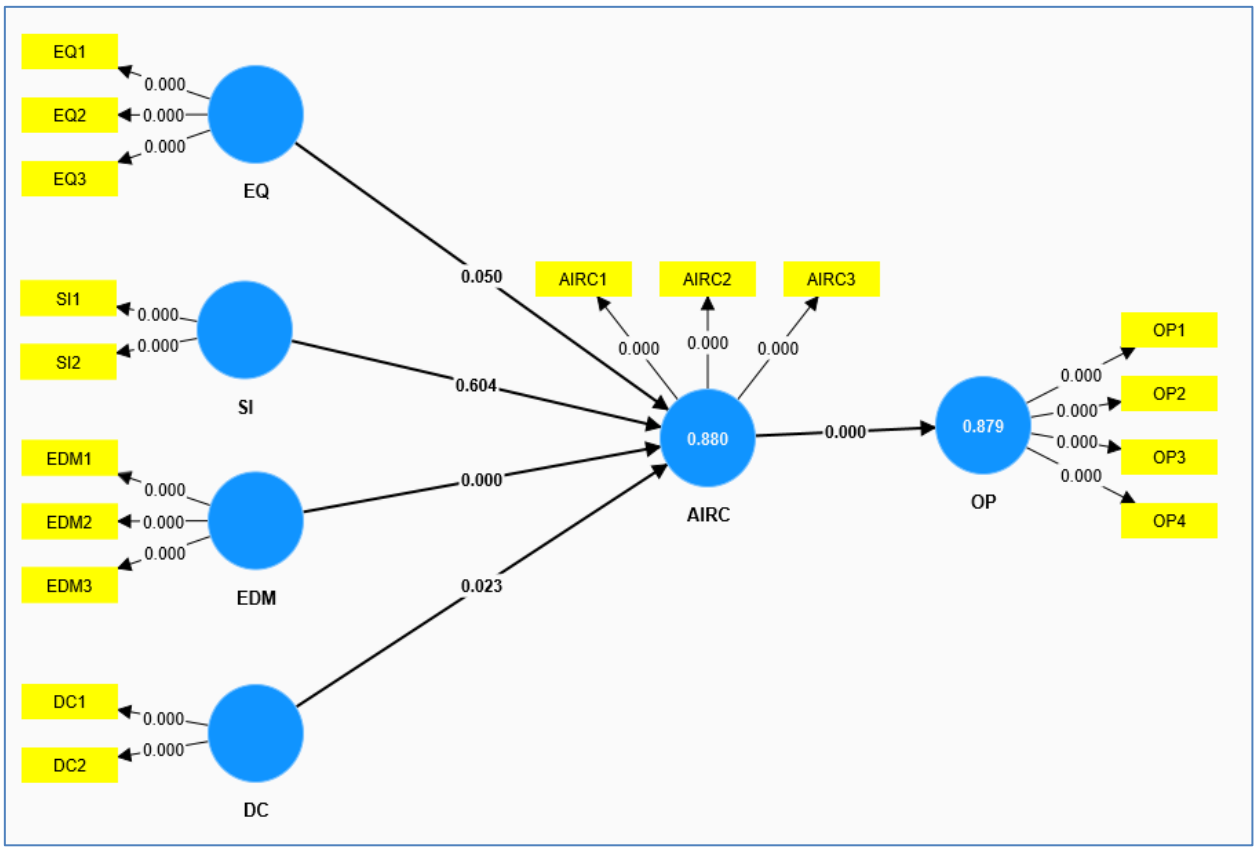

Fig. 5: Bootstrapping Test Result

To determine whether or not the suggested hypotheses were supported, hypothesis testing can be done following the partial least square algorithm using SmartPLS 4.0. A Paired Sample t-test with a 5% significance level (α = 0.05) was used to test the hypothesis. The hypothesis was supported if the p-value (Sig.) was less than 0.05, and it was not supported if the p-value (Sig.) was greater than 0.05. Table displays the summary of the hypothesis testing.

Table 10: Assessing T statistics and P values

	Original sample (O)	Sample mean (M)	Standard deviation (STDEV)	T statistics (|O/STDEV|)	P values
AIRC -> OP	0,938	0,938	0,005	198,436	0,000
DC -> AIRC	-0,040	-0,040	0,017	2,266	0,023
EDM -> AIRC	0,881	0,881	0,045	19,543	0,000
EQ -> AIRC	0,037	0,038	0,019	1,958	0,050
SI -> AIRC	0,027	0,026	0,052	0,519	0,604

- *Hypothesis 1 : Emotional Intelligence significantlly influences on AI Ready Culture*

Based on the statistical analysis that has been conducted, pvalue shows 0.050 (> 0.05) which means that Emotional Intelligence (EQ) does not significantly affect AI Ready Culture (AIRC). Therefore, it can be concluded that the hypothesis which stated: Emotional Intelligence significantly affect AI Ready Culture was not supported and that it was supported statistically by the results of this research.

- *Hypothesis 2 : Spiritual Intelligence significantlly influences on AI Ready Culture*

Based on the statistical analysis that has been conducted, pvalue shows 0.604 (> 0.05) which means that Spiritual Intelligence (SI) does not significantly affect AI Ready Culture (AIRC). Therefore, it can be concluded that the hypothesis which stated: Spiritual Intelligence significantly affect AI Ready Culture was not supported and that it was supported statistically by the results of this research.

- *Hypothesis 3 : Ethical Decision-Making significantlly influences on AI Ready Culture*

Based on the statistical analysis that has been conducted, path coefficient shows the value of 0.881 for the relation between Ethical Decision Making (EDM) with AI Ready Culture (AIRC). This indicates that there was a positive relation between EDM and AIRC. In addition, it also shows 0.000 (< 0.05) for its p-value and 19,543 for its t-value, which means that EDM significantly AIRC. Therefore, it can be concluded that the hypothesis which stated: Ethical Decision Making have a positive impact on AI Ready Culture was supported and that it was supported statistically by the results of this research.

- *Hypothesis 4 : Digital Competence significantlly influences on AI Ready Culture*

Based on the statistical analysis that has been conducted, path coefficient shows the value of -0.040 for the relation between Digital Competence (DC) with AI Ready Culture (AIRC). This indicates that there was a negative relation between DC and AIRC. In addition, it also shows 0.023 (< 0.05) for its p-value and 2,266 for its t-value, which means that DC significantly AIRC. Therefore, it can be concluded that the hypothesis which stated: Digital Competence have a negative impact on AI Ready Culture Organizational Performance" was supported and that it was supported statistically by the results of this research.

- *Hypothesis 5 : AI Ready Culture significantlly influences Organizational Performance*

Based on the statistical analysis that has been conducted, path coefficient shows the value of 0.938 for the relation between AI Ready Culture (AIRC) with Organizational Performance (OP). This indicates that there was a positive relation between AIRC and OP. In addition, it also shows 0.000 (< 0.05) for its p-value and 198,436 for its t-value, which means that AIRC significantly OP. Therefore, it can be concluded that the hypothesis which stated: AI Ready Culture have a positive impact on Organizational Performance" was supported and that it was supported statistically by the results of this research.

Table 11: Summary of the Hypotheses Testing

Hypothesis 1 : Emotional Intelligence significantlly influences on AI Ready Culture	Rejected
Hypothesis 2 : Spiritual Intelligence significantlly influences on AI Ready Culture	Rejected
Hypothesis 3 : Ethical Decision-Making significantlly influences on AI Ready Culture	Accepted
Hypothesis 4 : Digital Competence significantlly influences on AI Ready Culture	Accepted
Hypothesis 5 : AI Ready Culture significantlly influences Organizational Performance	Accepted

XI. DISCUSSION

In the following, we will position the results of our explanatory study by reframing the roles of leaders and the importance of leadership excellence in navigating the challenges and opportunities with the advent of AI. Thereby, we conceptualize that the four components of leadership studied in this research should be a valuable addition to the scholarly knowledge base and a necessary foundation for successful AI adoption and Organizational performance. Besides, we discuss the implications of Emotional Intelligence, Spiritual Intelligence, Digital competence and Ethical Decision Making as intertwined concepts and a necessary must have skills of the leaders of tomorrow.

In today's competitive business world, it's crucial for organizations to be current with emerging technologies. Organizations require skilled workers who are capable of creating new knowledge from vast amounts of information and apply it to challenging problems (Van Laar et al., 2017). Having technology alone does not guarantee maximum benefits. To adapt to new technologies, businesses must find

a way to adjust and realign their strategic capabilities to emerging technology. Digital Transformation can significantly improve a company's performance by empowering leaders to reevaluate customer value propositions, renew organizational structures and processes, and to create new business models (Berman, 2012; Hess et al., 2016; Bekkhus, 2016; Vale-Feigl, 2021). The digital maturity level of an organization is determined by where it is in the digital transformation process and indicates the extent to which digital leadership is already obvious. One of the biggest issues facing businesses today is taking advantage of the endless possibilities presented by developing information technologies. Organizations require leaders who can seize the opportunities presented by digitization and turn them into new business models if they are to effectively navigate the shift towards digitalization. It has been noted that businesses without Digital Leadership competencies have not been able to fully take advantage of technology. Inadequately deciding on and carrying out the right actions to Digital Transformation is the primary cause of failure (Saldanha, 2019). Business organizations must ensure they have the necessary resources to effectively handle digital technologies at the corporate level and to get ready for deploying them at their advantage (Kane et al., 2018).

Leadership excellence is essential to every organization's success. To be an excellent leader in this fast-paced, complex corporate climate of today, leaders must have a wide variety of abilities and improve their leadership abilities in order to cope with the requirements of tomorrow’s workplace. It takes more than simply having technical proficiency, knowledge, or intelligence to be an excellent leader. The ability to identify, comprehend, and regulate one's own emotions as well as those of others imply the need for EQ in the workplace.A leader's ability to successfully communicate, forge deep bonds with others, resolve issues, and motivate their team to reach objectives is all made possible by their emotional intelligence. Leaders of the future also need to be conscious of their own ability to direct and manage a team. It supports them in making wise and successful decisions that benefit the business and encourage individual development among team members. One essential aspect of emotional intelligence that is important in challenging work environments is self-management. It refers to a leader's capacity to control their feelings in challenging situations. Leaders need to understand their business environment because they don't work in a vacuum. Leaders that excel at social awareness demonstrate empathy. It helps people grasp the perspectives and feelings of others, allowing them to better communicate and collaborate. They must become familiar with these components in order to develop their emotional intelligence capabilities. It also prepares them to handle complex business situations. The need for spiritual intelligence is a vital skill that leaders need to acquire in order to navigate the complexities of tomorrow’s workplace, leaders with high levels of SI are more effective at motivating and inspiring their staff members. Leaders with high SI have a better sense of empathy, compassion, and a thorough awareness of the human condition, allowing them to connect with their people on a more profound level. SI can also improve employee communication and collaboration by encouraging empathy, compassion, and respect for other people's opinions and values. Leaders can cultivate SI in the workplace by encouraging their teams to engage in mindfulness practices and other types of self-reflection. Furthermore, spiritual intelligence can help leaders learn to accept and surrender in the face of ambiguity. They can learn to let go of their desire for certainty and control by acknowledging that certain circumstances are beyond their control and fostering a sense of confidence in a higher power or universal force in order for them to welcome uncertainty with openness and curiosity.

When ethical values are implemented in businesses, corporate and individual goals can go beyond maximizing profits and benefiting shareholders. Leaders may be influenced by ethical considerations to make wise choices to safeguard the company from unethical activity. Transparency is a fundamental leadership feature that enables leaders to make clear and consistent decisions. Leaders should communicate openly about their beliefs, ethical standards, and other components of their leadership philosophy. Responsibility is another important factor in influencing ethical decision-making since it requires leaders to evaluate the long-term consequences of their actions before making a final decision. The last soft skill that leaders need to develop is empathy, which is the ability to put oneself in another person's situation. In another words, it's the capacity to empathize with others. The concept is crucial, particularly in the digital age where digital information, remote work, and smart workplaces could bias our perceptions. While AI can offer data-driven insights and decision-making powers, human leadership is still required to provide vision, empathy, and strategic direction. Leaders must strike a balance between the applications of AI and the necessity for human discernment and judgment.

XII. CONCLUSIONS

Many people have different perspectives about whether AI should take the place of humans, whether AI is unnecessary, or whether a middle way should be adopted. By automating some jobs and services, the workplace's adoption of AI technology is revolutionizing the workforce. People are afraid of this development because they think robots will replace humans in the workforce and make us more susceptible to layoffs. On the other hand, some are thrilled about the new employment prospects and jobs that the growth of AI is bringing forth. In reality, AI automation will probably create new employment while also making some vulnerable, but one thing is for sure: the skill sets needed for the workforce of the future are evolving. Regarding the potential course of events, every alternative has pros and cons of its own. Therefore, it is critical that leaders take into account the culture, organizational framework, and social milieu in which they operate. AI need to be viewed as a collaborative tool that works with people rather than against them, whether that be in the government, business, or military forces. Artificial intelligence has a wide range of advantages and disadvantages, but regulation is required, and there is strong support for AI regulation. Effective regulation would prevent various concerns, but

ineffective regulation has the potential to impede AI development and progress. For regulation to be effective, it must target the core of the problem. Future workers must be equipped with the necessary abilities to work alongside artificial intelligence, including interpersonal communication, informed decision-making, and physical dexterity—qualities that AI cannot match. Such regulation can also preserve the advantages of artificial intelligence because it has minimal effect on AI innovation and development. In order to guarantee that their teams is capable of adjusting to the changing job needs, industry leaders must endeavor to predict these changes as much as possible and create strategies to reskill or upskill their personnel. Even as the use of AI technology in the workplace increases. Fostering a culture that rewards initiative and creative thinking is a key component of leadership excellence. It is imperative for leaders to establish communication channels that are transparent and open, enabling staff members to voice their issues and offer suggestions. In addition, they plays a vital role in promoting innovation, which is necessary for any firm to survive. It is imperative for leaders to foster a culture of experimentation and risk-taking in order to inspire creativity. Thus, an excellent leader needs to be a mobiliser - inspiring his team towards an envisioned future, society builder, humanist valuing the creativity of people, mediator to human-machine in a common quest, navigator that is building bridges in AI ecosystem, explorer by using AI to sharpen the competitive edge of their organizations, sense maker that is emphasising clarity in AI design and processes as well as architect and guardian of the futuristic workplaces.

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