



## The Role of Artificial Intelligence on Organisational support Programmes to Enhance work outcome and Employees Behaviour

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### ABSTRACT

A computer service's capacity to perceive, reason about, and adapt to the environment is described in Artificial Intelligence, Employee Behavior, and Work Outcomes (AIBEWO). Complex and dynamic settings are no match for computer systems with superior artificial intelligence. To assist supervise their workforce, businesses are adopting AI solutions at a rapid pace. AI's appeal is due to two factors. Large volumes of data (also known as big data) regarding a business's activities are now available to companies, allowing them make highly competitive and successful management choices. Second, AI breakthroughs now allow businesses to gather and analyses this information in real time. Even in the most complicated and dynamic marketplaces, organizations may now integrate the newest updates into their decision-making. Although this is the case, employees who are now being managed and held responsible by AI face new problems. A future in which we all work with artificial intelligence (AI) is predicted. AI solutions are being created that have the ability to minimize prejudices and, as a consequence, allow more open and multicultural workplaces. Computers that can imitate intelligent behavior may not just influence the job we perform; they may also be able to assist decrease unfair discrimination inside companies. Engaged employees are driven and enthusiastic about their work, as per this section. To implement this, the paper gives several things: it provides the fundamental concepts underlying employee engagement, it discusses the factors necessary to ensure that AI encourages employee engagements, and issues of AI control and its impact on employee outcomes such as job satisfaction, meaningfulness, and retention. In this article, we look at the nature of diversity and inclusion (D&I), biases as a barrier to more diverse and inclusive workplaces.

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## 1. Introduction

The inventors of artificial intelligence (AI) in the 1950s imagined creating robots that could detect, explain, and understand like humans. Though such a concept is still in the world of science fiction, recent improvements in computing and the widespread availability of huge datasets have enabled companies to adopt AI solutions that go far beyond automating and informing. Newly

developed AI bots are able to learn, problem - solving abilities, emotion recognition and presentation, and result creation in a wide range of disciplines, from creating innovative goods to independently managing corporate systems and supply networks. AI systems, for examples, identify suspect financial transactions and propose fraud-management strategies. Meals and medication are being delivered independently by robots and vehicles. The human mind is able to communicate with robots and machines in a variety of ways. Other than being a disruptive force, artificial intelligence (AI) technologies present companies with both new and unique possibilities, as well as new and substantial difficulties. World-

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wide, firms struggle with employee engagement, which is vital to the health & effectiveness of their businesses. These difficulties are exacerbated by the launch and integration of new technologies such as artificial intelligence (AI) into the business. It is therefore crucial to concentrate on best practices and solutions that enable people to bring their intellectual, emotional, and physical energy to work.

## 2. Organizations and business capabilities are enabled by AI opportunities

Diverse organizational applications are progressively integrating AI technology. The relevant business skills are examined as research possibilities, instead of focusing on a particular technology (e.g., machine learning): [1]

Robotics, robotic process automation, artificial intelligence, and norm systems are frequently used to automate structured (or semi structured) business activities.

- Use of chatbots, expert systems, machine learning, and image processing to engage consumers and workers
- Most commonly, machine learning methods and neural networks are used for selection.
- Computer vision and neural networks can be used to provide unique results.

Various nontechnical and information organizations and the conflicts that arise from their interactions are involved in continuous, dynamic, conflicting AI-enabled capacities. Our study topics are connected to each of these skills and their conflicts, even though they are typically mixed or given concurrently, for the present purpose.

### 2.1. AI-Enabled engagement

Using natural language to communicate with humans is called AI-enabled interaction. voice- and text-based technologies are employed in this type of engagement, the technologies used vary greatly in terms of their capacity and domain, as well as their level of embodiment. Artificial intelligence and speech recognition allow superior AI interaction technologies that can perform increasingly complicated jobs that need higher interactivity, dialogue, logic and correctness, as well as emotional presentation. In addition to banking, business, marketing, retailing, and health care, these technologies are employed in many other sectors. They do not yet have complete human language abilities. This might lead to misunderstandings and user displeasure [2].

### 2.2. AI-Enabled innovation

AI-enabled automation, AI-enabled interaction, and AI-enabled insight are three business competencies, but there are more, including innovation. Learning by machine learning and deep learning neural networks may be used to simplify or improve innovation quality and outcomes. Using ideas, models and visualizations based on AI data, innovators may understand data in a more technical way and make better decisions. And lastly, the potential for deep learning to accelerate the time necessary to get new goods into the marketplace is also a factor. Desperate to speed up the drug development process, numerous pharmaceutical corporations and biotech start-ups have invested heavily in AI [3]. However, even while AI may not be capable of generating complete solutions on its own, it is capable of directing humans in the direction of the most promising paths for development. Yet the employment of AI for development is fraught with conflict.

### 2.3. AI-Enabled automation

The use of technology to assist structured and semi structured activities is at the heart of AI-powered automation, which is powered by artificial intelligence. Most of these activities are continuous and labor - intensive, as well as requiring both physical and cognitive skills. Robots have traditionally been used in manufacturing automation to do physical activities. A.I-enabled robotics are capable of sensing their surroundings and comprehending it, as well as acting on it and learning. They can effectively navigate their environment, detect things around them and aid people with a variety of activities such as autonomous transportation and robot-assisted operations, thanks to this technology. Robotic automation or machine learning technologies are used in cognitive automation. When it comes to RPA, it's utilized to automate basic administrative activities like data input while machine learning is used to examine and discover abnormalities in huge data sets as well as to improve the efficiency, precision and productivity of modelling processes. There are a number of conflicts that arise when businesses use such technology in order to automate labor processes.

## 3. What is employee engagement?

The fact that there are so many definitions of employee involvement might lead to a muddled understanding. This fundamental concept of involvement appears to be the basis for all other definitions [4]. To attract positive notice or interest; to attract attention or interest. Other interpretations involve occupying a person's attention or efforts, or attracting and holding someone's attention. Employee involvement has been categorized in the following way. This refers to the existence of attention and concentration in the mind. In the early days of the workplace, employees were defined as being physically, mentally, and emotionally engaged in their task. Researchers in the field of human resource development (HRD) have more frequently established the concept as a positive, active, work-related psychological condition quantified by the

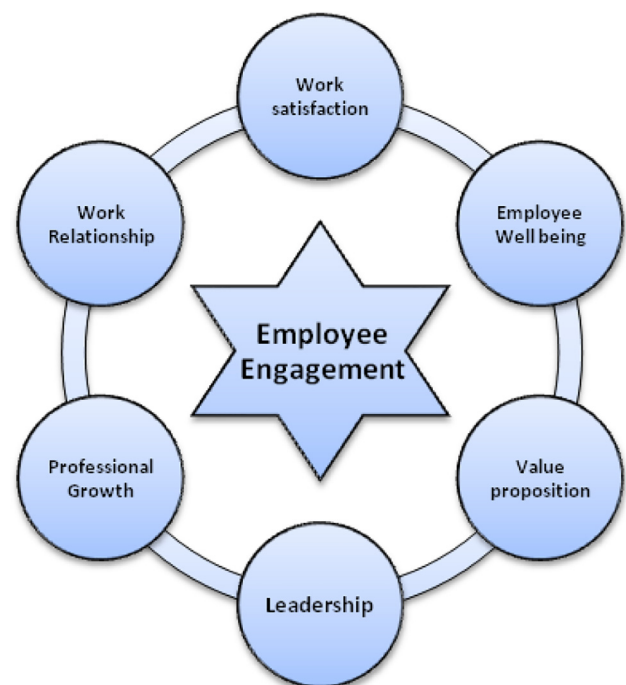


Fig. 1. Employee engagement.

preservation of intellectual, emotional, and behavioral energy and its strength and directions [5] (see Figs. 1 and 2).

#### 4. Artificial intelligence (AI) employee controls

It is necessary to be knowledgeable with management theory X and theory Y in order to properly grasp employee engagement and why it is so critical. Employee engagement may be approached from two different perspectives: theory X and theory Y. Employee engagement is promoted in theory X by guiding, supervising, rewarding, and/or disciplining employees, whereas employee engagement is promoted in theory Y by boosting employee happiness through more workplace autonomy and flexibility, as well as by reducing supervisory requirements. Both methods to employee involvement are viable and have their advantages and disadvantages. AI management systems are founded on hypothesis X, for better or worse [6]. By guiding, monitoring, rewarding, and/or penalizing employees' activities, AI management systems look to enhance employee engagement. This is particularly true for systems that allow the sharing economy, such as Uber. In conventional businesses, however, they can also apply to AI management systems. Worker behavior is influenced by organizational controls. Two of the most commonly utilized organizational controls are behavior and outcome controls [7]. This type of management involves the direct, personal observation of an employee's behaviors. Behavioral Control The outcome of a worker's actions is measured or evaluated objectively. As a result, many platform firms use AI management solutions to supervise their employees.

##### 4.1. Artificial intelligence (AI) outcome control

This is monitored by comparing the employee's performance in order to achieve a desired goal. However, outcome control involves evaluating the workers' performance after the activity has been finished [8]. Sales objectives and performance assessments are examples of outcome controls. AI outcome management using a digital platform is demonstrated by Uber's rating system. The driving privileges of Uber drivers who earn a performance rating of less than 4.6/5 may be revoked.

##### 4.2. Artificial intelligence (AI) behavior control

As a result of AI behavior control, employees' job actions are electronically directed and monitored to ensure compliance with a set standard. If both the company and the personnel know precisely how a job is to be done, behavior controls are often successful. Examples include retail shop managers who observe how staff welcome and engage with clients to verify they are following business standards [9]. It has been demonstrated that behavior control leads to strong internal motivation and favorable attitude changes in participants. Digital technologies are frequently used to regulate AI behavior.

#### 5. Artificial intelligence, job satisfaction, task significance in the workplace, and retention

To determine if management techniques are effective, work satisfaction, job significance, and employee retention are frequently cited. Positive attitudes about their jobs might be characterized as job satisfaction. Someone's job meaningfulness is determined by how much they believe their employment is desirable, helpful, and important. Measure of employee retention in a business is the number of employees who remain with the company after they leave. Connections and interactions with others at work are essential to job happiness, meaningfulness, and retention, according to study results. In addition to casual talks with coworkers, supervisors provide analysis brings and mentor ship [10]. Such relationships with coworkers and managers frequently provide employees with the social support they need to be happy, productive, and satisfied in their jobs. Humans, by nature, are social beings who require the company of others. Such social connections might be reduced or eliminated with the deployment of AI systems, though. To what extent can AI-driven businesses foster social contact? Building online communities on digital platforms is one way to go about this. A number of existing organizations, such as those sponsored by Uber and Airbnb, take a similar approach to this. In order for employees to connect with both each other and the firm, organizations might create their own online communities [11]. In addition to fostering employee relationships, these online communities allow firms to communicate with their employees and analyses their requirements. Naturally, privacy concerns should not be ignored. Workers must provide their consent before tracking their internet activities. Despite this, this technique can assist substitute conventional social connections, which seem to have been lost in these new digital AI-enabled working environments, according to the study.

#### 6. Understanding diversity

In the 1960s, gender and race discrimination became a major problem in the workplace. Since then, the definition of diversity has been broadened to encompass more statistical traits, such as disabilities and gender identity, as well as less conspicuous individual attributes, such as education, beliefs, and attitudes. A more modern definition of diversity encompasses any compositional distinctions that cause individuals to regard others in a work group to be comparable to, or different from, themselves. Differences in views or attitudes (known as separation diversity), information, connections, and experiences (known as variety diversity), or availability of resources such as privilege, status, salary, and position (known as disparity diversity) [12].

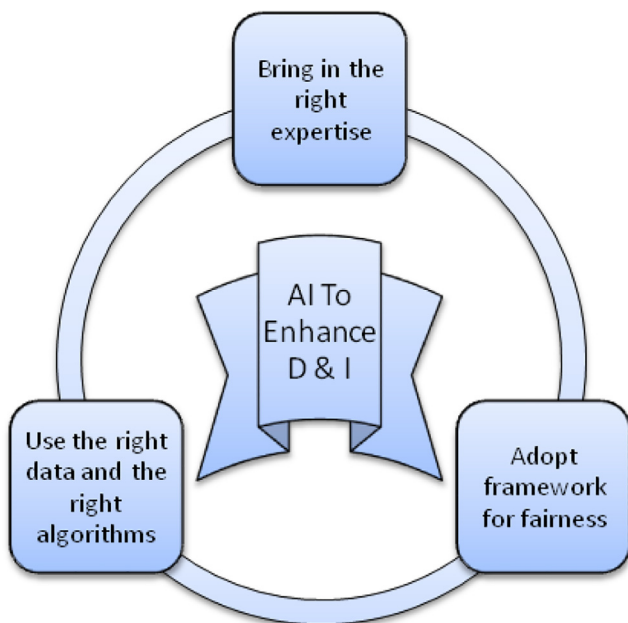


Fig. 2. Artificial Intelligence (AI) Enhance D&I.

7. The benefits and challenges of diversity

The influence of variety has been studied empirically, and the results are mixed [13]. Some research suggests that diversity is linked to beneficial results like increased creativity and production, while others show that diversity is linked to negative consequences like disagreement and disengagement. This is easier to grasp if we consider what it's like to work with people who are similar to us or who are very different from us. In Table 1. We show a work group's mixed impacts can be explained by the views and ideas listed below.

8. Inclusivity

As scholars and practitioners gain a better knowledge of the nature and impacts of diversity, the importance of inclusion has grown. In the last decade, inclusiveness has been seen as separate from, but connected to, diversity. For example, because exclusion was identified as a key issue in a diverse workforce, the notion of inclusion–exclusion was established. Inclusion Exclusion refers to a scale of how much a person believes he or she is a part of the organizational structure, both officially (access to information and decision-making) and socially (social gatherings, lunch meetings, etc.) [17]. A more modern and widely recognized perspective on inclusion focuses on an individual's two basic opposing needs: a desire for connection and a need for distinctiveness.

People attempt to reconcile their demands for resemblance to others with their desires for individuality through an ideal amount of inclusion, according to optimal distinctiveness theory (ODT). That is, the concurrent sensation of distinctiveness and connection, when combined, develops a sense of inclusion in a work group. Considering this, inclusiveness occurs when a person believes that he or she is appreciated and appreciated in the workplace and has a sense of connection while retaining his or her distinctiveness. Today, it is widely acknowledged that establishing an inclusive atmosphere allows one to solve the problems connected with

diversity while also realizing its potential benefits. People in an inclusive environment have equal access to knowledge and services, participate in teamwork, and make decisions [18]. All are regarded as 'analysts' inside the work group while retaining their own personalities.

9. The benefits of inclusivity

In Table 2. we show creating a diverse and inclusive workplace with a diverse staff provides businesses with a number of important advantages:

Inclusion can have an influence that extends outside these commercial gains. Inclusion brings united individuals from various origins and viewpoints (diversity), resulting in increased social cohesiveness and well-being.

10. Suggestions: Three essential activities for utilizing AI to enhance D&I success

Given its potential to remove biases and bring objectivity to employment decision-making, AI offers enormous promise for building more inclusive and diverse workplaces. Furthermore, if Learning models are not properly designed, they might provide biased results that harm D&I [19]. When businesses contemplate implementing AI in HR to improve D&I, they must take three essential steps:

- Bring in the appropriate knowledge:  
It is critical to include both experienced industrial-organizational (I-O) psychiatrists and data analysts when learning AI. I-O psychiatrists provide experience in information collecting and regulatory obligations, ensure that the information used to teach machines is bias-free and meets EEO criteria; data

Table 1  
Benefits and challenges of diversity.

From the viewpoint of cognitive resources	Increased performance can be described by the intellectual resource's viewpoint, which states that people with varied backgrounds, perspectives, and skills carry with them distinct cognitive qualities (e.g., perspective, capability). These characteristics can boost creativity and invention, as well as problem - solving skills, which can increase organizational performance [14].
The concept of similarity-attraction	The similarity attraction concept can explain more conflicts in a diverse collection. Including this worldview, individuals want to collaborate with people who are similar to them. Due to various common traits (e.g., personality, attitudes) of team members, a 'like-minded' group has less conflict, improve coordination, and more contacts, whereas a varied group has more problems [15].
Theory of social identity	The social identity hypothesis also explains some of the bad effects of a varied grouping, such as greater job mobility. Based on the current social identity theory, individuals prefer to categories themselves and others into distinct demographic groups based on characteristics such as religion membership, gender, and age. As a consequence of this social identity classification, there are 'in-groups' and 'out-groups.' In-group individuals tend to get along and have favorable results, whereas out-group individuals do not [16].

Table 2  
Creating a diverse and inclusive workplace.

Enhance the organization's reputation	A more inclusive culture and a more varied staff can help an organization's image. According to studies, gender diversity on corporate boards improves business reputation and leaves a favorable impression on customers. Furthermore, a good reputation makes a company more appealing to talent who is aware of D&I concerns. Women and minority groups, for example, consider businesses with diversity messaging to be more appealing as possible employees.
Expand your access to desired talents.	Organizations may incorporate all candidates, regardless of gender, age, nationality, or other factors, by incorporating D&I into their recruiting procedures. This results in a larger talent pool of possible applicants, giving companies more opportunity to acquire top people and fill skill gaps. Additionally, because diverse employees contribute distinct views and expertise that encourage innovation and better problem resolution, companies may benefit from increased productivity and flexibility to changing rapidly marketplaces.
Improve user experiences	Improved customer satisfaction has been connected to a varied organizational climate. This might be due to a varied customer service personnel having a better knowledge of various client demands and thus being capable to best assist those consumers.
As a minimum, verify security.	Compliance with Equal Employment Opportunity (EEO) standards is the very least that a company should do. A successful D&I programmed goes above EEO classifications (such as age, gender, and nationality) to include additional individual qualities (e.g., personality, attitudes).



scientists provide competence in model development and method design, reducing biases in techniques and methods.

- **Adopt fairness standards:**

By concentrating on abilities and behaviors rather than other potentially biased qualities, standardized job descriptions and competence models can assist companies in eliminating human subjectivity. An Artificial intelligence model may give clear, fundamental leadership and technical expertise criteria, as well as competency descriptors, that can be utilized across functions, systems, and regions to guarantee a consistent and objective baseline for evaluating workers and job seekers equally.

- **Make use of the relevant information and methods:**

Biases can emerge in both selection and data and algorithm development. It is critical to initially acquire a greater dataset before testing for and mitigating bias in the data supplied into the AI system. Method outputs should be evaluated as well, and model characteristics should be modified as necessary to eliminate bias.

## 11. Conclusion

In this research we reviewed about Organizations and business capabilities are enabled by AI opportunities and we describe their points like Artificial Intelligence (AI) enabled automation, Artificial Intelligence (AI) enabled engagement, AI enabled innovation which is a part of it. We also define employee Engagement and describe the AI Employees controls. In this study we briefly described the Artificial Intelligence (AI), Job satisfaction, task significance in the workplace and retention and we analyzing diversity and inclusivity and their benefits and challenges. At last, we can say in this study these essentials activities for utilizing artificial Intelligence to enhance Diversity and Inclusivity success.

## CRediT authorship contribution statement

**Korakod Tongkachok:** Investigation, Writing – original draft. **Shaifali Garg:** Conceptualization. **Veena Prasad Vemuri:** Formal analysis, Data curation. **Vijesh Chaudhary:** Conceptualization, Supervision. **Poonam Vitthal Koli:** Writing – review & editing. **K. Suresh Kumar:** Conceptualization, Writing – review & editing, Supervision.

## Declaration of Competing Interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

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