

**WHITE PAPER** 

# Applied AI in Business Transformation and Automation

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# **Table of Content**

01.	Introduction	03
02.	Technique of AI	04
03.	How AI is Helping in Business Transformation	04
04.	Examples of Transformation	05
05.	Applying AI for Automation	05
06.	Examples of Automation	05
07.	Top Countries that are using Automation	06
08.	Al led Automation in India	07
09.	Conclusion	07
10.	Motto of AI	07
11.	Reference Links	08
12.	About the Author	09



# Why Artificial Intelligence (AI) is chosen as a Better choice for Business transformation and Automation?

Yes, it is chosen as the best, and we will discuss it in detail in this blog.

# Introduction

In 1956, John McCarthy was regarded as the "father of artificial intelligence (AI)". He organized a conference to exhibit his interest in machine intelligence and to talk about the existence of A.I. in different fields.

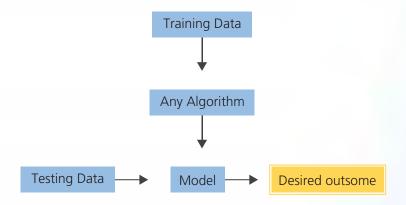
Al deals with the ability of a machine or a computer program to think, act, and learn like a human.





# **Technique of Al**

Here, Al does not make a machine or program to do any task instantly. Rather, it must be trained with accurate past data in all possible ways to understand and exhibit the required outcome as per the situation.



IMG 01. Describes how data is trained

This is how it is working to solve **real-world** problems.

# How Al is Helping in Business Transformation

Artificial Intelligence has created a **revolution** in transforming businesses to the next level in the world. It is happening because of the advancement of **technology** with new requirements, lack of efficiency, and accuracy issues in the workspace ("place of work"). And, most importantly, the lifespan of **digitalization** has increased dramatically since the COVID-19 pandemic.

Al has helped with advancements in every field of work. It has created massive transformations from drivers in cars to driverless cars, customer care to an online bot, bank deposits to e-payment, offline physician appointments to online clinical diagnosis, Alexa, Siri, and so on. As it has been proven that 84% of Indian businesses use Al transformations.



# **Examples of Transformation**



**Shopping** becomes easier through e-commerce platforms.



**Authentication** and authorization as part of security breach.



**Usage** of UPI transactions by different online applications.



**Health** diagnostics



**Travel** bookings



**Entertainment** and Multimedia

# **Applying AI for Automation**

Automation is a process of changing a manual routine task to work automatically when the condition is satisfied. For example, sensor lights glow when a person enters the room or automated taps release water when it senses our hand or any object below it. With this automation, we could lower the error rate of an operation, increasing incredible precision, accuracy, and speed. It is not affected by hostile environments, which ensures the completion of difficult tasks with ease.

# **Examples of Automation**



Self-driving cars (Driverless cars)



**Smart Home** 





**Humanoid Robots** 



Smart assistants



Laser surgical robots in health care



Army: Explosive detection systems

# **Top Countries that are using Automation**



### **South Korea**

Automated robot usage in the manufacturing industry



### **Switzerland**

R&D in automation with control t-engineering



### Japan

Industrial robots



### Italy

Innovative projects with integration



### Singapore

Electronic industry, autonomous driving, and Smart homes



### **Finland**

Leading hyper-automation country and global tech market



### China

Industrial robots, Personal robots, Food courts, Tang Yu (humanoid robot as CEO)



### Sweden

Industrial robot



### **Germany**

Transportation industry: first self-driving train



### **Denmark**

Drone technologies



# Al led Automation in India

**India** has a budding ecosystem of IT firms, hyper-automation startups, fintech, cyber- security companies, R & D services for AI and automation, and many more.

**"Sophia"** is one of the greatest inventions in the history of AI. It is a social humanoid robot developed by a Hong Kong-based company Hanson Robotics, activated on 19th April 2015, with many advanced qualities.

# Conclusion

"Humans are just awesome and without a human brain, nothing's going to happen."

We as humans have the power to design, develop, and give life to something new for making our lives better and more accurate through **digitalization** and Al.

## Motto of Al

"Machines won't sleep and rest like humans. It will not make any mistake or perform unwanted actions, because it is pre-programmed, well trained, evaluated and deployed in the environment successfully with expected accuracy."



# **Reference Links**

- March that the strength of the
- https://cio.economictimes.indiatimes.com/news/corporate-news/indian-businesses-lead-on-ai-ad option-in-comparison-to-the-uk-us-finds-peaks-state-of-ai-2022-report/91894483
- Matther://www.fingent.com/blog/9-examples-of-artificial-intelligence-transforming-business-today/
- March 10. https://www.analyticsinsight.net/top-10-worlds-most-automated-countries-to-know-in-2022/
- https://litslink.com/blog/artificial-intelligence-in-business
- Marcionize.com/blog/ai-business-transformation-getting-it-right
- https://execed.business.columbia.edu/programs/aibt?sourceid=LeftNav
- Mattps://www.simplilearn.com/how-ai-and-automation-are-changing-the-nature-of-work-article



# **About the Author**



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