

Forum: International Labor Organization (ILO)

Issue: Resolving the Escalation of Job Displacement and Unemployment Resulting from Automation

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Introduction

The world is quickly moving towards including technology in every aspect of our lives having its positive and negative effects, especially in workplaces where automation can cause the escalation of job displacement and unemployment thus greatly impacting the work industry. Consequently, in the workforces, automation is now taking over people's jobs because people think technology can get a job done better and faster leading to the great increase of job displacement. Moreover, automation can lead to different types of job redundancies, it can sometimes result in complete unemployment where automation takes over humans tasks completely or to partial unemployment where people still have a role yet are considered to be as a side or an unimportant option.

Definition of Key Terms

Automation

The process by which the work traditionally done by humans is carried out by machines and technology.

Unemployment

The number of people who are able and willing to work but are not getting employment.

Background Information

Automation is nothing new; it has existed for a few decades. However, jobs and duties that were created specifically for humans have been supplanted by automation as a result of all the technical and artificial intelligence developments. At first, AI would only target manufacturing jobs while on the other hand, now, it has been targeting many new fields of jobs such as customer service, data analysis, and even creative work. As a result, this leads to an enormous wave of unemployment. Even though technological change throughout history has given rise to new job types in addition to those it has rendered obsolete, automation is occurring at a rate and scale that makes the great majority of workers, particularly those who perform repetitive or predictable work, extremely vulnerable to displacement without clear pathways to transition.

Major Parties Involved

South Korea

- South Korea has released its National AI Strategy which focuses on employment creation and the development of digital technology skills. To guarantee that automation helps both workers and society, the government has made large investments in AI and automation while providing robust social safety measures, such as workforce development initiatives and universal basic income trials;
- South Korea has been taking proactive measures to address the issues raised by

automation and the possible loss of jobs it may cause. The country has come to understand the importance of finding a balance between the need for technical advancement and a strong workforce.

The United States of America

- **Workforce Reskilling and Training Programs:** To assist people learn new skills for developing industries, particularly in technology, the US has started programs like the National Council for the American Worker;
- **New Employment Sectors:** To decrease the effect of automation on unemployment rates, the US is investing in sectors like advanced manufacturing and renewable energy to generate new job opportunities that automation cannot replace.

Japan

- Japan does its best to combine the two approaches, which seeks to enhance human responsibilities rather than replace them with AI. In that way, Japan enhances its economy and workplace environment by investing in human-AI collaboration;
- Japan's Ministry of Health, Labour, and Welfare provides subsidies for retraining programs to help workers gain the skills needed in businesses like robots and artificial intelligence that are in high demand. This promotes an environment where people and machines coexist.

Timeline of Key Events

Date	Description of Event
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<p>9th century</p>	<p>The first windmill and watermill were made during this time and they are both a type of technology that eased certain jobs for humans. Both technologies expanded and continued to improve, reducing the need for human labor in hammermills, sawmills, paper mills, ore-crushing mills, and tool-sharpening mills.</p>
<p>17th and 18th century</p>	<p>It was during this period that the 18th and 19th centuries introduced the onset of the industrial revolution-that is, the age of unprecedented technological-economic changes resulting in shifting economies and life around the world from manual labor to machine-based manufacturing. This was also the era that saw many new technologies developed, which resulted in the expansion of factories from small workshops to huge ones and put a factory system into practice that relied on machines to do the regular chores rather than skilled manual labor. Though this sped up economic growth, it led to a great amount of</p>

	unemployment.
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1900s - 1950s	<p>Automation became the main force behind industrial growth between the 1900s and the 1950s, leading to mechanized manufacturing integrations. The assembly line, invented by Henry Ford in the 1910s, revolutionized mass production and increased output speeds that had previously been reached. As the century progressed, conveyor belts, specialized equipment, and various types of robots actually started to introduce automation in other industries, like textiles and electronics. The introduction of early computers and programmable machines in the 1950s marked the beginning of automation's full potential, advancing not only manufacturing but also data processing and many other business operations.</p>
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<p>20th and 21st century</p>	<p>All what happened before laid the ground for the automation and unemployment boom that occurred during this time. First, digital computers were introduced which led manufacturing facilities to now be able to have controllers which can perform more complex tasks at faster</p>
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	<p>speeds and greater efficiency than human beings. The development of robotic process automation was gaining prominence in manufacturing facilities as technology continued to evolve. Consequently, practically every assembly and production procedure currently carried out in factories is now done by robots. Though that benefitted companies greatly from the side of efficiency it led to a great increase in unemployment rates.</p>
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Previous Attempts To Resolve This Issue

Although many attempts to put an end to this global problem came into prominence, three major

trials stood out:

1. Employment in Public Areas

Public working areas have employed the workers that were displaced in constructional infrastructure, for example, those employed in the New Deal that was launched in the United States during the Great Depression in the early 20th century;

2. Training and Retraining Programs

For instance, Japan and Germany had already spent resources on training programs, which included vocational training that would help employees shift to other jobs in case automation occurred;

3. Universal Basic Income

More recently, debates on Universal Basic Income take center stage, finding a place among those feasible solutions that can guarantee economic stability to all, whether working or jobless, in view of the rapid automation of work.

Possible Solutions To Resolve This Issue

1. Impose Penalties

Force penalties on organizations that replace humans with AI generated robots to ensure that corporations would take utilizing AI into consideration;

2. Minimum Number of Employees in an Organization

Putting a minimum number of employees that should work in every workforce can ensure work opportunities for all citizens;

3. Restrict Utilizing AI

Limit and keep track of the amount of AI used in the country or in a specific field;

4. Divide Jobs Equally

Implement regulations that strictly mandates AI usage to be directly balanced with the number of human workers to ensure that no use outweighs the other.

Bibliography

AI | *JapanGov*. (n.d.). The Government of Japan. <https://www.japan.go.jp/topics/AI.html> Biden, P. (2024, June 18). *FACT SHEET: Biden-Harris Administration Announces Historic Rules to Create Good-Paying, High-Quality Clean Energy Jobs*. The White House.

<https://www.whitehouse.gov/briefing-room/statements-releases/2024/06/18/fact-sheet-biden-harris-administration-announces-historic-rules-to-create-good-paying-high-quality-clean-energy-jobs/>

Bong, N. (2022, April 26). *The evolution of automation*. Progressive Automations.

https://www.progressiveautomations.com/blogs/news/the-evolution-of-automation?srsltid=AfmBOopfYE4ogHNd823QcjOO54gJwWmer5OZe7hT1rNAzaJ5jW_JOhqs

Jain, S. (2024, June 6). *Artificial Intelligence and Unemployment*. GeeksforGeeks.

<https://www.geeksforgeeks.org/artificial-intelligence-and-unemployment/> Stangarone, T. (2020, June 25). *South Korea's Digital New Deal – The Diplomat*. The Diplomat.

<https://thediplomat.com/2020/06/south-koreas-digital-new-deal/>

Unraveling the Impact of Automation: Separating Fact from Fiction on Job Loss | Service Automation Framework. (2023, October 17). Service Automation Framework.

<https://www.serviceautomation.org/unraveling-the-impact-of-automation-separating-fact>

from-fiction-on-job-loss/

Zeira, J., & Nakamura, H. (2018, December 11). *Automation and unemployment: Help is on the way*. CEPR. <https://cepr.org/voxeu/columns/automation-and-unemployment-help-way>