

Essay:

Mankind faces the Challenge of Using AG Responsibly

Outline:

1. Introduction
2. A major threat of AG: To render mankind irrelevant as a has-been, washed away species of sapiens
3. Burden of using AG responsibly falls on humankind to rein in the following rather anarchic consequences:

- 3.1. Widespread unemployment with its secondary fall-outs
- 3.2. Democracy subversion making way for digital dictatorships in the wake of AG's irresponsible use
- 3.3. Robot wars evading war crime trials in absence of relevant legislation
- 3.4. 'Black Box' dilemma blurring lines between errors and maneuvers
- 3.5. 'End of the world?
- 3.6. Serious breaches of privacy

4. Light IN the tunnel: Path-forward to overcome the challenges ~~and~~ to wisely utilize the vast, safe potential of AG:

- 4.1. Placement of social safety nets
- 4.2. Rules for the imminent new World Order:
(A) Political
case-study of revising Geneva Convention
- 4.3. Reducing reliance on technology to optimum levels where national security at stake

4.

5. A case study of Stuxnet virus as a precursor to more pernicious cyber attacks commanded and executed by AG.

6. Conclusion

Mankind is ^{once} again at odds with its invention and at a loss in making peace with it. From gunpowder to the destructive nuclear weapons, it has performed poorly to extinguish ~~its~~ instincts acquired in the wilderness of African Savannahs. Artificial intelligence is that new invention which can be unreliable as a companion to new peaks of human civilization if used irresponsibly. Since too much dependency always has consequences - especially at a point where AG attains General Consciousness and thinks for and of itself as a distinct entity. Even your shadow abandons you when in the dark. Those consequences symbolic of darkness range from irrelevancy of humans as a once superior race, to unemployment, derailing of democracies and extending all the way to its breaching sacrosanct privacy of individuals in the context of increasingly digitized globe. In an era of globalization, threats multiply manifold as do the benefits. In case of AG, it is imperative to use it prudently without loss of acquiring its benefits. For, notwithstanding all the prospects of AG, mankind faces the challenge of its latest invention, a domain where it has a poor record with its past ingenuity of similarly formidable scale.

The most serious challenge AG's irresponsible development poses is its capability to render man as irrelevant. Although man had similar apprehensions in the wake of Industrial

Revolution, this time around it is a unique and more comprehensive threat. Hitherto a superior race, AG tends to replace humans not only physically but also intellectually. Such irrelevance is pronounced to man thanks also to the development of neurosciences and biotechnology. As a result, there are good chances of AG developing so far as to develop emotions of its own as emotions are a response to senses triggered by chemicals. A bot fitted with right sensors, can replace humans in its entirety as more developments surface. Thus, while man is busy creating a Frankenstein's monster, peril of its irrelevance as a species are increasing.

Of the many challenges of AG's unabashed onslaught in the horizon, unemployment is its first casualty. Man will rather face exploitation than embrace unemployment. As Yuval Noah Harari writes in his book "21 lessons from the 21st century," "the only thing worse than exploitation is irrelevance." This threat is a punch in itself, as its secondary consequences of poverty and resentment can be more miserable. Hence, the prospects of AG encroaching the labour market are as dire as real.

Moreover, in addition to the resentment caused, those challenges can be more nuanced in undermining the applecart of democracy. Information technology has capability to rally mass support for populist propaganda through its bots. In influencing

public opinion, even foreign elements can interfere in a polity's political sovereignty. It can damage people trust in public institutions. For instance, Russian hackers used bots ~~and~~ to spread propaganda in favour of Donald Trump in US elections, 2017. Yet the threats of digital dictatorship is more worrisome when AI can detect one's feelings through breathing and heart rate sensors. It is no different than 'thought police' used by Big Brother in George Orwell's novel, "1984". In short, sleeping AI can be death of democracies if used without restraints.

Furthermore, when robot soldiers replace ^{foot}human soldiers and even military command, wars can be an even deadlier phenomenon. It will be more troublesome to fix responsibility for civilian deaths and prosecute the war criminals when robots plan, identify and execute operations independently. There is no provision in Geneva Conventions for such possibility in battles. Thus devoid of emotions and control, irresponsible development of AI can itself be a hidden mine waiting to blast.

Besides, such threats are amplified when humans cannot compete with AI to differentiate between AI's maneuvers from its excess. Famously termed as a "Black Box" dilemma, tendency of robotic faults can be more dangerous than human follies. As wars turn unmanne^s, they can be more inhuman as well. Lethal Autonomous Weapons Systems

(LAWs) are less predictable and less controllable. In case of system errors, the damage will be huge before humans can correct the glitch or call off the operation.

In addition to Francis Fukuyama's theory of end of the world by its emergence to ^{American} unashamed liberalization to Robert Kaplan's a "coming anarchy," in 2018 Yuval Noah Harari added yet another prediction. In an article, "Why Technology favours Tyranny," he argues for an imminent world where governments will spy, manage and control human interaction, communication and thinking. While it is too early to declare ~~on~~ with any amount of certainty the end of world for any one reason, AI is one challenge - and ~~not~~ by no means an insignificant one. Therefore, AI is one of the candidates set to crumble the civilization of mankind if employed unrestrained.

Such a demise of world is linked to breaches of privacy. According to Proceedings of the National Academy of Sciences, AI systems can inadvertently infer sensitive information about individuals. For example, recommendation algorithms can interfere by inference even without direct access. At a larger scale, it can interfere in national decision-making and undermining its strategic autonomy by revealing its national secret databases.

However, the challenges posed by reckless use of AG can be timely addressed if right steps are taken now for future developments.

Placing social safety nets to protect the unemployed individuals is an imperative, first step towards mitigating AG's onslaught. It will help stabilize society and double down on possible resentments. As benefits from AG accrue, they can be passed on to individuals. Although complete loss of jobs is too dark and uncertain a consequence, yet effort must be made to accommodate suffering individuals. Thus protecting the affected is one solution to averting AG's multifold repercussions rather than a rabbit-out-of-hat cure.

Additionally, there is urgent need to brace for ~~immediate~~ brewing World Order that envisages a more significant role of robots in human affairs. For instance, Geneva Convention is at the time a toothless paper tiger in the context of LANS. The convention of war carries needs to be revised to make it more comprehensive, and ensure accountability - and - hopefully, peace.

What is more, reliance on technology should be limited to optimum levels to avoid unwanted interference in where it concerns national security. AG has become inevitable in many circumstances, yet it is critical to preserve state autonomy. As an adage made famous by Thomas Sowell, an American economist, says, "there are no

solutions, there are only trade-offs." It is particularly true when handling the threat of artificial intelligence.

Stuxnet worm is a case study as a precursor to more subversive cyber attacks commanded and executed by AI. ^{Untill} In 2010, it was unheard of of a cyber-attack wreaking physical damage when US Israel in league with Israel implanted the worm in Iran's Nuclear data acquisition and reporting systems. It had damaged hundreds of Iranian nuclear reactors and put its nuclear programme back to 2 years. It is only an indicator of damages caused when artificial intelligence replaces humans as commanders and executors. Thus, the havoc of AI controlled world cannot be made lightly of.

Conclusively, the third revolution in warfare is brought about by LAWS after gunpowder and nuclear weapons. Yet it poses challenges even in times of peace as is characteristic of disruptive technologies. From social, political, economic to even existential threats, AI is billed as a force to reckon with. However, there are many paths to be taken to escape the otherwise inevitable fate. For, as they say, make hay while sun shines - except the shining days are numbered for humans.