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International criminal responsibility for the use of artificial intelligence in the commission of international crimes against civilians during armed conflicts

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Abstract

Artificial Intelligence has become a powerful tool in military operations, capable of making independent decisions that were earlier controlled by humans. While these technologies promise efficiency and accuracy, they also create serious risks when used in armed conflicts. The paper explores how the use of AI can lead to international crimes against civilians and the difficulties in allocating responsibility for the acts. It highlights key principles of international humanitarian and criminal law, including the doctrines of distinction, proportionality, and command responsibility, to determine their relevance in AI-driven warfare. It argues that current laws were designed for human and do not suitably address autonomous systems. The paper suggests adopting new international standards that define responsibility for developers, commanders, and states involved in AI-based operations. Strengthening oversight and transparency mechanisms is essential to prevent misuse and ensure justice for civilian victims of technologically moderate warfare.

Keywords: Artificial Intelligence, military operations, international crimes, armed conflicts

1. Introduction

Artificial Intelligence (AI) serves as a significant aspect, transforming the frameworks of military operations and strategy (Bhattacharyya & Carroll, 2022) ^[18]. As countries face security challenges, the integration of AI capabilities into warfare signifies not purely a scientific progression, but a deep transformation in the operational methods, decision-making processes, and engagement strategies of combat forces (Acquaviva 2022) ^[70]. The incorporation of technology into warfare has significantly influenced consequence (Chidiogo Uzoamaka Akpuokwe *et al.*, 2024) ^[16]. Three layers are usually used to understand AI: Narrow artificial intelligence, sometimes referred as poor AI, is concerned with certain activities, such as chatbots and speech recognition, both of which are included in the aforementioned; When a machine has artificial general intelligence (AGI), it can theoretically do any intellectual challenge at a human level; and lastly, Artificial Super Intelligence (ASI), which is thought to be considerably superior to human capacity (Binns, 2020) ^[19]. Since AGI has yet to be implemented and ASI is just theoretical, it is likewise necessary to take a careful and hypothetical approach to its consequences (Acquaviva, 2024) ^[1]. These systems can function autonomously or semi-autonomously, on real-time discretion, based on their software and related inputs. Aircraft integrated with AI algorithms can independently identify and engage targets, minimizing the necessity for human intervention (Rabet Ghannadi, 2025) ^[55]. Although modern technologies offer efficiency and minimize human risk and also improves ethical and legal inquiries (Nwagbara, 2024) ^[46]. Armed forces using AI-driven analytics to guide strategic decisions by improving their technical awareness and operational planning abilities. (Dominelli & Sanna, 2025) ^[21]. AI is made up of complicated algorithms, self-evolving AI often is not able to perform itself (Lewis, 2020) ^[36]. Cybercrimes like fraud and data hacking arise from autonomous transportation systems like trains, drones, and self-driving vehicles (Greipl, 2023) ^[26]. These inquiries challenge current legal structures and need a reconsideration of the rules regulating armed forces (Iwan, 2021) ^[28]. The application of AI in military requires a good understanding of the potential for future outcomes. Formulating guidelines and standards for the ethical use of AI in military is important to match that military actions with human laws (Remy, 2023; Akkus, 2023) ^[56, 69]. International collaboration with civil society and ethical specialists, may create a more sustainable and fairer framework for AI in military

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warfare (Kharytonova, 2024; Kaur Sabherwal Kirandeep, 2024) ^[31, 30]. Three layers are usually used to understand AI: Artificial General Intelligence (AGI) is used theoretical and intellectual as human; Narrow AI (Weak AI) is focused on specific tasks such as voice recognition and chatbots and finally, there is Artificial Super Intelligence (ASI), which is the most advanced, it can work like human (Dement & Inglis, 2024; Plakhotnik, 2019) ^[19, 53].

2. Literature Review

This study aims to examine the criminal culpability of artificial super-intelligence, a significant legal concern posed by autonomous sophisticated technologies. The principal inquiry behind the study is as follows: What are the principles of Can conventional criminal responsibility be placed on someone in cases where an intelligent system independently makes complicated decisions absent direct human intervention? What legal framework can we use to determine the criminal culpability of these artificially intelligent systems? The study utilizes a theoretical framework to examine the integration of conventional criminal liability notions with current understandings of autonomous AI in relation to legal interactions, aiming to address these inquiries (Kaur Sabherwal Kirandeep, 2024) ^[30]. The research also addresses the advancement of these beliefs of ASI, which can do computations beyond the capacity of individual reasoning and analysis (Pacholska, 2022) ^[51]. This study pertains to a survey of legal publications and prior research of the current legal frameworks relating concerning the unlawful responsibility of computer programs either national and international law (Boutin, 2022) ^[11]. Numerous studies have examined the issue concerning artificial intelligence's criminal responsibility, ranging from the use of traditional criminal law principles to intelligent systems, "The Prospects of AI Human Liability," to the issue raised by self-learning systems (Prasetiawan *et al.*, 2018) ^[54] "Legal Frameworks and Super-intelligent AI." Relative legislative approaches on AI throughout legal frameworks in the US, EU, as well as a few particular Asian nations have additionally been the subject of several studies (Pacholska, 2024) ^[52]. The evident lack of research connecting the legal fields covered below to conventional conceptions of judicial culpability, as they relate to ASI, therefore justifies this study. Given the statutory vacuum surrounding ASI's criminal liability, it compares various national and international regulations with the goal of presenting legal proposals that can offer valuable insight into novel regulations that are informed by conceptual holes existing in the field in the coming years (Saxon, 2024) ^[61]. The use of Scholars are very interested in integrating artificial intelligence into modern warfare in a variety of disciplines,

particularly technology, ethics, and military studies (Vignard, 2024) ^[66]. AI has been incorporated into a number of important military operations domains. Automatic weapons systems, which autonomously recognize and engage objectives with capabilities by boosting operating velocity and effectiveness, are one notable use (Gaeta, 2023) ^[24]. For example, drones with AI algorithms installed may operate independently in challenging terrain and carry out targeted attacks or monitoring while lowering the danger to human troops (de Vries, 2023) ^[18]. AI is used in predict intelligence for threat assessment in contrast to autonomous systems. Armed institutions use artificial intelligence-based data analysis to spot trends in hostile conduct and foresee possible attacks, claim (Ojha, 2025) ^[49]. The decision-makers may more efficiently deploy resources and take preventive actions thanks to this predictive capability. AI improves being aware by analyzing enormous volumes of data from many sources, enabling military officers to make wise choices in uncertain circumstances with little assistance from humans (Bo, 2021) ^[10]. The use of AI in military operations has numerous advantages. The augmentation in operating effectiveness is one important advantage. Everyday jobs may be automated by AI systems. S uch as gathering and analyzing data, allowing staff members to concentrate on more important strategic issues (de Vries, 2023) ^[18]. Processes for making decisions are improved by such simplified method, which also enables speedier reactions to new dangers. Additionally, by streamlining the administration of supply chains and distribution, AI may help renovate the use of resources. Armed forces may save waste and guarantee that supplies are placed precisely where they are most required by using AI algorithms to forecast their equipment needs and optimize supply routes (Freeman, 2021) ^[23]. This effectiveness reduces the expenses related to military operations while improving operational preparedness (Swart, 2023) ^[64]. The moral consequences of autonomous firearms are a crucial worry. Delegating deadly decision-making to robots, according to critics, presents serious ethical and legal issues (Meloni, 2023) ^[39]. Traditional legal frameworks are challenged by independent systems' lack of responsibility for their acts, which calls for a review of the rules regulating strife involving weapons (Soler, 2019) ^[63]. More investigation is requisite as the subject of AI in combat develops to meet the obstacles and moral conundrums related to its incorporation (Hassan & Osman, 2023) ^[27]. Future research should concentrate on creating strong frameworks that emphasize on human supervision and responsibility for the proper application of AI in wartime situations (Azizi, 2025) ^[5].

Table 1: Timeline of AI Development in Military Applications

Year/Period	Technology/Weapon System	Country	Level of Autonomy	Reported Civilian Impact	Legal/Ethical Debate
2001	Predator Drone (U.S.)	USA	Semi-autonomous	Civilian casualties in Afghanistan	Debate on proportionality
2010	Harpy Loitering Munition	Israel	Autonomous	Target misidentification risks	Algorithmic accountability
2022	KUB-BLA Drone	Russia	Fully autonomous	Claimed use in Ukraine conflict	Lack of human oversight

3. Conceptual Framewrok

3.1 Artificial Intelligence in Military and Legal Contexts

The integration of artificial intelligence (AI) into military and legal contexts presents more opportunities along with complex ethical and legal challenges. In military warfare, AI improves the operational efficiency via efficient logistics, mission planning, and investigation, with risks to human. AI

is totally depend on human comand and supervison, it is still not able to perform any program by itself (Lahmann & Geiss, 2022; Kozyulin, 2025) ^[34, 33]. The organizations in charge of these infrastructures, such as the manufacturers or operators, are held accountable (King, 2024; Miljković *et al.*, 2023) ^[32, 41]. The development of statutory frameworks focuses more than just criminal liability; it also includes civil duty, business

ethics, and the protection of civil rights (Siregar *et al.*, 2024; Bakumenko, 2025; Rubisz, 2024) ^[62, 6, 59]. In the case of civil liability, it is crucial to set up legal procedures for addressing damages caused by AI especially in situations where it is blaming people directly (Alarie *et al.*, 2018; Madaoui, 2024) ^[3, 38]. AI adoption aligns with principles of justice, accountability, and human rights (Vargas-Murillo *et al.*, 2024) ^[65].

3.2 Autonomous, Semi-Autonomous and Automated Systems: Table 2. highlights the distinctions between systems that are autonomous, semi-autonomous, and automated, automated systems perform tasks based on pre-programmed

instructions. They follow predictable rules and lack the ability to accommodate or make decisions beyond their coding. For example it include industrial robots on assembly lines or basic cruise control in vehicles, which execute repetitive tasks efficiently but require human input for complicate decisions (Norris & Patterson, 2019; Bakumenko, 2025) ^[44, 6]. Semi-autonomous systems operate with partial independence, performing specific functions but still relying on human command. These systems are designed to assist rather than replace human decision-making. For instance, adaptive cruise control or advanced driver-patronage systems (ADAS) can manage speed and distance but hand control back to the driver when needed (Miller *et al.*, 2002; Rubisz, 2024) ^[42, 59].

Table 2: Distinctions between automated, semi-autonomous, and autonomous systems

System Type	Human Role	Decision-Making Ability	Adaptability	Example
Automated	None (after setup)	Follows programmed rules	None	Basic assembly robot
Semi-Autonomous	Oversight/backup	Some independent actions	Limited	Tesla Autopilot, bus platooning
Autonomous	None	Full, context-aware decisions	High	Level 5 self-driving car

Self-governing systems can make independent make choices and behave without human assistance intervention, using AI, sensors, and real-time data. These systems use advanced algorithms, sensors, and machine learning to adapt and self-manage without human hindrance. Examples include fully autonomous vehicles and military drones that can execute missions independently (Caron & Caron, 2020; Gillespie, 2019; Bartneck *et al.*, 2020) ^[14, 25, 7].

3.3 International crimes (genocides, war crimes and crimes against humanity)
Crimes committed globally are the most egregious abuses of human rights. People who commit crimes against humanity, war crimes, and genocide, or acts of hostility are held accountable for their actions under international criminal law. By upholding international criminal law and supporting efforts to guarantee that those responsible for global offenses are held accountable, every country has the duty of upholding international criminal law (King, 2024) ^[32].

Genocide

The Convention on the Prevention and Treatment of Genocide, a crime that was signed in 1948, is the document that defines the term "genocide."
The United Nations was moved to accept the Convention as a reaction to the events of Holocaust, which was a period of time during World War II in which Nazi Germany was responsible for the methodical extermination of about six million Jews. Those who perform actions with the goal of destroying, in entire or in part, a national, ethnically, racial, or faith organization are said to have committed the crime of genocide. Genocide may be committed by a number of different means, including but not limited to the following: murdering or gravely wounding membership of the group;

imposing circumstances that are intended to eliminate the group by restricting births among its members; and transferring with force kids who come from the group to an additional group onward (Sato, 2021; Nuredin & İnan, 2024)) ^[60, 45].

Crime against Humanity

In general, the term "crimes against humanity" refers to particular offenses that are committed in the framework of extensive assaults executed against people. It is necessary for an act to be done as a component of an extensive or organized assault against civilians residents, with understanding of the assault, in order for it to be regarded as a transgression of humanity: the act must be committed. The concept of crimes against humanity has developed over time as a result of the development of international jurisprudence and customary international law legal systems like the International Criminal Court for the Republic for the former Yugoslavia, the international relations. Criminal Tribunal for Rwanda, and the International Criminal Court (Okereke & Racheotes, 2014; Boutin, 2022) ^[50, 11].

Crimes of War

The breaches of humanitarian laws worldwide, which are often known as the rules of war, are referred to as war crimes. Particularly during the second half of the 19th century and the early part of the 20th century, when global humanitarian law was being written, the idea of war crimes began to emerge. Treaties are the origin of international humanitarian law. The four agreements of Geneva of 1949 and their two supplemental protocols constitute the foundation of international humanitarian law. Customary international law is also a component of national humanitarian law (Sato, 2021; Nuredin & İnan, 2024)) ^[60, 45].

Table 3: The table summarize definitions and distinctions of core international crimes

Crime	Key Elements & Context
Genocide	Intent to dismantle a group (national, ethnic, racial, religious)
War Crimes	Serious infractions of the laws of war during armed conflict
Crimes Against Humanity	Widespread/systematic attack on civilians, war or peace

4. Legal Framework Governing the Use of AI in Warfare
4.1 International Humanitarian Law (IHL)
The foundational doctrine of international humanitarian law

(IHL) are intended to reduce the impression of armed conflicts. The Geneva Convention Additional Protocol describe the following fundamental tenets: reasonableness,

differentiation, and protections. In order to safeguard populations and guarantee the security of the nation, these concepts govern the conduct of conflicts (Lambourne, 2024) ^[35].

Opponents to a war must use the concept of demarcation to distinguish amongst those who fight and those who do not and to limit their attacks to military targets. Interventions where the projected damage to people and civilian property exceeds what is anticipated military benefit are prohibited under the rule of proportionality (Mfuranzima, 2024) ^[40]. Lastly, the precautionary principle requires everyone involved to take practical measures to reduce unintentional injury to civilians and prevent needless suffering (Ahmad *et al.*, 2024) ^[2]. These three tenets are put to the test in several ways by the introduction of weapons systems that are autonomous (AWS). AWS could find it arduous to make sophisticated judgments in certain intricate battle situations since it functions with variable levels of human supervision (Muhammad Asif Safdar *et al.*, 2024) ^[43]. Environments where militants and residents are mixed together make differentiation very challenging and may result in erroneous targeting. Similar to this, AWS could not be dexterous to accurately determine proportionality because of their incapacity to adequately examine ethical, moral, and contextual factors. Finally, the unpredictable nature of AWS's behavior, especially when AI models go outside of their preprogrammed bounds, makes it difficult to put convenient safeguards in place (Ojha, 2025) ^[49].

Making sure that these advances in technology are capable of correctly differentiating between soldiers and civilians is among the largest obstacles to applying IHL to AWS. AWS relies on predetermined computations, imagery from sensors, and recognizing patterns to make different aiming choices, while people rely on intuitive thinking, real-time situational consciousness, and firsthand knowledge in the field (Saxon, 2024) ^[61]. In unpredictable circumstances like urban warfare, where fighters may not be in formation and residents could be involved in actions that might be interpreted to indicate assailant intent, these systems falter. Substantial peril are also presented by algorithmic bias and inaccuracies (Vignard, 2024) ^[66]. An AWS may detect threats inaccurately if it gets educated on biased or insufficient data, which might result in erroneous engagements and IHL breaches. This is demonstrated, for instance, by Israel's purported use of AI-powered military programs (operation names: "Lavender," "Where's Daddy," and "the Gospel" which analyze enormous volumes of data, including messages intercepted video footage, and other intelligence, in order to identify possible targets (de Vries, 2023) ^[18].

4.2 International Criminal Law (ICL)

The area of international law as a whole known as ICL was established to forbid certain types of behavior that are often regarded as serious tragedies and to keep those who participate in them legally accountable for what they do. Crimes against humanity, war crimes, genocide, and offences of Aggression is seen as the essential offenses under international law (Burgis-Kasthala & Sander, 2024) ^[13]. The responsibilities, rights, and exchanges between nations are subject to traditional international law. Following World War

II, the Nuremberg trial and the Charter of the UN International Military Arbitration Tribunal led to the creation of international criminal law the restrictions directly to individuals in this instance, the vanquished Nazi Germany's leaders were transforming international law (Ciampi *et al.*, 2024) ^[17]. In order to confront both the war offenses in the Yugoslav Civil War and the Rwandan genocide, international criminal law was resurrected in the 1990s after decades of dormancy. This resulted in the creation of a continuous International Criminal Court in 2001 (Chakrabarty & Banerjee, 2025) ^[15]. One part of worldwide law is international criminal law. Its origins are thus those that make up international law. Article 38(1) of the 1946 Constitution of the International Court of Tribunal provides a traditional list of such sources, which include treaties, basic legal principles, conventional international law, and rulings of the courts and the most eminent legal texts as a supplemental measure (Gaeta, 2023) ^[24]. The International Criminal Court's proceedings may draw on a similar, but distinct, range of references included in the Rome Statute that governs it. Depending on the kind of entity overseeing the case, different rules or principles will be implemented. Unlike international tribunals, national courts could not always follow international law norms and principles (Dinda Ermiza *et al.*, 2025) ^[20].

4.3 International Law Commission (ILC)

A group of specialists known as the ILC is tasked with the responsibility of contributing to the development and codification of international law is an every five years, the UNGA chooses 34 persons who are acknowledged for their competence and credentials in international law. These individuals are known for their contributions to the field of international law (Boyle & Chinkin, 2007) ^[12]. At the beginning of the 19th century, the Parliament of Viennese in Europe adopted a number of internationally recognized rules and principles in order to control the behavior of its members. These were the basis for ideology that eventually led to the establishment of the ILC (Voulgaris, 2022) ^[67]. After a number of initiatives were made in the early 20th century to create and rationalize international law, the ILC was established in 1947 by the UNGA in accordance with the Charter of the UN, which requires the Assembly to assist in the development and systematization of international law. A session of the Commission was convened for the first time in 1949 (Lubis, 2020) ^[37]. The early work of the Commission was driven by the Second World War and later worries concerning worldwide crimes such as acts of aggression and genocide.

Since then, the ILC has convened yearly meetings at the United Nations Office in Geneva to study and debate a variety of issues pertaining to international law, as well as to formulate fundamental principles of the international legal system (Report of the International Law Commission, 2024) ^[58]. The Vienna Conference on the Interpretation and Formation of Agreements, which creates the conditions for forming and deciphering treaties, and the International Criminal Court, the body which is the first permanent tribunal designated with the responsibility of deciding on offenses

such as massacre and crimes against humanity, are two of the foundational developments in international law that it is responsible for. Table 4. shows the comparison between IHL, ICL and ILC

Table 4: The comparison between IHL, ICL and ILC

Section	Focus / Definition	Key Principles or Features	Challenges / Relevance to AI
International Humanitarian Law (IHL)	Regulates conduct during armed conflicts to minimize suffering and protect civilians.	- <i>Distinction</i> : Between combatants and civilians. - <i>Proportionality</i> : Forbids attacks causing excessive civilian harm relative to military gain. - <i>Precaution</i> : Requires measures to minimize incidental civilian harm.	- Autonomous Weapon Systems (AWS) may fail to distinguish civilians/combatants. - Difficulty assessing proportionality due to lack of moral/contextual reasoning. - Algorithmic bias, sensor errors, and unpredictable AI behavior may breach IHL.
International Criminal Law (ICL)	Aims to punish and prevent serious international crimes: genocide, crimes against humanity, war crimes, and aggression.	- Developed post-WWII (Nuremberg). - Sources: treaties, customs, general principles, judicial decisions, and scholarly writings. - Enforced through tribunals (ICTY, ICTR) and the ICC (2001).	- Attribution of liability for AI-mediated harm remains complex. - Unclear whether developers, commanders, or states bear responsibility. - Difficulties in applying existing doctrines (<i>mens rea</i> , causation, control).
International Law Commission (ILC)	UN-mandated body (est. 1947) to codify and progressively develop international law.	- 34 members elected by the UNGA every five years. - Prepares draft articles, commentaries, and conventions. - Contributions include Vienna Convention (1969) and influence on the Rome Statute.	- Ensuring responsiveness of codification to emerging technologies (AI, cyber, robotics). - Balancing state sovereignty with universal accountability mechanisms. - Slow consensus-building vs. rapid tech evolution.

5. Case Analyses and Precedents

5.1 Prosecutor v. Jean-Pierre Bemba (ICC) command responsibility and causation

The Bemba case (Trial judgment 2016; Appeals Chamber 2018) was the ICC’s first extended engagement with Article 28 (command responsibility). At trial the Chamber convicted Bemba for crimes (murder, rape) committed by troops under his effective control in the Central African Republic; the Trial Chamber found he failed to take “necessary and reasonable measures” to prevent/punish. The Appeals Chamber reversed the conviction in 2018, holding that the Trial Chamber had not properly established a causation link between Bemba’s omissions and the crimes, and that it had applied an improper test for “measures” and causation. The result has powerfully affected how scholars and courts treat omission-based liability: Bemba underlines that (1) command responsibility requires both (a) effective control and (b) a sufficiently close causal connection between the superior’s omission and the commission/persistence of crimes; and (2) standards of proof and legal framing of “necessary and reasonable measures” matter enormously. For AI-mediated harm the Bemba aftermath is instructive: where harm flows from an autonomous system, prosecutors would need to demonstrate effective control and a chain of causation from commanders/operators/contractors’ omissions (e.g., defective training, inadequate testing, waiver of senior review) to unlawful effects. Bemba therefore narrows but does not close the path for superior liability in contexts where the causal chain involves complex socio-technical systems. Recent commentary frames Bemba as crystallizing uncertainty about “reason to know” and causation standards in modern command-responsibility doctrine (O’Sullivan, 2022; Fellmeth & Crawford, 2022) [47, 22].

5.2 Yamashita (WWII) superior/command responsibility as omission: The Yamashita judgment (application and U.S. Supreme Court review, 1946) established an early and still influential form of superior liability based on omission. General Tomoyuki Yamashita was held criminally responsible for atrocities committed by troops under his command in the Philippines even though the court did not find he directly ordered the crimes; the rationale was that he failed to take measures within his power to prevent or punish

the offenses. Yamashita is often read as imposing a strict standard: where atrocities are widespread and a commander has the material ability to take measures, criminal liability may follow from dereliction or wilful failure to act. Over time, modern doctrine (ICTY, ICC) has refined the *mens rea* and causation elements but Yamashita remains a touchstone for the idea that omissions by superiors can ground liability. In the context of AI-mediated harms, Yamashita’s logic translates into duties on commanders to control deployment, to ensure robust testing and lawful employment, and to halt systems that produce foreseeable unlawful effects. Critics (and later tribunals) emphasize due process and proportionality concerns in strict omission liability; defenders underline the doctrine’s deterrent value. For autonomous systems this raises hard questions: did the commander still have “material ability” to prevent harm (e.g., by refusing deployment, ordering human override, requiring V&V)? Yamashita thus supplies the doctrinal precedent for omission-based liability, but modern application must reconcile Yamashita’s strictness with contemporary causation, knowledge and technical plausibility constraints (Fellmeth & Crawford, 2022; O’Sullivan, 2022) [22, 47].

5.3 Tadić (ICTY) individual criminal responsibility, modes of liability, and complex operations

The ICTY’s Tadić decisions (Trial and Appeals, 1997-1999) were foundational for modern international criminal law. Tadić clarified (i) the tribunal’s jurisdictional approach to armed conflict typology; (ii) the elements of crimes against humanity and war crimes; and (iii) important modes of individual liability (including early treatments of joint criminal enterprise and co-perpetration). Importantly for liability in complex operations, Tadić established that individuals (not only states) could be held responsible for organized, multi-actor wrongdoing, and it articulated how participation, intent, and contribution must be traced through organizational structures. The case’s legacy matters for AI-mediated harm because many contemporary operations are networked: developers, manufacturers, operators, commanders, and policy-makers occupy different nodes in a distributed system. Tadić’s doctrinal tools (e.g., assessing contribution to a common plan, co-perpetration by control over an organised system) can be analogically deployed to

trace responsibility across socio-technical chains for example, where a design team knowingly builds a system with foreseeable unlawful targeting biases, or where a chain of command adopts doctrine that incentivizes risky autonomy. Nonetheless, Tadić predates the algorithmic era and courts will face evidentiary and mental-element challenges in proving individual mens rea where decision-making is distributed between humans and machines. Recent scholarship revisits Tadić's methods to ask how modes of participation should adapt to technologically mediated collective wrongdoing (Jackson, 2022; Weigend, 2023) ^[29, 68].

Conclusion

There are still serious worries about accountability and ethical consequences even if AI improves technical effectiveness in military warfare. Deployment of AI, guaranteeing conformity to global norms. Overcoming these challenges is important to ensure moral conduct in military operations, building trust among military people, and properly using AI's potential. Military organizations must make sure AI technologies are developed with ethical concerns depend on human supervision and cooperation. To promote trust and successful integration, people need to be trained and educated properly. The military may fully use AI while maintaining moral obligations in activities by taking care of ethical issues. Even if technology advances to a very high level, their programming is still far from being free because of AWS's connection will while making decisions. It is important, therefore, to see AI as instruments under the direct authority of people who create or lead them, and to hold them accountable for any illegal activity carried out of their use.

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