**Lethal autonomous weapons** (**LAWs**) are a type of autonomous military system that can independently search for and engage targets based on programmed constraints and descriptions. LAWs are also known as **lethal autonomous weapon systems** (LAWS), **autonomous weapon systems** (AWS), **robotic weapons** or **killer robots**. LAWs may operate in the air, on land, on water, underwater, or in space. The autonomy of current systems as of 2018 was restricted in the sense that a human gives the final command to attack—though there are exceptions with certain "defensive" systems.

 The official United States Department of Defense Policy on Autonomy in Weapon Systems, defines an Autonomous Weapons Systems as, "A weapon system that, once activated, can select and engage targets without further intervention by a human operator."[[](https://en.wikipedia.org/wiki/Lethal_autonomous_weapon#cite_note-2)

Automatic defensive systems[[edit](https://en.wikipedia.org/w/index.php?title=Lethal_autonomous_weapon&action=edit&section=2)]

1. The oldest automatically triggered lethal weapon is the [land mine](https://en.wikipedia.org/wiki/Land_mine), used since at least the 1600s,
2. [Naval mines](https://en.wikipedia.org/wiki/Naval_mine), used since at least the 1700s.
3. Some current examples of LAWs are automated "hardkill" [active protection systems](https://en.wikipedia.org/wiki/Active_protection_system)- [CIWS](https://en.wikipedia.org/wiki/CIWS) systems used to defend ships
4. Similar systems exist for tanks, such as the Russian [Arena](https://en.wikipedia.org/wiki/Arena_(countermeasure)), the Israeli [Trophy](https://en.wikipedia.org/wiki/Trophy_(countermeasure)), and the German [AMAP-ADS](https://en.wikipedia.org/wiki/AMAP-ADS).
5. Many [missile defence](https://en.wikipedia.org/wiki/Missile_defence) systems, such as [Iron Dome](https://en.wikipedia.org/wiki/Iron_Dome), also have autonomous targeting capabilities.

## Autonomous offensive systems

Systems with a higher degree of autonomy would include [drones](https://en.wikipedia.org/wiki/Unmanned_combat_aerial_vehicle) or [unmanned combat aerial vehicles](https://en.wikipedia.org/wiki/Unmanned_combat_aerial_vehicle), e.g.: "The unarmed [BAE Systems Taranis](https://en.wikipedia.org/wiki/BAE_Systems_Taranis) jet-propelled combat drone prototype may lead to a [Future Combat Air System](https://en.wikipedia.org/wiki/Future_Combat_Air_System) that can autonomously search, identify, and locate enemies but can only engage with a target when authorized by mission command. It can also defend itself against enemy aircraft"

## Ethical and legal issues

### 1.Standard used in US policy**[**[**edit**](https://en.wikipedia.org/w/index.php?title=Lethal_autonomous_weapon&action=edit&section=5)**]**

Current US policy states: "Autonomous … weapons systems shall be designed to allow commanders and operators to exercise appropriate levels of human judgment over the use of force."[[](https://en.wikipedia.org/wiki/Lethal_autonomous_weapon#cite_note-26)

Deputy Defense Secretary [Robert O. Work](https://en.wikipedia.org/wiki/Robert_O._Work) said in 2016 that the Defense Department would "not delegate lethal authority to a machine to make a decision", but might need to reconsider this since "authoritarian regimes" may do so.

2. Fear of Violation of International Laws

There is concern by some economists[[35]](https://en.wikipedia.org/wiki/Lethal_autonomous_weapon#cite_note-35) and legal scholars about whether LAWs would violate [International Humanitarian Law](https://en.wikipedia.org/wiki/International_Humanitarian_Law), especially the principle of distinction, which requires the ability to discriminate combatants from non-combatants, and the [principle of proportionality](https://en.wikipedia.org/wiki/Principle_of_proportionality), which requires that damage to civilians be proportional to the military aim.[[36]](https://en.wikipedia.org/wiki/Lethal_autonomous_weapon#cite_note-36) This concern is often invoked as a reason to ban "killer robots" altogether - but it is doubtful that this concern can be an argument against LAWs that do not violate International Humanitarian Law.

PROS AND CONS OF LAW SYSTEMS   
  
  
PROS  
1. Force multiplier

2. Saves soldiers from being put into high stress situations

3. Might save civilian lives due to lack of self preservation and no chances of ‘Shoot first, questions later’ situations.

4. Cheaper than a highly trained, well equipped soldier

5. Can have branching developmental innovations in other AI and robotic industries.

6. No feelings of revenge in AI

CONS

1. Defensive LAWs can allow a country to missile bomb a country without fear of nuclear retaliation.
2. High risk of collateral damage due to target identification being extremely difficult between combatants and non combatants even for humans.
3. Unclear responsibility as the AI could be blamed for death of civilians even if there was human intention to do so.
4. Delegation of life death situations to non human objects
5. Lower the threshold of going to war as soldiers are removed from the battlefield and the public is distanced from experiencing war

### Campaigns to ban LAWs

The group [Campaign to Stop Killer Robots](https://en.wikipedia.org/wiki/Campaign_to_Stop_Killer_Robots) formed in 2013. In July 2015, over 1,000 experts in artificial intelligence signed a letter warning of the threat of an [artificial intelligence arms race](https://en.wikipedia.org/wiki/Artificial_intelligence_arms_race) and calling for a ban on [autonomous](https://en.wikipedia.org/wiki/Autonomous) weapons. The letter was presented in [Buenos Aires](https://en.wikipedia.org/wiki/Buenos_Aires) at the 24th [International Joint Conference on Artificial Intelligence](https://en.wikipedia.org/wiki/International_Joint_Conference_on_Artificial_Intelligence) (IJCAI-15) and was co-signed by [Stephen Hawking](https://en.wikipedia.org/wiki/Stephen_Hawking), [Elon Musk](https://en.wikipedia.org/wiki/Elon_Musk), [Steve Wozniak](https://en.wikipedia.org/wiki/Steve_Wozniak), [Noam Chomsky](https://en.wikipedia.org/wiki/Noam_Chomsky), [Skype](https://en.wikipedia.org/wiki/Skype) co-founder [Jaan Tallinn](https://en.wikipedia.org/wiki/Jaan_Tallinn" \o "Jaan Tallinn) and [Google DeepMind](https://en.wikipedia.org/wiki/Google_DeepMind) co-founder [Demis Hassabis](https://en.wikipedia.org/wiki/Demis_Hassabis), among others.

As of 29 March 2019, the majority of governments represented at a UN meeting to discuss the matter favoured a ban on LAWs.[51] A minority of governments, including those of Australia, Israel, Russia, the UK, and the US, opposed a ban.[51] The United States has stated that autonomous weapons have helped prevent the killing of civilians.