# Law, Ethics, & Autonomous Weapons Systems

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# Agenda

I. The Frame: Just War Theory & International Humanitarian Law

II. The United Nations and the Convention on Conventional Weapons & "Killer Robots"

III. US Policy & Current Weapons Systems IV. "Autonomous" Weapons or AI?

V. What to Expect: Today, Near-Term and Long-Term Considerations



# Just War Theory

- Just War Theory
  - Jus ad Bellum The just resort to force
    - Just Cause, Last Resort, Likelihood of Success, Proportionality, Proper Authority
  - Jus in Bello The just use of force
    - Noncombatant immunity; Proportionality; Necessity



#### International Humanitarian Law

- International Humanitarian Law (IHL):
- Body of customary and treaty laws governing the use of force during hostilities, including international and noninternational armed conflicts.





### The Frame of the Debate

"Killer Robots" are:



- Unable to uphold the principle of distinction
- Unable to uphold the principle of proportionality
- Unable to accord with the Martens Clause
- Likely to increase the probability of war or escalation



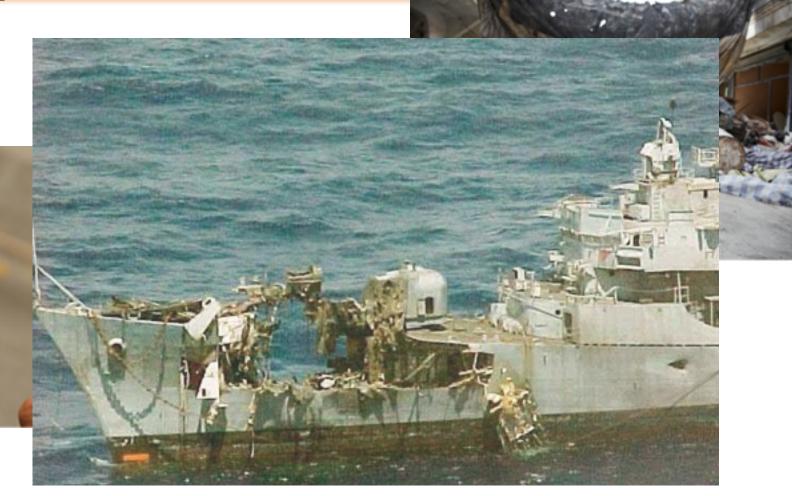
# Current Happenings at The United Nations

#### The UN & The CCW:





# **Targeting Difficulties**





# Department of Defense Policy

**US DoD Directive 3000.09** (2012): Establish DoD policy and guidelines regarding autonomous and semi-autonomous weapons systems. 5 year policy window, in 2017 must be reissued, cancelled or certified.

- "[weapons must be] designed to allow appropriate levels of human judgment over the use of force"
- "autonomous systems" may not select human targets, but may engage nonkinetically, or against materiel, or in time sensitive attacks
- "semi-autonomous weapons" are permitted to apply lethal and kinetic force.



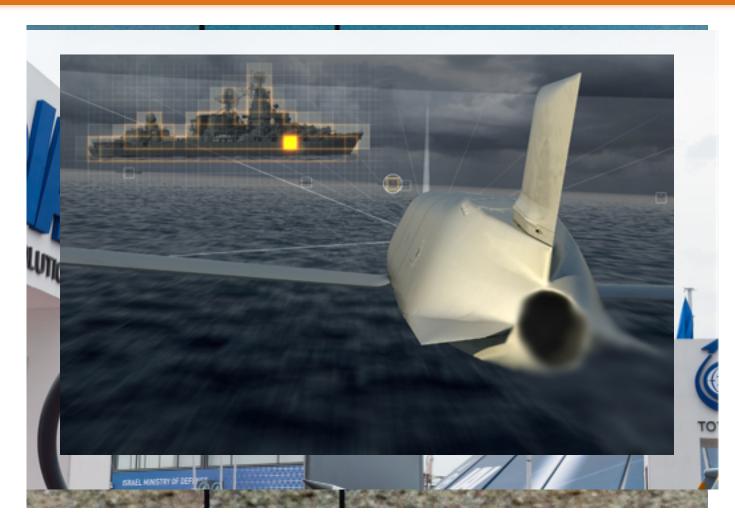
# Department of Defense Policy

#### Problems:

- Definitions of "autonomous vs. semi-autonomous"
- Command Responsibility
- Not a "ban" on autonomous human targeting, easily overridden, built in plausible deniability



# The Gateway Drugs





# Autonomous Weapons or AI?



## OR

