When Weapons are Speech
The State-of-the-Art and Constitutional Issues in Printed Arms

Robert Liu ’20, presenting June 16th, 2020 for INTERFACE.
Agenda

What you’ll get out of listening to me

• What’s currently possible with *craft manufacturing* of firearms?
• What political and Constitutional issues are contested?
• Who benefits from this new technology?
• How might this technology be wielded and controlled?
Themes

• Craft firearm production
• Home manufacturing
• Dual-use technologies
• Centralization/decentralization
• Sovereignty
An Emerging Technology

Video: Deterrence Dispensed music video
Frontier
What’s possible?

• FGC-9 “F*** Gun Control”
• Plastic parts are printed using a $200 3D printer
• Metal parts can be purchased from any hardware store
• Exception: AR fire control group ($40)
• Video: FGC-9 release trailer
Frontier
What’s possible?

- 80% lower: machine your own AR
- Full parts kit for $600
- ATF: “An individual may generally make a firearm for personal use.”
- Video: AR-15 full-auto conversion
- Video: Printed AR receiver push-up test
Manufacturing Innovations

• Additive manufacturing: plastic and metal
• Subtractive manufacturing: desktop CNC
• Home electrochemical machining
• Craft-produced suppressors
• 3D-printed tooling
• Home ammunition making (with Europe-available ingredients)
Is gun control dead?

Video: Project BWA
Cui bono?

Video: Anti-Gas Kettle
Cui bono?

"Good" uses

Decentralization

Centralization

"Bad" uses

COME AND TAKE IT

UNITED STATES MARINE CORPS
protect your rights
by any means necessary
Citations

• “FGC9 File Drop”, CTRL+Pew.

• “Questions and Answers”, ATF.

• “The Internet Won’t Kill Gun Control By Itself,” Sonya Mann, Palladium Magazine, 4 March 2019.


• “If you're a person in harm's way and need access to hard power (for protection of self or property), regardless of who your aggressor is - the state, the feds, violent instigators who couldn't give a damn less about George Floyd - here's the thread for you: how to make an AR15.” Ivan T., Twitter thread.