

Airsoft Guns for Force-on-Force Training

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Overview



- Force-on-Force concepts
- What's wrong with live fire training?
- Airsoft Guns
- Other Equipment
- Bridging the gap
- Safety issues
- Final thoughts

Force-on-Force concepts



• Live fire training uses actual weapons against simulated opponents.



Live Fire Training



Advantages:

- Practice gun handling with real guns, carry gear
- Practice shooting with actual noise/recoil/ballistics
- Practice safe gun handling

Live Fire Training



Disadvantages:

- Requires a shooting range
- Requires hearing protection
- Limits angles of fire
- Limits realism in target movement
- Accidents result in serious injury or death
- All problems "solved" by gunfire

Force-on-Force concepts



• Force on Force training uses simulated weapons against real opponents.



Force-on-Force Training



Advantages:

- Can be conducted using real buildings, cars, etc.
- Communication is critical component
- Unlimited angles of fire
- Can include lower force options (OC, unarmed)
- Wide variety of simulated weapons available
- Variable speed/intensity levels

Force-on-Force Training



Disadvantages:

- Can deteriorate into "paintball game"
- Requires skilled role players and observers
- Requires vigilance to exclude real weapons
- "Pain penalty" fatigue
- Cost of training equipment



• In the real world:

- Best outcome is that no shots are fired
- Communication is critical skill
- Decision to take action based on opponent's actions
- Opponents think, talk, move and fight
- Action occurs in three-dimensional, 360 deg space
- Integrated unarmed and weapon skills needed
- Unpredictable target reaction to hits
- Situation is not over when fight stops



- On the live fire range:
 - Every drill requires that shots are fired
 - Marksmanship is critical skill
 - Decision to take action based on range commands
 - Opponents often stationary
 - Action occurs in two-dimensional, 180 deg space
 - Firearm is only "solution" to problem
 - "Shoot two on paper" is standard rule
 - Situation ends when last shot fired



- Beyond "punching paper":
 - Clothes on targets
 - Mechanical target activators
 - Reactive targets (steel)
 - Simulated return fire (blanks, remote paintball guns)
 - Video systems (FATS, etc.)
 - Instructor/range officer produces "voice" of opponent to include communication skills



- "If they took away all our guns and told us we had to use silent, non-lethal laser guns, it just wouldn't be the same. The noise and recoil are an essential part of why we shoot."
 - Ted Bonnet, IPSC GM and IDPA Master





View movie "backingup2 here



Problems:

- opponent can advance faster than shooter can retreat
- impossible to see obstacles to rear
- shooter is still on opponent's line of attack
- harder to get hits while making "shuffle step"



View movie "flanking" here



Alternative solution:

- get "off line"
- flanking movement while firing
- natural movement
- move to safe space you can see



Once the basics of shooting and gun handling have been learned, the disadvantages of live fire outweigh the advantages.

Force on force training is a more effective way to integrate shooting skills with other skills that can't be safely and effectively practiced in a live-fire environment.



- Detailed replicas of real firearm designs
- Spring, gas, and electric models
- Fire 6mm plastic BBs and paintballs



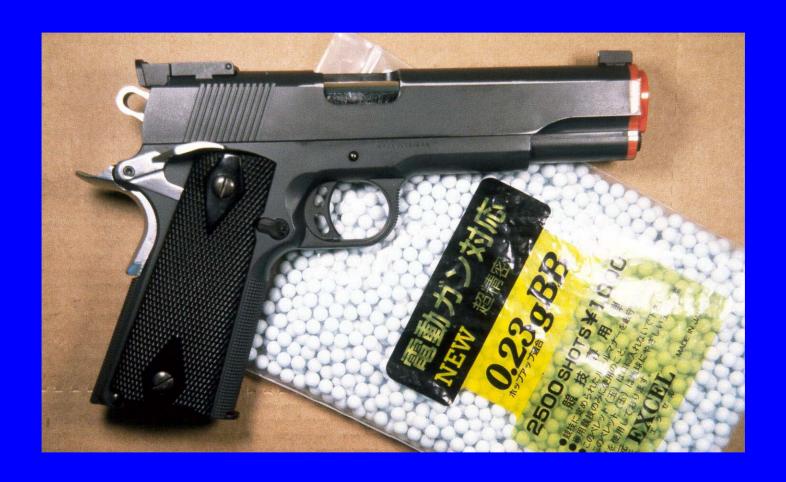
Two of these are Airsoft guns. One is real. Can you spot the real Glock?



• Airsoft guns:

- Developed in countries with total gun bans
- Limited number of U.S. importers
- Primary market is paintball players
- Rifle, pistol, revolver, and shotgun models
- Full auto versions legal
- Muzzle must be marked with orange for import
- Can be purchased via mail, Internet







- Gas Blowback Pistols:
 - Powered by compressed gas
 - Gas stored in magazines
 - Requires silicon lubricant
 - "Green gas" has lube in gas
 - "Duster gas" can be used





Gas Blowback Pistols:

- Slide cycles with each shot
- Slide locks open when magazine empty
- Capacity equal to firearm
- 2-3" accuracy at 7 yards
- 250-300 fps typical velocity





- Replicas available:
 - 1911, STI, SV, Para
 - Glock (17,18,19,26,34,...)
 - HK USP
 - Beretta M9
 - SIG
 - Desert Eagle
 - Colt Peacemaker
 - S&W Revolver
 - S&W Semi autos
 - And others





- Typical cost: \$75-250
- Manufacturers include:
 - KSC, KWC, KJW, Western Arms
- Multiple sources for many models
- Some models include parts from US gun makers
 - KSC / STI
 - Western Arms / SV
 - KWC / Taurus







Airsoft advantages:

- students can order their own replicas
- can be shot in garages, backyards, etc.
- better than dry fire for shooting practice
- excellent for training beginning shooters
- lower velocity reduces "pain penalty"
- safety equipment commercially available
- low cost

Other Equipment



- Simulated weapons
 - Padded impact weapons
 - Dulled/soft edged weapons
 - Inert aerosol weapons (OC)
 - Non-firing firearm replicas
 - Paintball and BB guns
 - Marking ammo in real guns







Other Equipment



	AIRSOFT	SIMUNITION
GUN COST	\$75-200	\$150-400 (kit)
AMMO COST	\$20/2500	\$20/50
VELOCITY	250-300 fps	400 fps
VENDORS	Many	One
MODELS	Many	Limited
RESTRICTIONS	Buyer must be over 18.	Kits and ammo can only be purchased by certified instructor. Instructor certification costs \$500+. \$1M liability insurance required. Company policies restrict use to LEO/MIL only.



Inexpensive, unrestricted Airsoft technology now makes it possible for anyone to do force on force training to practice self defense skills.

Low impact projectiles allow frequent practice against live opponents at realistic distances.



View movie 'robbery' here





















Equipment



- Mandatory Safety Equipment
 - Closed goggle system
 - Face and neck protection
 - First aid kit (ice, bandages)

- Optional Safety Equipment
 - Chest protection
 - Groin protection
 - Gloves
 - Soft knee and elbow pads







Q: What about "unloaded" real guns?

A: The cost for simulated guns that cannot fire live ammunition is small compared to the fiscal and emotional costs associated with a serious training accident.

If you are not willing to spend the money to use safe firearm substitutes in FoF training....



Don't do force-on-force training at all.

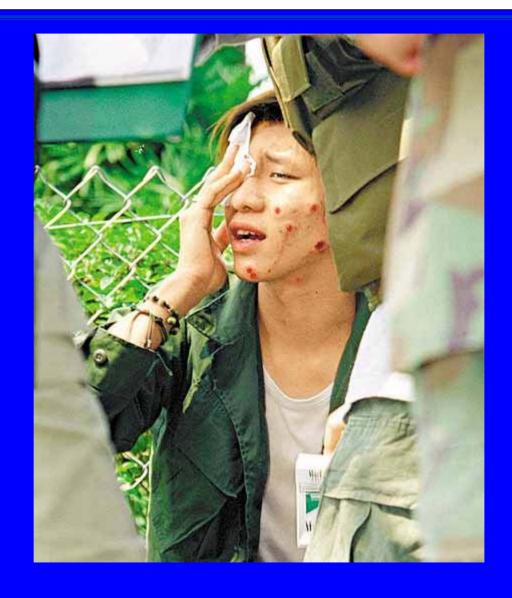
The #1 cause of force-on-force training accidents is the presence of live ammunition and real guns in the training environment.



SAFETY CONCERNS

- Eye protection is not enough!
- Full face protection is essential.
- Groin and throat protection is recommended.
- 300 fps is maximum safe limit
- Electric Airsoft rifles can shoot over 500 fps
- Take care of your training partners!





Final Thoughts



Force-on-force is to shooting what sparring is to martial arts.

You cannot learn to fight without facing live opponents who think, move, and try to hit you.

"It's more important to not get shot than it is to get to shoot." – Greg Hamilton, InSights Training

Final Thoughts



- "It's your worst training days, not your best, that determine how you'll perform in real situations."
 - Austin PD SWAT commander Paul Ford



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