



Violence Policy Center

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**Comments of The
Violence Policy Center
To The
Federal Aviation Administration
On
The Use of Firearms on Commercial Air Flights
Docket No. FAA-2001-111229
February 14, 2002
(Submitted via internet and mail)**

Introduction

The Violence Policy Center (VPC) is a non-profit organization dedicated to reducing firearm-related death and injury. The VPC has conducted extensive research and issued numerous studies regarding the use of handguns and other firearms for self-defense including *Unintended Consequences: Pro-Handgun Experts Prove that Handguns are a Dangerous Choice for Self-Defense*, issued in November 2001.

The VPC will limit its comments to two questions raised in the request for comments:

- whether pilots should carry firearms; and
- the amount and type of weapons training that should be required.

Arming Pilots is Ill-Advised and Counterproductive

The Violence Policy Center strongly cautions against arming pilots with firearms. Experience teaches that firearms, and particularly handguns, make poor self-defense tools. Moreover, asking or requiring a pilot to perform the duties of a law enforcement officer in addition to his pilot duties is unsound policy.

Firearms are seldom used successfully in self-defense. In 2000, handguns were lawfully used by private citizens to kill in self-defense only 122 times.¹

The experience of even highly trained police officers is even more instructive. Police officers—whose *only* job is law enforcement—often have their service weapons, or their partner’s guns, turned against them by suspects. One study found that 21 percent of officers killed with a handgun were shot with their own service weapon.²

Experience also shows that law enforcement professionals sometimes make grave mistakes in determining when the use of deadly force is justified. It is highly unlikely that pilots will fare any better, especially when they will have the additional pressure of flying the plane while fending off an attack.

Moreover, successfully hitting an intended target is extremely difficult. Experts in firearm self-defense point out that “bullet *placement* is the key to stopping a felonious assault.”³ In order for a handgun to be an effective self-defense weapon, the shooter must be able to hit a small, moving target, quite possibly while he is also moving, seeking cover. “Police weapons training should always include movement; learn to shoot while moving. Whenever possible, you should practice with a moving target and a moving shooter.”⁴

The actual experience of seasoned police officers illustrates how extraordinarily difficult this real-life shooting challenge can be. Former NYPD officer Jim Cirillo, for example, reports that “in many confrontations, I was only offered head shots—the gunmen who did not give up when challenged generally ducked for cover, leaving only their heads or a portion of their heads for a target.”⁵ The

¹ “Crime in the United States 2000,” *Uniform Crime Report* (Washington D.C.: U.S. Government Printing Office, 2001) 14.

² Garen Wintemute, “Homicide, Handguns, and the Crime Gun Hypothesis: Firearms Used in Fatal Shootings of Law Enforcement Officers, 1980 to 1989,” *American Journal of Public Health*, 84 (April 1994): 561- 564.

³ Bill Clede, *The Practical Pistol Manual: How to Use a Handgun for Self Defense* (Ottawa, Ill.: Jameson Books, Inc., 1997), xv (emphasis in original).

⁴ Dick Fairburn, “Training Issues Gained from the PMA/Fairburn Stopping Power Survey,” *Police Marksman*, November/December 1993, 17.

⁵ Jim Cirillo, *Guns, Bullets, and Gunfights: Lessons and Tales from a Modern-Day Gunfighter* (Boulder, Colo.: Paladin Press, 1996), 13; see also, Chris Bird, *The Concealed Handgun Manual: How to Choose, Carry, and Shoot a Gun in Self Defense* (San Antonio: Privateer Publications, 1998), 138.

difficulty of hitting such a target is underscored by shooting expert and author Massad Ayoob, who writes that "the head is a small, bobbing target, difficult to hit even on stationary silhouette targets. Facing a living human being, it becomes close to impossible."⁶

Several experts discuss problems *beyond the fact that the target is small and likely moving* that make head shots "totally unpredictable."⁷ For one thing, it is not unusual for bullets to glance off of the hard human skull. So, as firearms expert Duane Thomas describes, accuracy becomes even more important and even more difficult:

In order to make a "head shot" work, you'd have to slip a bullet through the eye sockets or the nasal septum. On a full-grown man, this is a target area approximately two inches high by four inches wide. In the real world, under stress, in bad lighting, with both you and your opponent moving (all of which are possible, if not probable), making that sort of shot is going to be very difficult. It will require a higher degree of shooting skill than most people possess. It's not that shots like this can't be made, it's just that most people can't shoot well enough under stress to count on the head shot as a reliable stopper.⁸

But, even if the assailant does not present such a limited target: "The only part of the body certain to produce an instant stop is the central nervous system," advises another expert. "Hitting such a moving target with a handgun, under extreme stress, is not easy."⁹

These problems will only be exacerbated by the fact that pilots will have to maneuver within the very small space of the cockpit or cabin. Cramped quarters will enhance the likelihood that a stray bullet will strike an innocent passenger, flight crew member, or some component of the aircraft. Moreover, hijackers will

⁶ Massad F. Ayoob, *The Semiautomatic Pistol in Police Service and Self-Defense* (Massad F. and Dorothy A. Ayoob, Publishers, 1987), 23.

⁷ Jim Cirillo, *Guns, Bullets, and Gunfights: Lessons and Tales from a Modern-Day Gunfighter* (Boulder, Colo.: Paladin Press, 1996), 114.

⁸ Duane Thomas, *The Truth About Handguns: Exploding the Myths, Hype, and Misinformation* (Boulder, Colo.: Paladin Press, 1997), 38.

⁹ Dick Fairburn, "Training Issues Gained from the PMA/Fairburn Stopping Power Survey," *Police Marksman*, November/December 1993, 15.

board the aircraft with the knowledge that the pilot is armed, increasing the chance that the hijacker will be determined to smuggle his own firearm on board. Recognizing that he is likely to face an armed pilot will also give hijackers an incentive to do everything possible to take away the pilot's gun.

Beyond the extreme difficulties of maintaining control of the firearm and hitting an intended target is the serious threat of unintentional discharge of the weapon. Many firearms, including popular handgun models used by law enforcement agencies, can fire when dropped or bumped. Again, the danger of such "drop" or "bump" fires can only be magnified in an airplane cabin's close quarters: a bullet damaging key flight controls, injuring a fellow pilot, or potentially piercing the hull of the jetliner.

In short, the chance that a pilot will be able to successfully deploy a firearm to kill or subdue a hijacker are extremely small when compared with the likelihood that the gun will be taken away by a hijacker, that a bullet fired by the pilot will miss its target, or that the firearm will discharge unintentionally. The VPC further urges the agency to consider the liability implications of even one such mishap.

Training May Not Adequately Prepare a Pilot to Always Act Appropriately

Firearms training can only prepare a pilot for shooting under controlled circumstances. Experts on the use of handguns for self-defense cite a number of real-life factors for which range shooting does not prepare one:

- ! ***The Physical Environment.*** One obvious difference is that shooting ranges optimize lighting and view. A pilot, however, will have only limited control over the environmental conditions under which he may perceive the need to use his gun. The experience of police officers in real shootouts shows that "light conditions are often too poor to allow using the sights. Officers normally practice and qualify on well-lit ranges that allow full use of sights. Conditions on the street are rarely as favorable as range conditions."¹⁰ Poor lighting and confusing situations on an aircraft will increase the risk of an error in judgment that could result in harm to an innocent person, or harm to the pilot himself because he cannot use his firearm effectively. The range of potential environmental differences from a shooting range is enormous. For example, an aircraft flying at night; encountering severe turbulence; or flying in hazardous weather conditions.

¹⁰ Tony Lesce, "Instinctive Shooting," *Police Marksman*, January/February 1994, 12.

- ! **Physiological Stress.** Mortal fear does not accompany shooting at paper targets. But in a life or death situation “your heart thuds in your chest and your breathing accelerates and you have to react rapidly.”¹¹ This fear seriously affects one’s shooting ability. “The real world of combat means a highly stressful event in which a very small percentage of bullets fired even strike the target.”¹² Even well-trained police officers who are taught to expect such stress reactions miss their targets many more times than they hit them.

- ! **Assailant Movements.** While a pilot may learn to successfully score in the “kill zone” on stationary paper targets, replicating that accuracy in a real-world situation will be much more difficult. As many police officers have learned, assailants don’t stand still waiting to be shot. “What a revelation. I was never so terrified in my whole life. They never told me in the academy that the targets were going to jump and move all over the place. There wasn’t one 3' by 2' target to shoot at like on the police range.”¹³ Such a scenario played out on a full flight could result in unmitigated disaster if the hijacker(s) attempted to move and hide among passengers and crew or use them as shields.

- ! **Unexpected Assailant Reaction.** A hijacker who is actually shot is unlikely to simply fall down and stay down. As police have learned, assailants often don’t fall down, or they get back up and keep coming. This is true especially if the assailant is on alcohol or drugs. According to one expert, “We can presume that in half of the police-involved shootings, the felon will not lay down and be cooperative instantly. In fact, many shooting reports included information to suggest that the felon showed no indication that he had been hit....Hitting such a moving target with a handgun, under extreme stress, is not easy.”¹⁴

¹¹ Bill Clede, *The Practical Pistol Manual: How to Use a Handgun for Self Defense* (Ottawa, Ill.: Jameson Books, Inc., 1997), 33.

¹² George T. Williams and Daniel C. Friend, “Common Tactical Myths, Or Separating the Mythical Chaff From the Tactical Wheat!,” *Police Marksman*, September/October 1991, 18.

¹³ Jim Cirillo, *Guns, Bullets, and Gunfights: Lessons and Tales from a Modern-Day Gunfighter* (Boulder, Colo: Paladin Press, 1996), 73.

¹⁴ Dick Fairburn, “Training Issues Gained from the PMA/Fairburn Stopping Power Survey,” *Police Marksman*, November/December 1993, 15.

- ! ***Ambiguous Situations.*** There is no doubt about whether to shoot the targets at a shooting range—they are the surrogate hijacker or bomber. But many real-life situations are ambiguous: is the “hijacker” really a threat? Is the threat deadly enough to justify the use of lethal force? From his own experience, seasoned New York City police officer and author Jim Cirillo notes: “Many times, situations looked like armed robberies but turned out to be innocent. At such times, a man with no compassion might shoot when he shouldn’t, or he might not consider bystanders during his moment of danger.”¹⁵

- ! ***Disarmament Moves.*** Pilots would also have to be well-trained to be prepared when the assailant attempts to disarm him or the hijacker brandishes his own weapon. Being suddenly disarmed or outgunned is a threat in the real world. “There are many instances where the suspect has drawn a weapon and killed an officer after the officer pointed his weapon and issued the proper challenge. The suspect just plain beat the officer....The Aryan Brotherhood prison gang, along with the Hell’s Angels outlaw motorcycle gang, have developed a technique to disarm an officer from a distance of 21 feet. It works in conjunction with an officer’s natural lag time.”¹⁶

It is simply unrealistic to expect that pilots would be able to spend the enormous amount of time necessary to adequately train with a firearm in addition to the time pilots must spend maintaining and improving their flight skills. In the judgment of the Violence Policy Center, the job of protecting passengers and crew—including pilots—from threats of terrorism should be left to security experts and personnel trained solely and exclusively as law enforcement agents. Therefore, the VPC strongly opposes the implementation of any policy that would allow for pilots armed with firearms on commercial aircraft.

Respectfully submitted,

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¹⁵ Jim Cirillo, *Guns, Bullets, and Gunfights: Lessons and Tales from a Modern-Day Gunfighter* (Boulder, Colo.: Paladin Press, 1996), 59.

¹⁶ George T. Williams, “The Proper Weapon Hold on a Suspect,” *Police Marksman*, November/December 1993, 44.