

Department of Legislative Services
Maryland General Assembly
2006 Session

FISCAL AND POLICY NOTE

House Bill 12
Judiciary

(Delegate Smigiel)

**Repeal of Procedure on Shell Casing Information - Timing of Report on
Personalized Handgun Technology**

This bill repeals the requirement for: (1) handgun manufacturers to provide to handgun dealers shell casings of projectiles discharged from handguns and other specified additional information; (2) handgun dealers to forward shell casings and other specified information to the Department of State Police (DSP) Crime Laboratory; and (3) DSP to enter specified information in a relevant database. The bill also requires the Handgun Roster Board to report on the status of personalized handgun technology once every three years rather than annually.

Fiscal Summary

State Effect: None. All costs for the State Police associated with the existing shell casing requirement have already been eliminated. Computer equipment used for shell casing database entries would be maintained with existing budgeted resources, and used for crime scene ballistics data collections. Requiring the Handgun Roster Board report on personalized handgun technology every three years, rather than annually, would eliminate some minimal annual operational responsibilities.

Local Effect: None.

Small Business Effect: Potential meaningful. The provisions of this bill would likely spur additional handgun sales in the State. The actual magnitude of such a retail impact on handgun dealers is unknown, but is assumed to be potentially significant to the State's 250 licensed gun dealers, who are generally believed to be small businesses.

Analysis

Current Law: Any manufacturer that ships or transports a handgun to be sold, rented, or transferred in the State is required to include in the box with the handgun in a separate sealed container: (1) a shell casing of a projectile discharged from that handgun; and (2) additional information that identifies the type of handgun and shell casing as required by the Secretary of State Police.

Upon receipt of a handgun from the manufacturer, the dealer must confirm to DSP that the manufacturer complied with these requirements. Upon the sale or transfer of the handgun, the dealer is required to forward the sealed container to the State Police Crime Laboratory. Upon receipt of the shell casing and required information, the State Police Crime Laboratory must enter the information in all pertinent databases.

Any person who knowingly violates these provisions is guilty of a misdemeanor and subject to maximum penalties of imprisonment for five years and/or a fine of \$10,000. Each violation must be considered a separate offense.

“Handgun” means any firearm with a barrel less than 16 inches in length including signal, starter, and blank pistols.

The Handgun Roster Board is an entity within the Department of State Police. The board is required to review the status of personalized handgun technology and report its findings to the Governor and the General Assembly on an annual basis, beginning by July 1, 2002.

A personalized handgun is a handgun manufactured with incorporated design technology that allows the handgun to be fired only by the authorized user and prevents any of the safety characteristics of the handgun from being readily deactivated.

These provisions were contained in Chapter 2 of 2000, the Responsible Gun Safety Act of 2000.

Background: Shell casing information, using digital imaging software and handgun owner information, is entered into the Maryland Integrated Ballistic Identification System (MD-IBIS). Bullets are not entered into MD-IBIS. MD-IBIS constitutes the State’s ballistic fingerprint database.

When evidence shell casings are recovered from crime scenes, the identifying marks found on that evidence are correlated or searched against the MD-IBIS database. When potential matches are identified by the ballistics imaging system and a firearms examiner

positively identifies the match, DSP is led to the original owner of the handgun, providing a potential investigative lead. MD-IBIS also serves as a screening tool to eliminate certain evidence and potential leads.

Since the early 1990s, the federal government has been operating computer systems able to process both bullets and shell casings, also referred to as the Integrated Ballistics Identification System (IBIS), and originally known as the National Integrated Ballistics Information Network (NIBIN). This information is based on ballistic evidence obtained at crime scenes and does not include shell casings from newly manufactured guns, as is the case in Maryland. It is believed that more than 36 states and territories (including Maryland) have installed federal IBIS-NIBIN.

Initially, DSP anticipated that 30,000 cartridge casings would be received annually for input into the IBIS system. As such, the system was designed to hold around 300,000 casings over a 10-year period. The system has thus far received around 35,000 cartridge casings for input, including around 2,000 from trooper-issued semi-automatic 40-caliber Beretta firearms. There have been 160 requests to match crime-scene casings with the IBIS system, resulting in four “hits” or matches.

A September 2003 report on MD-IBIS by DSP’s Forensic Sciences Division acknowledged several “major problems” with the system: (1) some cartridge casings submitted by Glock Company may have been unreliable; (2) the remote station did not work properly thus preventing connection with outside agencies; (3) a memorandum of understanding between the Bureau of Alcohol, Tobacco, Firearms, and Explosives and State and local law enforcement agencies prohibits the linking of NIBIN to any State or local system, such as IBIS; and (4) guns being submitted by manufacturers are not generally the types of guns usually linked to crime scenes. In addition, a California study of ballistic fingerprinting operations in both New York and Maryland was critical of such state operations for several technical and operational reasons, including a concern that markings on cartridge casings may be changed or altered by a gun user.

In 2003, DSP recommended that MD-IBIS continue in operation, despite these concerns. The Forensic Sciences Division believed then that improving technology would enhance MD-IBIS’ ability to achieve hits and that this database, similar to the State’s DNA database needs time to develop to “bear fruit.” DSP noted in the 2003 report that the DNA database was initiated in 1994 and did not obtain its first hit until 1998.

However, the September 2004 progress report on MD-IBIS by the Forensic Sciences Division found that the personal imaging biases of the laboratory technician who enters the sample data into MD-IBIS and the biases of the examiner who attempts to match the shell casing from the crime scene against the MD-IBIS database are apt to lead to a low

probability of a match. In addition, the 2004 report found that the procedure for the submission of a test-fired cartridge case lacked safeguards to assure quality assurance and, thus, rendered the integrity of the database suspect.

The 2004 report concluded that: “The MD-IBIS Program, for all its good intentions, has not proven to be a time saving tool for the firearms examiner or an investigative enhancement to the criminal investigator.” Unlike the conclusion from the 2003 report, in fiscal 2005, DSP recommended that the program be suspended and laboratory technicians associated with the program transferred to the DNA database unit.

Until fiscal 2005: (1) two laboratory technicians were assigned to enter the “fingerprint” of each shell casing into the computer database and make comparisons from the database against any shell casing recovered as evidence from a crime scene; and (2) the computer equipment was serviced under a maintenance contract costing about \$162,000 per year. The fiscal 2005 and 2006 budgets did not provide funds to continue the maintenance contract. Currently maintenance costs are handled by shifting funds from within the agency.

Even though this bill would eliminate requirements relating to shell casing data collections on new handgun sales, crime scene ballistics data collections would continue. It is assumed that MD-IBIS equipment, including the computer equipment used for other MD-IBIS database entries, would continue to be used by the department and would not be sold. The computer equipment would continue to be serviced or maintained internally.

With respect to personalized handgun technology, the board has concluded that while extensive research has been conducted in the area of personalized weapons, currently there are no models of personalized handguns available for sale. Based on its research, the technology to produce personalized weapons is some unknown away. The board continues to evaluate the status of this technology and reports its findings each year to the Governor and the General Assembly.

Additional Information

Prior Introductions: HB 179 of 2005, an identical bill, had a hearing before the House Judiciary Committee and had no further action taken on it. HB 251 and SB 662 of 2004 were withdrawn. HB 579 of 2003 had a hearing before the House Judiciary Committee and had no further action taken on it.

Cross File: None.

Information Source(s): Department of State Police, Department of Public Safety and Correctional Services, Department of Legislative Services

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