

Comment by Megan Taylor

in support of exemption for the following classes of works:

1. Computer programs embedded in computer printers and toner cartridges and that control the interoperation and functions of the printer and toner cartridge
2. Computer programs embedded in a machine or product and which cannot be copied during the ordinary operation or use of the machine or product
3. Computer programs embedded in a machine or product and that control the operation of a machine or product connected thereto, but that do not otherwise control the performance, display or reproduction of copyrighted works that have an independent economic significance

An exemption to the DMCA for printer cartridges and similar classes of works containing embedded computer programs is necessary to protect consumer choice and prevent adverse effects on noninfringing uses, such as legitimate reverse engineering and interoperability. Such an exemption would clearly benefit the public in the form of increased competition, leading to increased quality and decreased prices on items containing embedded programs.

The anticircumvention devices used by equipment manufacturers on chips in printer cartridges should not fall under the jurisdiction of the DMCA because they are not intended to protect a work of art or original expression. These devices have no other purpose than to thwart aftermarket competition.

The printer original equipment manufacturers (OEMs) make a large percentage of their revenue from their imaging supplies (cartridges for toner and inkjet-based printers). The printers, especially inkjet ones, are often sold at or below cost, with supplies for those printers making up the bulk of the OEMs' imaging division revenue streams. This means that the inkjet printer cartridges are often quite costly, with one or two replacement cartridges sometimes exceeding the cost of the printer itself.

Consumers deserve the right to have options for the source of printer cartridges they buy. Due to intellectual property rights and other issues, most printers cannot have compatible cartridges created. The only viable alternative for the vast majority of these printers is remanufactured cartridges.

Remanufacturing is the process by which a third-party or aftermarket company takes empty cartridges that have been collected, and inspects the cartridges and adds replacement parts as needed. The cartridges are then filled with high-quality compatible toner or ink and sold to consumers as remanufactured products. This industry has existed for many years, and helps to provide consumer choice, gives a lower priced alternative and helps keep millions of pounds of plastic out of landfills every year.

The problem comes when OEMs create cartridges with chips containing, among other things, anticircumvention devices. The programs that the anticircumvention devices protect are often minimal and, at best, only slightly useful to the consumer. In the vast majority of cases, these programs could easily have been placed on the printer rather than the cartridge.

In fact, the true purpose of the anticircumvention device is to act as a lockout to prevent third-party chips, with similar software created through legitimate reverse engineering, from functioning when the cartridge is placed in the printer. That is, the purpose of the anticircumvention device is not to protect a work of art, but to prevent interoperability, a legitimate, noninfringing use.

In the case of devices placed on movie DVDs to prevent copying, circumventing the device allows the pirate to copy the whole item of value (the movie), and then sell it to make a profit. Circumventing the "lockout" devices on printer cartridge chips does not allow the remanufacturer to sell the program to another party -- it only allows the cartridge to function as it was intended.

It is only a small portion of the overall product. This is legitimate, noninfringing use for interoperability. Exempting embedded programs in printers and cartridges from the DMCA would help protect noninfringing uses, including the interoperability of products.

This class of works definitely falls outside of the bounds intended for the DMCA. These tiny and mostly useless programs (often containing only a few bytes of information) are not the original works of art or expressions that the DMCA was meant to protect.

In addition, there are usually no viable sources for products that do not contain these lockout devices. Unlike the movie market where videotape versions of movies are available without lockout devices, there are no viable sources of printer cartridges without these anticircumvention devices. For example, Lexmark admitted in court that more than 90 percent of the cartridges sold for its T520/620 printers were part of its Prebate program, and thus contain lockout devices on the chips. This does not leave a source of remanufacturable cartridges available for third parties wishing to legitimately create interoperable replacement cartridges.

In addition, despite claims by Lexmark that the non-Prebate cartridges are remanufacturable, allegations have been made in ongoing court cases that the two types of cartridges are identical, and that both contain the lockout. Thus, there may be no remanufacturable cartridges available at all, from any source, for those printers. It is necessary to exempt embedded programs in printers and cartridges because there are no readily available unprotected versions for noninfringing uses.

Unfortunately, there could be dire consequences for the public if an exemption is not granted to these classes of works. The most important factor would be a loss of consumer choice, including increased prices and decreased quality. Currently, the printer manufacturers have a very high percentage (more than 90 percent for some OEMs) of cartridge sales in their aftermarkets. Previous cases in the U.S. and around the world have determined that the printer manufacturers effectively control their own aftermarkets. Consumers have purchased printers that despite the price-cutting techniques, can still be fairly expensive (laser printers especially can be thousands or even tens of thousands of dollars for specialty uses). The majority of consumers purchase these products unaware they will have little choice in who will provide the costly supplies for the printers.

Consumers deserve the right to have options for the source of printer cartridges they buy. Any device that prevents competition will harm consumers in the form of the decreased quality and increased prices that almost always follow on the heels of a monopoly. Exempting the embedded programs in printers and cartridges from the DMCA will help preserve consumer choice.

In sum, the continued inclusion of these classes of works in the DMCA will have a significantly adverse effect on noninfringing uses, including reverse engineering and interoperability. Granting the petition for exemption will help preserve these noninfringing uses, as well as allow increased competition, benefiting the public through increased choice, increased quality and decreased prices. Thus, an exemption for the classes of works containing embedded computer programs is necessary.