Comments regarding the exemption to the anticircumvention provisions of the Digital Millennium Copyright Act, 17 U.S.C. 1201(a), proposed by Static Control Components, Inc.

Submitted to the Copyright Office of the Library of Congress
by

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Summary

Because courts have interpreted "access to a work" to include the running of a computer program, if a computer program controlling a printer is written so that it needs to perform an authentication procedure with a toner cartridge, it appears to be a violation of Section 1201(a) to construct, sell, or even use a toner cartridge not authorized by the owner of the copyright in the printer control program. This can make it impossible for anyone except the printer (or game console or garage door opener) manufacturer to produce and sell toner cartridges (or video games or garage door controllers), a degree of control not contemplated by Congress when it passed the Digital Millennium Copyright Act.

However, the first exemption proposed by Static Control Components is far too narrow to address the general problem. The second and third proposed exemptions use terms that are not well-defined, and therefore could create new problems. In my comments, I suggest alternative language more directly tied to the problem.

Comments

In the case that prompts these proposed exemptions, *Lexmark v. Static Control Components* (E.D. Ky.), the court issued a preliminary injunction on February 27, 2003, after finding that the Static Control Component's performs an "authentication sequence" that "controls the consumer's ability to make use of" the control program in a Lexmark printer. (It should be noted that there were other grounds for issuing the preliminary injunctions – the court cited copyright infringement because of the "wholesale copying" of Lexmark's Toner Loading Programs when an alternative implementation was possible.)

Even if Static Control Components were to implement their toner loading program using one of the alternatives mentioned by the court in its opinion, under the court's reasoning Section 1201(a) likely would still be violated. Anything that provides an authentication procedure sufficient to allow the printer control program to operate normally would "circumvent" a "technological measure" that "controls access" to a copyrighted work.

A company that wanted to control what can operate with their printer (or game console or garage door opener) would only have to include a simple authentication mechanism tested by their program, knowing that any unauthorized use of the authentication mechanism by the maker of a competitive toner cartridge (or video game or garage door control) would be a violation of the DMCA.

I do not believe it was the intention of Congress, when it passed the Digital Millennium Copyright Act, to provide a legal means of tying one product to another, just because those products can be implemented using computer programs that perform a simple exchange of information.

But the *Lexmark* court considered the plain meaning of Section 1201(a) clear and therefore felt it was inappropriate to try to determine the intent of Congress. The question is how this "technological tying" of two products seemingly permitted by the language of Section 1201(a), as interpreted by the *Lexmark* court, can be rectified by exempting a class of works, or whether it will require intervention by Congress or a different interpretation of Section 1201(a) by the courts.

The first exemption proposed by Static Control Components, "Computer programs embedded in computer printers and toner cartridges and that control the interoperation and functions of the printer and toner cartridge," clearly eliminates its DMCA problem, but does nothing to address the problem as applied to other products that could be tied, such as games and game consoles or garage door openers and controls.

Its other two proposed exemptions, "Computer programs embedded in a machine or product and which cannot be copied during the ordinary operation or use of the machine or product" and "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," come closer to a solution. But those proposals introduce a number of new terms, such as "embedded" and "ordinary operation or use" that do not have clear meanings. Rather than litigation focused on whether "access to" a computer program includes the running of that computer program, it will be concerned with whether a program is "embedded" or not. And because of that, developers of competitive complementary products that must interact with a device's computer program through an authentication procedure will not know whether they are covered by the exemption or not.

Possible language for an alternative exemption that more directly addresses the root of the problem, while trying to remain in the spirit of a "class of works" is:

> Computer programs whose continued execution depends on the presence of a second, separately-marketed device that participates in an authentication procedure with the computer program.

or, more narrowly:

> Computer programs whose primary purpose is to control a device other than a general-purpose computer whose continued execution depends on the presence of a second, separately-marketed device that participates in an authentication procedure with the computer program.

or, perhaps more broadly:

> Computer programs whose continued execution depends on an authentication procedure.

With each of these alternatives, whether the exemption applies is solely a function of the readily-ascertainable characteristics of a particular type of literary work (the computer program) and not how it might be used, and so should fall within the statutory requirements for a class of works to be exempted.

It should be kept in mind that even if the exemption were so broad as to include all computer programs, valuable software would not be without protection under the DMCA. Section 1201(b) provides protection similar to Section 1201(a) when the circumvention would infringe one of the copyright owner's rights. That would clearly protect any copy protection technique used to prevent illegal duplication of a computer program and virtually every other way that a computer program can be pirated.

And by restricting the exemption to computer programs *whose continued execution depends* on an authentication procedure, it would not apply to the use of a technological measure to prevent the unauthorized installation of the computer program or starting the execution of the program.

I hope that the hearings on the proposed exemptions will discuss whether there really is a problem caused by a broad reading of "access to" a copyrighted work that includes running a computer program, whether if there is a problem it can be remedied within the statutory bounds of these proceedings or whether Congress needs to act to clarify the scope of Section 1201(a), and if it can be done by these proceedings, what language for the exemption remedies the problem without hurting legitimate protection for computer programs.