PRIVACY AND INTELLECTUAL PROPERTY RIGHTS

Second summary 03/11/2021

Legal Protection of Computer Programs

In 1979 AT&T adopts a new license agreement in order to prohibit the usage of the UNIX source code as teaching material. To bypass this limitation professor Tanenbaum writes MINIX. In 1982 a New Consent Decree made AT&T lose its monopoly on the telephone and made it possible for them to enter the computer industry, following this event they created the UNIX System Labs. UNIX came in different versions so there was a need for a standard interface: the POSIX standard creation started in 1988.

Regarding the legal side, before 1976 the copyright act was obsolete so in the new US copyright act the new definition of literary works was made in order to include computer programs, both in object, source and executable format. A special commission was created (CONTU) to manage specific issues regarding computer programs legislation. In Europe we needed to wait until the 80s-90s to have copyright protection on software, since the laws where not 100% coherent some programs where infringing copyright in the US but not in Europe.

History of free and open-source software

There are 2 basic principles to have a software industry: the first is the technological requirement that is the possibility of creating computer programs, the second is the legal requirement which is the need to protect your product.

At first computer science was strongly rooted in university (UNIX as a teaching tool), as a result knowledge was often shared between people, but when writing software became a way of making profits the industry started to hire people from the academic environment. In those years Bill Gates wrote a letter stating that copying (or using copied) computer programs is like stealing, this caused a cultural shock. Since software were now profitable, knowledge about programs was not shared anymore, in particular Richard Stallman had some problems due to this. IN 1984 he resigned from the MIT lab and wrote the GNU manifesto, stating his ideals and he started working on a new operating system. Stallman was trying to find a way to make code public, without having privileged users, and not sellable. He came up with the GNU General Public License which was based on the copyleft that is a license granting basic freedoms and preventing the possibility of selling that code. With GPL the freedom granted is limited by the fact that you had to accept it and use it for each piece of code you redistributed.

In 1991 Linus Torvalds released the Linux Kernel covered by GPL. Linux was developed under an informal distributed development model; anyone could download the software and take part in the development process. In order to have a protection stronger than the one given by GPL he used trademarks. Torvalds registered the Linux name giving him power on the creation process. In the meantime, another family of free os where created called BSD (Berkeley Software Distribution) using yet another license. In 1978 Bill Joy created the first BSD which included an editor and a pascal compiler. In 1979 DARPA (Defense Advanced Research Project Agency) asked them to develop the TCP/IP stack for UNIX operating systems to be used for the Internet. Later they started selling BSD software as UNIX, but since AT&T had trademark on the name the were sued. AT&T sold the trademark to Novel which got to an agreement with Berkeley, unfortunately the agreement was late, and BSD got cut out from the market. In the 90s the word "free" was concerning so there was a decision to rebrand free software as open source which could be read by many contributing people.

The GPL has 4 basic principles: The freedom of running, studying, redistributing, and improving the piece of code protected by it. In any case you were not allowed to add restrictions to modified version of the original code (that was under GPL). Unlike public domain software you were not allowed to take the code and create a proprietary version of it so that no one could do this to sell programs. GPL, as many other free software licenses, has an exclusion of warranty and limitation of liability since writing code is seen as a difficult and complex task. Since GPL had a broad concept of derivative code, a new license was created to regulate the usage of libraries and make it possible to free libraries on non-free operating systems.