## Software Licensing

(short overview)

Programming Techniques II HS15

# Legalism: Copyright

### Copyright of a creator:

- legal right as per jurisdiction
- exclusive use & distribution of original work
- covers expression of ideas
- implicitly granted
- limited (expiration, fair use)

### Legalism: License

### License between parties:

- legal instrument governed by contract law
- grants rights, imposes restrictions
- allocates responsibility and liability

### License Properties

- Duration: limited / renewable / perpetual
- Application permissions
- Warranty / Liability
- Redistribution
- Upgrade policy
- Attribution / Branding
- Copyleft (permissive → viral)

## Earning Money with Software

- For distribution (licensing fee, shipping, authenticity)
- Work for hire (product, feature contract, SAAS)
- Per use (trialware)
- Support
- Donations

### Source Visibility

Open Source: code is visible

(software is understood through the source)

The OSI Definition contains much more:

https://opensource.org/osd-annotated

## Ideological Classification

Software as Property

Free and Open Source (FOSS)

Consider when granting monopoly rights:

work of copy? → resources consumed lend / borrow expressions of ideas? → DRM delete / forget?

### Properties

### Clean-Room Implementation

Reverse engineering technique, side-steps copyright:

Person A examines object and builds specification documentation from behavioural observations

 Person B only receives the documentation and builds an object to match the behaviour

### Legalism: Patents

### Patent of an inventor:

- legal right as per jurisdiction
- exclusive implementation of new\* idea
- covers implementation of ideas
- explicitly acquired (often expensive)
- limited (expiration)

<sup>\*</sup>novel, useful, non-obvious

### Patent of an inventor:

- legal right as per jurisdiction
- exclusive implementation of new\* idea
- covers implementation of ideas
- explicitly acquired (often expensive)
- limited (expiration)

<sup>\*</sup>novel, useful, non-obvious

United States Patent Iaaskelainen 5,301,348 April 5, 1994

Dynamic progress marking icon

#### Abstract

A dynamic progress marker icon is disclosed that dynamically changes to mark the progress of a task. In this manner, the user is kept informed of the status of a task being performed without resorting to language sensitive messages such as "Now processing object number 12 of 100". The icon does not require a graphics display to be used and therefore can be used on both graphics and non-graphics displays. The icon of the prepared embodiment has five rows consisting of four percent (%) symbols surrounded by a border. At the beginning of a task, a task monitor quantifies the task into substantially equivalent task work units. All twenty "%" symbols are present and displayed to the user. When the task monitor determines that one task work unit has completed, one "%" symbol is replaced in the icon by a replacement character, such as a blank or null character. The replacement of one "%" symbol each time a task work unit completes continues until all of the "%" symbols are replaced, indicating 100% completion of the task. The order in which symbols inside the icon are replaced is determined by a pattern array and can be modified if desired. The symbols used inside the icon and for the border are selected to be available in virtually all languages, and can also be modified to meet the needs of a particular user.

The European Patent Convention

Article 52 – Patentable inventions

- (2) The following in particular shall not be regarded as inventions within the meaning of paragraph 1:
- (c) schemes, rules and methods for performing mental acts, playing games or doing business, and programs for computers;
- (3) Paragraph 2 shall exclude the patentability of the subjectmatter or activities referred to therein only to the extent to which a European patent application or European patent relates to such subject-matter or activities as such.

The European Patent Convention

Article 52 – Patentable inventions

- (2) The following in particular shall not be regarded as inventions within the meaning of paragraph 1:
- (c) schemes, rules and methods for performing mental acts, playing games or doing business, and programs for computers;
- (3) Paragraph 2 shall exclude the patentability of the subjectmatter or activities referred to therein only to the extent to which a European patent application or European patent relates to such subject-matter or activities as such.

### Decision (FOSS Licenses)

Consider your use case!

http://choosealicense.com/licenses/

http://oss-watch.ac.uk/apps/licdiff/

## Examples

- GPL
  - copyleft, open, commercial
- Apache
  - permissive, open, commercial
- MIT
- EULA
- Shareware/Freeware
- Public Domain

### GNU General Public License (GPL)

- The freedom to run the program as you wish, for any purpose (freedom 0).
- The freedom to study how the program works, and change it so it does your computing as you wish (freedom 1). Access to the source code is a precondition for this.
- The freedom to redistribute copies so you can help your neighbor (freedom 2).
- The freedom to distribute copies of your modified versions to others (freedom 3). By doing this you can give the whole community a chance to benefit from your changes. Access to the source code is a precondition for this.

### Apache License

- Derivative works can change license
- Unmodified parts and original copyright, patent, trademark, and attribution notices in redistributed code must be preserved
- Grants patent license to receiver

### MIT License

Copyright (c) <year> <copyright holders>

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

### **EULA & Custom Licenses**

Proprietary Software

EULA should be advertised before purchase

Roll your own (or cleanroom-reimplement one)

### Content Licenses

Creative Commons

GNU Free Documentation License

Waiver disclaimers

All rights reserved

### For Researchers

- Pick an established license (proliferation is a mess)
- Consider a FOSS license
- Academic conduct: cite your sources, even if the license doesn't require attribution
- Ownership: most work contracts transfer ownership of code to your employer