

# The GNU GPL Revisited

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# Introduction

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## Who is speaking to you?

- an independent Free Software developer
- who earns his living off Free Software since 1997
- who is one of the authors of the Linux kernel firewall system called netfilter/iptables
- who IS NOT A LAWYER, although this presentation is the result of dealing almost a year with lawyers on the subject of the GPL

## Why is he speaking to you?

- because he thinks there is too much confusion about copyright and free software licenses. Even Red Hat CEO Matt Szulik stated in an interview that RedHat puts investments into 'public domain' :(

# Disclaimer

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## Legal Disclaimer

- All information presented here is provided on an as-is basis
- There is no warranty for correctness of legal information
- The author is not a lawyer
- This does not comprise legal advice
- The authors experience is limited to German copyright law

# What is copyrightable?

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- The GNU GPL is a copyright license, and thus only covers copyrighted works
- Not everything is copyrightable (German: Schoepfungshoehe)
  - Small bugfixes are not copyrightable (similar to typo-fixes in a book)
  - As soon as the programmer has a choice in the implementation, there is significant indication of a copyrightable work
  - Choice in algorithm, not in formal representation
- Apparently, the level for copyrightable works is relatively low

# Terminology

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- Public Domain**
  - concept where copyright holder abandons all rights
  - same legal status as works where author has died 70 years ago (German: Gemeinfreie Werke)
- Freeware**
  - object code, free of cost. No source code
- Shareware**
  - proprietary "Try and Buy" model for object code.
- Cardware/Beerware/...**
  - Freeware that encourages users to send payment in kind

# Terminology

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- Free Software**

- source code freely distributed
- must allow redistribution, modification, non-discriminatory use
- mostly defined by Free Software Foundation

- Open Source**

- source code freely distributed
- must allow redistribution, modification, non-discriminatory use
- defined in the "Open Source Definition" by OSI

- The rest of this document will refer to Free and Open Source Software as FOSS.**

# Common FOSS licenses

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## Original BSD License

- allows redistribution, modification
- even allows proprietary extensions with no source code offer
- all docs, advertisement materials have to mention copyright holder

## Modified BSD License

- same as "Original BSD License", but no copyright statements required in docs and advertisements



# Common FOSS licenses

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- **GPL (GNU General Public License)**
  - allows redistribution, including modified works
  - obliges distributor to supply source code including all modifications
  - usage rights are revoked if license conditions not met
- **LGPL (GNU Library General Public License)**
  - explicitly allows linking of proprietary applications
  - written as special case for libraries (such as glibc)

# The GNU GPL Revisited

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## Revisiting the GNU General Public License

- Regulates distribution of copyrighted code, not usage
- Allows distribution of source code and modified source code
  - ▷ The license itself is mentioned
  - ▷ A copy of the license accompanies every copy
- Allows distribution of binaries or modified binaries, if
  - ▷ The license itself is mentioned
  - ▷ A copy of the license accompanies every copy
  - ▷ The complete source code is either included with the copy made available to any 3rd party

# Complete Source Code

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"... complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable."

**Our interpretation of this is:**

- Source Code
- Makefiles
- Tools for generating the firmware binary from the source
  - ▷ (even if they are technically no 'scripts')

**General Rule:**

- Intent of License is to enable user to run modified versions of the program.  
They need to be enabled to do so.
- Result: Signing binaries and only accepting signed versions without providing a signature key is not acceptable!

# Derivative Works

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- What is a derivative work?
  - Not dependent on any particular kind of technology (static/dynamic linking, dlopen, whatever)
  - Even while the modification can itself be a copyrightable work, the combination with GPL-licensed code is subject to GPL.
- No precedent in Germany so far
  - As soon as code is written for a specific non-standard API (such as the iptables plugin API), there is significant indication for a derivative work
  - This position has been successfully enforced out-of-court with two Vendors so far (iptables modules/plugins).

# Derivative Works

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Position of my lawyer:

- In-kernel proprietary code (binary kernel modules) are hard to claim GPL compliant
- Case-by-case analysis required, especially when drivers/filesystems are ported from other OS's.

# Collected Works

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"... it is not the intent .. to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works ..."

"... mere aggregation of another work ... with the program on a volume of a storage or distribution medium does not bring the other work und the scope of this license"

**GPL allows "mere aggregation"**

- like a general-purpose Linux distribution (SuSE, Red Hat, ...)

**GPL disallows "collective works"**

- legal grey area
- tends to depend a lot on jurisdiction
- no precedent so far

# Non-Public modifications

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## Non-Public modifications

- A common misconception is that if you develop code within a corporation, and the code never leaves this corporation, you don't have to ship the source code.
- However, at least German law would count every distribution beyond a number of close colleagues as distribution.
- Therefore, if you don't go for '3a' and include the source code together with the binary, you have to distribute the source code to any third party.
- Also, as soon as you hand code between two companies, or between a company and a consultant, the code has been distributed.

# GPL Violations

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- When do I violate the license
  - when one or more of the obligations are not fulfilled
  
- What risk do I take if I violate the license?
  - the GPL automatically revokes any usage right
  - any copyright holder can obtain a preliminary injunction banning distribution of the infringing product



# Thanks

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## Thanks to

### KNF

▷ for first bringing me in contact with linux in 1994

### Astaro AG

▷ for sponsoring most of my netfilter work

### Free Software Foundation

▷ for the GNU Project

▷ for the GNU General Public License

### Dr. Till Jaeger

▷ for handling my legal cases

The slides of this presentation are available at <http://www.gnumonks.org/>

## Further reading:

The netfilter homepage <http://www.netfilter.org/>

The <http://www.gpl-violations.org/> project