

# WHAT IS OPEN SOURCE?



# THIS PRESENTATION IS

- presentation framework:  
[reveal.js](#)
- uploaded using git
- (probably) stored on linux
- served using nginx
- presented in chrome/firefox

# OPEN SOURCE

- introduced by free software movement
- more precise definition than *free*

# **FSF - FREE SOFTWARE FOUNDATION**

- 1985 by Stallman
- supporting GNU project
- GNU (GNU Not Unix)
- GNU with Linux kernel (GNU/Linux)
- Multiple distros: Debian, Ubuntu, RedHat, CentOS, Arch,

# GNU

- think of lego
- consists of multiple parts (compiler, binutils, shell)
- works with other sw's
- ported to non-free os-s as well (osx, windows)

```
$ uname -a
Linux oroszi.net 3.2.0-69-virtual #103-Ubuntu SMP \
Tue Sep 2 05:21:29 UTC 2014 x86_64 x86_64 x86_64 GNU/Linux
```

```
$ uname -a
Linux raspberrypi 3.18.7+ #756 PREEMPT \
Wed Feb 18 16:08:51 GMT 2015 armv6l GNU/Linux
```

# LICENSES

MIT, APACHE-2.0, BSD-3-CLAUSE, ARTISTIC-1.0-PERL, GPL-3.0, ISC, GPL-2.0+, BSD-3-CLAUSE-CLEAR, LGPL-3.0, GPL-2.0, LGPL-2.1+, BSD-2-CLAUSE, EPL-1.0, AGPL-3.0, UNLICENSE, GPL-2.0-WITH-CLASSPATH-EXCEPTION, CNRI-PYTHON-GPL-COMPATIBLE, DSDP, GPL-3.0+, EPL-1.0, WTFPL, AGPL-3.0, LGPL-3.0+, ECL-2.0, QPL-1.0, MPL-2.0, LGPL-2.0+, BSD-3-CLAUSE-ATTRIBUTION, ZED, INTEL-ACPI, ABSTYLES, XPP, NETCDF, LGPL-2.1, VOSTROM, FTL, CC-BY-NC-4.0, ARTISTIC-2.0, RSCPL, CDDL-1.0, FAIR, MPL-2.0, OSL-3.0, BSD-2-CLAUSE-FREEBSD, MIROS, BSL-1.0, AFL-3.0, LGPL-3.0, CDDL-1.1, OPENSSL, CCo-1.0, HPND, PLEXUS, PYTHON-2.0, OGTSL, BEERWARE, GPL-1.0+, IBM-PIBS, ZLIB, RUBY, ARTISTIC-1.0, BSD-2-CLAUSE-NETBSD, CC-BY-4.0, CC-BY-SA-3.0, AML, TMATE, UNICODE-TOU, GPL, AGPL-1.0, JASPER-2.0, BSD-4-CLAUSE, MIT-ENNA, GPL-2.0, VIM, CPOL-1.02, ODBL-1.0, GPL-3.0-WITH-GCC-EXCEPTION, GFDL-1.3, BITTORRENT-1.1, CPAL-1.0, ZEND-2.0, CPL-1.0, CC-BY-NC-ND-3.0, MPL-1.1, CC-BY-3.0, ARTISTIC-1.0-CL8, SAX-PD, CECILL-2.0, SMLNJ, W3C, AAL, NCSA, INTEL,

OFL-1.1, ALADDIN, JSON, EUPL-1.1, CC-BY-NC-SA-4.0, FSFUL, CECILL-C, PHP-3.0, MITNFA, ADSL, SIMPL-2.0, SGI-B-2.0, GPL-2.1, SAXPATH, ZLIB-ACKNOWLEDGEMENT, WXWINDOWS, SCEA, CALDERA, LIBPNG, DOC, CC-BY-NC-ND-4.0, OML, CECILL-B, MTLL, LPL-1.0, HASKELLREPORT, LPPL-1.2, CC-BY-SA-4.0, IMATIX, IPA, SLEEPYCAT, PDDL-1.0, CCo-1.0, SPL-1.0, MAKEINDEX, SWL, OLDAP-2.7, MPL-2.0-NO-COPYLEFT-EXCEPTION, FSFULLR, CC-BY-NC-3.0, AMPAS, BSD-3-CLAUSE-LBNL, ADOBE-2006, X11, NOWEB, IJG, NLPL, NASA-1.3, GPL-2.0-WITH-FONT-EXCEPTION, BSD-PROTECTION, PSFRAG, IPL-1.0, CC-BY-NC-SA-3.0, OLDAP-2.8, NUNIT, MS-PL

## **TOP LICENSES (ACROSS 755,882 PROJECTS)**

- MIT (182,664 PROJECTS)
- APACHE-2.0 (63,174 PROJECTS)
- BSD-3-CLAUSE (26,851 PROJECTS)
- ARTISTIC-1.0-PERL(12,478 PROJECTS)
- +1 GPL, LGPL

The screenshot shows a mobile application interface with a red header bar. The header contains a back arrow icon and the text "Open source licenses". The main content area has a white background. At the top left of the content area, there is a section titled "Notices for packages:" followed by a bulleted list of four items: "Guava", "James Mime4J", "Jackson", and "Jakarta", each with a blue underline indicating they are links. Below this list is a centered text block for the Apache License, Version 2.0, January 2004, with the URL <http://www.apache.org/licenses/>. The text block contains the full legal text of the Apache License, which is a standard document defining terms like "License", "Licensor", "Legal Entity", "You", "Source", and "Object". The text is in a black font on a white background. At the bottom of the screen, there is a black navigation bar with three white icons: a triangle pointing left, a circle, and a square.

TERMS AND CONDITIONS FOR USE, REPRODUCTION, AND DISTRIBUTION

1. Definitions.

"License" shall mean the terms and conditions for use, reproduction, and distribution as defined by Sections 1 through 9 of this document.

"Licensor" shall mean the copyright owner or entity authorized by the copyright owner that is granting the License.

"Legal Entity" shall mean the union of the acting entity and all other entities that control, are controlled by, or are under common control with that entity. For the purposes of this definition, "control" means (i) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (ii) ownership of fifty percent (50%) or more of the outstanding shares, or (iii) beneficial ownership of such entity.

"You" (or "Your") shall mean an individual or Legal Entity exercising permissions granted by this License.

"Source" form shall mean the preferred form for making modifications, including but not limited to software source code, documentation source, and configuration files.

"Object" form shall mean any form resulting from mechanical transformation or translation of a Source form, including but not limited to compiled object code, generated documentation, and

[← Third Party Notices](#)**THE FOLLOWING SETS FORTH ATTRIBUTION NOTICES FOR  
THIRD PARTY SOFTWARE THAT MAY BE CONTAINED IN  
PORTIONS OF THE FACEBOOK PRODUCT.****ACE**

The following software may be included in this product: ACE.  
This software contains the following license and notice below:

ACE(TM), TAO(TM), CIAO(TM), DAnCE>(TM), and CoSMIC(TM) (henceforth referred to as "DOC software") are copyrighted by Douglas C. Schmidt and his research group at Washington University, University of California, Irvine, and Vanderbilt University, Copyright (c) 1993-2009, all rights reserved. Since DOC software is open-source, freely available software, you are free to use, modify, copy, and distribute--perpetually and irrevocably--the DOC software source code and object code produced from the source, as well as copy and distribute modified versions of this software. You must, however, include this copyright statement along with any code built using DOC software that you release. No copyright statement needs to be provided if you just ship binary executables of your software products.

You can use DOC software in commercial and/or binary software releases and are under no obligation to redistribute any of your source code that is built using DOC software. Note, however, that you may not misappropriate the DOC software code, such as copyrighting it yourself or claiming authorship of the DOC software code, in a way that will prevent DOC software from being distributed freely using an open-source development model. You needn't inform anyone that you're using DOC software in your software, though we encourage you to let us know so we can promote your project in the DOC



# **WHY**

- cooperation
- access to source
- end of vendor lock-in

## **BUT**

- Control
- More people -> more eyes
- Source is free, maintenance, support (see moodle)

# **FEW MORE THINGS**

- attractive
- feeling proud
- hiring/onboarding is easier
- more open company policy

## **BE PART OF IT**

- github.com: [\*Lawyer need, Documentation needed\*](#)
- bitbucket.com
- (google code)
- (sourceforge)

# THANKS, QUESTIONS?

<https://github.com/oroce>

<https://github.com/purposeindustries>

## +1 REAL PROJECT: POST

- TI CC2541: open source driver
- Raspberry PI: open hardware
- Raspbian: open source os
- NodeJS (which based on v8): open source
- Influxdb: open source
- Grafana (which based on kibana): open source