

# GNU Hackers Meeting 2010



## **Contributing reusable code**

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# Suppose you have...

## Reusable code

- likely useful outside your project
- not dependent on your project



# GNU gnulib

- A source code library
- modular
- composed of:
  - POSIX and glibc compatible substitutes
  - General purpose code for applications (file system traversal, crypto, containers, i18n, etc.)
  - Maintainer infrastructure (config.guess, consistency checking tools, upload script for ftp.gnu.org, ...)



# Shape of a module

- Code structure:
  - Use GNU coding style
  - .h file: specification
  - .c file: implementation
  - .m4 file: autoconf macro (optional)
  - unit test (recommended)
  - .texi file (optional)
- Depends: on gnu lib only
- Memory allocation: malloc vs. xmalloc

# Using a module in your package



- Directories

```
gnulib-local/
```

```
    lib/
```

```
    m4/
```

```
    modules/
```

```
    tests/
```

- Before calling autoreconf (in autogen.sh):

```
gnulib-tool -local-dir=gnulib-local  
--import module...
```



# Module description

- Meta-information
- *nearly* in Rec format

Description:

Files:

Depends-on:

configure.ac:

Makefile.am:

Include:

License:

GPL

Maintainer:



# Contribute it to gnulib

1. Appropriate? Ask on bug-gnulib
2. Assign copyright to the FSF
3. Present the code on bug-gnulib