

# Installing & using the SystemC library

# Fetch

- <http://www.systemc.org>
- requires free registration
- fetch version 2.1 (systemc-2.1.v1.tgz, ~4 MB)

# Compile

- decompress tgz

```
tar xzf systemc-2.1.v1.tgz
```

- prepare for compiling

```
mkdir buildsc
```

```
cd buildsc
```

```
../configure --prefix=/destination/directory
```

- compile: `make`

- all this takes some 5 minutes

# Install

- install into the specified destination dir  
`make install`
- may require to edit `src/sysc/qt/Makefile` and remove 4 lines down from “`list=`echo md``”
- that directory will now hold (among other):
  - `include/` with header files
  - `lib-ostype/` (e.g. `lib-macosx`) with the library

# Use

- in order to compile against the SysC library

```
g++ -I/dest/dir/include -L/dest/dir/lib-linux/  
-lsystemc -o progname progsrc*.cpp
```

# Preparing simple\_bus

- **compile & test on its own**  
`cd examples/sysc/simple_bus`  
`make check`
- **copy its stuff into /dest/dir/simpls\_bus**  
`mkdir /dest/dir/simple_bus`  
`cp simple_bus*.pp /dest/dir/simple_bus`

# Using simple\_bus

- include simple\_bus' interfaces in sources
- compile against systemc
- include the path to search for those interfaces

```
g++ -I/dest/dir/simple_bus -I/dest/dir/  
include -L/dest/dir/lib-linux/ -lsystemc -o  
programe prosrc*.cpp simple_bus*.cpp
```