

# My Christmas List for Reproducibility

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# Tools and Infrastructure

- ▶ **software identifier**

DOI-like system for software, vendor-independent  
always pointing to the current location of the code

- ▶ **open data storage**

until every journal stores supp. materials  
more reliable than home page storage

# Standards

- ▶ **cross-library APIs**

we need to be able to replace one broken library by another

→ need an interface and spec common to multiple implementations

- ▶ **programming language specs**

prog. lang. defined by the current implementation will eventually break

→ need a formal and stable spec of the language

- ▶ **software quality test tools and services**

guide code authors to improvements

reduce the workload for referees

# Copyright and Patents

- ▶ **paper vs. software**

paper for human, software for computer

→ should have the same copyright status

- ▶ **no patent restriction for research**

patent system is supposed to stimulate innovation

implementation is the translation of information already public in the patent application

→ should not be prevented from releasing the code