

# Verifying Downloads

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whoami

# Two step process:

1. Verify the source
2. Verify the contents

**Verify the  
source**

**Check the hostname**

**But... DNS can be  
changed**

**Change the  
nameservers**

# Poison the DNS cache

<http://youtu.be/1d1tUefYn4U>

# SSL and DNSSEC

Useful but rare and  
have overheads



**Verify the  
contents**

# Checksums

String representing  
block of data

md5sum

(also sha\*sum)

Usage:

md5sum [FILE]

Also **-c** to check

# An unmodified file

a30a7d0126cbb23faa8f18b57399a407

# An unmodified file.

1f048e1b12e368f917d1c92381b6d2e4

# Requirements

1. Cheap to compute
2. One-way
3. Collision-free

**Broken in?**

**Just change the  
checksums...**

# Checksum summary

+1 for content

-1 for security



# File signing

## Used by Debian

# Questions?

[www.yanone.de](http://www.yanone.de)

[tinyurl.com/slide-design-dev](http://tinyurl.com/slide-design-dev)