

# MAC Motivation

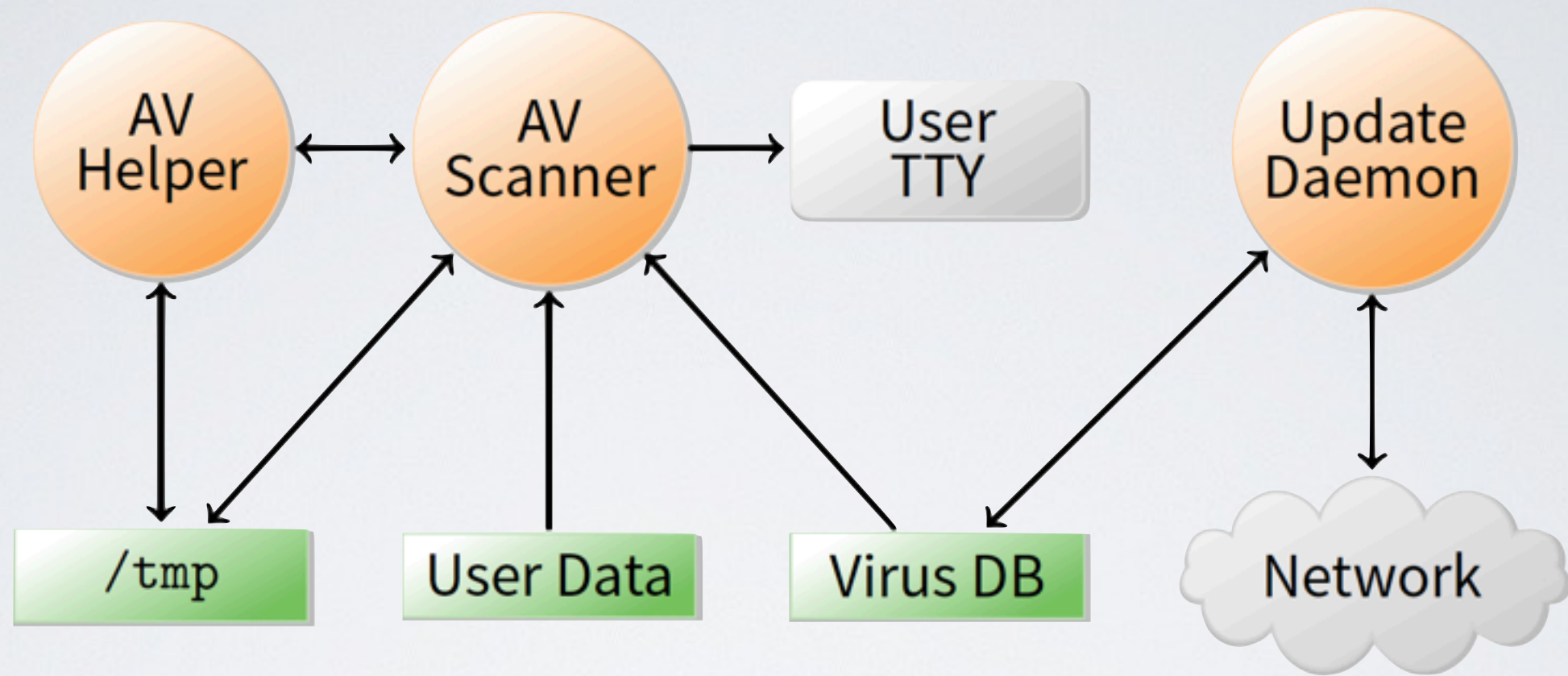
**Prevent users from disclosing sensitive information** (whether accidentally or maliciously) e.g. classified information requires such protection

**Prevent software from surreptitiously leaking data** - seemingly innocuous software may steal secrets in the background (Trojan Horse)

Case study - Symantec AntiVirus 10

- Inherently required access to all of a user's files to scan them
- Contained a remote exploit (attacker could run arbitrary code)
- ➔ Can an OS protect private file contents under such circumstances?

## Example - anti-virus software



How can OS enforce security without trusting AV software ?

- Must not leak contents of your files to network
- Must not tamper with contents of your files