

# The State of SELinux

Paul Moore, Red Hat

September 2013

# Happy Anniversary!

List: [linux-kernel](#)  
Subject: [Linux 2.6.0-test3](#)  
From: [Linus Torvalds <torvalds \(\) osdl ! org>](#)  
Date: [2003-08-09 5:40:37](#)  
[\[Download message RAW\]](#)

The bulk of the diff by far is various architecture updates, and in particular bringing MIPS[\[64\]](#) a bit closer to being up-to-date for 2.6.x. But there's arm, alpha, h8300 and ia64 updates too.

Merging the SELinux security architecture also ends up growing the patch, even though it may not be all that noticeable for most normal users.

For most x86 users, the CPU frequency updates, network driver updates, and some USB updates are most likely to matter.

And this should fix the PCMCIA lock-up that a number of people have seen happening since 2.5.71 or so. Thanks for people involved in testing and fixing that one.

Also, Andrew fixed a read-ahead bug that was introduced in test2 that could cause (non-readahead) IO failures under load.

Shortlog follows, full details in the BK trees and in the log on the ftp/web sites.

Linus

# Labeled NFS

- Client support merged into Linux 3.11
  - NFSv4.2 enables file labeling
  - File based access control on the client
- Server support still a work in progress
  - NFSv4.2 provides file labels
  - Missing support for client process labels
    - Allow server to enforce client accesses
    - Upcoming in RPCSEC\_GSSv3

# Android

- SELinux in new Samsung devices
  - Permissive mode on GS4
    - Updates will enable enforcing mode
  - Core component of Samsung's KNOX
- SELinux required in Android 4.3
  - Compatibility Definition Document

# Policy and Toolchain

- Fedora 19 shipped with 735 domains
  - Number of unconfined domains drops
    - 71 with unconfined.pp loaded
    - 11 without unconfined.pp loaded
- Toolchain improvements
  - Troubleshooting info in systemd
  - Better GUI tools, improved ease of use

# What's Next

- Linux Containers
  - Add SELinux labeling to containers
    - Similar to QEMU/libvirt/sVirt
  - Adds additional sandbox security
    - Fedora “libvirt-sandbox” package
- Android
  - Default AOSP runs enforcing mode
  - Improvements to policy