LSB Manageability Issues

2008. 4. 8. ~ 10.

Jong-Geun PARK & Chang-Won AHN
{queue; ahn}@etri.re.kr
Manageability Issues

- Standardization of Kernel Interfaces for Manageability
  - `/proc` and/or `/sys` interfaces

- Adoption of Open Management Standards
  - DMTF-CIM/WBEM and Profiles
  - Implementation of LSB Modules for CIM Client, CIM Server, CIM Providers
Kernel Interfaces

- Standardization of Kernel Interfaces
  - `/proc` and/or `/sys` interfaces
  - “Tunable” interfaces to change parameter for the running kernel
  - “Query” interfaces to obtain information about the system
  - Discussed at the LSB F2F November 2007

Source: http://www.linux-foundation.org/en/ProjectPlan40
http://www.linux-foundation.org/en/LSB_Kernel_Interfaces
Open Management Standards

- **Challenges**
  - Configuring Linux today requires tweaking zillions of config files
    - How bring everything under 1 management umbrella?
    - Eg. Windows is fully managed via WMI CIM repository
  - Existing Linux mgmt apps are distro specific
    - Minimal compatibility between different distros’ tools
    - Partial coverage by the tools within a distro
  - Distro’s willing to adopt Open mgmt standards?
    - Requires re-working/re-writing tools. Lost investment?
    - Reduces a distro’s differentiating features?

Open Management Standards

- **DMTF CIM/WBEM Technologies**
  - DMTF Management Profile standards are being released
    - Base Server Profile
    - Base Desktop and Mobile Profile
    - And other released profiles (http://www.dmtf.org/standards/profiles)
  - There are many Linux-based on-going open source projects for DMTF technologies
    - CIM Object Manager: OpenPegasus, OpenWBEM, SFCB, etc
    - CIM Providers: SBLIM, OpenDRIM, OMC, etc
    - CIM Client Library: SBLIM etc
    - Development Tools: OpenDRIM, SBLIM, etc
Discussion

Thanks for your attention!

{queue; ahn}@etri.re.kr