High Availability with SLES 11 and System z

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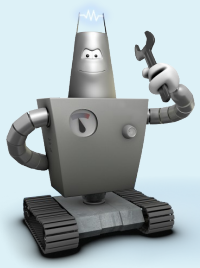
SUSE Building Blocks for Linux OS Lifecycle



SUSE Studio
Building workloads for physical and cloud environments

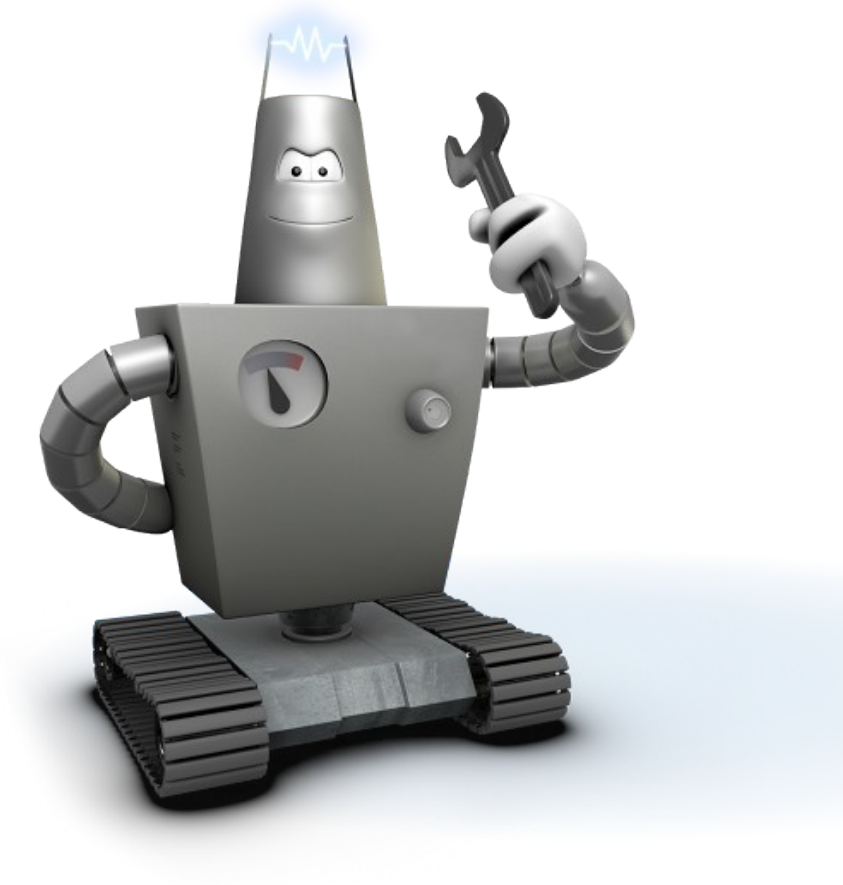
SUSE Manager
Provisioning
Management
Monitoring

SUSE Linux Enterprise
The foundation for your data center workloads and virtualization, from x86 to the mainframe

SUSE® Studio™

- Award winning image software customization tool and appliance builder
- Simplifies application deployment
- Build software appliances
  - Physical, virtual or cloud
  - In minutes, not days
- One click deployment to Amazon EC2
- One click deployment to Microsoft Azure

http://susestudio.com



SUSE® Manager

SUSE Manager

- Manage both SUSE Linux Enterprise and Red Hat Enterprise Linux servers with a single centralized solution
- Automated and cost-effective software management, system provisioning/configuration and monitoring capabilities
- Manage Linux server deployments across physical, virtual and cloud environments

SUSE® Manager

Business Benefits

Benefit	Proof Points
Slash cost of ownership	• Automates system management tasks • Eases data center expansion • Enables more effective use of resources • Early identification of server performance issues • More affordable than proprietary third-party solutions
Reduce complexity of managing Linux systems	• Tightly integrated with Linux ensuring consistent management across systems • Single solution to manage Linux workloads across a range of: - Hardware architectures - Hypervisors - Cloud environments • Manages SUSE Linux Enterprise Server product extensions and appliances • Familiar Linux logic and terminology limits need for training
Simplify compliance	• Audits software patch status • Ensures IT staff has proper authority to manage each server • Tracks configuration changes • Automates hardware, software and subscription inventory
Improve service quality	• Faster completion of management and provisioning tasks with fewer errors • Reduces service disruptions to the business

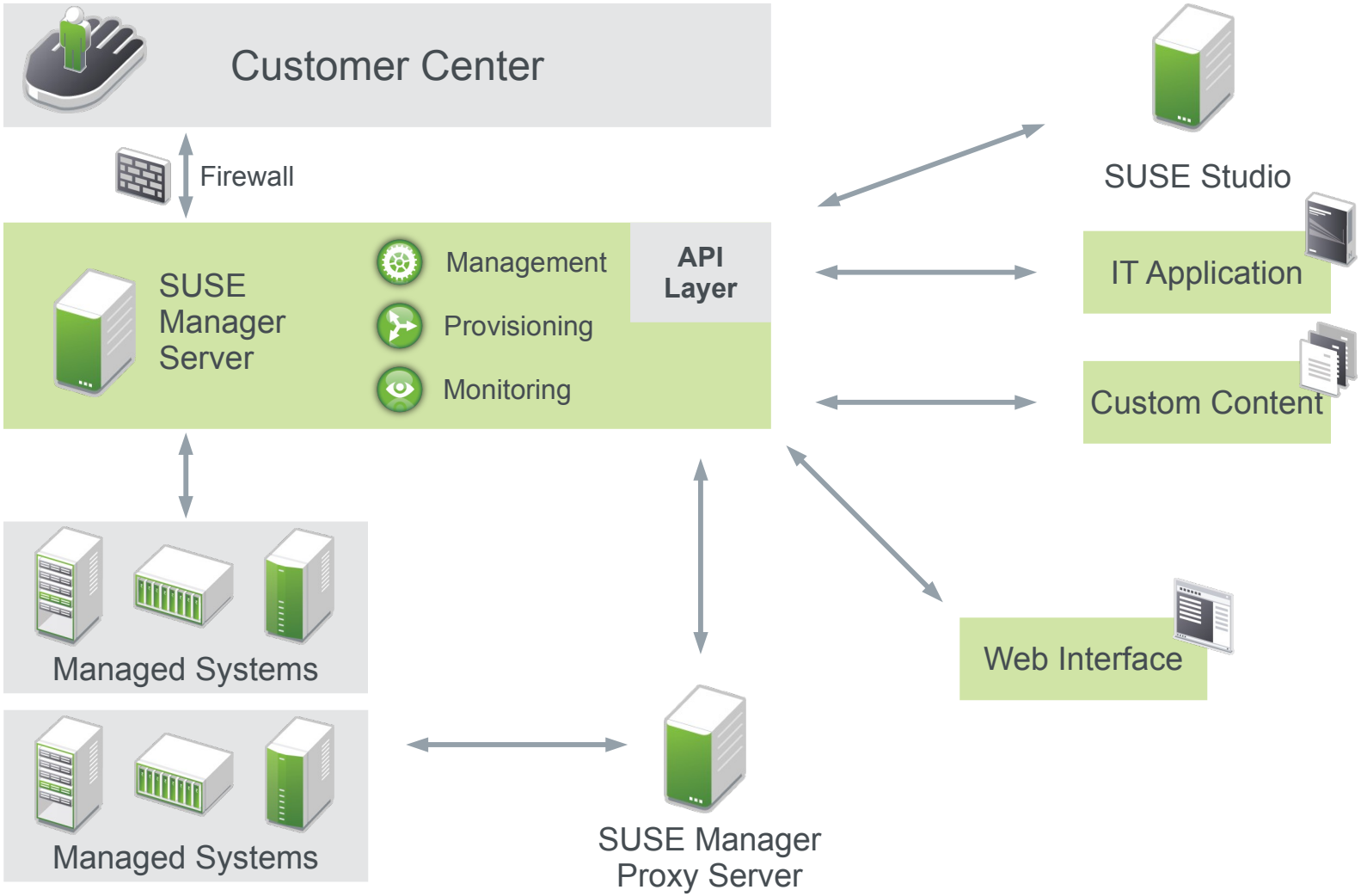
SUSE® Manager

Open Source Connection

What is the Spacewalk Project?	What is the role of SUSE in the Spacewalk Project?
• Upstream version of SUSE Manager and Red Hat Network (RHN) Satellite Server • Red Hat open sourced RHN Satellite (GPL v2) in June 2008	• SUSE Manager is based on Spacewalk, but SUSE has adapted it for SUSE Linux Enterprise • SUSE is an active contributor to Spacewalk • SUSE embraces the open source development model and Spacewalk is just one of the many open source projects we support

SUSE® Manager

How Does it Work?

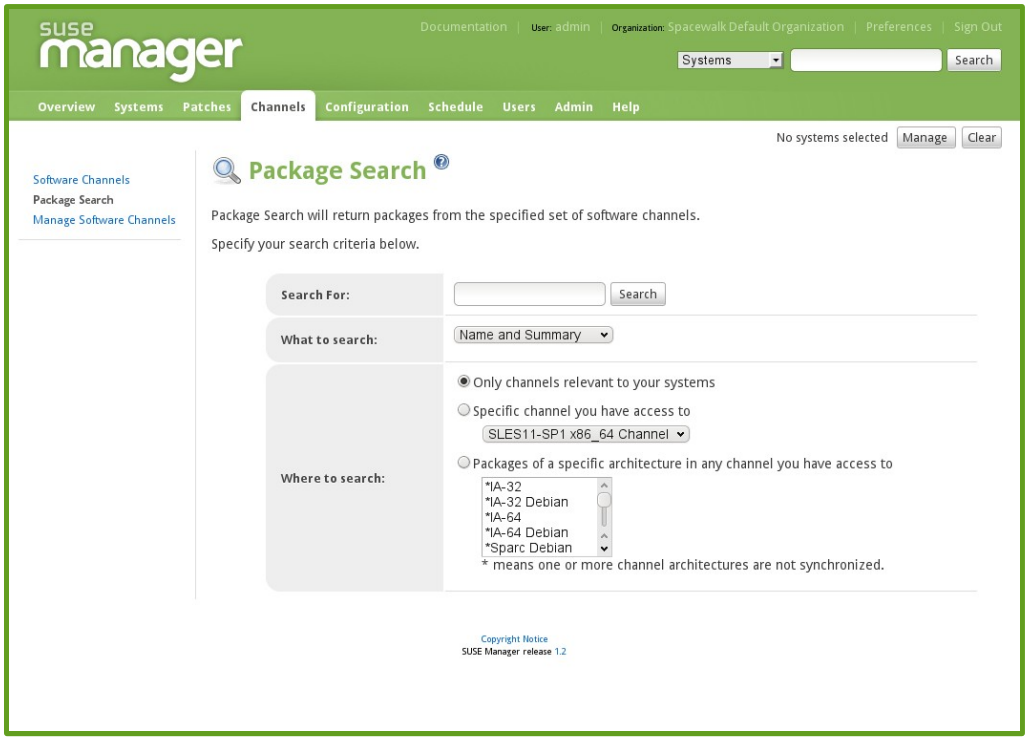


Management Module

SUSE Manager

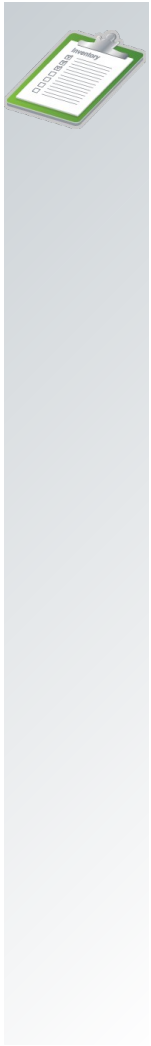
Management Module

- Customer center integration
- Uses native update stacks
- System grouping
- Custom repositories
- SUSE Manager API
- Consistent Scheduler
- Role-based access control
- Extensive Search
- Central Audit Log
- Virtual guest, appliance and System z management



SUSE Manager – Management Module

Inventory



- Hardware
  - CPU, Memory, BIOS, Network
  - Physical location
- Software
  - Installed packages
  - Profiles, Reference system

SUSE Manager – Management Module

Package Management

- Channels – Grouped package repositories
  - Tree-like structure
    - Parent/child
    - Distribution and architecture specific
  - Allows for custom/private channels
- Profiles – Point-in-time capture of installed software
  - Compare live systems to the profile
  - Compare like systems to each other

SUSE Manager – Management Module

Patch and Update Management

- Gain detailed insight into patches
- View/cancel/reschedule any pending updates
- Notifications and audit trail
- Manual or automatic update, push or pull
- Schedule reboots or remote commands

The SUSE® Manager *API*

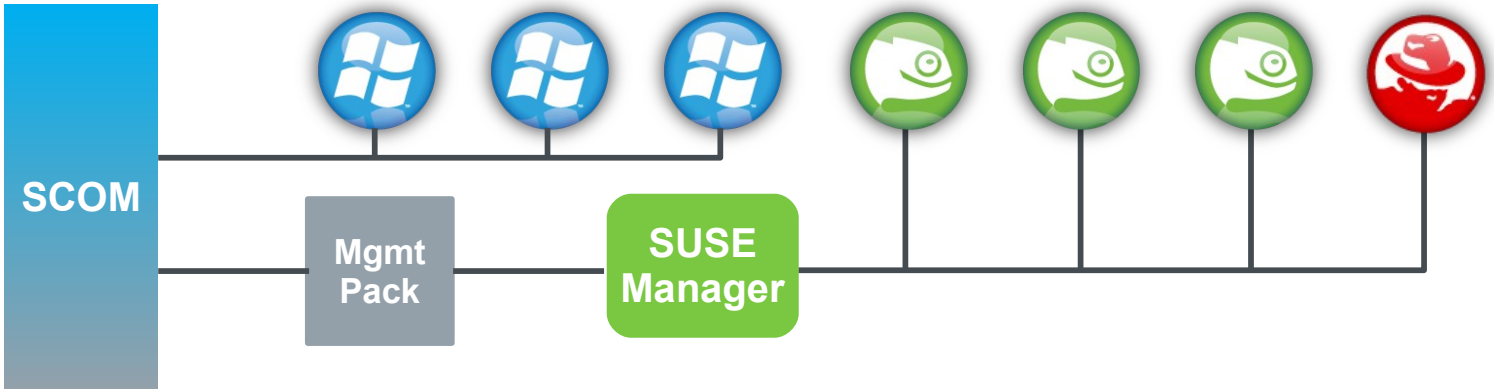
Add scripting where you need it!

- Automate multi-step tasks
- Create customized compliance reports with the tools of your choice (from Python, Perl, Ruby, Java, …)
- Integrate SUSE Manager with other tools in your workflow

SUSE Manager Management Pack

for Microsoft System Center

- Development of a management pack for System Center Operations Manager 2007 R2/2012, providing close integration with SUSE Manager
  - Gives Systems Center users a single console to manage and update Windows and Linux servers in the data center
  - Maintains the same user experience as of a Windows system administrator, using platform native update stack



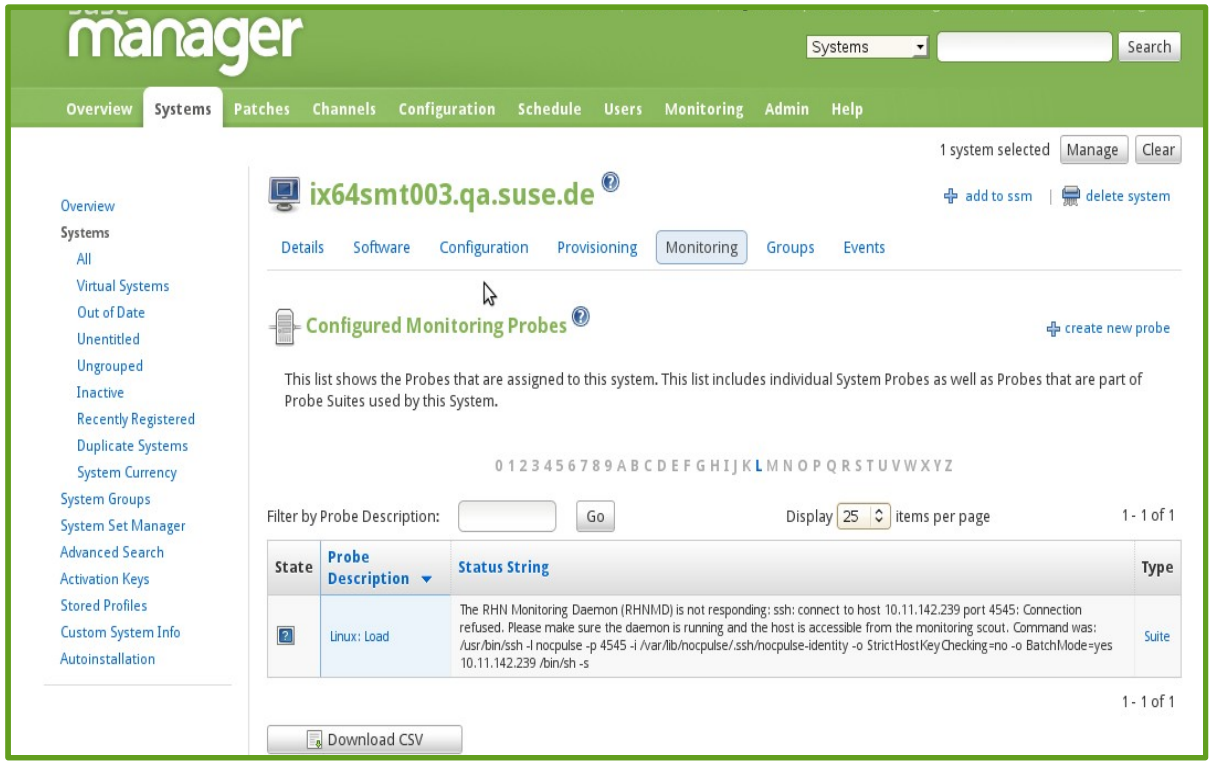
http://www.suse.com/products/suse-manager/open-beta.html

Monitoring Module

SUSE Manager

Monitoring Module

- Probes
- Probe groups
- Boundaries
- Notifications/ Alerts
- Reporting
- Graphical view

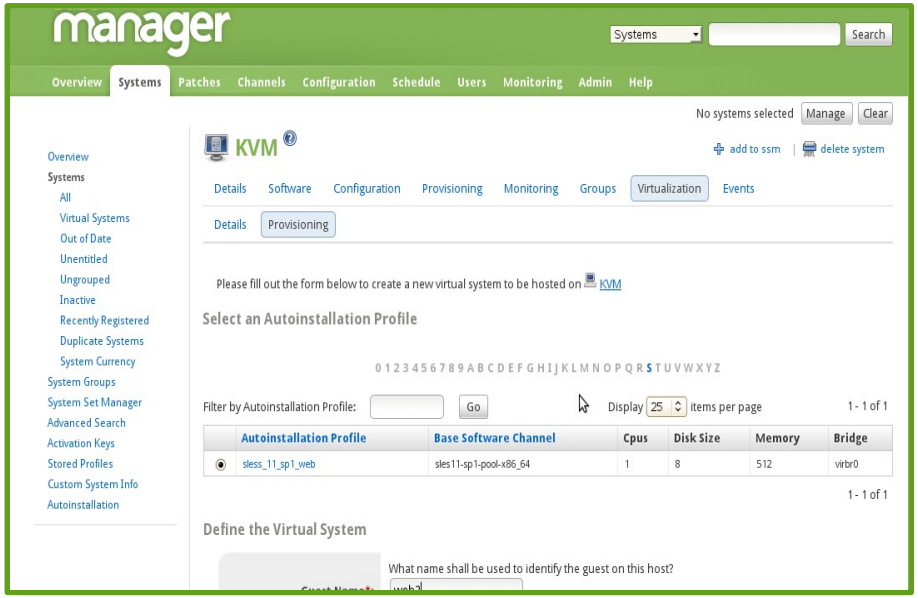


Provisioning Module

SUSE Manager

Provisioning Module

- Deployment
  - Bare-metal provisioning
  - Virtual-guest provisioning
    - Xen and KVM, soon z/VM
  - Existing state provisioning
  - Server roll-back



- Configuration management
  - Configuration profile management
  - Grouped application of multiple configuration files

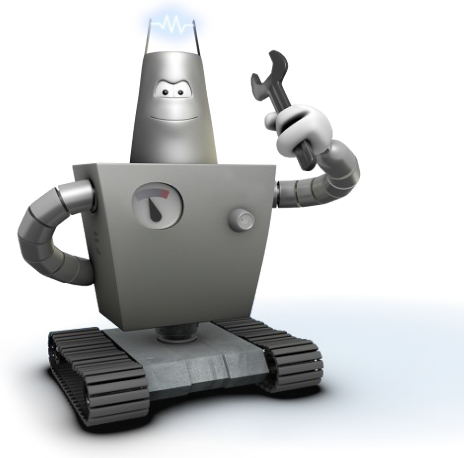
SUSE Manager – Provisioning Module

Configuration Management

- Files and directories
- Organized as channels
- Profiles
- Drift-Control

SUSE Studio Integration for Image Deployment

- KVM/Xen Images
- Images are built in SUSE Studio (Online or Onsite)
- Per SUSE Manager user, a Studio account can be configured in SUSE Manager. A user can choose from all Studio images built by the account provided
- Image-based installation triggered from SUSE Manager, images are directly downloaded from Studio to the KVM/Xen host and started up
- Auto-registration of images in SUSE Manager
- ***Future:***
  - Choose from Gallery (not just per user account)
  - Deploy to physical hosts
  - Deploy to OpenStack, VMware, HyperV



and now: Show time!

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