Installer Packages

Duncan McCracken



What we will cover

- Uses
- Bundles vs. Flat Packages
- Best Practices
- Scripts
- Tools
- PackageMaker CLI
- Distributions



Packages can be used for

- Building Images with InstaDMG / NetInstall / NetRestore / FileWave / Casper Suite or other tools
- Changing settings on an image/volume
- Updating systems already in Production using ARD / FileWave / Casper Suite / Absolute MANAGE
- Adding User Accounts
- Many others, they're a very flexible tool

Bundle Packages

- Pre-Leopard support
- Update existing package scripts
- Best for payload-free packages
- Local or NFS install only



Flat Packages

- Single File
- Complicated to update existing package scripts
- Debug process is longer
- Install over HTTP



Best Practices

- Ensure your package can be installed on a nonbooted system!
- Get your permissions right
- Try to limit the script commands you use to those available on the install media for SIU workflows
- Embed other command binaries in the package



Best Practices

- Create the appropriate type of package (Bundle package / Flat package)
- Design them to be re-usable, or easily updated, especially Payload-free packages
- Break your packages / distributions down into logical building blocks
- Try to avoid moving files with pre / post tasks



Scripts

- InstallationCheck*
- VolumeCheck*
- preflight*
- preinstall

- preupgrade
- postupgrade
- postinstall
- postflight*



Checking an existing package



Tools

- PackageMaker 2 (Xcode 2.5.x)
- PackageMaker 3 (Xcode 3.2.x)
- Composer (Casper Suite)
- Install Ease (Absolute MANAGE)
- Iceberg
- Packages
- Others



Automating package creation using scripts and PackageMaker's CLI



PackageMaker 2

- Installed with Xcode 2.5
- Easy to use
- Very flexible
- Best tool for creating bundle packages





Creating a bundle package using PackageMaker 2



PackageMaker 3

- Installed with Xcode 3.x
- Workflow Driven
- Flat Packages
- Snapshot Packages
- Best tool for CLI





Creating a flat package using PackageMaker 3



Creating a snapshot package with PackageMaker 3



Composer

- Part of JAMF's Casper Suite
- Snapshot Packages
- Pre-defined Templates for Applications & Settings
- When used with Casper has Uninstall function





Install Ease

- Part of Absolute MANAGE
- Simple Workflow Driven
- Creates Uninstaller Packages
- Snapshot Packages





lceberg

- Supports Package Plug-ins
- Extra options available in GUI
- AppleScript Support
- Best tool for creating oldstyle MetaPackages





Packages

- Supports Package Plug-ins
- Extra options available in GUI
- Flat Packages





Other Tools

- Flat Package Editor
- Pacifist
- TextWrangler
- Property List Editor
- Xcode













Creating a package using PackageMaker's CLI



Distributions

- Used to tie all of your packages together
- Javascript based
- Manage dependencies for packages



Creating a distribution



The Big Finish



Thankyou

Enjoy MacSysAdmin 2010

