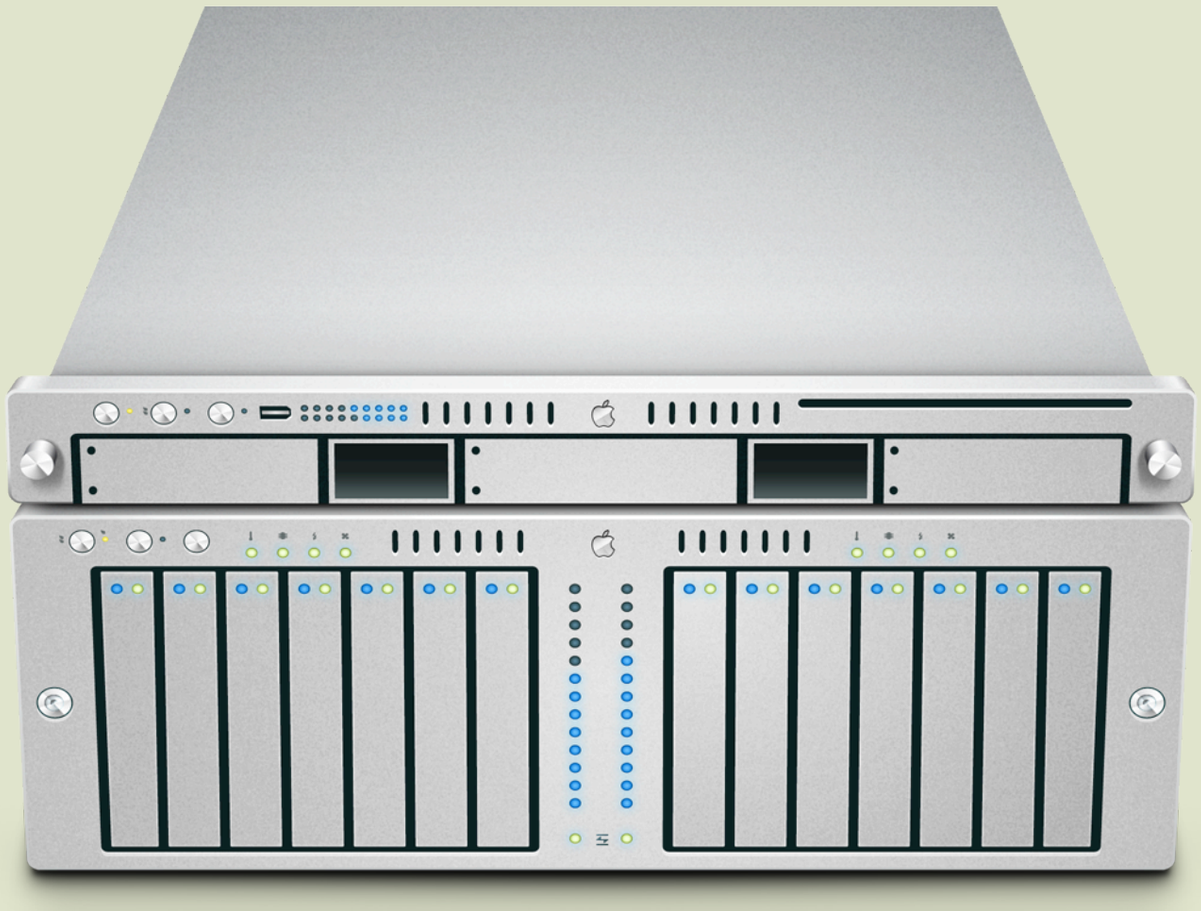
Managing Macs with Puppet

Puppet?

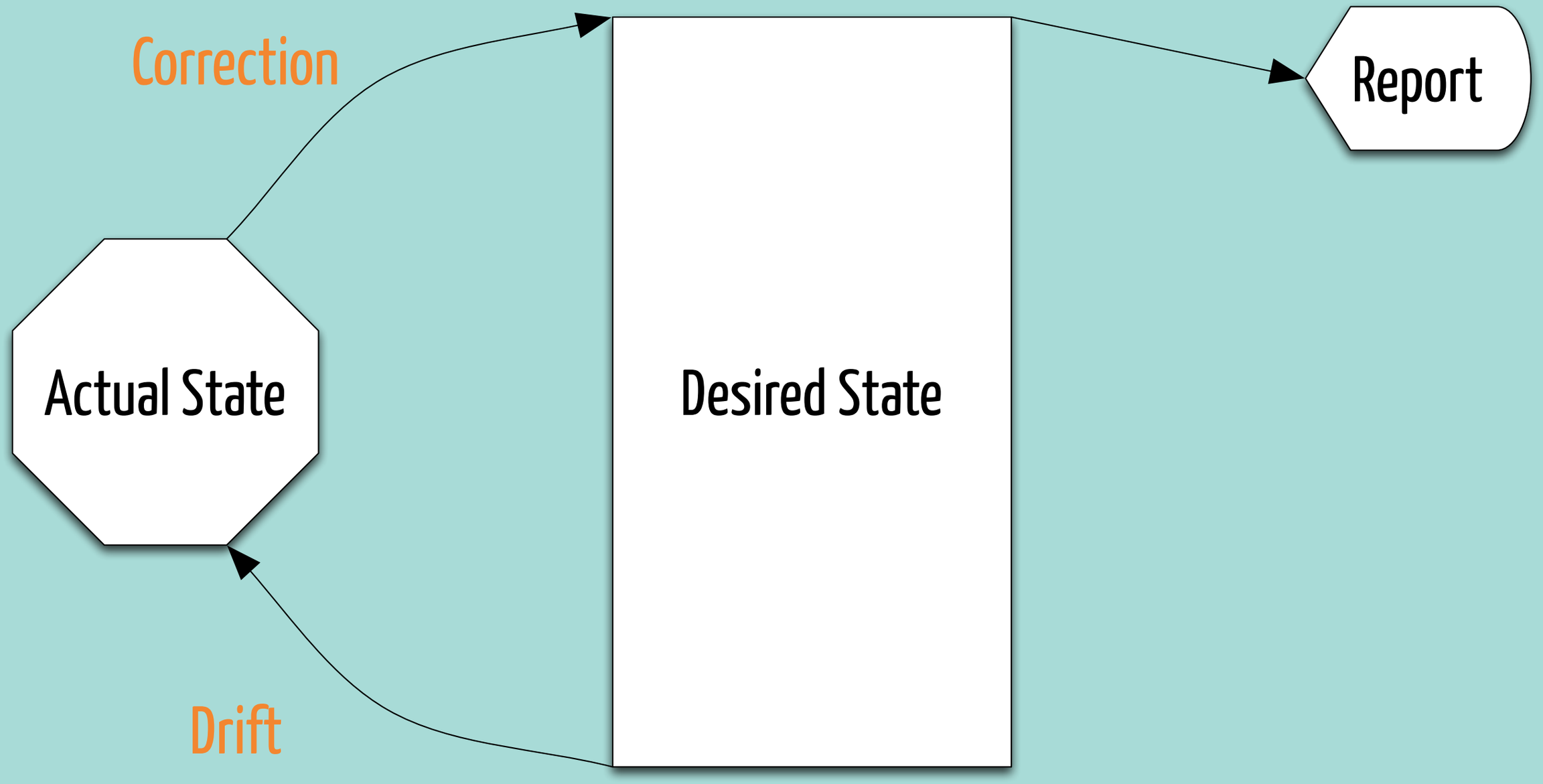
How I used to do it



Here be dragons

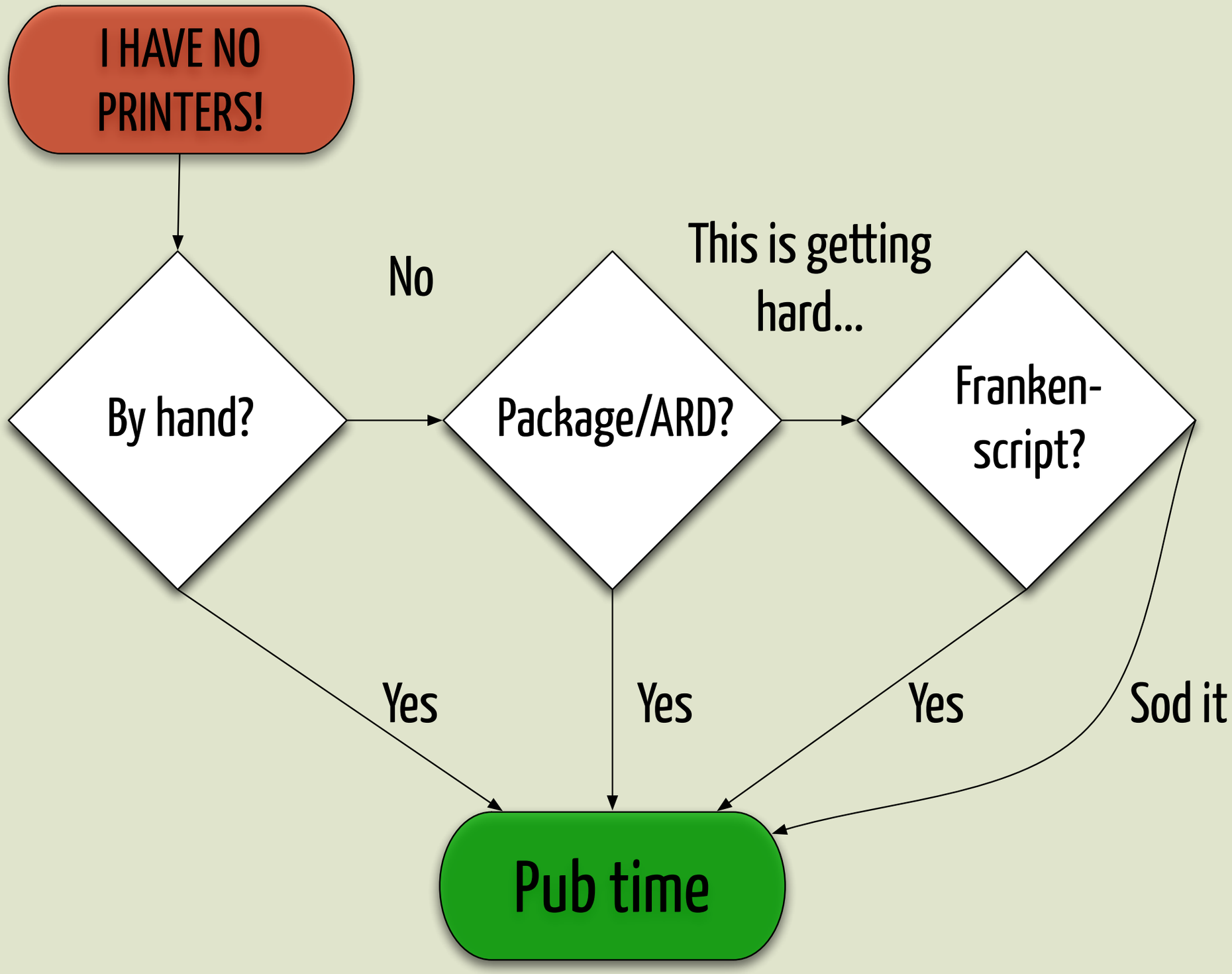
Puppet maintains a Mac in a desired state

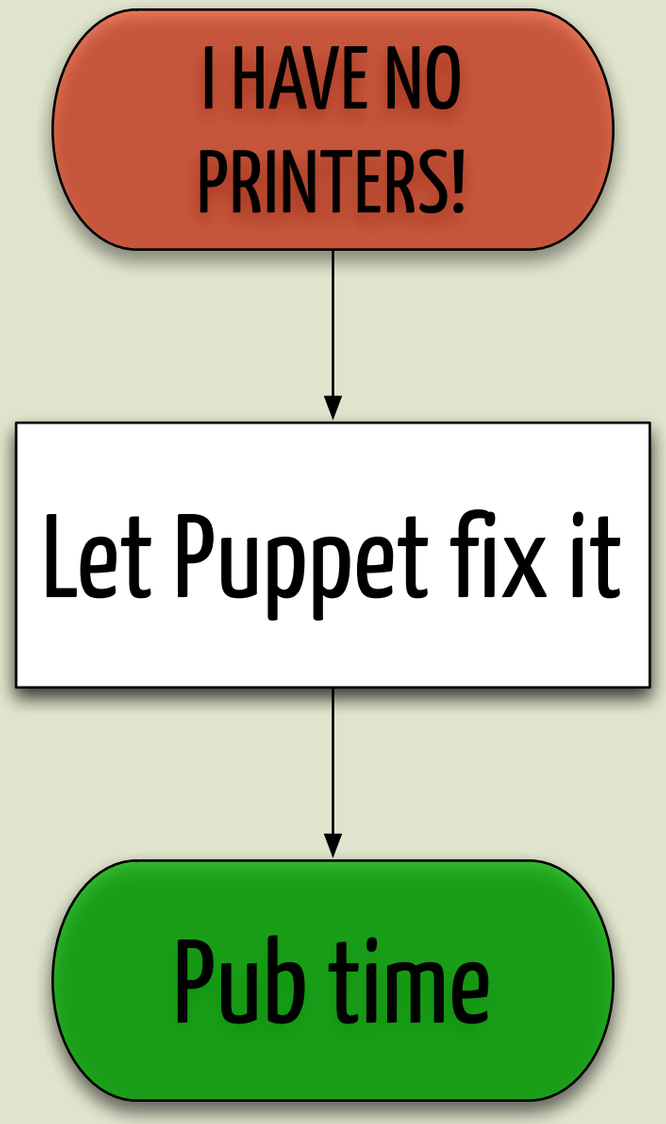
WAT?


Correction
Report
Actual State
Desired State
Drift

“I just did something in ARD and deleted all the printers.”

!FAIL!


I HAVE NO PRINTERS!
By hand?
No
Package/ARD?
This is getting hard...
Franken-script?
Yes
Yes
Yes
Sod it
Pub time


I HAVE NO PRINTERS!
Let Puppet fix it
Pub time

The User Template

/System/Library/User Template/Non_localized/

```
file {'/System/Library/User Template/Non_localized/Library/Preferences':
    ensure => 'directory',
    group  => wheel,
    mode   => 700,
    owner  => root,
}

file { "/System/Library/User Template/Non_localized/Library/Preferences/
com.apple.desktop.plist":
    ensure => present,
    source => "puppet:///modules/user_template/com.apple.desktop.plist",
    owner  => root,
    group  => wheel,
    mode   => 700,
}
```

“Language to describe what you want, not how you get there.”

@glarizza

```
file {'/System/Library/User Template/Non_localized/Library/Preferences':
    ensure => 'directory',
    group  => wheel,
    mode   => 700,
    owner  => root,
}

file { "/System/Library/User Template/Non_localized/Library/Preferences/
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    ensure => present,
    source => "puppet:///modules/user_template/com.apple.desktop.plist",
    owner  => root,
    group  => wheel,
    mode   => 700,
}
```

Infrastructure as code

```
file {'/etc/puppet/puppet.conf':
    ensure  => 'present',
    owner   =>  root,
    group   =>  wheel,
    mode    =>  0644,
    source  =>  puppet:///modules/my_module/
puppet.conf,
}
```

```
if $::operatingsystem == "Darwin" {
    file {'/etc/puppet/puppet.conf':
        ensure  => 'present',
        owner   =>  root,
        group   =>  wheel,
        mode    =>  0644,
        source  =>  puppet:///modules/my_module/
puppet.conf,
    }
}
```

```
if $::operatingsystem == "Darwin" {
    file {'/etc/puppet/puppet.conf':
        ensure  => 'present',
        owner   =>  root,
        group   =>  wheel,
        mode    =>  0644,
        source  =>  puppet:///modules/my_module/
puppet.conf,
    }
}
```

Factor

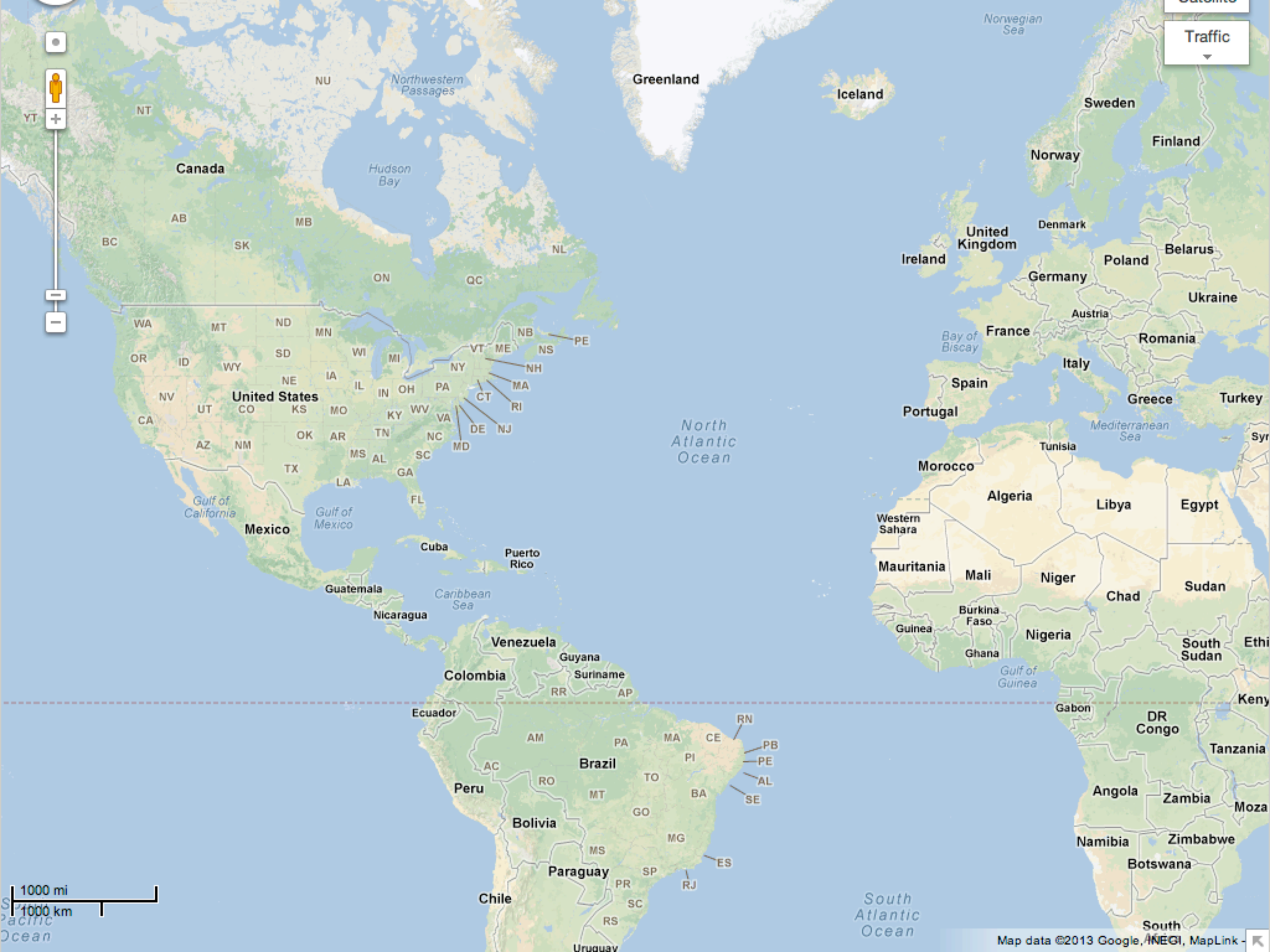
What's the OS?

What network is the machine on?

Is it a VM?

How much RAM does the machine have?

So what?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```
if ($network_en0 == '10.30.2.0'){
    printer { "Sharp_ARM316":
        ensure      => present,
        uri         => "lpd://10.30.2.10",
        description => "Sharp ARM316",
        shared      => false,
        ppd         => "/Library/Printers/PPDs/Contents/Resources/SHARP
AR-M316.PPD.gz",
    }
}
if ($network_en0 == '10.30.10.0'){
    printer { "SF_Xerox_7556":
        ensure      => present,
        uri         => "lpd://10.30.10.10",
        description => "SF Xerox 7556",
        shared      => false,
        ppd         => "/Library/Printers/PPDs/Contents/Resources/Xerox
WC 7556.gz",
    }
}
```

Here's the science bit

Master = Your server

Agent / Node = Your Macs

Class = Collection of resources

Group = Contains nodes, has classes

Show me the money

Lessons Learnt

All things to all men

All things to all men

Start Small

Do something real

Use Git

Use GitHub

Autosigning is your friend

sometimes

Autosigning is your

friend

Refine your code

What's next?

@grahamgilbert
grahamgilbert.com
github.com/grahamgilbert/puppet_psu_2013