Core Types Cheat Sheet

HELLO WORLD

notify

Sends an arbitrary message to the agent run-time log.

```
notify { "This message is getting logged on the agent node.": }

notify { "Mac warning":
     message => $operatingsystem ? {
          'Darwin' => "This seems to be a Mac.",
          default => "And I'm a PC.",
     },
}
```

ATTRIBUTES

- `message` — **Defaults to title.**
- See also: `withpath`

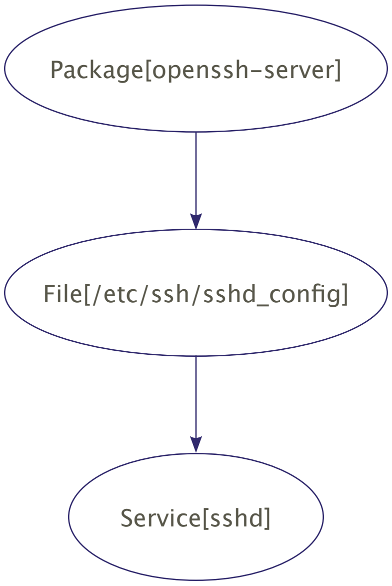
THE TRIFECTA

Package/file/service: Learn it, live it, love it. If you can only do this, you can still do a lot.

```
package { 'openssh-server':
     ensure => installed,
}

file { '/etc/ssh/sshd_config':
     source  => 'puppet:///modules/sshd/sshd_config',
     owner   => 'root',
     group   => 'root',
     mode    => '640',
     notify  => Service['sshd'], # sshd will restart whenever you
                edit this file.
     require => Package['openssh-server'],
}

service { 'sshd':
     ensure => running,
     enable => true,
     hasstatus => true,
     hasrestart => true,
}
```



file

Manages local files.

ATTRIBUTES

- `ensure` — Whether the file should exist, and what it should be.
  - present
  - absent
  - file
  - directory
  - link
- `path` — The fully qualified path to the file; **defaults to title.**
- `source` — Where to download the file. A puppet:/// URL to a file on the master, or a path to a local file on the agent.
- `content` — A string with the file's desired contents. Most useful when paired with templates, but you can also use the output of the file function.
- `target` — The symlink target. (When ensure => link.)
- `recurse` — Whether to recursively manage the directory. (When ensure => directory.)
  - true or false
- `purge` — Whether to keep unmanaged files out of the directory. (When recurse => true.)
  - true or false
- `owner` — By name or UID.
- `group` — By name or GID.
- `mode` — Must be specified exactly. Does the right thing for directories.
- See also: `backup, checksum, force, ignore, links, provider, recurselimit, replace, selrange, selrole, seltype, seluser, sourceselect, type.`

package

Manages software packages. Some platforms have better package tools than others, so you'll have to do some research on yours; check the type reference for more info.

ATTRIBUTES

- `ensure` — The state for this package.
  - present
  - latest
  - {any version string}
  - absent
  - purged (Potentially dangerous. Ensures absent, then zaps configuration files and dependencies, including those that other packages depend on. Provider-dependent.)
- `name` — The name of the package, as known to your packaging system; **defaults to title.**
- `source` — Where to obtain the package, if your system's packaging tools don't use a repository.
- See also: `adminfile, allowcdrom, category, configfiles, description, flavor, instance, platform, provider, responsefile, root, status, type, vendor.`

service

Manages services running on the node. Like with packages, some platforms have better tools than others, so read up. To restart a service whenever a file changes, subscribe to the file or have the file notify the service.
`(subscribe => File['sshd_config'] or notify => Service['sshd'])`

ATTRIBUTES

- `ensure` — The desired status of the service.
  - running (or true)
  - stopped (or false)
- `enable` — Whether the service should start on boot. Doesn't work everywhere.
  - true or false
- `name` — The name of the service to run; **defaults to title.**
- `status, start, stop, and restart` — Manually specified commands for working around bad init scripts.
- `hasrestart` — Whether to use the init script's restart command instead of stop+start. Defaults to false.
  - true or false
- `hasstatus` — Whether to use the init script's status command instead of grepping the process table. Defaults to false.
  - true or false
- `pattern` — A regular expression to use when grepping the process table. Defaults to the name of the service.
- See also: `binary, control, manifest, path, provider.`

GRAB BAG

exec

Executes an arbitrary command on the agent node. When using execs, make sure the command can be safely run multiple times or specify that it should only run under certain conditions.

ATTRIBUTES

- `command` — The command to run; **defaults to title.** If this isn't a fully-qualified path, use the path attribute.
- `path` — A search path for executables; colon-separated list or an array. This is most useful as a resource default, e.g.:

```
Exec {
     path => [
          '/usr/local/bin',
          '/opt/local/bin',
          '/usr/bin',
          '/usr/sbin',
          '/bin',
          '/sbin'],
     logoutput => true,
}

exec {'pwd':}
exec {'whoami':}
```

- `creates` — A file created by this command; if the file exists, the command won't run.
- `refreshonly` — If true, the exec will only run if a resource it subscribes to (or a resource which notifies it) has changed.
  - true or false
- `onlyif` — A command or array of commands; if any have a non-zero return value, the command won't run.
- `unless` — The opposite of onlyif.
- `environment` — An array of environment variables to set (e.g. `['MYVAR=somevalue', 'OTHERVAR=othervalue']`).
- See also: `cwd, group, logoutput, returns, timeout, tries, try_ sleep, user.`

cron

Manages cron jobs. Largely self-explanatory.

```
cron { logrotate:
     command => "/usr/sbin/logrotate",
     user => root,
     hour => 2,
     minute => 0
}
```

ATTRIBUTES

- `command` — The command to execute.
- `ensure` — Whether the job should exist.
  - present
  - absent
- `hour, minute, month, monthday, and weekday` — The timing of the cron job.
- See also: `environment, name, provider, special, target, user.`

user

Manages user accounts; mostly used for system users.

```
user { "dave":
     ensure     => present,
     uid        => '507',
     gid        => 'admin',
     shell      => '/bin/zsh',
     home       => '/home/dave',
     managehome => true,
}
```

ATTRIBUTES

- `name` **(defaults to title)**
- `uid` — The user ID. Must be specified numerically; chosen automatically if omitted.
- `ensure` — Whether the user should exist.
  - present
  - absent
  - role
- `gid` — The user's primary group. Can be specified numerically or by name.
- `groups` — An array of secondary groups to which the user belongs. (Don't include the group specified as the GID.)
- `home` — The user's home directory.
- `managehome` — Whether to manage the home directory when managing the user; if you don't set this to true, you'll need to create the user's home directory manually.
  - true or false

- `shell` — The user's login shell.
- See also: `allowdupe, auths, comment, expiry, key_membership, keys, membership, password, password_max_age, password_min_age, profile_membership, profiles, project, provider, role_membership, roles.`

group

Manages groups.

ATTRIBUTES

- `name` **(defaults to title)**
- `gid` — The group ID; must be specified numerically, and will be chosen automatically if omitted.
- `ensure` — Whether the group should exist.
  - present
  - absent
- See also: `allowdupe, auth_membership, members, provider.`

EVERYTHING ELSE

You are ready. Go check the types reference at
http://docs.puppetlabs.com/references/latest/type.html