

puppet 实战-puppet apply 命令的中文帮助信息详解

puppet apply 是 Puppet 的运行命令，主要在检测 manifests 时或在没有网络连接的情况下使用。不同于 puppet agent，puppet apply 在运行时不会连接 Master

命令: puppet apply #运行本地 manifests

```
-h|--help #查看帮助
-V|--version #显示版本信息
-d|--debug #启用完整的调试模式
-v|--verbose #显示详细信息
-e|--execute #执行命令中指定的 puppet 代码
--detailed-exitcodes #提供详细的退出代码
-l|--logdest <file> #日志发送方式，默认采用 syslog 配置
--catalog <catalog> #运行 puppet master 采用--compile 输出 JSON 代码
```

```
[root@linux57poc ~]# puppet help apply

puppet-apply(8) -- Apply Puppet manifests locally
=====

SYNOPSIS
-----
Applies a standalone Puppet manifest to the local system.

USAGE
-----
puppet apply [-h|--help] [-V|--version] [-d|--debug] [-v|--verbose]
  [-e|--execute] [--detailed-exitcodes] [-l|--logdest <file>]
  [--apply <catalog>] [--catalog <catalog>] <file>

DESCRIPTION
-----
This is the standalone puppet execution tool; use it to apply
individual manifests.

When provided with a modulepath, via command line or config file, puppet
apply can effectively mimic the catalog that would be served by puppet
master with access to the same modules, although there are some subtle
```

differences. When combined with scheduling and an automated system for pushing manifests, this can be used to implement a serverless Puppet site.

Most users should use 'puppet agent' and 'puppet master' for site-wide manifests.

OPTIONS

Note that any configuration parameter that's valid in the configuration file is also a valid long argument. For example, 'modulepath' is a valid configuration parameter, so you can specify '--tags <class>,<tag>' as an argument.

See the configuration file documentation at <http://docs.puppetlabs.com/references/stable/configuration.html> for the full list of acceptable parameters. A commented list of all configuration options can also be generated by running puppet with '--genconfig'.

* --debug:

Enable full debugging.

* --detailed-exitcodes:

Provide transaction information via exit codes. If this is enabled, an exit code of '2' means there were changes, an exit code of '4' means there were failures during the transaction, and an exit code of '6' means there were both changes and failures.

* --help:

Print this help message

* --loadclasses:

Load any stored classes. 'puppet agent' caches configured classes (usually at /etc/puppet/classes.txt), and setting this option causes all of those classes to be set in your puppet manifest.

* --logdest:

Where to send messages. Choose between syslog, the console, and a log file. Defaults to sending messages to the console.

* --execute:

Execute a specific piece of Puppet code

```
* --verbose:
    Print extra information.

* --apply:
    Apply a JSON catalog (such as one generated with 'puppet master --compile'). You
    can
    either specify a JSON file or pipe in JSON from standard input. Deprecated, please
    use --catalog instead.

* --catalog:
    Apply a JSON catalog (such as one generated with 'puppet master --compile'). You
    can
    either specify a JSON file or pipe in JSON from standard input.
```

EXAMPLE

```
-----
$ puppet apply -l /tmp/manifest.log manifest.pp
$ puppet apply --modulepath=/root/dev/modules -e "include ntpd::server"
$ puppet apply --catalog catalog.json
```

AUTHOR

```
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COPYRIGHT

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```

举例说明:

以下为写好的 puppet 模块，目的是通过 erb 模板创建/etc/motd 文件

```
[root@linux58poc puppet]# mkdir -p /etc/puppet/modules/motd/manifests
[root@linux58poc puppet]# mkdir -p /etc/puppet/modules/motd/templates
[root@linux58poc puppet]# mkdir -p /etc/puppet/modules/motd/files
[root@linux58poc puppet]# vim /etc/puppet/modules/motd/manifests/init.pp
class motd{
  package{ setup:
    ensure => present,
```

```
}
file{ "/etc/motd":
  owner   => "root",
  group   => "root",
  mode    => 0400,
  content => template("motd/motd.erb"),
  require => Package["setup"],
}
}
[root@linux58poc puppet]# vim /etc/puppet/modules/motd/templates/motd.erb
-----a few of facter values-----
myhostname = <%= hostname%>
eth0_ip = <%= ipaddress_eth0%>
kernel = <%= kernelrelease%>
system release = <%= lsbdistdescription%>
puppetversion = <%= puppetversion%>
rubyversion = <%= rubyversion%>
.....
....
-----
[root@linux58poc puppet]#
```

eg.将输出信息输出到日志文件中

```
[root@linux58poc ~]# cat /tmp/motd.log
Thu Jan 09 05:32:37 +0800 2014 Puppet (notice): Finished catalog run in 0.04
seconds
[root@linux58poc ~]# puppet apply --debug -l /tmp/motd.log
/etc/puppet/modules/motd/manifests/init.pp
[root@linux58poc ~]# cat /tmp/motd.log
Thu Jan 09 05:32:37 +0800 2014 Puppet (notice): Finished catalog run in 0.04
seconds
Thu Jan 09 05:33:02 +0800 2014 Puppet (info): Loading facts in
/var/lib/puppet/lib/facter/fact_apply.rb
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Creating default schedules
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Failed to load library 'ldap' for
feature 'ldap'
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Puppet::Type::User::ProviderLdap:
feature ldap is missing
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug):
Puppet::Type::User::ProviderUser_role_add: file roleadd does not exist
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Puppet::Type::User::ProviderPw: file
pw does not exist
```

```
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug):
Puppet::Type::User::ProviderDirectoryservice: file /usr/bin/dscl does not exist
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/state/graphs] (debug):
Autorequiring File[/var/lib/puppet/state]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/facts] (debug): Autorequiring
File[/var/lib/puppet]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/ssl/certs] (debug):
Autorequiring File[/var/lib/puppet/ssl]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/state/last_run_summary.yaml]
(debug): Autorequiring File[/var/lib/puppet/state]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/ssl/certs/ca.pem] (debug):
Autorequiring File[/var/lib/puppet/ssl/certs]
Thu Jan 09 05:33:02 +0800 2014 /File[/etc/puppet/namespaceauth.conf] (debug):
Autorequiring File[/etc/puppet]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/state/last_run_report.yaml]
(debug): Autorequiring File[/var/lib/puppet/state]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/ssl/private] (debug):
Autorequiring File[/var/lib/puppet/ssl]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/client_data] (debug):
Autorequiring File[/var/lib/puppet]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/ssl/crl.pem] (debug):
Autorequiring File[/var/lib/puppet/ssl]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/ssl/public_keys] (debug):
Autorequiring File[/var/lib/puppet/ssl]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/ssl/certificate_requests]
(debug): Autorequiring File[/var/lib/puppet/ssl]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/ssl] (debug): Autorequiring
File[/var/lib/puppet]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/client_yaml] (debug):
Autorequiring File[/var/lib/puppet]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/state] (debug): Autorequiring
File[/var/lib/puppet]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/state/resources.txt] (debug):
Autorequiring File[/var/lib/puppet/state]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/state/state.yaml] (debug):
Autorequiring File[/var/lib/puppet/state]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/ssl/private_keys] (debug):
Autorequiring File[/var/lib/puppet/ssl]
Thu Jan 09 05:33:02 +0800 2014 /File[/var/lib/puppet/lib] (debug): Autorequiring
File[/var/lib/puppet]
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Finishing transaction 23661132012600
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Loaded state in 0.03 seconds
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Loaded state in 0.00 seconds
```

```
Thu Jan 09 05:33:02 +0800 2014 Puppet (info): Applying configuration version
'1389216782'
Thu Jan 09 05:33:02 +0800 2014 /Schedule[daily] (debug): Skipping device resources
because running on a host
Thu Jan 09 05:33:02 +0800 2014 /Schedule[monthly] (debug): Skipping device
resources because running on a host
Thu Jan 09 05:33:02 +0800 2014 /Schedule[hourly] (debug): Skipping device resources
because running on a host
Thu Jan 09 05:33:02 +0800 2014 /Schedule[never] (debug): Skipping device resources
because running on a host
Thu Jan 09 05:33:02 +0800 2014 /Schedule[weekly] (debug): Skipping device resources
because running on a host
Thu Jan 09 05:33:02 +0800 2014 /Schedule[puppet] (debug): Skipping device resources
because running on a host
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Finishing transaction 23661133266940
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Storing state
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Stored state in 0.02 seconds
Thu Jan 09 05:33:02 +0800 2014 Puppet (notice): Finished catalog run in 0.04
seconds
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Finishing transaction 23661132292240
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Received report to process from
linux58poc.localdomain
Thu Jan 09 05:33:02 +0800 2014 Puppet (debug): Processing report from
linux58poc.localdomain with processor Puppet::Reports::Store
```

eg. 在本地运行命令，加载一个类，创建 motd 文件

```
[root@linux58poc ~]# rm -rf /etc/motd
[root@linux58poc ~]# puppet apply -e "include motd" --noop
notice: /Stage[main]/Motd/File[/etc/motd]/ensure: current_value absent, should be
file (noop)
notice: Class[Motd]: Would have triggered 'refresh' from 1 events
notice: Stage[main]: Would have triggered 'refresh' from 1 events
notice: Finished catalog run in 0.17 seconds

[root@linux58poc ~]# puppet apply -e "include motd"
notice: /Stage[main]/Motd/File[/etc/motd]/ensure: defined content as
'{md5}b05f87905d7b6d2608f71502906dcaeb'
notice: Finished catalog run in 0.17 seconds
[root@linux58poc ~]# cat /etc/motd
-----a few of facter values-----
myhostname = linux58poc
eth0_ip = 192.168.100.126
kernel = 2.6.18-308.el5
```

```
system release = Red Hat Enterprise Linux Server release 5.8 (Tikanga)
puppetversion = 2.7.23
rubyversion = 1.8.7
.....
....
-----
```

为了能够和大家更好的交流和学习 Puppet，本人 2014 年又新开辟了微信公众号进行交流学习，目前已经有 300 多人同时收听，喜欢 Puppet 的大神们可自行加入哦。

如果你有好的有关 Puppet 的咨询也可以给我投稿，投稿邮箱：admin@kisspuppet.com

微信公众号：“**puppet2014**”，可搜索加入，也可以扫描以下二维码

