

puppet full tutorial>>

<http://www.example42.com/tutorials/PuppetTutorial>

Puppet installation and manifest

@ Puppet installation

*****SERVER-SIDE*****

server-side {puppet-master configuration}

remove all puppet and its dependencies

apt-get purge puppet puppet-common

update system

apt-get update && apt-get -y upgrade && apt-get install -y nano wget

change hostname and /etc/hosts so that change the FQDN

install ntp for accurate time to sync with puppet-agents

sudo apt-get -y install ntp

service ntp restart

update the repository for get latest puppet

wget https://apt.puppetlabs.com/puppetlabs-release-trusty.deb

dpkg -i puppetlabs-release-trusty.deb

apt-get update

apt-get install puppetmaster

edit the configuration {/etc/puppet/puppet.conf}

(cert and dns... for used if puppet is integrated with apache, because apache take puppet master name as puppet not our FQDN,we do this for resolve that issue)

nano /etc/puppet/puppet.conf

#templatedir=\$confdir/templates

cert=puppet

dns_alt_names=puppet,puppetmaster.biz.com

edit the configuration {/etc/default/puppetmaster}

nano /etc/default/puppetmaster

START=yes

service puppetmaster start

check the version

puppet -V

edit the configuration file /etc/puppet/fileserver.conf
(indeed for adding some files from master to agent)

nano /etc/puppet/fileserver.conf

*#[Extra-files]
#path /etc/puppet/files
#allow **

change this to

*[files]
path /etc/puppet/files
allow **

1) mkdir -p [puppet-home]/files # create a dir "files" under [puppet-home] eg :
/etc/puppet

2) add the files need to copy to agents in "files" dir

3) source => 'puppet:///files/added-item'

*******AGENT-SIDE*******

agent configuration {puppet-agent configuration}

remove all puppet and its dependencies

apt-get purge puppet puppet-common

update system

apt-get update && apt-get -y upgrade && apt-get install -y nano wget

change hostname and /etc/hosts so that change the FQDN

install ntp for accurate time to sync with puppet-agents

```
sudo apt-get -y install ntp
```

```
service ntp restart
```

update the repository for get latest puppet

```
wget https://apt.puppetlabs.com/puppetlabs-release-trusty.deb
```

```
dpkg -i puppetlabs-release-trusty.deb
```

```
apt-get update
```

check the time of server and agent are same or not

```
date
```

edit the configuration {/etc/puppet/puppet.conf}

(cert and dns... for used if puppet is integrated with apache, because apache take puppet master name as puppet not our FQDN, we do this for resolve that issue)

```
nano /etc/puppet/puppet.conf
```

```
#templatedir=$confdir/templates
```

```
#[master]
```

```
## These are needed when the puppetmaster is run by passenger
```

```
## and can safely be removed if webrick is used.
```

```
#ssl_client_header = SSL_CLIENT_S_DN
```

```
#ssl_client_verify_header = SSL_CLIENT_VERIFY
```

```
[agent]
```

```
server=puppetmaster.biz.com
```

edit the configuration {/etc/default/puppetmaster}

```
nano /etc/default/puppetmaster
```

```
START=yes
```

add the master's FQDN in /etc/hosts and try to ping

```
nano /etc/hosts
```

```
ping puppetmaster.biz.com
```

establish the connection from client side by sending ssl key

puppet agent -t

********SERVER-SIDE********

list all certificates

puppet cert list --all

it will shows some certs but accepted certificates have “+” sign in the first line.

puppet cert sign puppet-agent-name

********AGENT-SIDE********

check from the client side

puppet agent --fingerprint

********SERVER-SIDE********

configure the manifest

nano /etc/puppet/manifests/site.pp

********AGENT-SIDE********

after creating manifest, run the agent for testing

puppet agent -t

links::

<https://www.howtoforge.com/puppet-ubuntu-14.04>

******MANIFEST******

@ manifest

code writing

```
resource_type { 'resource_name'  
  attribute => value  
  ...  
}
```

class name

```
{  
  ..code..  
}
```

single node

```
node 'node-name',  
{  
  ..code..  
  or  
  include class  
}
```

multiple nodes

```
node 'node-name-1', 'node-name-2', 'node-name-3',  
{  
  ..code..  
  or  
  include class  
}
```

multiple nodes ending with digits
(eg: www1,www32,www645)
node /^name\d+\$/,

```
node /^www\d+$/  
{  
  ..code..  
  or  
  include class  
}
```

multiple nodes having some common name
(eg: www.example,zzz.example)
node /^(node-1|node-2|...node-n).name\$/

```
node /^(www|zzz)\.example$/  
{  
  ..code..  
  or  
  include class  
}
```

useradding

```
user {'name',  
  ensure => 'present',  
  uid => '1500',  
  gid => '1500',  
  shell => '/bin/bash',  
  home => '/home/name'  
  require => group['name'],    # require that group adding before executing  
  require => class['class-name'],
```

create file or directory

```
file {'/path/name':  
  ensure => 'directory',      # change directory to file if need file  
  content => 'hai',           #this will append to that file  
  owner => 'name',  
  group => 'name',  
  mode => '0777',  
}
```

to create a group

```
group {'name':  
  ensure => present,  
  gid => '1500',  
}
```

to updating or do some command

```
exec { 'apt-update':  
  # exec resource named 'apt-update'  
  command => '/bin/apt-get update', # command this resource will run  
}
```

using scripts we can make it more confort

```
class mysql  
{  
  file {'/home/mysql.sh':  
    ensure => 'file',  
    source => 'puppet:///files/mysql.sh',  
    mode => 0777  
  }  
}
```

```
exec {'mysql':  
  command => '/home/mysql.sh',  
}  
}
```

```
node 'puppet-1'  
{  
  include mysql  
}
```


links:

https://docs.puppet.com/puppet/latest/reference/lang_node_definitions.html

source command >>>

<http://askubuntu.com/questions/90015/how-to-copy-files-to-all-machines-using-puppet-master>

full resource info >>

<https://docs.puppet.com/puppet/3.8/reference/type.html>