Fixed addresses. Associate mac address with ip so the same address is allocated to a machine
ddns-update-style none;

# If this DHCP server is the official DHCP server for the local
# network, the authoritative directive should be uncommented.
# authoritative;

# Use this to send dhcp log messages to a different log file (you also
# have to hack syslog.conf to complete the redirection).
# log-facility local7;

# No service will be given on this subnet, but declaring it helps the
# DHCP server to understand the network topology.

subnet 144.38.199.32 netmask 255.255.255.240 {
  # what part of this range should be served dynamically?
  range 144.38.199.40 144.38.199.46;
  #override a global option if you want
  option domain-name-servers 8.8.8.8;
  #option domain-name "foobar.com";
  option subnet-mask 255.255.255.240;
  option routers 144.38.199.33;
}

include "/etc/dhcp/IT3110-dhcp.txt";
# i could list the addresses in this file
# But i have chose to put them in the included file for clarity

# I have deleted everything below this for clarity (it was all comments)
"/etc/dhcp/dhcppd.conf" 50L, 1601C written
joe@dhcp:~$ sudo vi /etc/dhcp/IT3110-dhcp.txt

jfrancom@desdemona:~$ citv clonevm bionic_template_2019 fixed-1-2019 512 2003
jfrancom@desdemona:~$ cvt clonevm bionic_template_2019 fixed-2019 512 2003
jfrancom@desdemona:~$ city showvm | grep fixed
  fixed-1-2019   512  1 None:5955  2003 52:54:00:08:00:36  0/0 IT4
200
  fixed-2-2019   512  1 None:5956  2003 52:54:00:08:00:37  0/0 IT4
200
jfrancom@desdemona:~$
host client1 {
  hardware ethernet 52:54:00:08:00:36;
  fixed-address 144.38.199.36;
}

host client2 {
  hardware ethernet 52:54:00:08:00:37;
  fixed-address 144.38.199.38;
}
When assigning fixed addresses, make sure that they are NOT part of your 'range' statement.
When assigning fixed addresses, make sure that they are NOT part of your 'range' statement.

```
range 144.38.199.40 144.38.199.46;
```

See that my fixed addresses are not in that range.
jfrancom@desdemona:$ citv bootvm fixed-1-2019 c
/usr/bin/ssh -q cleopatra "/qemu/bin/qemu-boot 55 'jfrancom-fixed-1-2019' 512 '52:54:00:08:00:36' ' ' ' ' ' 'c' 1 1 2003 '/qemu/images';"
User(jfrancom) has booted machine(fixed-1-2019) on server(cleopatra:55) with 512 memory.
jfrancom@desdemona:$ citv bootvm fixed-2-2019 c
/usr/bin/ssh -q cleopatra "/qemu/bin/qemu-boot 56 'jfrancom-fixed-2-2019' 512 '52:54:00:08:00:37' ' ' ' ' ' 'c' 1 1 2003 '/qemu/images';"
User(jfrancom) has booted machine(fixed-2-2019) on server(cleopatra:56) with 512 memory.
jfrancom@desdemona:$ 
Jan 10 10:30:54 bionic-template dhcpd[10056]: Sending on LPF/ens4/52:54:00:08:00:32/144.38.199.32/28
Jan 10 10:30:54 bionic-template sh[10056]: Sending on Socket/fallback/fallback-net
Jan 10 10:30:54 bionic-template dhcpd[10056]: Server starting service.
Jan 10 10:32:38 bionic-template dhcpd[10056]: uid lease 144.38.199.40 for client 52:54:00:08:00:36 is duplicate on 144.38.199.32/28
Jan 10 10:32:38 bionic-template dhcpd[10056]: DHCPDISCOVER from 52:54:00:08:00:36 via ens4
Jan 10 10:32:38 bionic-template dhcpd[10056]: DHCPOFFER on 144.38.199.37 to 52:54:00:08:00:36 via ens4
Jan 10 10:32:38 bionic-template dhcpd[10056]: uid lease 144.38.199.40 for client 52:54:00:08:00:36 is duplicate on 144.38.199.32/28
Jan 10 10:32:38 bionic-template dhcpd[10056]: DHCPREQUEST for 144.38.199.37 (144.38.199.34) from 52:54:00:08:00:36 via ens4
Jan 10 10:32:38 bionic-template dhcpd[10056]: DHCPCONF on 144.38.199.37 to 52:54:00:08:00:36 via ens4
Jan 10 10:32:45 bionic-template dhcpd[10056]: uid lease 144.38.199.40 for client 52:54:00:08:00:37 is duplicate on 144.38.199.32/28
Jan 10 10:32:45 bionic-template dhcpd[10056]: DHCPDISCOVER from 52:54:00:08:00:37 via ens4
Jan 10 10:32:45 bionic-template dhcpd[10056]: DHCPOFFER on 144.38.199.38 to 52:54:00:08:00:37 via ens4
Jan 10 10:32:45 bionic-template dhcpd[10056]: uid lease 144.38.199.40 for client 52:54:00:08:00:37 is duplicate on 144.38.199.32/28
Jan 10 10:32:45 bionic-template dhcpd[10056]: DHCPREQUEST for 144.38.199.38 (144.38.199.34) from 52:54:00:08:00:37 via ens4
Jan 10 10:32:45 bionic-template dhcpd[10056]: DHCPCONF on 144.38.199.38 to 52:54:00:08:00:37 via ens4