

POWERDNS WITH POWERADMIN & BACKEND MYSQL

Note :

OS : Ubuntu 14.04

NS1 : 192.168.100.51/24 (ns1.raisa.net).

Host1 : 192.168.100.7/24 (www.padli.org, www.mail.padli.org).

Host2 : 192.168.100.20/24 (www.host1.co.id, www.host2.co.id).

1. set ip ns1.

```
padli@ns1:~$ ifconfig
eth0      Link encap:Ethernet HWaddr a6:53:64:60:dc:06
          inet addr:192.168.100.51 Bcast:192.168.100.255 Mask:255.255.255.0
          inet6 addr: fe80::a453:64ff:fe60:dc06/64 Scope:Link
          UP BROADCAST RUNNING MULTICAST MTU:1500 Metric:1
          RX packets:152 errors:0 dropped:0 overruns:0 frame:0
          TX packets:86 errors:0 dropped:0 overruns:0 carrier:0
          collisions:0 txqueuelen:1000
          RX bytes:15324 (15.3 KB) TX bytes:10515 (10.5 KB)

lo       Link encap:Local Loopback
          inet addr:127.0.0.1 Mask:255.0.0.0
          inet6 addr: ::1/128 Scope:Host
          UP LOOPBACK RUNNING MTU:65536 Metric:1
          RX packets:0 errors:0 dropped:0 overruns:0 frame:0
          TX packets:0 errors:0 dropped:0 overruns:0 carrier:0
          collisions:0 txqueuelen:0
          RX bytes:0 (0.0 B) TX bytes:0 (0.0 B)

padli@ns1:~$
```

2. set hostname ns1.

```
padli@ns1:~$ more /etc/hostname
ns1.raisa.net
padli@ns1:~$
```

3. update & upgrade sistem ns1.

```
padli@ns1:~$ sudo apt-get update && sudo apt-get upgrade -y
```

4. install lib bahasa indonesia.

```
padli@ns1:~$ sudo apt-get install languange-pack-id
```

5. install mysql.

```
padli@ns1:~$ sudo apt-get install mysql-server mysql-client
```

6. set passwd user root.

```
padli@ns1:~$ sudo dpkg-reconfigure mysql-server-5.5
Package configuration

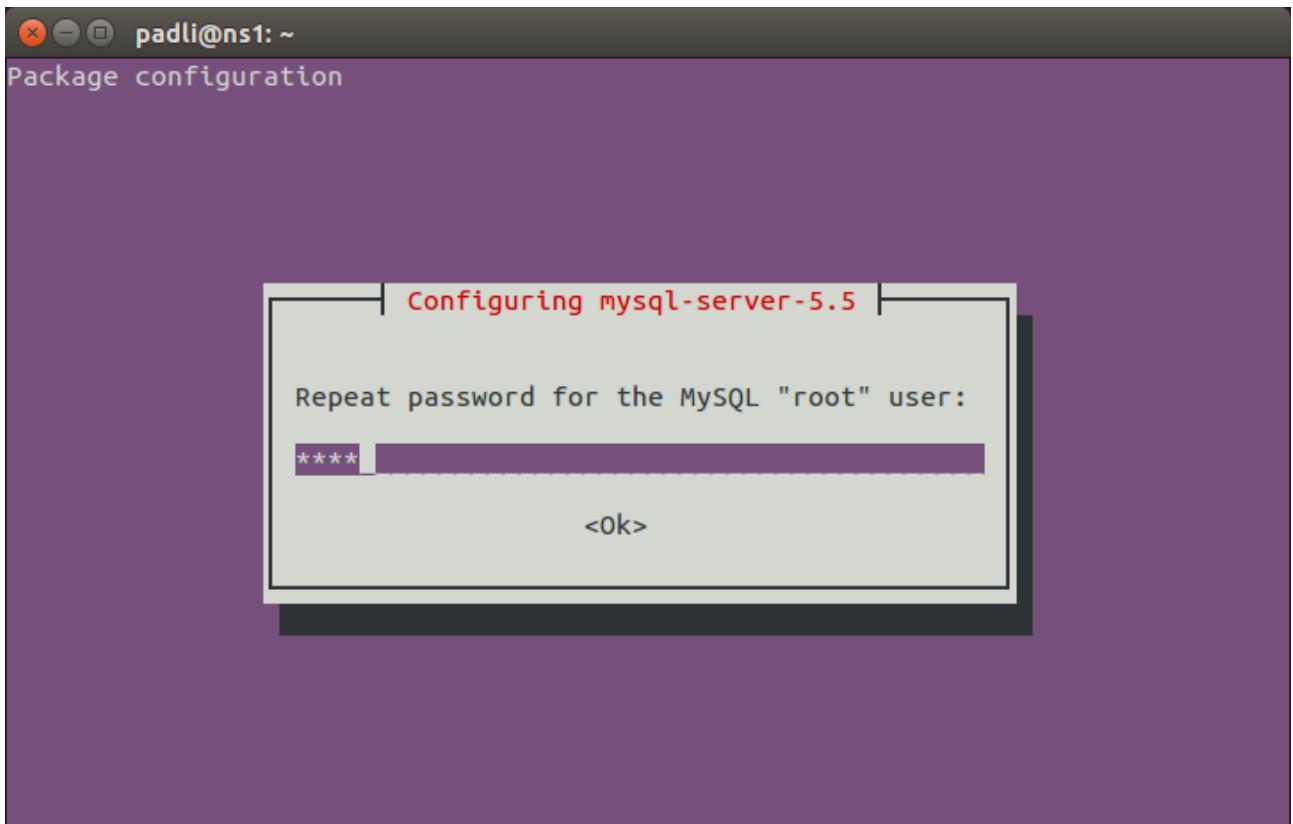
Configuring mysql-server-5.5
While not mandatory, it is highly recommended that you set a password
for the MySQL administrative "root" user.

If this field is left blank, the password will not be changed.

New password for the MySQL "root" user:
*****
```

<Ok>

7. konfirmasi passwd root.



8. edit file "nano /etc/mysql/my.cnf" set off bind-address.

A screenshot of a terminal window titled "padli@ns1: ~". The window shows the "GNU nano 2.2.6" editor with the file "/etc/mysql/my.cnf" open. The file contains MySQL configuration settings, including the line "#bind-address = 127.0.0.1" which is highlighted with a cursor. The bottom of the screen shows the nano editor's command-line interface with various keyboard shortcuts.

9. restart.

```
padli@ns1:~$ sudo reboot
```

10. install nmap.

```
padli@ns1:~$ sudo apt-get install nmap
```

11. cek port yg aktif.

```
padli@ns1:~$ sudo nmap localhost

Starting Nmap 6.40 ( http://nmap.org ) at 2015-08-19 15:13 WIB
Nmap scan report for localhost (127.0.0.1)
Host is up (0.000017s latency).
Other addresses for localhost (not scanned): 127.0.0.1
Not shown: 998 closed ports
PORT      STATE SERVICE
22/tcp    open  ssh
3306/tcp  open  mysql

Nmap done: 1 IP address (1 host up) scanned in 89.43 seconds
padli@ns1:~$
```

12. cek mysql.

```
padli@ns1:~$ mysql -u root -p
Enter password:
Welcome to the MySQL monitor.  Commands end with ; or \g.
Your MySQL connection id is 36
Server version: 5.5.44-0ubuntu0.14.04.1 (Ubuntu)

Copyright (c) 2000, 2015, Oracle and/or its affiliates. All rights reserved.

Oracle is a registered trademark of Oracle Corporation and/or its
affiliates. Other names may be trademarks of their respective
owners.

Type 'help;' or '\h' for help. Type '\c' to clear the current input statement.

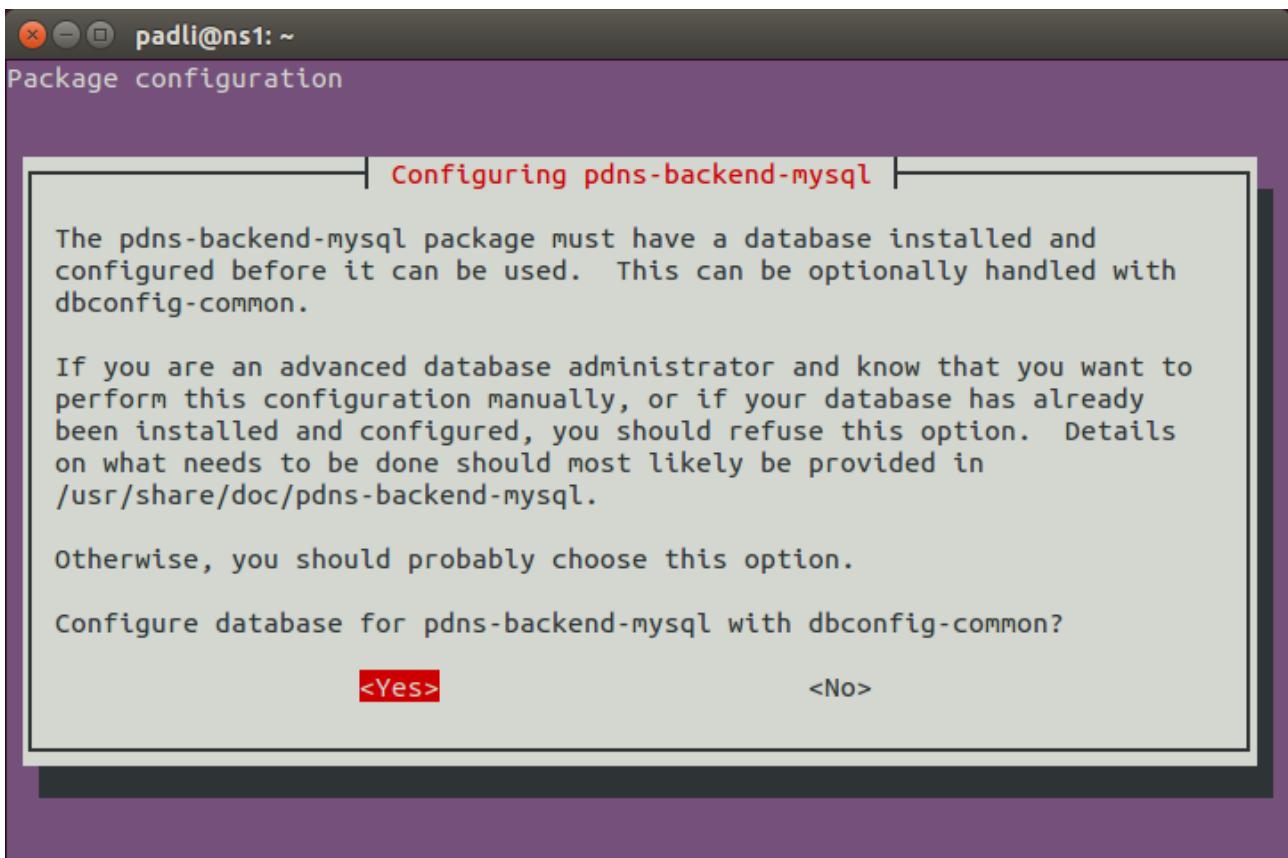
mysql> show databases;
+---------------------+
| Database           |
+-----+
| information_schema |
| mysql               |
| performance_schema |
+-----+
3 rows in set (0.03 sec)

mysql> 
```

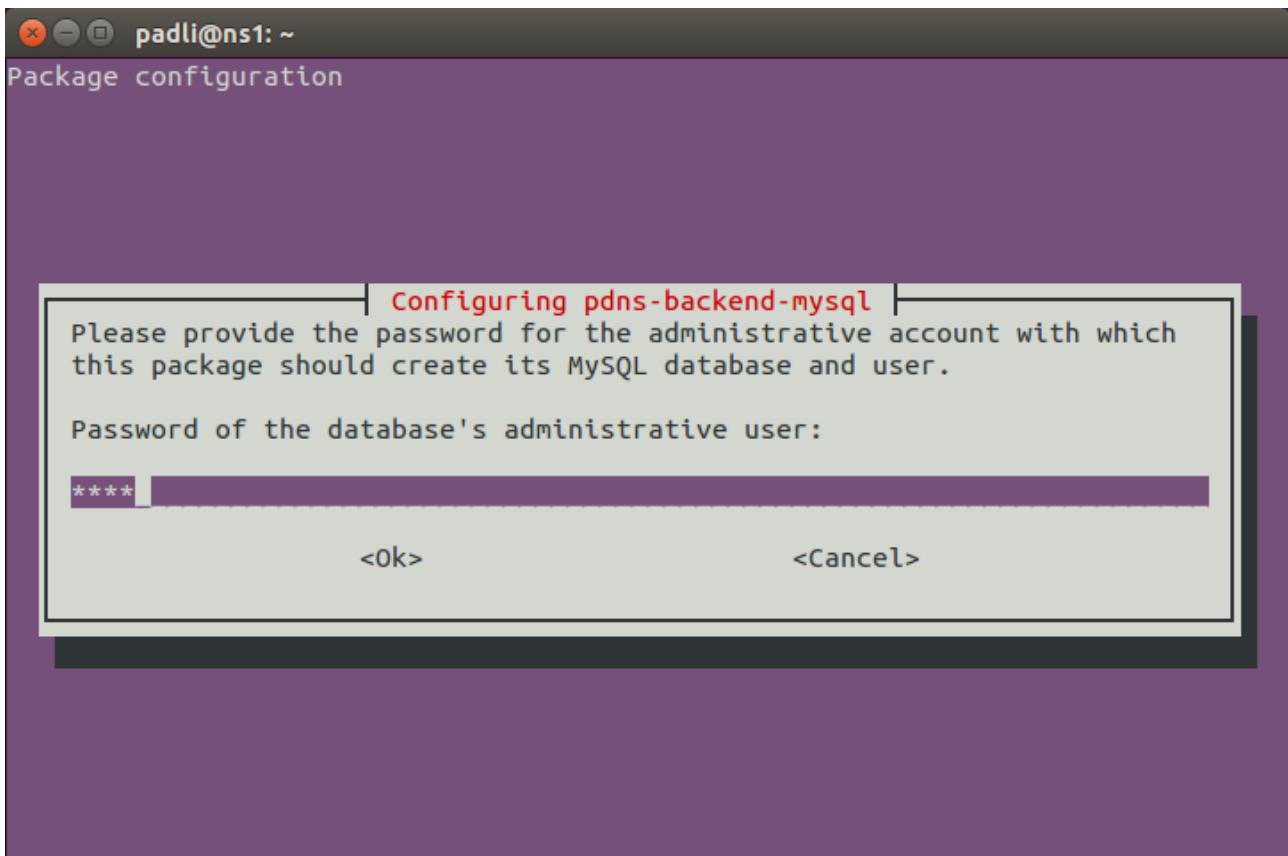
13. install powerdns.

```
padli@ns1:~$ sudo apt-get install pdns-server pdns-backend-mysql
```

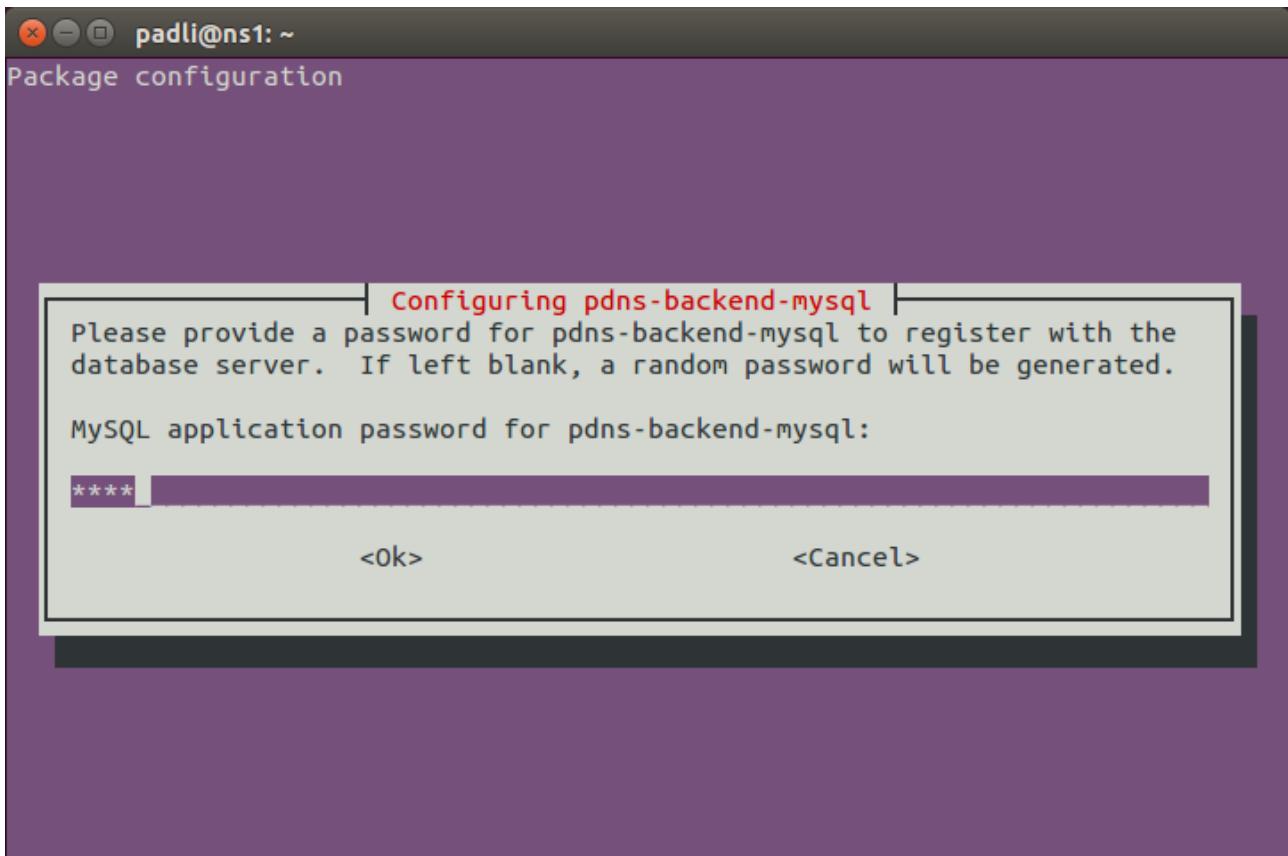
14. set yes.



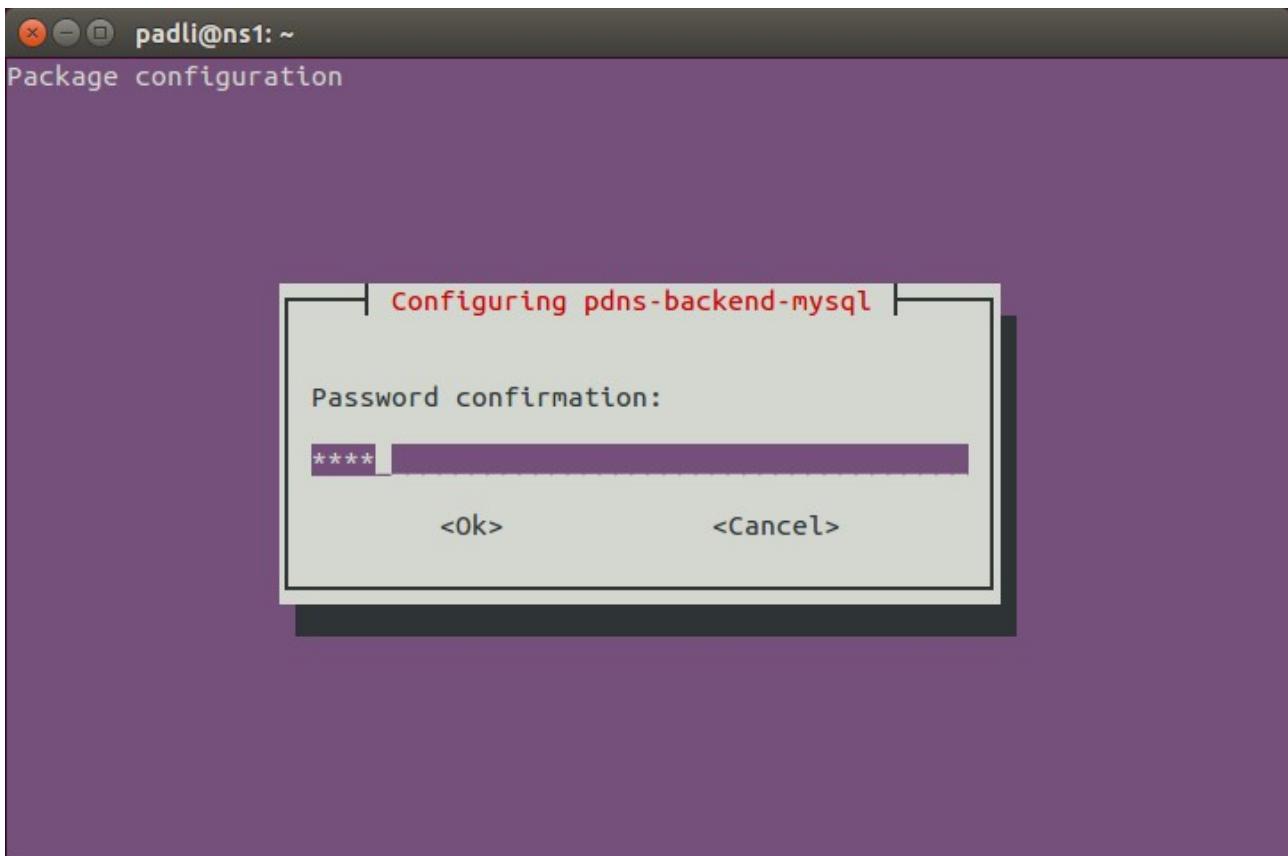
15. input root passwd mysql.



16. set passwd untuk powerdns backend mysql.



17. konfirmasi passwd.



18. buat database powerdns dan user poweruser untuk manajemen db.

```
padli@ns1:~$ mysql -u root -p
Enter password:
Welcome to the MySQL monitor. Commands end with ; or \g.
Your MySQL connection id is 46
Server version: 5.5.44-0ubuntu0.14.04.1 (Ubuntu)

Copyright (c) 2000, 2015, Oracle and/or its affiliates. All rights reserved.

Oracle is a registered trademark of Oracle Corporation and/or its
affiliates. Other names may be trademarks of their respective
owners.

Type 'help;' or '\h' for help. Type '\c' to clear the current input statement.

mysql> CREATE DATABASE powerdns;
Query OK, 1 row affected (0.00 sec)

mysql> GRANT ALL ON powerdns.* TO 'poweruser'@'%' IDENTIFIED BY 'root';
Query OK, 0 rows affected (0.00 sec)

mysql> FLUSH PRIVILEGES;
Query OK, 0 rows affected (0.00 sec)

mysql> quit;
```

19. login user poweruser, buat tabel domains.

```
padli@ns1:~$ mysql -u poweruser -p
Enter password:
Welcome to the MySQL monitor. Commands end with ; or \g.
Your MySQL connection id is 47
Server version: 5.5.44-0ubuntu0.14.04.1 (Ubuntu)

Copyright (c) 2000, 2015, Oracle and/or its affiliates. All rights reserved.

Oracle is a registered trademark of Oracle Corporation and/or its
affiliates. Other names may be trademarks of their respective
owners.

Type 'help;' or '\h' for help. Type '\c' to clear the current input statement.

mysql> USE powerdns;
Database changed
mysql> CREATE TABLE domains (
    -> id INT auto_increment,
    -> name VARCHAR(255) NOT NULL,
    -> master VARCHAR(128) DEFAULT NULL,
    -> last_check INT DEFAULT NULL,
    -> type VARCHAR(6) NOT NULL,
    -> notified_serial INT DEFAULT NULL,
    -> account VARCHAR(40) DEFAULT NULL,
    -> primary key (id)
    -> );
Query OK, 0 rows affected (0.04 sec)

mysql> CREATE UNIQUE INDEX name_index ON domains(name);
Query OK, 0 rows affected (0.08 sec)
Records: 0  Duplicates: 0  Warnings: 0

mysql> █
```

20. buat tabel records.

```
padli@ns1: ~
mysql> CREATE TABLE records (
    -> id INT auto_increment,
    -> domain_id INT DEFAULT NULL,
    -> name VARCHAR(255) DEFAULT NULL,
    -> type VARCHAR(6) DEFAULT NULL,
    -> content VARCHAR(255) DEFAULT NULL,
    -> ttl INT DEFAULT NULL,
    -> prio INT DEFAULT NULL,
    -> change_date INT DEFAULT NULL,
    -> primary key(id)
    -> );
Query OK, 0 rows affected (0.04 sec)

mysql> CREATE INDEX rec_name_index ON records(name);
Query OK, 0 rows affected (0.04 sec)
Records: 0 Duplicates: 0 Warnings: 0

mysql> CREATE INDEX nametype_index ON records(name,type);
Query OK, 0 rows affected (0.01 sec)
Records: 0 Duplicates: 0 Warnings: 0

mysql> CREATE INDEX domain_id ON records(domain_id);
Query OK, 0 rows affected (0.05 sec)
Records: 0 Duplicates: 0 Warnings: 0

mysql> ■
```

21. buat tabel supermasters.

```
padli@ns1: ~
mysql> CREATE TABLE supermasters (
    -> ip VARCHAR(25) NOT NULL,
    -> nameserver VARCHAR(255) NOT NULL,
    -> account VARCHAR(40) DEFAULT NULL
    -> );
Query OK, 0 rows affected (0.00 sec)

mysql> show tables;
+-----+
| Tables_in_powerdns |
+-----+
| domains           |
| records           |
| supermasters      |
+-----+
3 rows in set (0.00 sec)

mysql> quit;■
```

22. hapus file default.

```
padli@ns1:~$ sudo rm /etc/powerdns/pdns.d/*.*
```

23. buat file baru "nano /etc/powerdns/pdns.d/pdns.local.gmysql.conf" set koneksi ke db mysql.

```
padli@ns1:~$ nano /etc/powerdns/pdns.d/pdns.local.gmysql.conf
GNU nano 2.2.6      File: /etc/powerdns/pdns.d/pdns.local.gmysql.conf      Modified

# MySQL Configuration
#
# Launch gmysql backend
launch=gmysql

# gmysql parameters
gmysql-host=localhost
gmysql-dbname=powerdns
gmysql-user=poweruser
gmysql-password=root

^G Get Help    ^O WriteOut   ^R Read File   ^Y Prev Page   ^K Cut Text   ^C Cur Pos
^X Exit        ^J Justify    ^W Where Is    ^V Next Page   ^U UnCut Text ^T To Spell
```

24. restart servis powerdns.

```
padli@ns1:~$ sudo /etc/init.d/pdns restart
 * Restarting PowerDNS Authoritative Name Server pdns                                [ OK ]
padli@ns1:~$ sudo netstat -tap | grep pdns
tcp        0      0 *:domain              *:*                  LISTEN      3113
/pdns_server-in
padli@ns1:~$
```

25. set "nano /etc/powerdns/pdns.conf" izinkan recursor oleh semua ip.

```
padli@ns1: ~
GNU nano 2.2.6          File: /etc/powerdns/pdns.conf      Modified

# Autogenerated configuration file template
#####
# allow-axfr-ips      If enabled, restrict zonetransfers to originate from these
#                      IP addresses
#
# allow-axfr-ips=

#####
# allow-recursion      List of netmasks that are allowed to recurse
#
allow-recursion=0.0.0.0/0

#####
# allow-recursion-override  Local data even about hosts that don't exist will
#                           override the internet. (on/off)
#
# allow-recursion-override=


^G Get Help   ^O WriteOut   ^R Read File   ^Y Prev Page   ^K Cut Text   ^C Cur Pos
^X Exit       ^J Justify    ^W Where Is    ^V Next Page   ^U UnCut Text  ^T To Spell
```

26. set recursor ke ip google (dns forwarding ke ip google).

```
padli@ns1: ~
GNU nano 2.2.6          File: /etc/powerdns/pdns.conf      Modified

# receiver-threads=1

#####
# recursive-cache-ttl  Seconds to store packets in the PacketCache
#
# recursive-cache-ttl=10

#####
# recursor      If recursion is desired, IP address of a recursing nameserver
#
recursor=8.8.8.8

#####
# setgid      If set, change group id to this gid for more security
#
setgid=pdns


^G Get Help   ^O WriteOut   ^R Read File   ^Y Prev Page   ^K Cut Text   ^C Cur Pos
^X Exit       ^J Justify    ^W Where Is    ^V Next Page   ^U UnCut Text  ^T To Spell
```

27. restart servis powerdns.

```
padli@ns1:~$ sudo /etc/init.d/pdns restart
 * Restarting PowerDNS Authoritative Name Server pdns [ OK ]
padli@ns1:~$ sudo netstat -tap | grep pdns
tcp      0      0 *:domain          *:*                  LISTEN      3177
/pdns_server-in
padli@ns1:~$
```

28. set nameserver ke ip ns1.

```
padli@ns1:~$ nano /etc/network/interfaces
GNU nano 2.2.6           File: /etc/network/interfaces           Modified

# This file describes the network interfaces available on your system
# and how to activate them. For more information, see interfaces(5).

# The loopback network interface
auto lo
iface lo inet loopback

auto eth0
iface eth0 inet static
    address 192.168.100.51
    netmask 255.255.255.0
    network 192.168.100.0
    broadcast 192.168.100.255
    gateway 192.168.100.1
    dns-nameserver 192.168.100.51

^G Get Help   ^O WriteOut   ^R Read File   ^Y Prev Page   ^K Cut Text   ^C Cur Pos
^X Exit       ^J Justify    ^W Where Is    ^V Next Page   ^U UnCut Text ^T To Spell
```

29. restart.

```
padli@ns1:~$ sudo reboot
```

30. pastikan ns ke ns1, tes dns forwarding ping ke google.co.id (karena ip google tidak ada di ns1.raisa.net maka di forward ke ns google 8.8.8.8).

```
padli@ns1:~$ more /etc/resolv.conf
# Dynamic resolv.conf(5) file for glibc resolver(3) generated by resolvconf(8)
#      DO NOT EDIT THIS FILE BY HAND -- YOUR CHANGES WILL BE OVERWRITTEN
nameserver 192.168.100.51
padli@ns1:~$ ping google.co.id
PING google.co.id (173.194.126.88) 56(84) bytes of data.
64 bytes from kul06s05-in-f24.1e100.net (173.194.126.88): icmp_seq=1 ttl=53 time=116 ms
64 bytes from kul06s05-in-f24.1e100.net (173.194.126.88): icmp_seq=2 ttl=53 time=104 ms
64 bytes from kul06s05-in-f24.1e100.net (173.194.126.88): icmp_seq=3 ttl=53 time=181 ms
64 bytes from kul06s05-in-f24.1e100.net (173.194.126.88): icmp_seq=4 ttl=53 time=316 ms
64 bytes from kul06s05-in-f24.1e100.net (173.194.126.88): icmp_seq=5 ttl=53 time=364 ms
^C
--- google.co.id ping statistics ---
5 packets transmitted, 5 received, 0% packet loss, time 4005ms
rtt min/avg/max/mdev = 104.062/216.749/364.745/105.495 ms
padli@ns1:~$
```

31. install lib2 yg dibutuhkan untuk instalasi powerdns.

```
padli@ns1:~$ sudo apt-get install apache2 gettext libapache2-mod-php5 php5 php5-common php5-curl
php5-dev php5-gd php-pear php5-imap php5-ming php5-mysql php5-xmlrpc php5-mhash php5-mcrypt wget
```

32. install modul pear db (1).

```
padli@ns1:~$ sudo pear install DB
```

33. install modul pear db (2).

```
padli@ns1:~$ sudo pear install pear/MDB2#mysql
```

34. enable modul php5-mcrypt.

```
padli@ns1:~$ sudo php5enmod mcrypt
padli@ns1:~$ sudo /etc/init.d/apache2 restart
 * Restarting web server apache2                                         [ OK ]
padli@ns1:~$
```

35. change dir "cd /var/www/html".

```
padli@ns1:/var/www/html$ cd /var/www/html/
padli@ns1:/var/www/html$ rm index.html
rm: remove write-protected regular file 'index.html'? y
rm: cannot remove 'index.html': Permission denied
padli@ns1:/var/www/html$ sudo rm index.html
```

36. download poweradmin.

```
padli@ns1:/var/www/html
padli@ns1:/var/www/html$ sudo wget http://sourceforge.net/projects/poweradmin/files/poweradmin-2.1.7.tgz
```

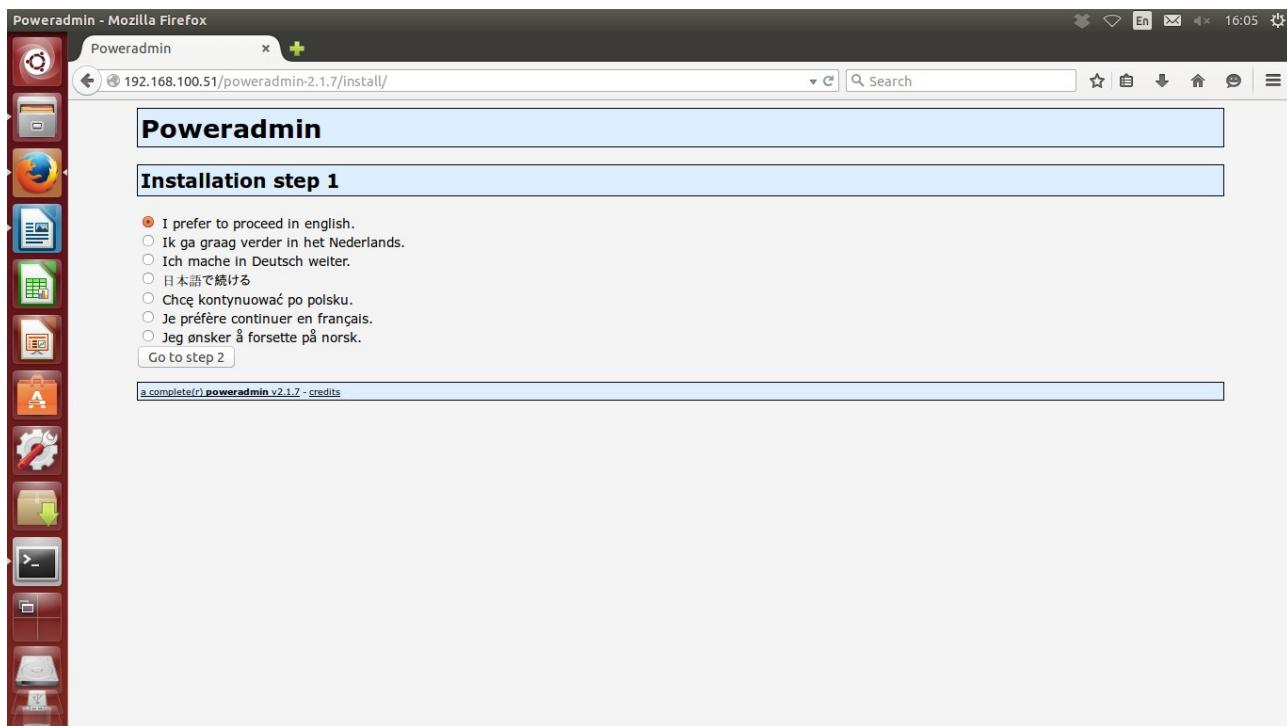
37. extract poweradmin.

```
padli@ns1:/var/www/html
padli@ns1:/var/www/html$ ls
poweradmin-2.1.7.tgz
padli@ns1:/var/www/html$ sudo tar xvfz poweradmin-2.1.7.tgz
```

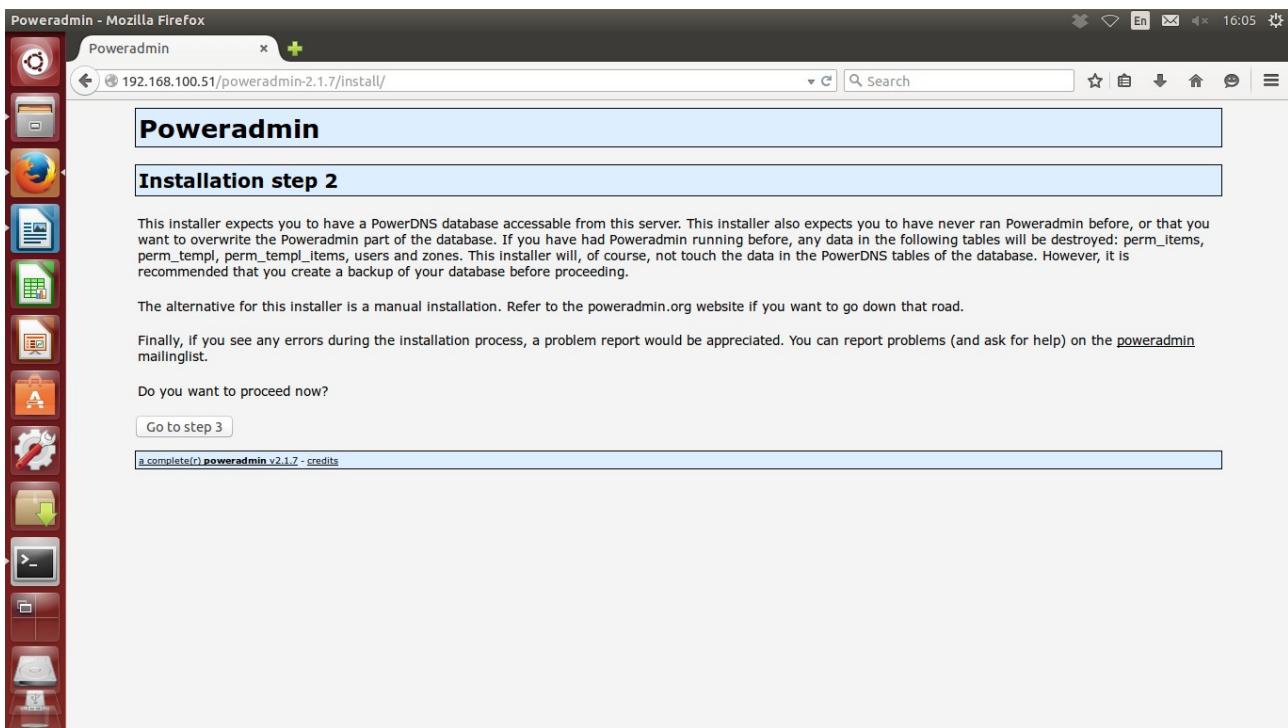
38. ubah kepemilikan dir poweradmin, restart servis apache2.

```
padli@ns1:/var/www/html
padli@ns1:/var/www/html$ ls
poweradmin-2.1.7 poweradmin-2.1.7.tgz
padli@ns1:/var/www/html$ sudo chown -R www-data:www-data /var/www/html/poweradmin-2.1.7
padli@ns1:/var/www/html$ ls -al
total 304
drwxr-xr-x 3 root      root      4096 Agu 19 15:59 .
drwxr-xr-x 3 root      root      4096 Agu 19 15:51 ..
drwxrwxr-x 10 www-data www-data  4096 Jul  5 2014 poweradmin-2.1.7
-rw-r--r--  1 root      root     296469 Jul 10 2014 poweradmin-2.1.7.tgz
padli@ns1:/var/www/html$ sudo /etc/init.d/apache2 restart
 * Restarting web server apache2                                         [ OK ]
padli@ns1:/var/www/html$
```

39. login poweradmin [http://ipserver/poweradmin\\$\\$\\$/install](http://ipserver/poweradmin$$$/install), next.

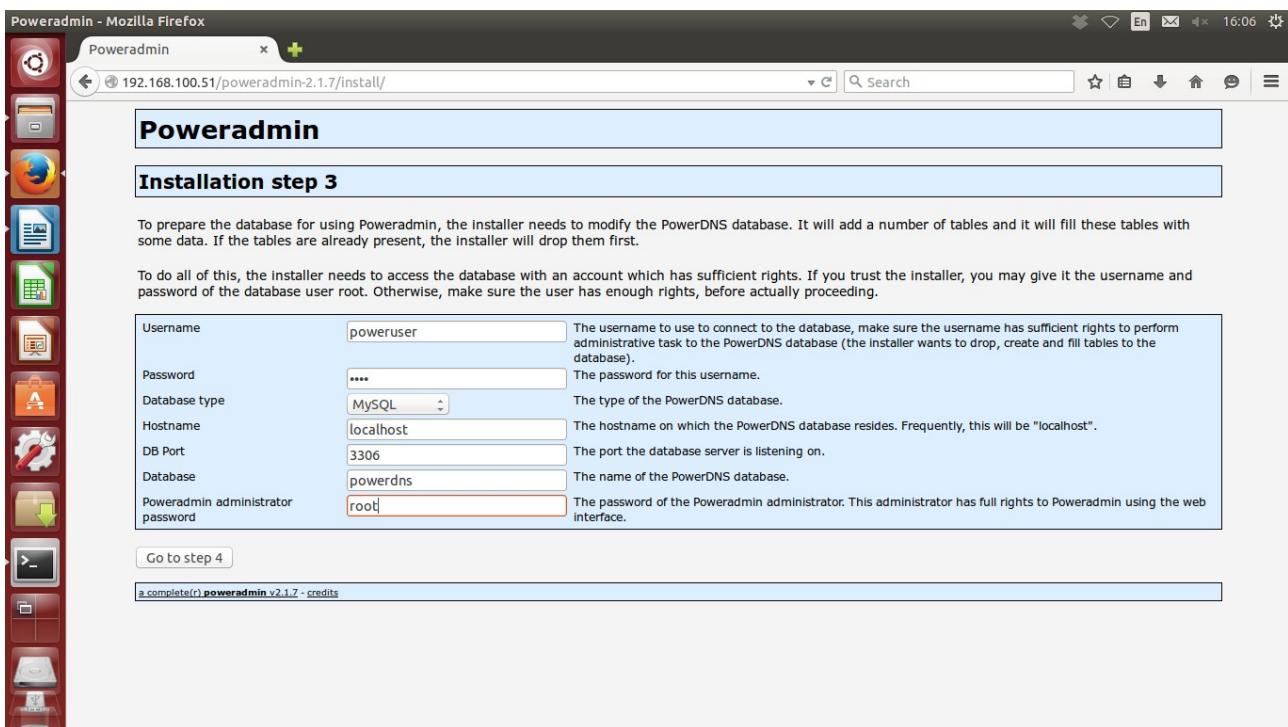


40. next.



A screenshot of a Mozilla Firefox browser window titled "Poweradmin - Mozilla Firefox". The address bar shows the URL "192.168.100.51/poweradmin-2.1.7/install/". The main content area is titled "Poweradmin" and "Installation step 2". It contains instructions about the PowerDNS database and a note about overwriting existing data. It also asks if the user wants to proceed and provides a "Go to step 3" button. A status bar at the bottom says "a complete(r) poweradmin v2.1.7 - credits". On the left, there is a vertical toolbar with various icons.

41. isikan config db mysql, sesuaikan dengan config db mysql, next.



A screenshot of a Mozilla Firefox browser window titled "Poweradmin - Mozilla Firefox". The address bar shows the URL "192.168.100.51/poweradmin-2.1.7/install/". The main content area is titled "Poweradmin" and "Installation step 3". It explains the need to modify the PowerDNS database and access it with sufficient rights. It includes a form for database configuration:

Username	poweruser	The username to use to connect to the database, make sure the username has sufficient rights to perform administrative task to the PowerDNS database (the installer wants to drop, create and fill tables to the database).
Password	The password for this username.
Database type	MySQL	The type of the PowerDNS database.
Hostname	localhost	The hostname on which the PowerDNS database resides. Frequently, this will be "localhost".
DB Port	3306	The port the database server is listening on.
Database	powerdns	The name of the PowerDNS database.
Poweradmin administrator password	root	The password of the Poweradmin administrator. This administrator has full rights to Poweradmin using the web interface.

Below the form is a "Go to step 4" button and a status bar at the bottom saying "a complete(r) poweradmin v2.1.7 - credits". On the left, there is a vertical toolbar with various icons.

42. config user baru untuk poweradmin.

Poweradmin - Mozilla Firefox
Poweradmin
192.168.100.51/poweradmin-2.1.7/install/
Poweradmin
Installation step 4
Updating database... done!
Now we will gather all details for the configuration itself.
Username: poweruser (The username for Poweradmin. This new user will have limited rights only.)
Password: root (The password for this username.)
Hostmaster: ns1.raisa.net (When creating SOA records and no hostmaster is provided, this value here will be used. Should be in the form "hostmaster.example.net".)
Primary nameserver: ns1.raisa.net (When creating new zones using the template, this value will be used as primary nameserver. Should be like "ns1.example.net".)
Secondary nameserver: ns2.raisa.net (When creating new zones using the template, this value will be used as secondary nameserver. Should be like "ns2.example.net".)

Go to step 5
a complete(r) poweradmin v2.1.7 - credits

43. ubah 'localhost' ke '%' agar db dapat di akses dari mana saja, next.

Terminal
Poweradmin
192.168.100.51/poweradmin-2.1.7/install/
Poweradmin
Installation step 5
You now want to give limited rights to Poweradmin so he can insert and update records in the PowerDNS database.
GRANT SELECT, INSERT, UPDATE, DELETE
ON powerdns.*
TO 'poweruser'@'localhost'
IDENTIFIED BY 'root';
After you have added the new user, proceed with this:

padli@ns1:~\$ mysql -u root -p
Enter password:
Welcome to the MySQL monitor. Commands end with ; or \g.
Your MySQL connection id is 49
Server version: 5.5.44-0ubuntu0.14.04.1 (Ubuntu)

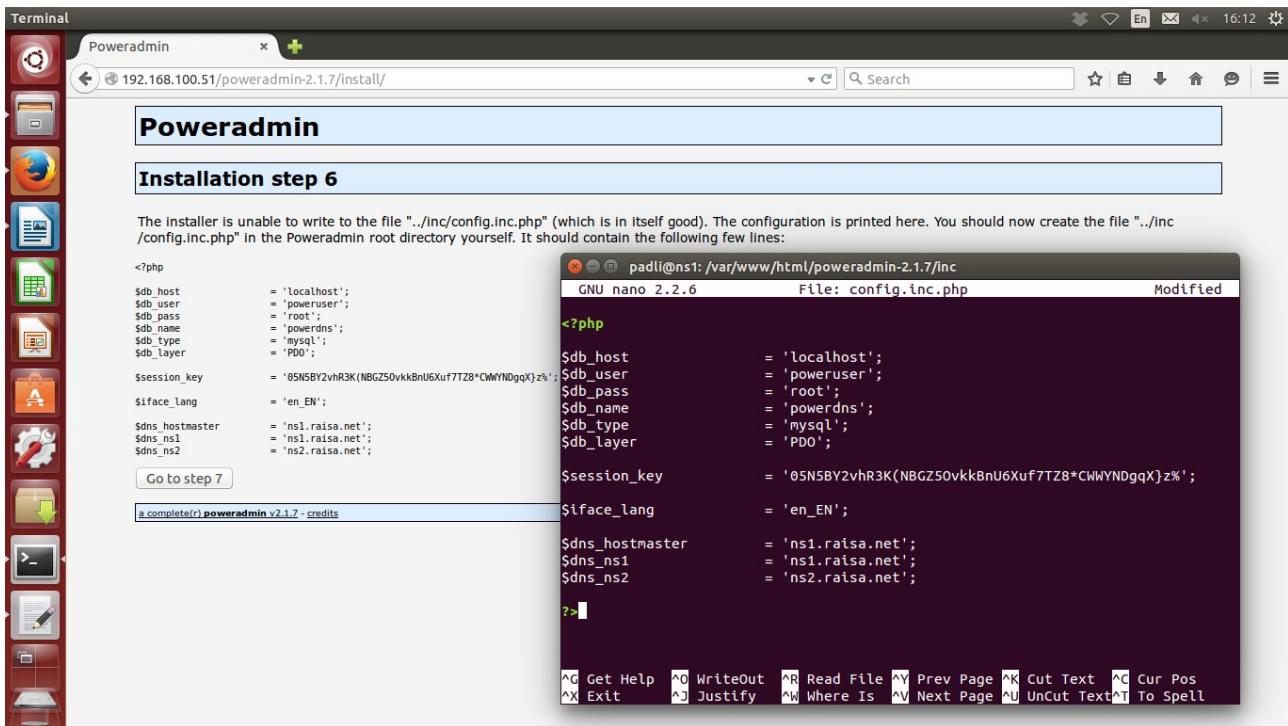
Copyright (c) 2000, 2015, Oracle and/or its affiliates. All rights reserved.
Oracle is a registered trademark of Oracle Corporation and/or its
affiliates. Other names may be trademarks of their respective
owners.

Type 'help;' or '\h' for help. Type '\c' to clear the current input statement.

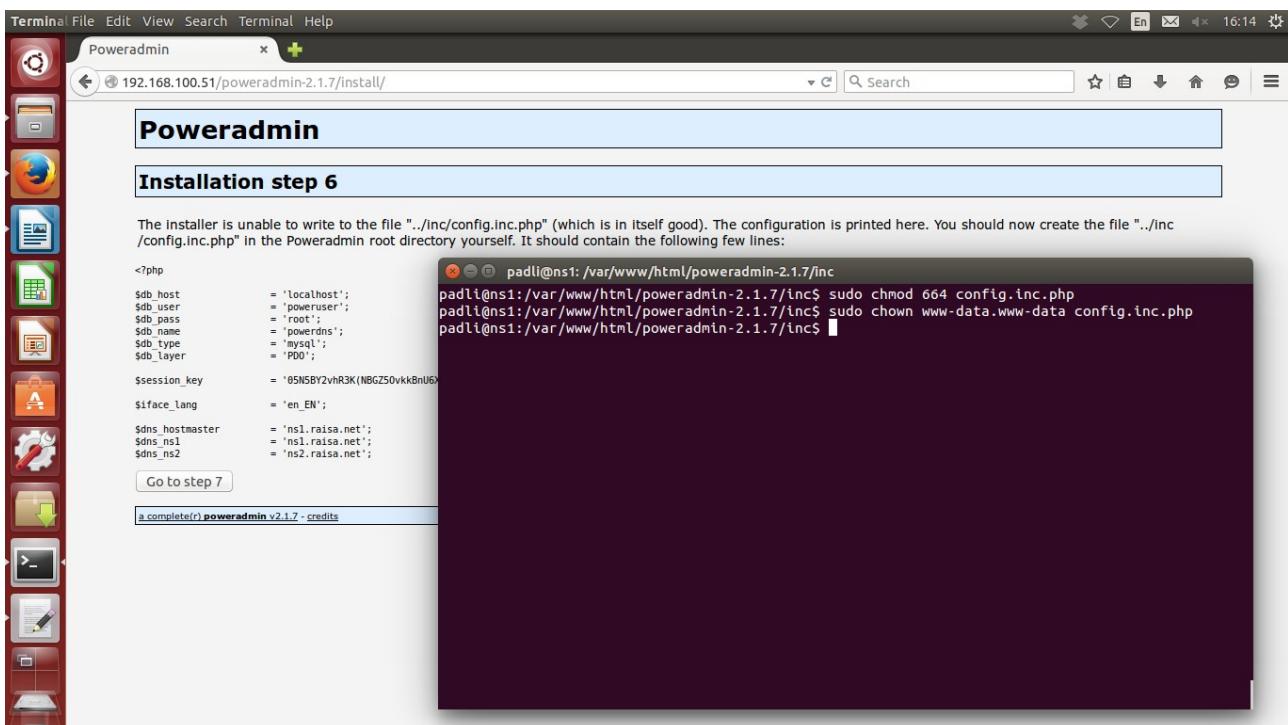
mysql> GRANT SELECT, INSERT, UPDATE, DELETE
-> ON powerdns.*
-> TO 'poweruser'@'%'
-> IDENTIFIED BY 'root';
Query OK, 0 rows affected (0.00 sec)

mysql> |

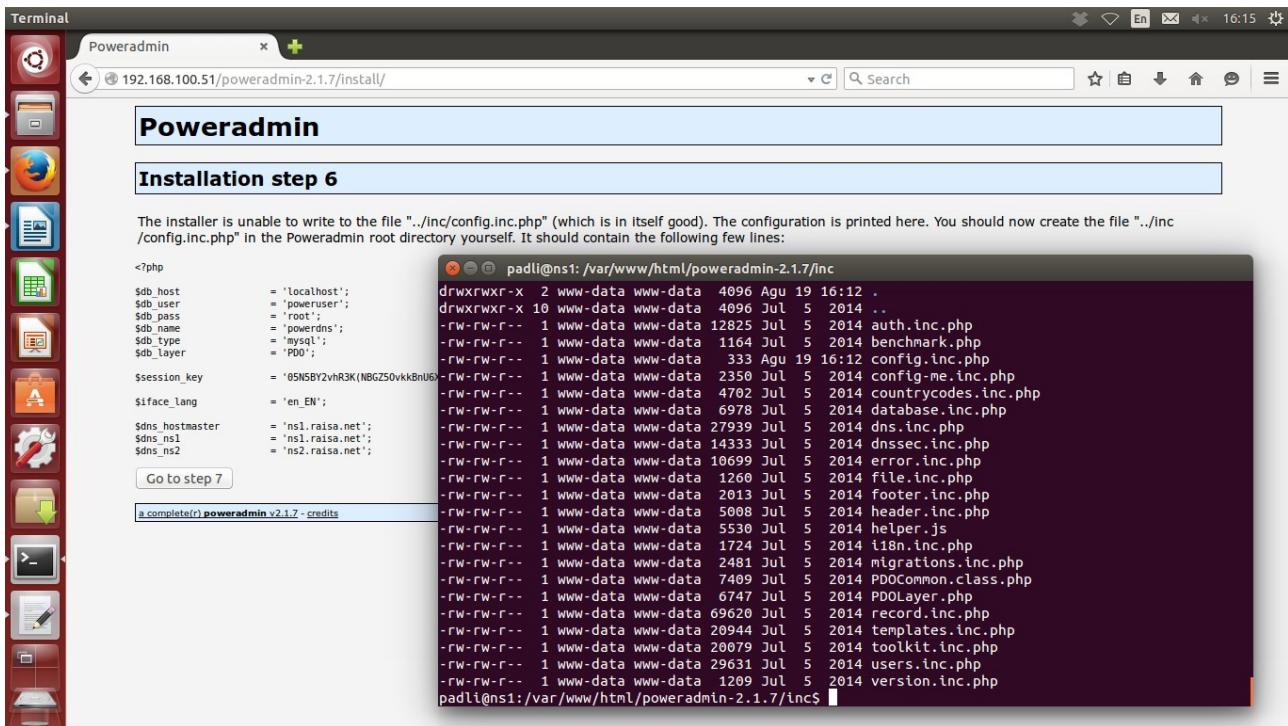
44. copy script ke file /var/www/html/poweradmin\$\$\$/inc/config.inc.php.



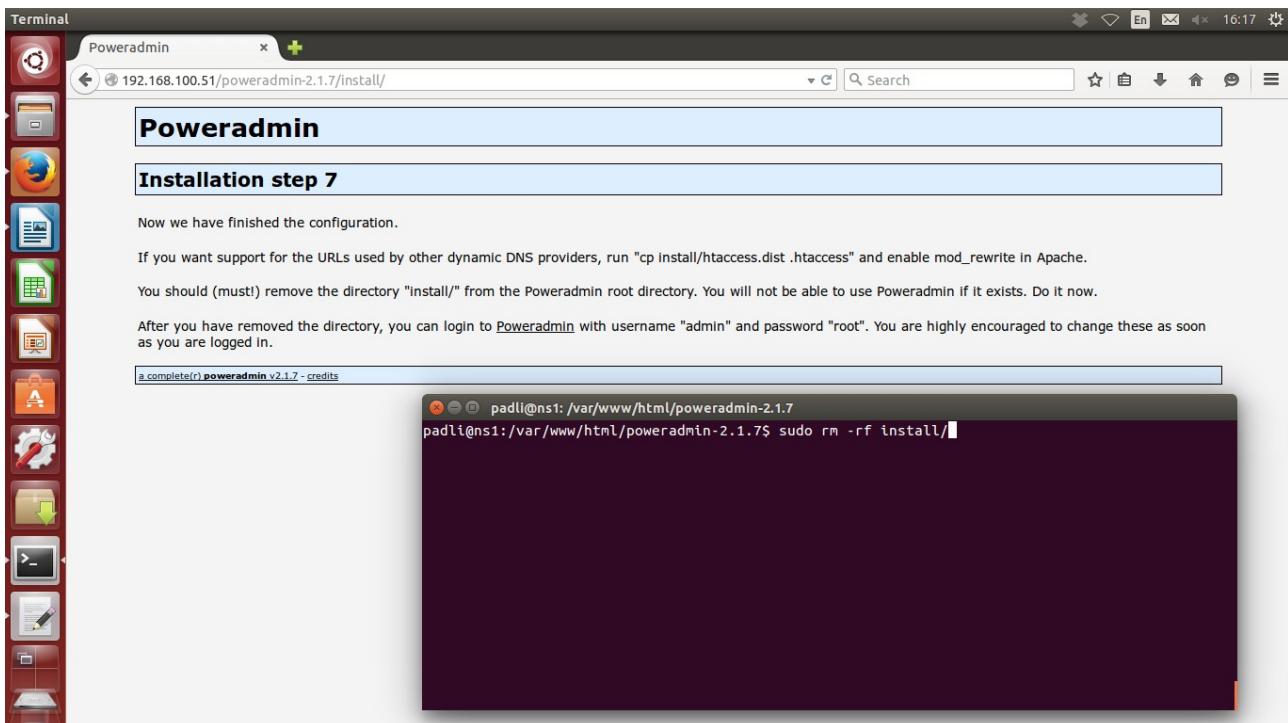
45. ubah hak akses & kepemilikan file.



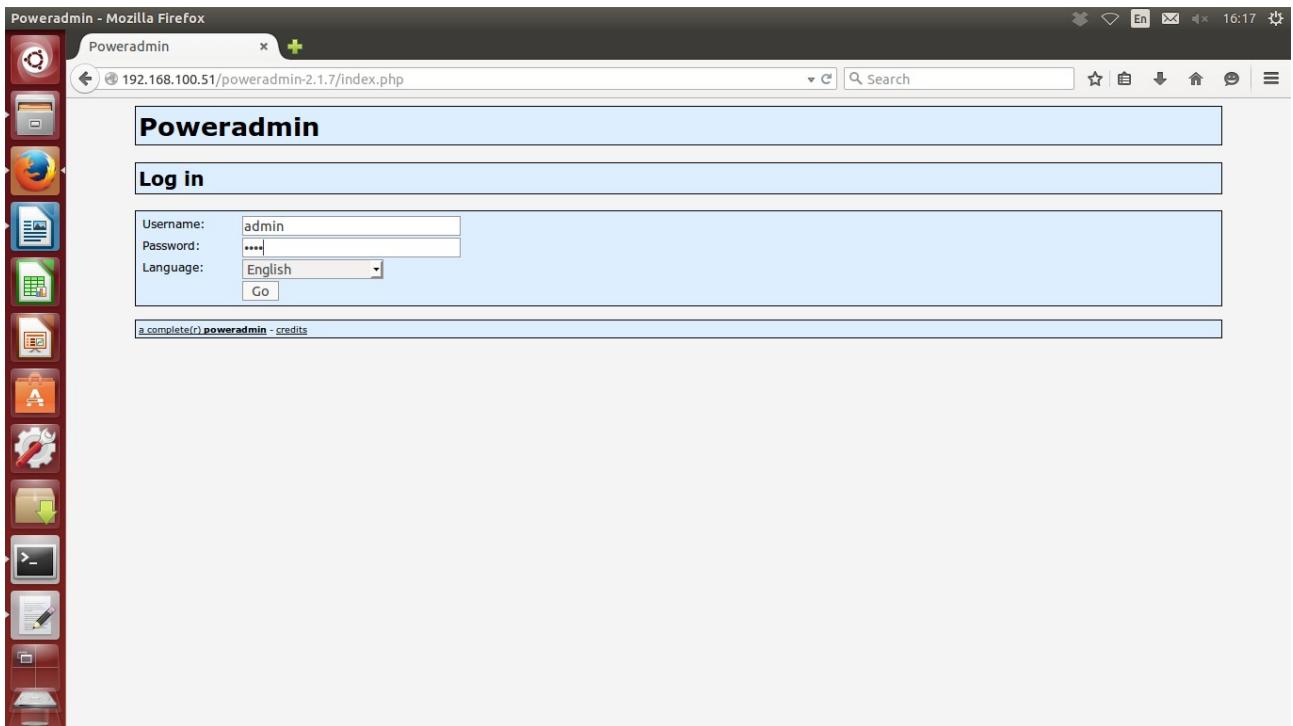
46. cek file, next.



47. hapus dir installasi, login poweradmin.



48. login admin & passwd root sesuai config.



Poweradmin - Mozilla Firefox

Poweradmin

192.168.100.51/poweradmin-2.1.7/index.php

Search

Poweradmin

Log in

Username: admin

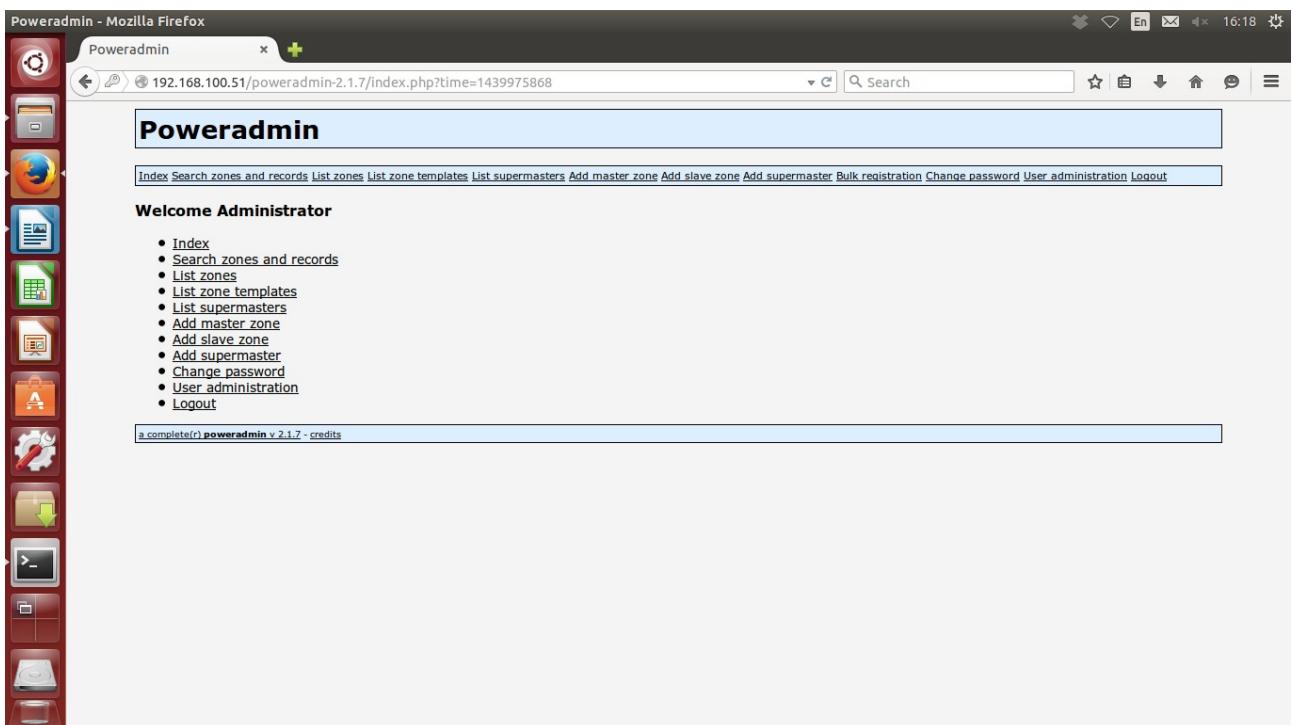
Password: ****

Language: English

Go

a.complete(r) poweradmin - credits

49. halaman index poweradmin.



Poweradmin - Mozilla Firefox

Poweradmin

192.168.100.51/poweradmin-2.1.7/index.php?time=1439975868

Search

Poweradmin

[Index](#) [Search zones and records](#) [List zones](#) [List zone templates](#) [List supermasters](#) [Add master zone](#) [Add slave zone](#) [Add supermaster](#) [Bulk registration](#) [Change password](#) [User administration](#) [Logout](#)

Welcome Administrator

- Index
- Search zones and records
- List zones
- List zone templates
- List supermasters
- Add master zone
- Add slave zone
- Add supermaster
- Change password
- User administration
- Logout

a.complete(r) poweradmin v 2.1.7 - credits

50. tambahkan master zone raisa.net.

Poweradmin - Mozilla Firefox

Poweradmin

192.168.100.51/poweradmin-2.1.7/add_zone_master.php

Poweradmin

[Index](#) [Search zones and records](#) [List zones](#) [List zone templates](#) [List supermasters](#) [Add master zone](#) [Add slave zone](#) [Add supermaster](#) [Bulk registration](#) [Change password](#) [User administration](#) [Logout](#)

Add master zone

Zone name: Add another domain

Owner:

Type:

Template:

DNSSEC:

a complete(r) poweradmin v 2.1.7 - credits

51. tambahkan master zone reverse 100.168.192.in-addr.arpa.

Poweradmin - Mozilla Firefox

Poweradmin

192.168.100.51/poweradmin-2.1.7/add_zone_master.php

Poweradmin

[Index](#) [Search zones and records](#) [List zones](#) [List zone templates](#) [List supermasters](#) [Add master zone](#) [Add slave zone](#) [Add supermaster](#) [Bulk registration](#) [Change password](#) [User administration](#) [Logout](#)

raisa.net - Zone has been added successfully.

Add master zone

Zone name: Add another domain

Owner:

Type:

Template:

DNSSEC:

a complete(r) poweradmin v 2.1.7 - credits

52. cek list zones, edit master zone raisa.net.

The screenshot shows the 'List zones' page of the Poweradmin web interface. The left sidebar contains various icons for managing domains, files, databases, and users. The main content area has a table with four columns: Name, Type, Records, and Owner. Two entries are present:

Name	Type	Records	Owner
100.168.192.in-addr.arpa	master	1	Administrator
raisa.net	master	1	Administrator

Below the table is a link 'View zone raisa.net' and a footer note 'a complete(r) poweradmin v 2.1.7 - credits'.

53. tambahkan record NS (nameserver), ceklist add also reverse record.

The screenshot shows the 'Edit zone "raisa.net"' page of the Poweradmin web interface. The left sidebar contains various icons for managing domains, files, databases, and users. The main content area shows the current zone configuration:

ID	Name	Type	Content	Priority	TTL
1	raisa.net	SOA	ns1.raisa.net ns1.raisa.net 2015081900 28800 7200 604800 86400		86400

Below the table is a 'Comments:' section with a text input field. Underneath are sections for saving as a template and committing changes. At the bottom, there is a table for adding new records, with a row for '.raisa.net' of type NS with content 'ns1.raisa.net'. A checkbox 'Add also reverse record' is checked. The 'Owner of zone' and 'Type' dropdowns are set to 'Administrator' and 'master' respectively.

54. tambahkan record A (address).

The screenshot shows the Poweradmin web interface for managing DNS zones. The main title is "Edit zone "raisa.net"". Below it is a table listing existing records:

ID	Name	Type	Content	Priority	TTL
1	raisa.net	SOA	ns1.raisa.net ns1.raisa.net 2015081901 28800 7200 604800 86400		86400
3	raisa.net	NS	ns1.raisa.net	0	86400

Below the table is a "Comments:" text area. Underneath the table are fields for saving a new template:

Save as new template:
Template Name:
Template Description:

Buttons: Commit changes, Reset changes, Save as template.

Below these are fields for adding a new record:

Name: ns1.raisa.net	Type: IN A	Content: 192.168.100.51	Priority:	TTL:
---------------------	------------	-------------------------	-----------	------

Buttons: Add record, Add also reverse record.

Owner of zone: Administrator

55. cek list record master zone raisa.net.

The screenshot shows the Poweradmin web interface for managing DNS zones. The main title is "Edit zone "raisa.net"". Below it is a table listing existing records:

ID	Name	Type	Content	Priority	TTL
1	raisa.net	SOA	ns1.raisa.net ns1.raisa.net 2015081902 28800 7200 604800 86400		86400
3	raisa.net	NS	ns1.raisa.net	0	86400
5	ns1.raisa.net	A	192.168.100.51	0	86400

Below the table is a "Comments:" text area. Underneath the table are fields for saving a new template:

Save as new template:
Template Name:
Template Description:

Buttons: Commit changes, Reset changes, Save as template.

Below these are fields for adding a new record:

Name: ns1.raisa.net	Type: IN A	Content:	Priority:	TTL:
---------------------	------------	----------	-----------	------

Buttons: Add record, Add also reverse record.

Owner of zone: Administrator

56. cek list record master zone reverse.

Id	Name	Type	Content	Priority	TTL
2	100.168.192.in-addr.arpa	SOA	ns1.raisa.net ns1.raisa.net 2015081901 28800 7200 604800 86400		86400
4	51.100.168.192.in-addr.arpa	PTR	ns1.raisa.net	0	86400

57. tes ping & lookup domain di mesin ns1.raisa.net.

```
padli@ns1:~$ ping ns1.raisa.net
PING ns1.raisa.net (192.168.100.51) 56(84) bytes of data.
64 bytes from ns1.raisa.net (192.168.100.51): icmp_seq=1 ttl=64 time=0.011 ms
64 bytes from ns1.raisa.net (192.168.100.51): icmp_seq=2 ttl=64 time=0.027 ms
^C
--- ns1.raisa.net ping statistics ---
2 packets transmitted, 2 received, 0% packet loss, time 1000ms
rtt min/avg/max/mdev = 0.011/0.019/0.027/0.008 ms
padli@ns1:~$ nslookup ns1.raisa.net
Server:      192.168.100.51
Address:     192.168.100.51#53

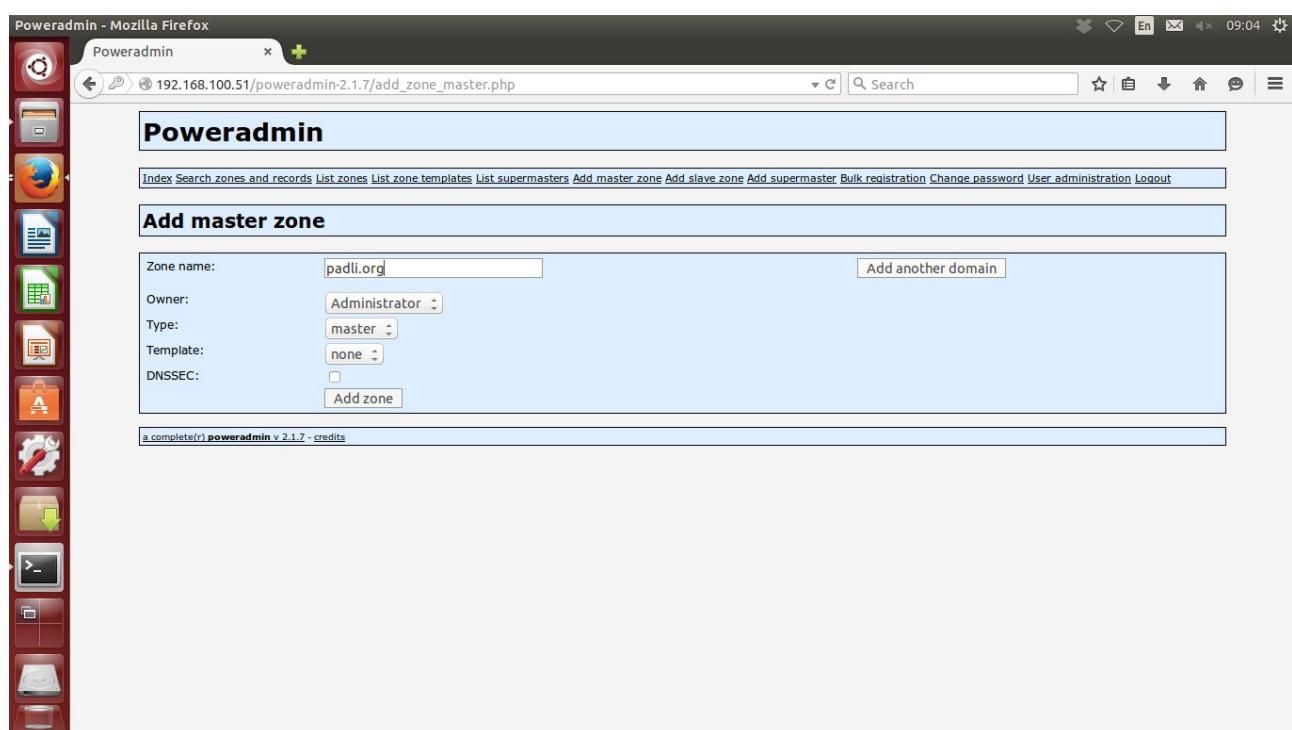
Name:   ns1.raisa.net
Address: 192.168.100.51

padli@ns1:~$
```

58. tes dig domain ns1.raisa.net.

```
padli@ns1: /  
padli@ns1:~/dig ns1.raisa.net  
  
; <>> DiG 9.9.5-3ubuntu0.4-Ubuntu <>> ns1.raisa.net  
;; global options: +cmd  
;; Got answer:  
;; ->>HEADER<<- opcode: QUERY, status: NOERROR, id: 48881  
;; flags: qr aa rd ra; QUERY: 1, ANSWER: 1, AUTHORITY: 0, ADDITIONAL: 1  
  
;; OPT PSEUDOSECTION:  
; EDNS: version: 0, flags:; udp: 2800  
;; QUESTION SECTION:  
;ns1.raisa.net. IN A  
  
;; ANSWER SECTION:  
ns1.raisa.net. 86400 IN A 192.168.100.51  
  
;; Query time: 3 msec  
;; SERVER: 192.168.100.51#53(192.168.100.51)  
;; WHEN: Wed Aug 19 16:26:36 WIB 2015  
;; MSG SIZE rcvd: 58  
  
padli@ns1:/$
```

59. tambahkan master zone padli.org.

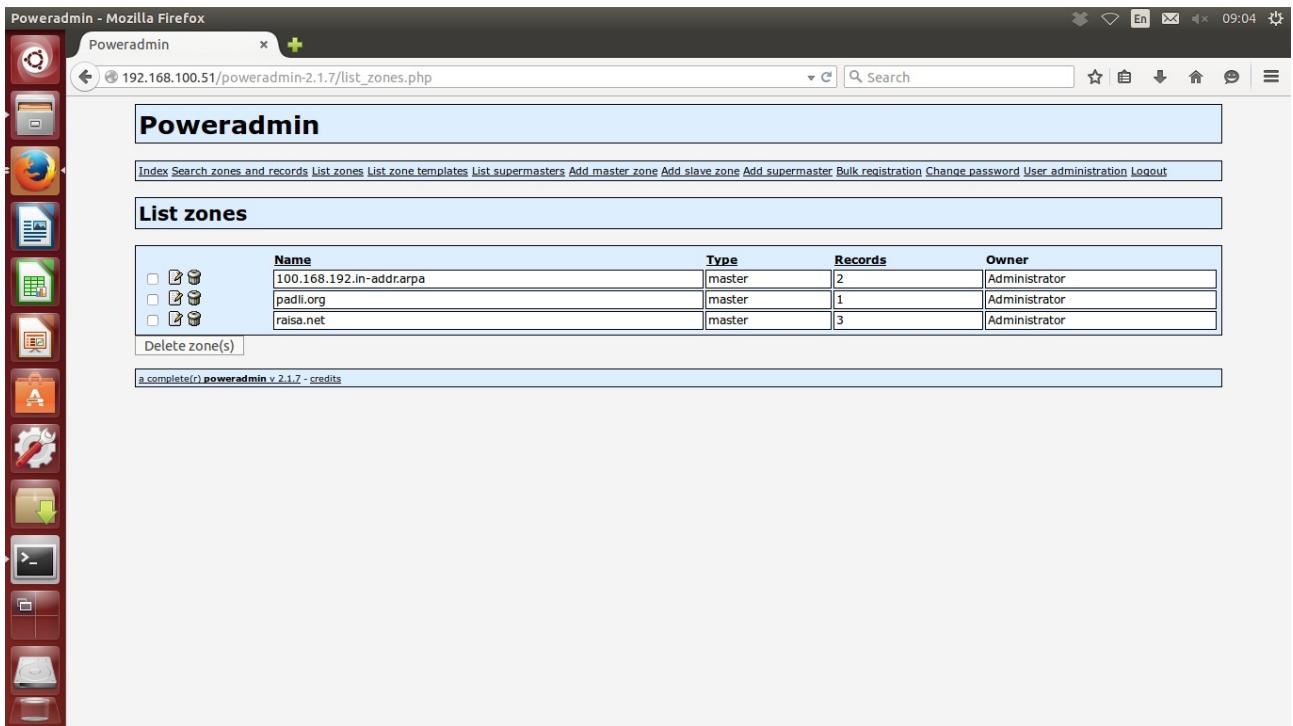


The screenshot shows a Mozilla Firefox browser window titled "Poweradmin - Mozilla Firefox". The address bar contains the URL "192.168.100.51/poweradmin-2.1.7/add_zone_master.php". The main content area is titled "Poweradmin" and displays the "Add master zone" form. The form fields are as follows:

- Zone name: padli.org
- Owner: Administrator
- Type: master
- Template: none
- DNSSEC:
- Add zone button

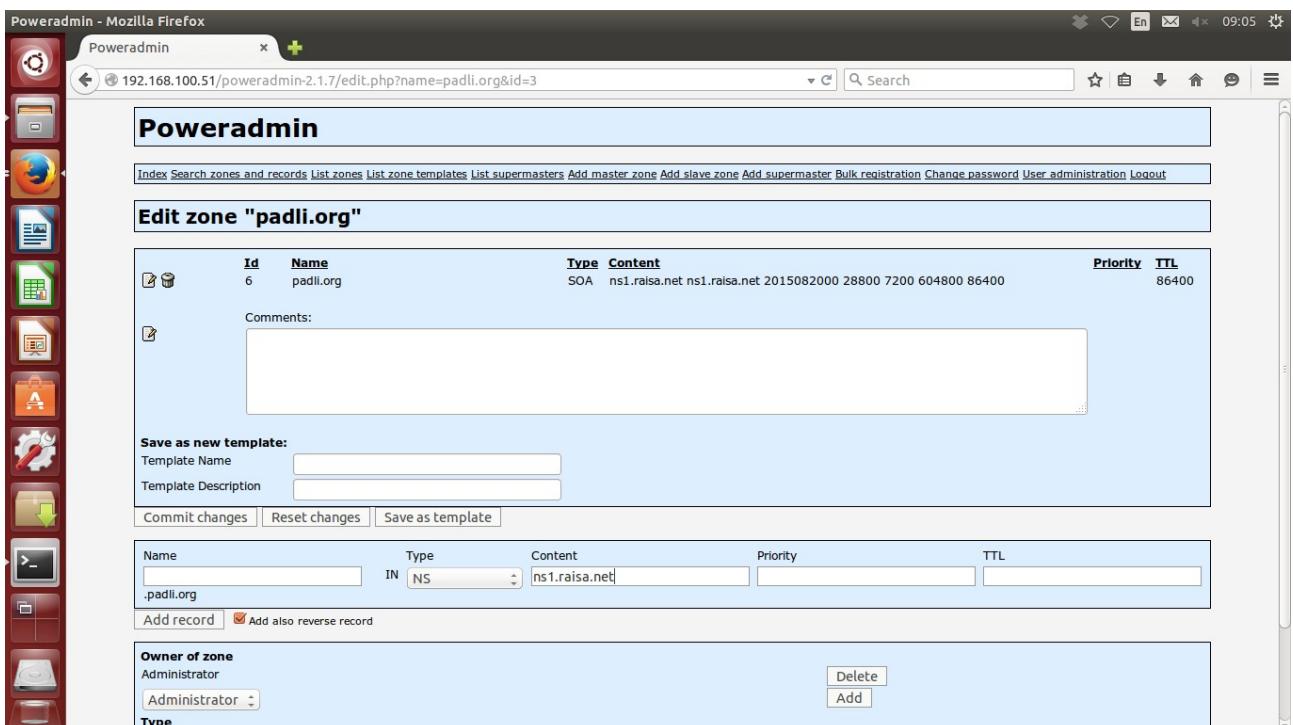
The left sidebar of the Poweradmin interface contains various icons for managing zones, records, templates, supermasters, and other DNS-related tasks.

60. edit record master zone padli.org.



Name	Type	Records	Owner
100.168.192.in-addr.arpa	master	2	Administrator
padli.org	master	1	Administrator
raisa.net	master	3	Administrator

61. tambahkan record NS, cek list add also reverse record.



Name	Type	Content	Priority	TTL
padli.org	SOA	ns1.raisa.net ns1.raisa.net 2015082000 28800 7200 604800 86400		86400

Comments:

Save as new template:

Template Name:

Template Description:

Commit changes | Reset changes | Save as template |

Name	Type	Content	Priority	TTL
.padli.org	IN NS	ns1.raisa.net		

Add record Add also reverse record

Owner of zone
Administrator

Delete | Add |

62. tambahkan record A.

Id	Name	Type	Content	Priority	TTL
6	padli.org	SOA	ns1.raisa.net ns1.raisa.net 2015082001 28800 7200 604800 86400		86400
7	padli.org	NS	ns1.raisa.net	0	86400

Comments:

Save as new template:
Template Name:
Template Description:

Add record Add also reverse record

Owner of zone
Administrator
Administrator

63. tambahkan record MX (mail exchange).

Id	Name	Type	Content	Priority	TTL
6	padli.org	SOA	ns1.raisa.net ns1.raisa.net 2015082002 28800 7200 604800 86400		86400
7	padli.org	NS	ns1.raisa.net	0	86400
9	www.padli.org	A	192.168.100.7	0	86400

Comments:

Save as new template:
Template Name:
Template Description:

Add record Add also reverse record

Owner of zone
Administrator
Administrator

64. tambahkan record A untuk mail.

Id	Name	Type	Content	Priority	TTL
6	padli.org	SOA	ns1.raisa.net ns1.raisa.net 2015082003 28800 7200 604800 86400		86400
7	padli.org	NS	ns1.raisa.net	0	86400
10	padli.org	MX	mail.padli.org	10	86400
9	www.padli.org	A	192.168.100.7	0	86400

Comments:

Save as new template:
Template Name:
Template Description:

Commit changes | Reset changes | Save as template |

Name: <input text"="" type="text" value="IN"/>	Type: <input type="text" value="A"/>	Content: <input type="text" value="192.168.100.7"/>	Priority: <input type="text"/>	TTL: <input type="text"/>
------------------------------------------------	--------------------------------------	-----------------------------------------------------	--------------------------------	---------------------------

Add record | Add also reverse record

65. cek list record master zone padli.org.

Id	Name	Type	Content	Priority	TTL
6	padli.org	SOA	ns1.raisa.net ns1.raisa.net 2015082004 28800 7200 604800 86400		86400
7	padli.org	NS	ns1.raisa.net	0	86400
12	mail.padli.org	A	192.168.100.7	0	86400
10	padli.org	MX	mail.padli.org	10	86400
9	www.padli.org	A	192.168.100.7	0	86400

Comments:

Save as new template:
Template Name:
Template Description:

Commit changes | Reset changes | Save as template |

Name: <input type="text" value=".padli.org"/>	Type: <input type="text" value="IN"/>	Type: <input type="text" value="A"/>	Content: <input type="text"/>	Priority: <input type="text"/>	TTL: <input type="text"/>
-----------------------------------------------	---------------------------------------	--------------------------------------	-------------------------------	--------------------------------	---------------------------

Add record | Add also reverse record

66. cek list record master zone reverse.

Id	Name	Type	Content	Priority	TTL
2	100.168.192.in-addr.arpa	SOA	ns1.raisa.net ns1.raisa.net 2015082001 28800 7200 604800 86400		86400
8	7.100.168.192.in-addr.arpa	PTR	www.padli.org	0	86400
11	7.100.168.192.in-addr.arpa	PTR	mail.padli.org	0	86400
4	51.100.168.192.in-addr.arpa	PTR	ns1.raisa.net	0	86400

67. tes ping domain www.padli.org & mail.padli.org.

```
padli@ns1:~$ ping www.padli.org
PING www.padli.org (192.168.100.7) 56(84) bytes of data.
64 bytes from mail.padli.org (192.168.100.7): icmp_seq=1 ttl=64 time=0.371 ms
64 bytes from mail.padli.org (192.168.100.7): icmp_seq=2 ttl=64 time=0.541 ms
^C
--- www.padli.org ping statistics ---
2 packets transmitted, 2 received, 0% packet loss, time 1001ms
rtt min/avg/max/mdev = 0.371/0.456/0.541/0.085 ms
padli@ns1:~$ ping mail.padli.org
PING mail.padli.org (192.168.100.7) 56(84) bytes of data.
64 bytes from mail.padli.org (192.168.100.7): icmp_seq=1 ttl=64 time=0.221 ms
64 bytes from mail.padli.org (192.168.100.7): icmp_seq=2 ttl=64 time=0.491 ms
^C
--- mail.padli.org ping statistics ---
2 packets transmitted, 2 received, 0% packet loss, time 999ms
rtt min/avg/max/mdev = 0.221/0.356/0.491/0.135 ms
padli@ns1:~$ █
```

68. tes lookup.

```
padli@ns1:~$ nslookup mail.padli.org
Server:      192.168.100.51
Address:     192.168.100.51#53

Name:   mail.padli.org
Address: 192.168.100.7

padli@ns1:~$ nslookup www.padli.org
Server:      192.168.100.51
Address:     192.168.100.51#53

Name:   www.padli.org
Address: 192.168.100.7

padli@ns1:~$ nslookup 192.168.100.7
Server:      192.168.100.51
Address:     192.168.100.51#53

7.100.168.192.in-addr.arpa      name = www.padli.org.
7.100.168.192.in-addr.arpa      name = mail.padli.org.

padli@ns1:~$
```

69. tambahkan master zone host1.co.id.

The screenshot shows a Mozilla Firefox browser window titled "Poweradmin - Mozilla Firefox". The address bar contains the URL "192.168.100.51/poweradmin-2.1.7/add_zone_master.php". The main content area displays the "Poweradmin" interface with a sidebar on the left containing various icons. The central panel is titled "Add master zone" and contains the following form fields:

Zone name:	<input type="text" value="host1.co.id"/>	<input type="button" value="Add another domain"/>
Owner:	<input type="text" value="Administrator"/>	
Type:	<input type="text" value="master"/>	
Template:	<input type="text" value="none"/>	
DNSSEC:	<input type="checkbox"/>	<input type="button" value="Add zone"/>

At the bottom of the central panel, there is a small footer note: "a complete(r) poweradmin v 2.1.7 - credits".

70. tambahkan master zone host2.co.id.

The screenshot shows the Poweradmin web interface in Mozilla Firefox. The URL is 192.168.100.51/poweradmin-2.1.7/add_zone_master.php. The main title is "Poweradmin". Below it, a green banner displays the message "host1.co.id - Zone has been added successfully.". The main content area is titled "Add master zone". It contains fields for "Zone name" (host2.co.id), "Owner" (Administrator), "Type" (master), "Template" (none), and "DNSSEC" (unchecked). A "Add zone" button is at the bottom right. On the left is a vertical toolbar with various icons. At the bottom, a footer bar shows "a complete(r) poweradmin v 2.1.7 - credits".

71. edit record master zone host1.co.id.

The screenshot shows the Poweradmin web interface in Mozilla Firefox. The URL is 192.168.100.51/poweradmin-2.1.7/list_zones.php. The main title is "Poweradmin". Below it, a green banner displays the message "host1.co.id - Zone has been added successfully.". The main content area is titled "List zones". It shows a table of zones with columns: Name, Type, Records, and Owner. The table includes rows for 100.168.192.in-addr.arpa, host1.co.id, host2.co.id, padli.org, and raisa.net. All zones are listed as master type with varying record counts (4, 1, 1, 5, 3) and owned by Administrator. A "Delete zone(s)" button is at the bottom left. On the left is a vertical toolbar with various icons. At the bottom, a footer bar shows "a complete(r) poweradmin v 2.1.7 - credits".

72. tambahkan record NS dan A pada master zone host1.co.id..

Id	Name	Type	Content	Priority	TTL
13	host1.co.id	SOA	ns1.raisa.net ns1.raisa.net 2015082004 28800 7200 604800 86400		86400
16	host1.co.id	NS	ns1.raisa.net	0	86400
18	www.host1.co.id	A	192.168.100.20	0	86400

Comments:

Save as new template:
Template Name:
Template Description:

Commit changes | Reset changes | Save as template |

Name: <input type="text"/> .host1.co.id	Type: IN <input type="button" value="A"/>	Content: <input type="text"/>	Priority: <input type="text"/>	TTL: <input type="text"/>
-----------------------------------------	-------------------------------------------	-------------------------------	--------------------------------	---------------------------

Add record | Add also reverse record

Owner of zone
Administrator | Delete

73. tambahkan record NS & A pada master zone host2.co.id.

Id	Name	Type	Content	Priority	TTL
14	host2.co.id	SOA	ns1.raisa.net ns1.raisa.net 2015082002 28800 7200 604800 86400		86400
19	host2.co.id	NS	ns1.raisa.net	0	86400
21	www.host2.co.id	A	192.168.100.20	0	86400

Comments:

Save as new template:
Template Name:
Template Description:

Commit changes | Reset changes | Save as template |

Name: <input type="text"/> .host2.co.id	Type: IN <input type="button" value="A"/>	Content: <input type="text"/>	Priority: <input type="text"/>	TTL: <input type="text"/>
-----------------------------------------	-------------------------------------------	-------------------------------	--------------------------------	---------------------------

Add record | Add also reverse record

Owner of zone
Administrator | Delete

74. cek list master record reverse.

Id	Name	Type	Content	Priority	TTL
2	100.168.192.in-addr.arpa	SOA	ns1.raisa.net ns1.raisa.net 2015082003 28800 7200 604800 86400	0	86400
8	7.100.168.192.in-addr.arpa	PTR	www.padli.org	0	86400
11	7.100.168.192.in-addr.arpa	PTR	mail.padli.org	0	86400
20	20.100.168.192.in-addr.arpa	PTR	www.host2.co.id	0	86400
17	20.100.168.192.in-addr.arpa	PTR	www.host1.co.id	0	86400
4	51.100.168.192.in-addr.arpa	PTR	ns1.raisa.net	0	86400

Comments:

Save as new template:
Template Name:
Template Description:

Commit changes | Reset changes | Save as template

75. tes lookup.

```
padli@ns1:~$ nslookup www.host1.co.id
Server:      192.168.100.51
Address:     192.168.100.51#53

Name:   www.host1.co.id
Address: 192.168.100.20

padli@ns1:~$ nslookup www.host2.co.id
Server:      192.168.100.51
Address:     192.168.100.51#53

Name:   www.host2.co.id
Address: 192.168.100.20

padli@ns1:~$ nslookup 192.168.100.20
Server:      192.168.100.51
Address:     192.168.100.51#53

20.100.168.192.in-addr.arpa    name = www.host1.co.id.
20.100.168.192.in-addr.arpa    name = www.host2.co.id.

padli@ns1:~$
```