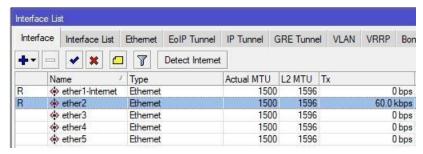
A. Konfigurasi Router Jakarta

1. Pemberian nama setiap interface



Untuk ether2 terhubung ke VMWARE

2. Addressing

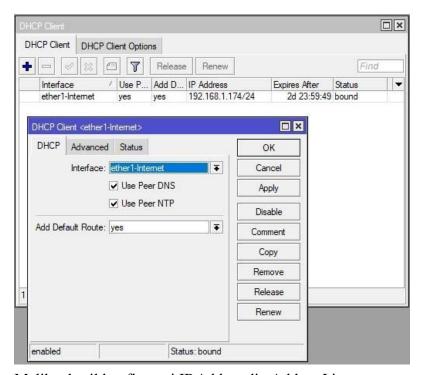
Masukkan perintah sebagai berikut :

IP Address yang terhubung ke PC Kasir 1 dan SERVER POST

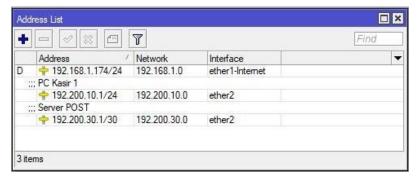
```
/ Move up to base level
.. Move up one level
//command Use command at the base level
[admin@Router-Jakarta] > /ip address add address=192.200.30.1/30 interface=ether2
comment="Server POST"
[admin@Router-Jakarta] > /ip address add address=192.200.10.1/24 interface=ether2
comment="PC Kasir 1"
```

3. DHCP Client

IP -> DHCP Client -> Klik tanda [+]

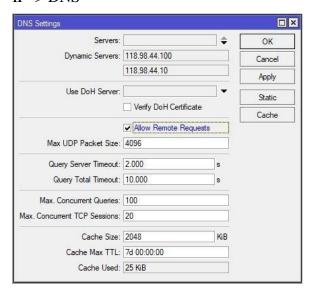


Melihat hasil konfigurasi IP Addess di : Addess List



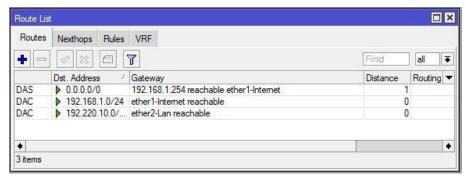
4. Konfigurasi DNS

IP -> DNS



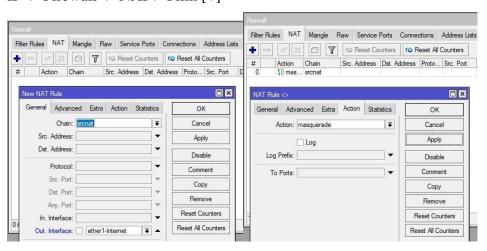
Centang [v] pada Allow Remote Requests

5. Konfigurasi Routes (Optional)



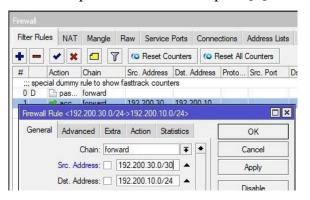
6. Firewall

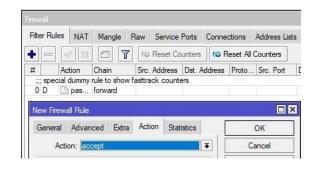
IP -> Firewall -> NAT > Pilih [+]



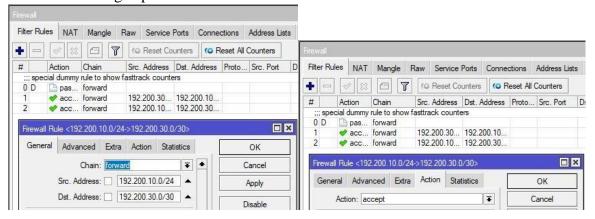
Pilih: Action

Kemudian pilih :Filter Rules -> pilih [+]





Buatlah rule dengan posisi IP address dibalik



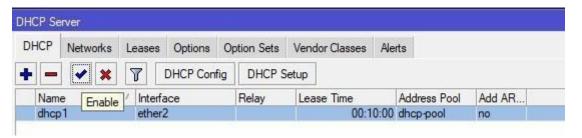
7. DHCP Server

Buka Terminal, masukkan perintah berikut:

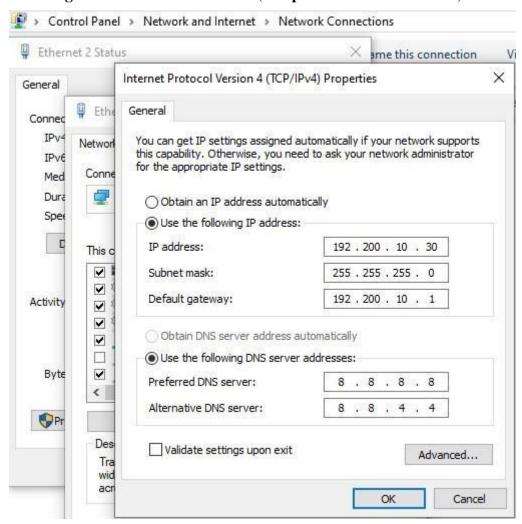
[admin@Router-Jakarta] > /ip pool add name=dhcp-pool ranges=192.200.10.2-192.200.10.254

[admin@Router-Jakarta] > /ip dhcp-server add address-pool=dhcp-pool interface=ether2 lease-time=10m

Kemudian aktifkan di IP > DHCP Server > Pilih bagian "✓"



7. Konfigurasi IP Address Windows (Tempat VMWARE terinstall)



Pengujian koneksi ke jaringan internet/global

```
C:\Users\HP2025-50REV>ping google.com

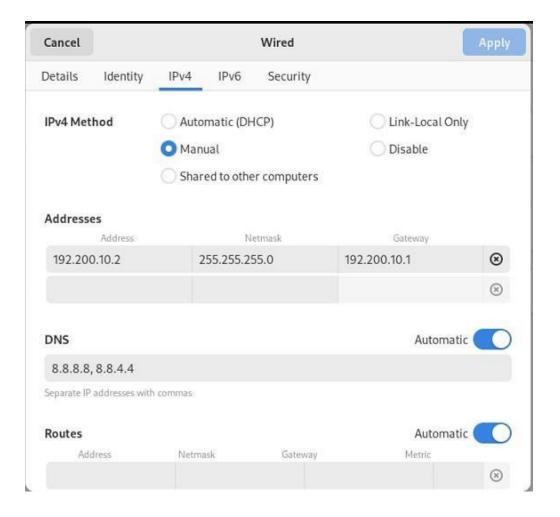
Pinging forcesafesearch.google.com [216.239.38.120] with 32 bytes of data:
Reply from 216.239.38.120: bytes=32 time=21ms TTL=116
Ping statistics for 216.239.38.120:
Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
Approximate round trip times in milli-seconds:
Minimum = 21ms, Maximum = 21ms, Average = 21ms

C:\Users\HP2025-50REV>
```

8. Pengujian pada posisi PC-KASIR 1 dan SERVER POST

Konfigurasi IP address di PC Kasir 1 (Debian 11 GUI)





Konfigurasi IP address di SERVER POST

```
Debian GNU/Linux 12 server tty1
server login: root
Password: _
```

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

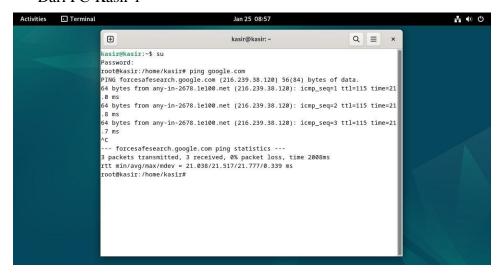
source /etc/network/interfaces.d/*

# The loopback network interface
auto lo
iface lo inet loopback

# The primary network interface
allow-hotplug ens33
iface ens33 inet static
    address 192.200.30.2/30
    gateway 192.200.30.1
    # dns-* options are implemented by the resolvconf package, if
    dns-nameservers 8.8.8.8,8.8.4.4
```

Pengujian koneksi ke jaringan internet/global

• Dari PC-Kasir 1



Dari SERVER POST ke jaringan internet/global

```
Debian GNU/Linux 12 server tty1

server login: root
Password:
Linux server 6.1.0-15-amd64 #1 SMP PREEMPT_DYNAMIC Debian 6.1.66-1 (2023-12-09) x86_64

The programs included with the Debian GNU/Linux system are free software;
the exact distribution terms for each program are described in the
individual files in /usr/share/doc/*/copyright.

Debian GNU/Linux comes with ABSOLUTELY NO WARRANTY, to the extent
permitted by applicable law.
Last login: Sat Jan 25 08:48:49 WIB 2025 on tty1
root@server: "# ping google.com
PING forcesafesearch.google.com
PING forcesafesearch.google.com (216.239.38.120) 56(84) bytes of data.
64 bytes from any-in-2678.1e100.net (216.239.38.120): icmp_seq=1 ttl=115 time=21.1 ms
64 bytes from any-in-2678.1e100.net (216.239.38.120): icmp_seq=2 ttl=115 time=21.8 ms
64 bytes from any-in-2678.1e100.net (216.239.38.120): icmp_seq=3 ttl=115 time=21.8 ms
64 bytes from any-in-2678.1e100.net (216.239.38.120): icmp_seq=4 ttl=115 time=21.7 ms
^C
--- forcesafesearch.google.com ping statistics ---
4 packets transmitted, 4 received, 0% packet loss, time 3005ms
rtt min/avg/max/mdev = 21.131/21.612/21.902/0.291 ms
root@server: "# __
```

Dari SERVER POST ke PC Kasir 1

```
root@server:~# ping 192.200.10.2

PING 192.200.10.2 (192.200.10.2) 56(84) bytes of data.

64 bytes from 192.200.10.2: icmp_seq=1 ttl=63 time=2.64 ms

From 192.200.30.1: icmp_seq=2 Redirect Host(New nexthop: 192.200.10.2)

64 bytes from 192.200.10.2: icmp_seq=2 ttl=63 time=3.13 ms

64 bytes from 192.200.10.2: icmp_seq=3 ttl=64 time=1.38 ms

64 bytes from 192.200.10.2: icmp_seq=4 ttl=64 time=1.17 ms

64 bytes from 192.200.10.2: icmp_seq=5 ttl=64 time=1.37 ms

^C

--- 192.200.10.2 ping statistics ---

5 packets transmitted, 5 received, 0% packet loss, time 4009ms

rtt min/avg/max/mdev = 1.165/1.937/3.129/0.793 ms

root@server:~# _
```

9. Konfigurasi VPN/L2TP Konfigurasi

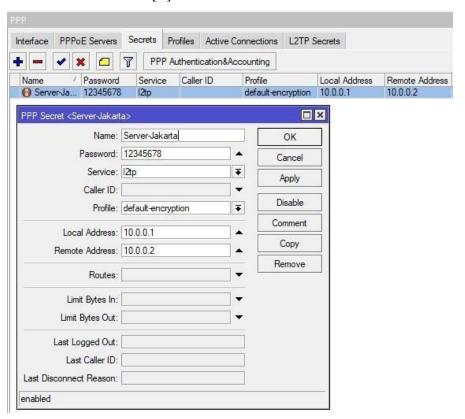
Profiles

Pilih: PPP->Profiles->[+]



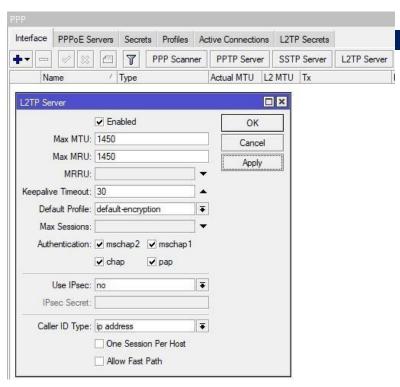
Konfigurasi Secret

Pilih: PPP->Secrets->[+]



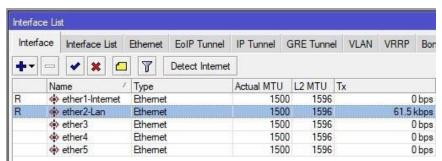
Konfigurasi VPN/L2TP SERVER

Pilih: PPP->Interface->L2TP Server



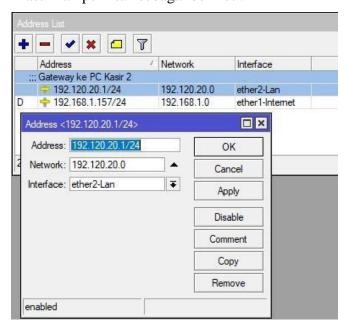
Konfigurasi Router Surabaya

1. Pemberian nama setiap interface



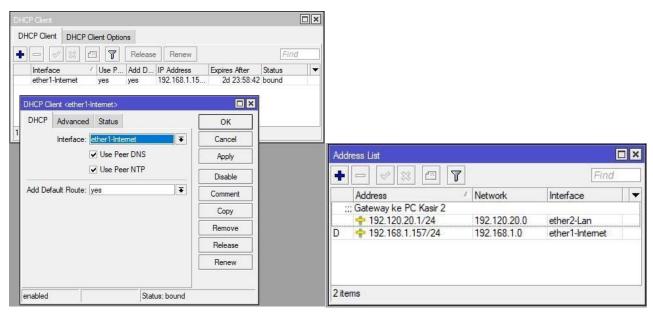
2. Addressing

Masukkan perintah sebagai berikut:



3. DHCP Client

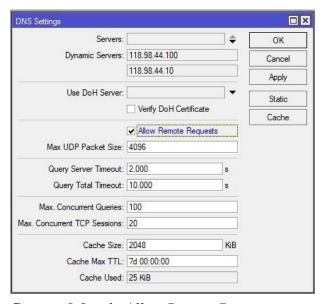
IP -> DHCP Client -> Klik tanda [+]



Addess List

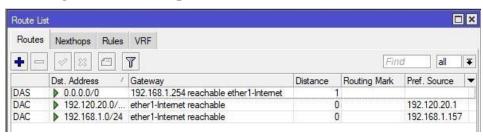
4. Konfigurasi DNS

IP -> DNS



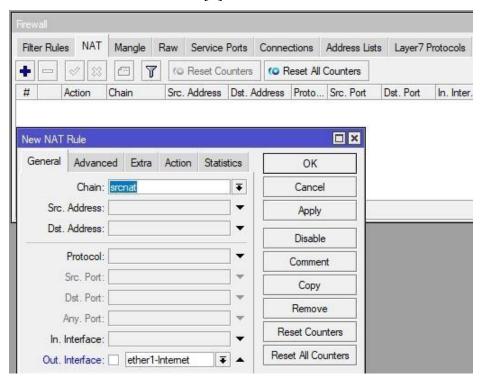
Centang [v] pada Allow Remote Requests

5. Konfigurasi Routes (Optional)

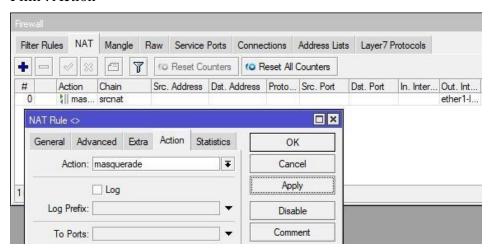


6. Firewall

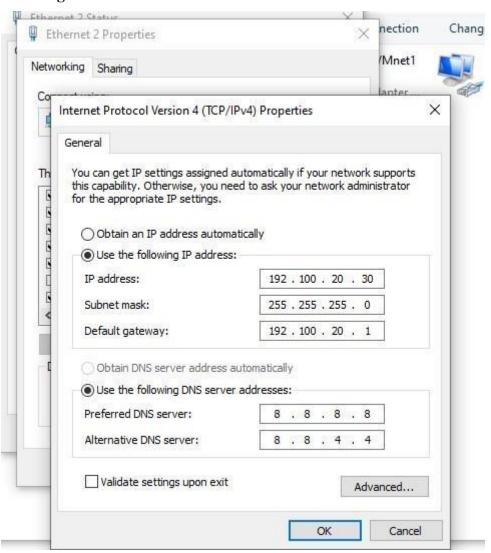
IP -> Firewall -> NAT > Pilih [+]



Pilih: Action



7. Konfigurasi IP Address PC Kasir 2



Pengujian koneksi ke jaringan internet/global

```
Command Prompt

Microsoft Windows [Version 10.0.19045.5371]

(c) Microsoft Corporation. All rights reserved.

C:\Users\HP2025-50REV>ping google.com

Pinging forcesafesearch.google.com [216.239.38.120] with 32 bytes of data:

Reply from 216.239.38.120: bytes=32 time=20ms TTL=116

Ping statistics for 216.239.38.120:

Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),

Approximate round trip times in milli-seconds:

Minimum = 20ms, Maximum = 20ms, Average = 20ms

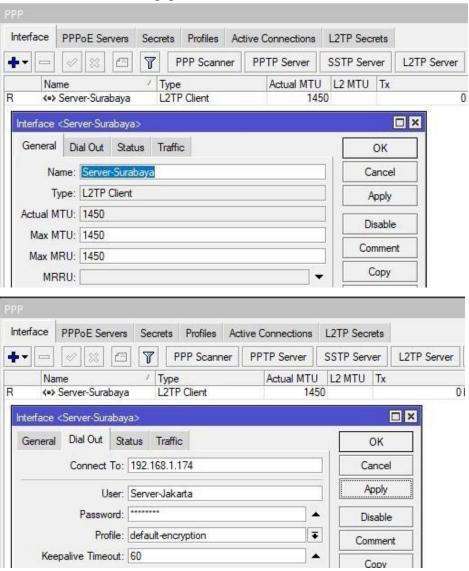
C:\Users\HP2025-50REV>__
```

10. Konfigurasi VPN/L2TP

Mengonfigurasi **L2TP Server** dengan dua buah Mikrotik memungkinkan Anda untuk membuat koneksi **site-to-site VPN**. Dalam pengaturan ini, satu Mikrotik bertindak sebagai **L2TP Server**, dan yang lainnya sebagai **L2TP Client**. Berikut langkahlangkahnya:

Konfigurasi L2TP di Client

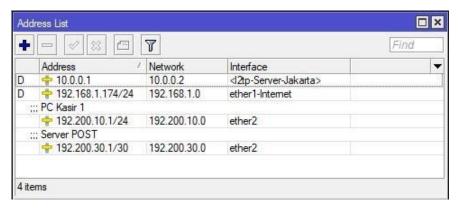
Pilih: PPP->Interface->[+]->L2TP Client



Kemudian periksa di sisi server (Router-Jakarta)

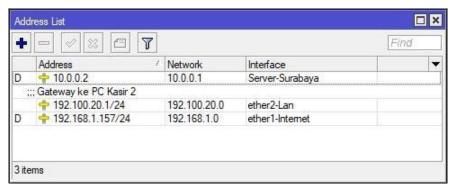


Periksa di IP->Addresses



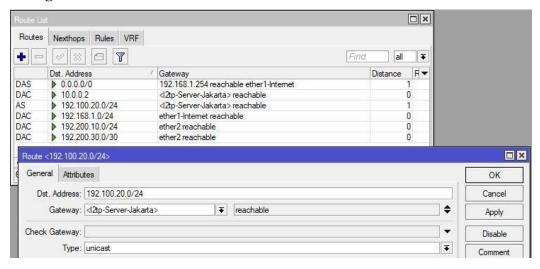
Kemudian periksa di sisi Client (Router-Surabaya) Pilih

: IP->IP Addresses

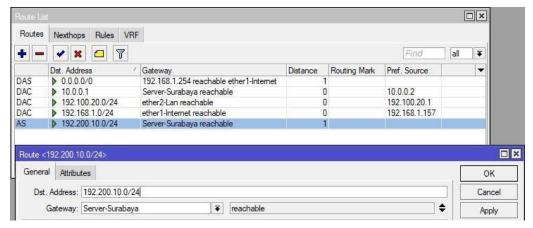


Agar bisa berkomunikasi antar router, kita harus seting routing static di sisi server dan client

Seting Router Static di Router-Jakarta Pilih: IP->Routes



Seting Router Static di Router-Surabaya Pilih : IP->Routes a. Routing ke IP address 192.200.10.0/24



b. Routing Ke IP address 192.200.30.0/30

PENGUJIAN TUNNEL (L2TP SERVER)

Pengujian tunnel akan di lakukan di komputer klien (Router-Surabaya) ke komputer server (Router-Jakarta)

a. Pengujian dari PC Kasir 2 ke IP address PC Kasir 1

```
C:\Users>ping 192.200.10.2

Pinging 192.200.10.2 with 32 bytes of data:
Reply from 192.200.10.2: bytes=32 time<1ms TTL=128

Ping statistics for 192.200.10.2:

Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
Approximate round trip times in milli-seconds:

Minimum = 0ms, Maximum = 0ms, Average = 0ms
```

b. Pengujian dari PC Kasir 2 ke SERVER POST

```
C:\Users>ping 192.200.30.2

Pinging 192.200.30.2 with 32 bytes of data:
Reply from 192.200.30.2: bytes=32 time<1ms TTL=128

Ping statistics for 192.200.30.2:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
Approximate round trip times in milli-seconds:
    Minimum = 0ms, Maximum = 0ms, Average = 0ms</pre>
```

C. Install dan Konfigurasi Aplikasi Kasir di Server POST

Aplikasi yang saya pakai untuk Aplikasi Kasir : **Dolibarr** (**optional**), anda bisa menggunakan aplikasi kasir yang lainnya, misal: *Odoo (ERP dengan Fitur POS), uniCenta atau Floreant POS, dengan install dan konfigurasi berbeda*.

1. Install Apache2, Mariadb dan PHP

root@server:~# apt install apache2 mariadb-server php php-mysql php-gd php-xml phpjson php-ldap php-zip php-imap php-mbstring php-intl libapache2-mod-php php-curl

Kemudian masukkan perintah

root@server:~# cd /var/www

download folder dolibarr yang menjadi folder utama konfigurasi untuk aplikasi kasir di Server POST dengan perintah

root@server:~# wget_https://github.com/Dolibarr/dolibarr/tarball/develop -O

dolibarr.tar.gz

Ferver ×

root@server:~# wget https://github.com/Dolibarr/dolibarr/tarball/develop -O dolibarr.tar.gz
--2025-01-25 11:39:45-- https://github.com/Dolibarr/dolibarr/tarball/develop -O dolibarr.tar.gz
--2025-01-25 11:39:45-- https://github.com/Dolibarr/dolibarr/tarball/develop
Resolving github.com (github.com) | 20.205.243.166
Connecting to github.com (github.com) | 20.205.243.166|:443... connected.
HTTP request sent, awaiting response... 302 Found
Location: https://codeload.github.com/Dolibarr/legacy.tar.gz/refs/heads/develop
Location: https://codeload.github.com/Dolibarr/dolibarr/legacy.tar.gz/refs/heads/develop
Resolving codeload.github.com (codeload.github.com)... 20.205.243.165
Connecting to codeload.github.com (codeload.github.com) | 20.205.243.165
Connecting to codeload.github.com (codeload.github.com) | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243.165 | 20.205.243

root@server: /var/www# ls dolibarr.tar.gz

html

Dan extract folder tersebut dengan perintah

root@server: /var/www# tar xzvf dolibarr.tar.gz root@server: /var/www# ls

Dolibarr-dolibarr-ec649b0

Dan kita akan mengganti nama dari folder tersebut dengan dolibarr

root@server: /var/www# mv Dolibarr-dolibarr-ec649b0 dolibarr

root@server: /var/www# rm dolibarr.tar.gz root@server:

/var/www# ls

dolibarr html

2. Setel Hak Akses

root@server:~# chown -R www-data:www-data/var/www/dolibarr root@server:~# chmod -R 755 /var/www/dolibarr

3. Konfigurasi Database

```
root@server:~# mysql -u root -p

root@server:~# mysql -u root -p

Enter password:
Welcome to the MariaDB monitor. Commands end with ; or \g.
Your MariaDB connection id is 31

Server version: 10.11.4-MariaDB-1~deb12u1 Debian 12

Copyright (c) 2000, 2018, Oracle, MariaDB Corporation Ab and others.

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

MariaDB [(none)]>
```

Buat database dan user untuk Dolibarr:

```
MariaDB [(none)]> create database dolibarr character set utf8mb4 collate utf8mb4_general_ci;
Query OK, 1 row affected (0.001 sec)

MariaDB [(none)]> create user 'dolibarruser'@'localhost' identified by '12345678';
Query OK, 0 rows affected (0.002 sec)

MariaDB [(none)]> grant all privileges on dolibarr.* to 'dolibarruser'@'localhost';
Query OK, 0 rows affected (0.001 sec)

MariaDB [(none)]> flush privileges;
Query OK, 0 rows affected (0.001 sec)

MariaDB [(none)]> exit;_
```

4. Konfigurasi Apache2

Buat file virtual host:

```
root@server:~# cd /etc/apache2/sites-available
root@server:/etc/apache2/sites-available# ls
000-default.conf default-ssl.conf
root@server:/etc/apache2/sites-available# cp 000* dolibarr.conf
root@server:/etc/apache2/sites-available# ls
000-default.conf default-ssl.conf dolibarr.conf
root@server:/etc/apache2/sites-available# a2dissite 000*
Site 000-default disabled.
To activate the new configuration, you need to run:
systemctl reload apache2
root@server:/etc/apache2/sites-available# _
```

```
root@server:/etc/apache2/sites-available# nano dolibarr.conf
                                              dolibarr.conf
  GNU nano 7.2
 VirtualHost *:80>
        ServerName smknsukasari.lks.id
        ServerAdmin smknsukasari@localhost
        DocumentRoot /var/www/dolibarr
        <Directory /var/www/dolibarr/htdocs>
                Options FollowSymLinks
                AllowOverride All
                Require all granted
        # Available loglevels: trace8, ..., trace1, debug, info, notice, warn,
        # error, crit, alert, emerg.
        # It is also possible to configure the loglevel for particular
        #LogLevel info ssl:warn
        ErrorLog ${APACHE_LOG_DIR}/dolibarr_error.log
        CustomLog ${APACHE_LOG_DIR}/dollibarr_access.log combined
        # enabled or disabled at a global level, it is possible to
        # include a line for only one particular virtual host. For example the
        #Include conf-available/serve-cgi-bin.conf
 /VirtualHost>
```

Aktifkan virtual host dan restart Apache:

```
root@server:/etc/apache2/sites-available# a2ensite dolibarr.conf
Enabling site dolibarr.
To activate the new configuration, you need to run:
systemctl reload apache2
```

Restart Apache

root@server:/etc/apache2/sites-available# systemctl restart apache2

5. Akses Dolibarr

Buka browser dan akses: http://192.200.30.2/htdocs/install/index.php



Pilih: Next step.

Untuk konfigurasi selanjutnya, silahkan teruskan !, kalau ada masalah dengan konfigurasinya, silahkan buka web sitenya : https://www.dolibarr.org/



SELAMAT MENCOBA!