

Installation, configuration et sécurisation d'un serveur LAMP

Le package LAMP inclut Linux, Apache, Mysql/MariaDB et Php.

Il est essentiel au bon fonctionnement d'un serveur Web.

L'installation du site s'est déroulée sur un OS Debian 12.

J'ai reproduit l'installation d'un serveur LAMP de mon côté avec une machine hébergée (VPS) également sur Debian 12.

Je mets à jour le système avec *apt update* et télécharge les paquets nécessaires avec *apt upgrade*.

```
debian@vps-556b5fdb:~$ sudo apt-get update
Get:1 file:/etc/apt/mirrors/debian.list Mirrorlist [30 B]
Get:5 file:/etc/apt/mirrors/debian-security.list Mirrorlist [39 B]
Hit:2 https://deb.debian.org/debian bookworm InRelease
Hit:3 https://deb.debian.org/debian bookworm-updates InRelease
Hit:4 https://deb.debian.org/debian bookworm-backports InRelease
Hit:6 https://deb.debian.org/debian-security bookworm-security InRelease
Reading package lists... Done
debian@vps-556b5fdb:~$ sudo apt-get upgrade
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
Calculating upgrade... Done
0 upgraded, 0 newly installed, 0 to remove and 0 not upgraded.
debian@vps-556b5fdb:~$
```

Je démarre l'installation LAMP en installant les paquets serveur apache.

```
debian@vps-556b5fdb:~$ sudo apt-get install apache2 -y
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
The following additional packages will be installed:
```

Je vérifie ensuite le bon fonctionnement d'apache.

```
debian@vps-556b5fdb:~$ systemctl status apache2
● apache2.service - The Apache HTTP Server
  Loaded: loaded (/lib/systemd/system/apache2.service; enabled; preset: enabled)
  Active: active (running) since Tue 2024-03-12 10:42:06 UTC; 1min 38s ago
    Docs: https://httpd.apache.org/docs/2.4/
   Main PID: 9384 (apache2)
      Tasks: 55 (limit: 2295)
     Memory: 10.8M
        CPU: 43ms
      CGroup: /system.slice/apache2.service
              └─9384 /usr/sbin/apache2 -k start
                  ├─9386 /usr/sbin/apache2 -k start
                  ├─9387 /usr/sbin/apache2 -k start

Mar 12 10:42:06 vps-556b5fdb systemd[1]: Starting apache2.service - The Apache HTTP Server...
Mar 12 10:42:06 vps-556b5fdb systemd[1]: Started apache2.service - The Apache HTTP Server.
debian@vps-556b5fdb:~$
```

Je continue l'installation LAMP en installant tous les paquets nécessaires au langage Php.

```
debian@vps-556b5fdb:~$ sudo apt install php8.2 php8.2-cgi php8.2-common php8.2-imap php8.2-redis php8.2-snmp php8.2-mysqli php8.2-zip php8.2-mbstring php8.2-curl libapache2-mod-php -y
```

Je vérifie la version de Php, ici 8.2.7

```
debian@vps-556b5fdb:~$ sudo php -v
Created directory: /var/lib/snmp/cert_indexes
PHP 8.2.7 (cli) (built: Jun  9 2023 19:37:27) (NTS)
Copyright (c) The PHP Group
Zend Engine v4.2.7, Copyright (c) Zend Technologies
    with Zend OPcache v8.2.7, Copyright (c), by Zend Technologies
```

Je finalise l'installation LAMP en installant et configurant la base de données de mon serveur grâce aux paquets MariaDB.

```
debian@vps-556b5fdb:~$ sudo apt install mariadb-server -y
```

Je vérifie l'état de MariaDB.

```
debian@vps-556b5fdb:~$ systemctl status mariadb
● mariadb.service - MariaDB 10.11.6 database server
  Loaded: loaded (/lib/systemd/system/mariadb.service; enabled; preset: enabled)
  Active: active (running) since Tue 2024-03-12 10:51:40 UTC; 52s ago
    Docs: man:mariadb(8)
          https://mariadb.com/kb/en/library/systemd/
   Main PID: 19572 (mariadb)
     Status: "Taking your SQL requests now..."
      Tasks: 13 (limit: 2295)
     Memory: 99.4M
        CPU: 505ms
      CGroup: /system.slice/mariadb.service
              └─19572 /usr/sbin/mariadb

Mar 12 10:51:40 vps-556b5fdb mariadb[19572]: 2024-03-12 10:51:40 [Note] InnoDB: Loading buffer pool(s) from /var/lib/mysql/ib_buffer_pool
Mar 12 10:51:40 vps-556b5fdb mariadb[19572]: 2024-03-12 10:51:40 [Warning] You need to use --log-bin to make --expire-logs-days or --binlog-expire-logs-seconds work.
Mar 12 10:51:40 vps-556b5fdb mariadb[19572]: 2024-03-12 10:51:40 [Note] Server socket created on IP: '127.0.0.1'.
Mar 12 10:51:40 vps-556b5fdb mariadb[19572]: 2024-03-12 10:51:40 [Note] InnoDB: Buffer pool(s) load completed at 240312 10:51:40
Mar 12 10:51:40 vps-556b5fdb mariadb[19572]: 2024-03-12 10:51:40 [Note] /usr/sbin/mariadb: ready for connections.
Mar 12 10:51:40 vps-556b5fdb mariadb[19572]: Version: '10.11.6-MariaDB-0+deb12u1' socket: '/run/mysqld/mysqld.sock' port: 3306 Debian 12
Mar 12 10:51:40 vps-556b5fdb systemd[1]: Started mariadb.service - MariaDB 10.11.6 database server.
Mar 12 10:51:40 vps-556b5fdb /etc/mysql/debian-start[19588]: Upgrading MySQL tables if necessary.
Mar 12 10:51:40 vps-556b5fdb /etc/mysql/debian-start[19599]: Checking for insecure root accounts.
Mar 12 10:51:40 vps-556b5fdb /etc/mysql/debian-start[19605]: Triggering myisam-recover for all MyISAM tables and aria-recover for all Aria tables
```

Je paramètre la base de données « *wordpress* » avec *admin* en utilisateur et *Aristee.2024* en mot de passe.

```
debian@vps-556b5fdb:~$ sudo mariadb
Welcome to the MariaDB monitor.  Commands end with ; or \g.
Your MariaDB connection id is 32
Server version: 10.11.6-MariaDB-0+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)]> CREATE DATABASE wordpress;
Query OK, 1 row affected (0.000 sec)

MariaDB [(none)]> CREATE USER 'admin'@'localhost' IDENTIFIED BY 'Aristee.2024';
Query OK, 0 rows affected (0.003 sec)
```

J'attribue les privilèges à l'utilisateur *admin* sur la base de données « *wordpress* ».

```
MariaDB [(none)]> GRANT ALL PRIVILEGES ON wordpress.* TO 'admin'@'localhost';
Query OK, 0 rows affected (0.001 sec)
```

Je rafraîchis les privilèges octroyés.

```
MariaDB [(none)]> FLUSH PRIVILEGES;
Query OK, 0 rows affected (0.001 sec)
```

Je supprime l'*index.html* dans le répertoire */var/www/html*

```
debian@vps-556b5fdb:~$ rm /var/www/html/index.html
rm: remove write-protected regular file '/var/www/html/index.html'?
debian@vps-556b5fdb:~$ ■
```

Je remets à jour mon système.

```
debian@vps-556b5fdb:~$ sudo apt update
Get:1 file:/etc/apt/mirrors/debian.list Mirrorlist [30 B]
Get:5 file:/etc/apt/mirrors/debian-security.list Mirrorlist [39 B]
Hit:2 https://deb.debian.org/debian bookworm InRelease
Hit:3 https://deb.debian.org/debian bookworm-updates InRelease
Hit:4 https://deb.debian.org/debian bookworm-backports InRelease
Hit:6 https://deb.debian.org/debian-security bookworm-security InRelease
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
All packages are up to date.
```

Le package LAMP est correctement installé et configuré.