

# Generic Linux installation

*The information on this page refers to License Statistics v6.18 or newer, which introduced the CLI and moved the License Statistics license from a file to the database. If you are running a previous version of License Statistics, see [documentation for previous versions](#).*

If your Linux distribution is other than [Debian](#), [Ubuntu](#), or [RedHat Enterprise Linux](#) (which have dedicated installers), or you need more control over the installation process, you can use the generic (universal) installer.

This installation method requires more manual configuration than the DEB and RPM installers, but allows for a high level of customization including:

- Running the application with a custom user
- Optionally running the application in non-service mode
- Customizing locations for files in the filesystem
- Running the application on distributions other than [officially supported](#) DEB and RPM

## Installation

The following generic Linux installation procedure can be customized according to your needs.



All paths and commands used in the descriptions below are just examples of a customized installation procedure. This installation procedure requires advanced experience with customized installation, and all customizations are made at your own risk.

1. Download the License Statistics installation from the [License Statistics download page](#).
2. Create user and group.

```
addgroup --system licstat
adduser --ingroup licstat --no-create-home --system --disabled-login --shell /bin/false licstat
```

3. Create installation and data directories.



Back up all configuration and data files, especially the configuration file and MySQL data.

### Installation directory

```
mkdir -p /opt/xflicstat
```

### Data directories

For MySQL:

```
mkdir -p /var/opt/xflicstat/mysql
```

For logs:

```
mkdir -p /var/opt/xflicstat/log
```

For temporary and runtime files:

```
mkdir -p /var/opt/xflicstat/tmp
```

4. Set ownership and group:

```
chown licstat:licstat /opt/xflicstat \
    /var/opt/xflicstat/mysql \
    /var/opt/xflicstat/log \
    /var/opt/xflicstat/tmp
```

5. Extract License Statistics:

```
tar xzf license_statistics_v6.17.0_linux_x64.tar.gz -C /opt/xflicstat
```

and set ownership:

```
chown -R licstat:licstat /opt/xflicstat/
```

6. Set the port in the License Statistics configuration file /opt/xflicstat/conf/xflicstat.cfg:

```
WEBSERVER_PORT = 8080
# if not run as root port must be greater than 1024
```

7. Set options in the MySQL configuration file /opt/xflicstat/embedded/etc/mysql/mysql.conf:

```
user = licstat
basedir
# if installation is different than /opt/xflicstat
datadir
# if mysql data dir is different than /var/opt/xflicstat/mysql
```

8. Bootstrap the database:

```
LD_LIBRARY_PATH=/opt/xflicstat/embedded/lib /opt/xflicstat/embedded/bin/mysqld \
--defaults-file=/opt/xflicstat/embedded/etc/mysql/mysql.conf \
--initialize-insecure
```

9. Copy the default file:

```
cp /opt/xflicstat/scripts/default /etc/default/xflicstat
```

and set in /etc/default/xflicstat:

```
LOG_DIRECTORY=/var/opt/xflicstat/log
TMP_DIRECTORY=/var/opt/xflicstat/tmp
```

10. Install systemd unit:

```
cp /opt/xflicstat/scripts/xflicstat.service /lib/systemd/system/xflicstat.service
```

and edit:

```
systemctl edit xflicstat.service
```

and set:

```
[Service]
User=licstat
```

If installation directory is different than /opt/xflicstat, also set the new installation directory with:

```
ExecStart=/opt/xflicstat/bin/xflicstat --run --logDir ${LOG_DIRECTORY} --tmpDir ${TMP_DIRECTORY}
```

11. Reload systemd:

```
systemctl --system daemon-reload
```

and optionally, enable License Statistics to start with the system:

```
systemctl enable xflicstat.service
```

## Configuration

Configure the installation using the configuration file:

*installation\_directory*/conf/xflicstat.cfg.

For example:

/opt/xflicstat/conf/xflicstat.cfg

## Activating the license

Activate the license using:

/opt/xflicstat/bin/xflicstat-cli license activate *activation\_key*

You may also use an alternative activation method, as described in [Activating a license](#).

## Starting the service

1. Start the service from a command line:

```
systemctl start xflicstat.service
```

2. Access License Statistics in the browser:

```
{hostname}:80
```

## Stopping the service

Stop the service from a command line:

```
systemctl stop xflicstat.service
```

## Removing the service

1. Stop the service (see Stopping the service, above).
2. Remove the directories with or without data directories, according to your needs.

## Updating the service

1. Download the License Statistics installation from the [License Statistics download page](#).
2. Stop the service (see Stopping the service, above).
3. Backup the xflicstat.cfg file; for example: /opt/xflicstat/conf/xflicstat.cfg
4. Clear the current installation directory; for example: /opt/xflicstat
5. Install the new version by extracting new files:

```
tar xzf license_statistics_v6.17.0_linux_x64.tar.gz -C /opt/xflicstat
```

and setting ownership:

```
chown -R licstat:licstat /opt/xflicstat/
```

6. Optionally, restore the configuration file or reconfigure the default configuration file.
7. Start the service (see Starting the service, above).