

passwordpolicy

The `passwordpolicy` is like the regular PostgreSQL `passwordcheck` extension, except it is built with `cracklib` and has some configurations options. Unlike the original module, this one has more strict password checks. The `passwordpolicy` module checks users' passwords whenever they are set with `CREATE ROLE` or `ALTER ROLE`. If a password is considered too weak, it will be rejected and the command will terminate with an error.

Installing by compiling source code

Prerequisite

Ubuntu:

```
# add postgres repo
add-apt-repository 'deb http://apt.postgresql.org/pub/repos/apt/ xenial-pgdg main'
wget --quiet -O - https://www.postgresql.org/media/keys/ACCC4CF8.asc | sudo apt-key add -

# install postgres
apt-get -y update
apt-get -y install postgresql postgresql-contrib libpq-dev postgresql-server-dev-all

# install build requirements
apt-get -y install make build-essential

# install cracklib
apt-get -y install libpam-cracklib libcrack2-dev
```

RHEL:

```
yum -y install openssl-devel

# add postgres repo
rpm -Uvh https://yum.postgresql.org/10/redhat/rhel-7-x86_64/pgdg-centos10-10-2.noarch.rpm

# install postgres
yum -y install postgresql10-server postgresql10-libs postgresql10-devel postgresql10-contrib

# install cracklib
yum -y install cracklib cracklib-devel cracklib-dicts words

# create dictionary
mkdict /usr/share/dict/* | packer /usr/lib/cracklib_dict

# initialize database
/usr/pgsql-10/bin/postgresql-10-setup initdb
```

To build it, just do this:

```
make
make install
```

If you encounter an error such as:

```
make: pg_config: Command not found
```

Be sure that you have `pg_config` installed and in your path. If you used a package management system such as RPM to install PostgreSQL, be sure that the `-devel` package is also installed. If necessary tell the build process where to find it. Edit `Makefile`, and change `PG_CONFIG` variable:

```
PG_CONFIG=/path/to/pg_config
```

followed by the

```
make
make install
```

`pg_config` is usually under `/usr/pgsql-10/bin/pg_config` on RHEL/CentOS/Fedora. Replace 10 with your major PostgreSQL version.

Alternatively the following will work too:

```
PATH="/usr/pgsql-10/bin:$PATH" make
sudo PATH="/usr/pgsql-10/bin:$PATH" make install
PATH="/usr/pgsql-10/bin:$PATH" make installcheck
```

Using the module

To enable this module, add `'$libdir/passwordpolicy'` to `shared_preload_libraries` in `postgresql.conf`, then restart the server.

Configurations

Configure the `passwordpolicy` plugin in `postgresql.conf`.

```
p_policy.min_password_len = 8      # Set minimum Password length
p_policy.min_special_chars = 2     # Set minimum number of special chracters
p_policy.min_numbers = 2          # Set minimum number of numeric characters
p_policy.min_uppercase_letter = 2  # Set minimum number of upper case letters
p_policy.min_lowercase_letter = 2  # Set minimum number of lower casae letters
```

Testing

Using vagrant:

```
vagrant up
vagrant provision --provision-with install
```

More information

For more details, please read the manual of the original module:

<https://www.postgresql.org/docs/current/static/passwordcheck.html>

Contributing

Bug reports and pull requests are welcome on GitHub at `passwordpolicy` repository. This project is intended to be a safe, welcoming space for collaboration, and contributors are expected to adhere to the Contributor Covenant code of conduct.

Author

- **indrajit** - *Owner* - eendroroy

License

The project is available as open source under the terms of the MIT License.