

LinOTP for two phase authentication

October 14, 2016 / Gavin Jackson

authentication

linotp

linux

python

security

two phase authentication



At work we just completed a migration from a closed source 2 phase authentication product (that ran on our Windows AD Server) to an open source product called [LinOTP](#) that integrates with Google Authenticator (in fact it work with any authenticator that supports the HMAC-Based One-Time Password (HOTP) or Time-Based One-Time Password (TOTP) algorithms - these include Lastpass Authenticator and FreeOTP).

LinOTP is written in Python (Python 2/Pylons), is extremely modular (allowing you to configure it to suit your environment).

Our configuration makes use of the following modules:

- PAM authentication module (which is used by Openvpn to perform the two phase authentication).
- LDAP against AD to perform user ID resolution
- Postgresql to host the token and audit databases
- Apache2 to provide authentication to the management interface and SSL

A lot of the configuration is plumbing - as it is running on python 2 I did have to use [pyenv](#) to get a version of python 2 with a working virtualenv (Ubuntu seems to have broken virtualenv in their recent 16.04 LTS upgrade).

The LinOTP [documentation](#) is **VERY** good.

LinOTP Config

Tools

Import Token File

Help

LinOTP

Logged in as: gavinj | Logout

Selected User

Selected Token

TOTP00012E16

Realms:

les-mills-asia-pacific

Enroll

Assign

Unassign

Enable

Disable

Set PIN

Reset Failcounter

Delete

Token View

User View

Policies

Audit Trail

Lost Token

Token Info

Resync Token

Set Token Realm

Serial Number	Active	Username	Realm	Type	Login Attempts Failed	Description	Max Login Attempts	OTP Length	Count Window	Sync Window
TOTP00012E16	true		les-mills-asia-pac	TOTP	0	web ui generated	10	6	10	1000
TOTP00015C44	true		les-mills-asia-pac	TOTP	0	web ui generated	10	6	10	1000
TOTP00016FB3	true		les-mills-asia-pac	TOTP	0	web ui generated	10	6	10	1000
TOTP0001735B	true		les-mills-asia-pac	TOTP	0	web ui generated	10	6	10	1000
TOTP0001970E	true		les-mills-asia-pac	TOTP	0	Les Mills VPN	10	6	10	1000

Find

Login Name

Search

19

Page 1 of 1

Displaying 1 to 5 of 5 items

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Tidy Management Interface (with self service portal capability)

Enroll Token

The token will be enrolled for user **andrew (Imap (LDAPIdResolver))**.

Token type

HMAC eventbased

OCRA - challenge/response Token

mOTP - mobile otp

Day OTP Token / Tagespasswort

E-mail token

Forwarding Token

HMAC eventbased

HMAC time based

OCRA2 - challenge/response Token

QRToken - challenge/response Token

RADIUS token

Remote token

SMS OTP

Simple Pass Token

YubiKey

Token seed

generate

Enter seed

Token settings

Google

OTP Digits

Hash algorithm

Description

Token PIN:

Enter PIN:

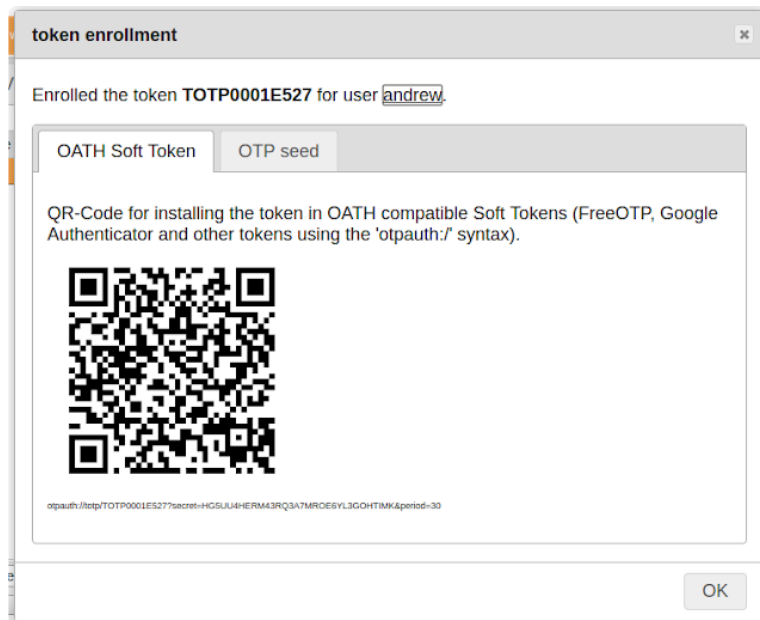
Confirm PIN:

Enroll

Cancel

Experts GmbH

Range of Token types supported



QRCode Scanning Screen

Downloaded from <https://www.gavinj.net/post/linotp-for-two-phase-authentication>

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