pfSense - Todo #7024

Replace copy of radius.inc by pear-Auth_RADIUS

12/20/2016 10:07 AM - Renato Botelho

Status:	Resolved		**Start date:**	12/20/2016
Priority:	Normal		**Due date:**	
Assignee:	Renato Botelho		**% Done:**	100%
Category:			**Estimated time:**	0.00 hour
Target version:	2.4.4			

Description
Replace copy of radius.inc, with a good number of modifications, by pear-Auth_RADIUS provided by ports

Associated revisions

Revision e26b805c - 07/03/2018 07:40 AM - Renato Botelho

Fix #7024: Deprecate /etc/inc/radius.inc in favor of pear-Auth_RADIUS port

Revision 49ec9d91 - 07/05/2018 06:38 AM - Renato Botelho

Fix #7024: Fix Radius include extension

History

#1 - 10/12/2017 09:55 AM - Jim Pingle

- Target version changed from 2.4.1 to 2.4.2

#2 - 10/23/2017 12:20 PM - Jim Pingle

- Target version changed from 2.4.2 to 2.4.3

#3 - 02/14/2018 12:35 PM - Renato Botelho

- Target version changed from 2.4.3 to 2.4.4

Push for 2.4.4

#4 - 07/03/2018 07:50 AM - Renato Botelho

- Status changed from New to Feedback

- % Done changed from 0 to 100

Applied in changeset e26b805c92d2454629a8f63ca491c2c3c812d9dc.

#5 - 07/04/2018 02:46 PM - James Webb

I believe the change applied in commit: e26b805 may have caused errors; specifically those referenced in issue #8617. Can I please have further clarification as to whether the pear-Auth_RADIUS package provided by ports is actually included in the current development snapshots?

#6 - 07/06/2018 06:11 AM - Renato Botelho

James Webb wrote:

> I believe the change applied in commit: e26b805 may have caused errors; specifically those referenced in issue #8617. Can I please have further clarification as to whether the pear-Auth_RADIUS package provided by ports is actually included in the current development snapshots?

pear-Auth_RADIUS port is part of pfSense for a long time. It was not being used. You can check if it's present in your system running `pkg info | grep

RADIUS`

#7 - 08/18/2018 02:37 AM - Vladimir Lind

On 2.4.4 Fri Aug 17 21:29:09 EDT 2018:

Shell Output - pkg info | grep RADIUS

freeradius3-3.0.17   Free RADIUS server implementation
hostapd-2.6_1   IEEE 802.11 AP, IEEE 802.1X/WPA/WPA2/EAP/RADIUS Authenticator
pfSense-pkg-freeradius3-0.15.5_3 FreeRADIUS 3.x package for pfSense
php72-pear-Auth_RADIUS-1.1.0_4 PEAR wrapper classes for the RADIUS PECL
squid_radius_auth-1.10   RADIUS authenticator for squid proxy 2.5 and later

#8 - 08/19/2018 05:57 AM - Chris Macmahon

root: pkg info | grep RADIUS
hostapd-2.6_1   IEEE 802.11 AP, IEEE 802.1X/WPA/WPA2/EAP/RADIUS Authenticator
php72-pear-Auth_RADIUS-1.1.0_4 PEAR wrapper classes for the RADIUS PECL
[2.4.4-DEVELOPMENT][root@pfSense.localdomain]/root:

#9 - 08/19/2018 10:57 AM - Constantine Kormashev

It seems ok on latest 244
php72-pear-Auth_RADIUS-1.1.0_4 PEAR wrapper classes for the RADIUS PECL

#10 - 08/19/2018 03:01 PM - Jim Pingle

The package is there, but what we need is more functional testing. We need to make sure not only that RADIUS authentication works but also accounting (where supported) as well as values passed back from RADIUS like certain configurations for OpenVPN, IPsec, Captive Portal, etc.

See https://netgate.slack.com/files/U0PFG0Z2B/FBFMBHQFJ/radius_tests_txt.txt :

- Basic RADIUS auth (Diag > Auth test)
-- https://www.netgate.com/docs/pfsense/book/usermanager/authentication-servers.html
- GUI RADIUS auth
-- Primary concern is fetching groups from RADIUS
-- https://www.netgate.com/docs/pfsense/book/usermanager/authentication-servers.html
- IPsec RA RADIUS auth
-- values passed back from server: IP addr
-- https://www.netgate.com/docs/pfsense/vpn/ipsec/ikev2-with-eap-radius.html
- OpenVPN RA RADIUS auth
-- values passed back from server: IP addr, routes, rules (inacl/outacl), DNS servers
-- https://www.netgate.com/docs/pfsense/book/openvpn/controlling-client-parameters-via-radius.html
- Captive Portal RADIUS auth
-- values passed back from server: bw limits, session timeout, idle time, time/data limits, URL redirection
-- https://www.netgate.com/docs/pfsense/book/captiveportal/zone-configuration-options.html#passing-back-configuration-from-radius-servers
- PPPoE Server RADIUS auth
-- https://www.netgate.com/docs/pfsense/book/services/pppoe-server.html
- L2TP Server RADIUS auth
-- https://www.netgate.com/docs/pfsense/book/l2tp/l2tp-server-configuration.html#authentication
- Wireless 802.1x auth
-- https://www.netgate.com/docs/pfsense/book/wireless/pfsense-as-an-access-point.html#ieee-802-1x-authentication-wpa-enterprise

#11 - 09/16/2018 07:54 AM - A FL

Well, I made some tests :

Basic RADIUS auth (Diag > Auth test)

-> Good (working correctly)

GUI RADIUS auth

-> Good (working correctly).
Groups are correctly fetched from the RADIUS server & group rights are correctly applied to the logged user. Local database fallback is also working as expected

Captive Portal RADIUS auth

- **bw limits** (using pfSense-Bandwidth-Max-Up and pfSense-Bandwidth-Max-Down) -> **Working correctly**
  I carefully verified that these RADIUS attributes do override pfSense's settings if any (and if they are enabled).
  I also verified that these RADIUS attributes are not fetched when unchecking "Use RADIUS pfSense-Bandwidth-Max-Up and pfSense-Bandwidth-Max-Down attributes". Everything is working as expected

I found a small issue with RADIUS bw limits however : pfsense-Bandwidth-Max-Up/Down have to be written in bits per seconds in the RADIUS reply, and are converted in kbps internally by pfSense when applying the ipfw rules.
However, the conversion assumes 1000 bits = 1kb. Shoudn't it be 1024 bits = 1kb?
(Anyway, it's a small issue and it's not a regression so...I don't think it needs to be fixed before 2.4.4 is released)

- **data limit/traffic** quota (using pfSense-Max-Total-Octets) -> **Working correctly**
  I also verified that the RADIUS attribute does override pfSense's "traffic quota" if set.

- **time limit** (Using Session-Timeout) => **Working correcty**
  The time has to be given in seconds in the RADIUS reply (as specified in RFC2865)
  I carefully verified that this RADIUS attribute does override pfSense's session timeout if any.
  Also, i verified that this RADIUS attribute is not fetched when unchecking "Use RADIUS Session-Timeout attributes".

- **idle time timeout** (using Idle-Timeout) => **Working correctly**
  As for Session-Timeout, the time has to be given in seconds
  I carefully verified that this RADIUS attribute does override pfSense's idle timeout if any.

- **url redirection** (using WISPr-Redirection-URL): **Working correctly**
  I carefully verified that RADIUS attribute does override pfSense's redirect URL if set.

I'm not sure if i missed something, would it be possible to request access to the full
https://netgate.slack.com/files/U0PFG0Z2B/FBFMBHQFJ/radius_tests_txt.txt file ?

#12 - 09/17/2018 07:43 AM - Jim Pingle

A FL wrote:

> I found a small issue with RADIUS bw limits however : pfsense-Bandwidth-Max-Up/Down have to be written in bits per seconds in the RADIUS
> reply, and are converted in kbps internally by pfSense when applying the ipfw rules.
> However, the conversion assumes 1000 bits = 1kb. Shoudn't it be 1024 bits = 1kb?
> (Anyway, it's a small issue and it's not a regression so...I don't think it needs to be fixed before 2.4.4 is released)

We've gone back and forth on kilobits vs kibibits there in the past. It's more important that Captive Portal and FreeRADIUS match since limiters will
blow up with non-integer bandwidth values (See [#8097](#)). I can't find it now but I remember a lengthy debate on it somewhere.

> I'm not sure if i missed something, would it be possible to request access to the full
> https://netgate.slack.com/files/U0PFG0Z2B/FBFMBHQFJ/radius_tests_txt.txt file ?

Sure, here is the list:

- Basic RADIUS auth (Diag > Auth test)
    - https://www.netgate.com/docs/pfsense/book/usermanager/authentication-servers.html
- GUI RADIUS auth
    - Primary concern is fetching groups from RADIUS
    - https://www.netgate.com/docs/pfsense/book/usermanager/authentication-servers.html
- IPsec RA RADIUS auth
    - values passed back from server: IP addr
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- OpenVPN RA RADIUS auth
    - values passed back from server: IP addr, routes, rules (inacl/outacl), DNS servers
    - https://www.netgate.com/docs/pfsense/book/openvpn/controlling-client-parameters-via-radius.html
- Captive Portal RADIUS auth
    - values passed back from server: bw limits, session timeout, idle time, time/data limits, URL redirection
    - https://www.netgate.com/docs/pfsense/book/captiveportal/zone-configuration-options.html#passing-back-configuration-from-radius-servers
- PPPoE Server RADIUS auth
    - https://www.netgate.com/docs/pfsense/book/services/pppoe-server.html
- L2TP Server RADIUS auth
    - https://www.netgate.com/docs/pfsense/book/l2tp/l2tp-server-configuration.html#authentication
- Wireless 802.1x auth
    - https://www.netgate.com/docs/pfsense/book/wireless/pfsense-as-an-access-point.html#ieee-802-1x-authentication-wpa-enterprise

#13 - 09/21/2018 07:19 AM - Renato Botelho

- Status changed from Feedback to Resolved

The main move is done. Specific possible bugs found should have new tickets