

# OpenRoaming with Radiator

14th and 16th of February 2023





# OpenRoaming with Radiator

webinar on the 14th and 16th of February 2023

## LEARN

- What is required for OpenRoaming?
- What is the quickest way to start testing?
- What are the recommended architecture and practices for adding OpenRoaming both for a Service/Access Network Provider and for an Identity Provider?
- Where can one find help to configure Radiator for OpenRoaming?



Find materials and webinars at <https://radiatorsoftware.com/webinars/>

# What is required for OpenRoaming?



Radiator



# OpenRoaming requirements for Access Network Provider (ANP)

- For organisations who only want to let OpenRoaming users roam in their network
- Minimum requirements:
  - Passpoint (Hotspot 2.0) compatible Wi-Fi network equipment
  - OpenRoaming Settled or Settlement-Free Access service from some WBA member service provider
  - No WBA membership needed
- Connecting directly to other OpenRoaming members requires WBA client certificate (via service provider or WBA membership), and an own RADIUS server

# OpenRoaming requirements for Identity Provider (IdP)

- For organisations who want their members or subscribers roam in OpenRoaming member networks
- Minimum requirements:
  - (Passpoint (Hotspot 2.0) compatible Wi-Fi network equipment) \*
  - Ability to configure OpenRoaming DNS records for IdP realm
  - OpenRoaming Settled or Settlement-Free Access service **and** IdP service from some WBA member service provider
  - No WBA membership needed
- Connecting directly to other OpenRoaming members requires WBA client+server certificate (via service provider or WBA membership) and an own RADIUS server.

\*) only if providing also Wi-Fi access network services (ANP)

# OpenRoaming requirements for Operators

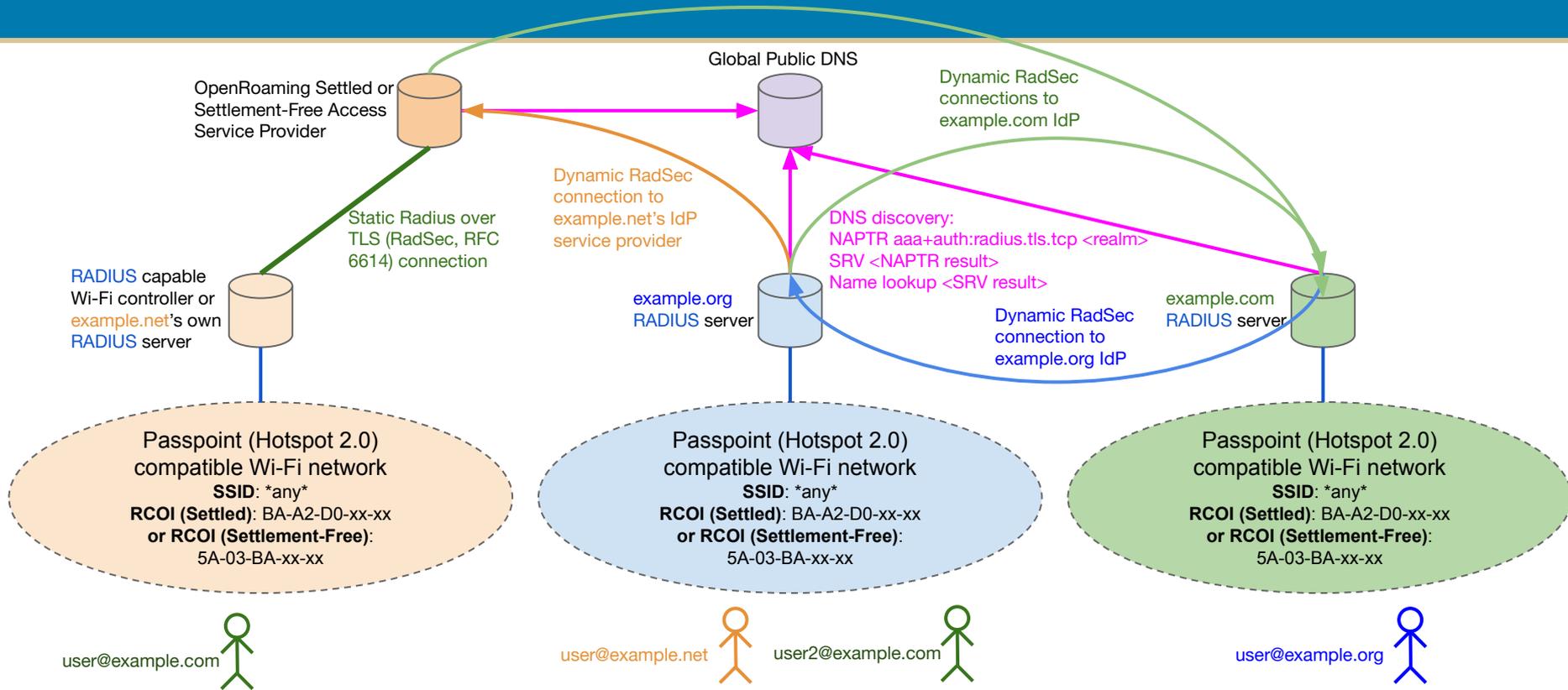
- Depend heavily on operator requirements for roaming logic, accounting, invoicing, WRIX/roaming broker functionality...
- Minimum requirements (same with IdPs):
  - (Passpoint (Hotspot 2.0) compatible Wi-Fi network equipment)
  - Ability to configure OpenRoaming DNS records for IdP realm
  - OpenRoaming Settled or Settlement-Free Access service **and** IdP service from some WBA member service provider
  - No WBA membership needed, but it gives more business options
- Connecting directly to other OpenRoaming members requires WBA client+server certificate (via service provider or WBA membership) and an own RADIUS server.

\*) only if providing also Wi-Fi access network services (ANP)

# What are the recommended architecture and practices for adding OpenRoaming both for a Service/Access Network Provider and for an Identity Provider?



# OpenRoaming Technical Functionality

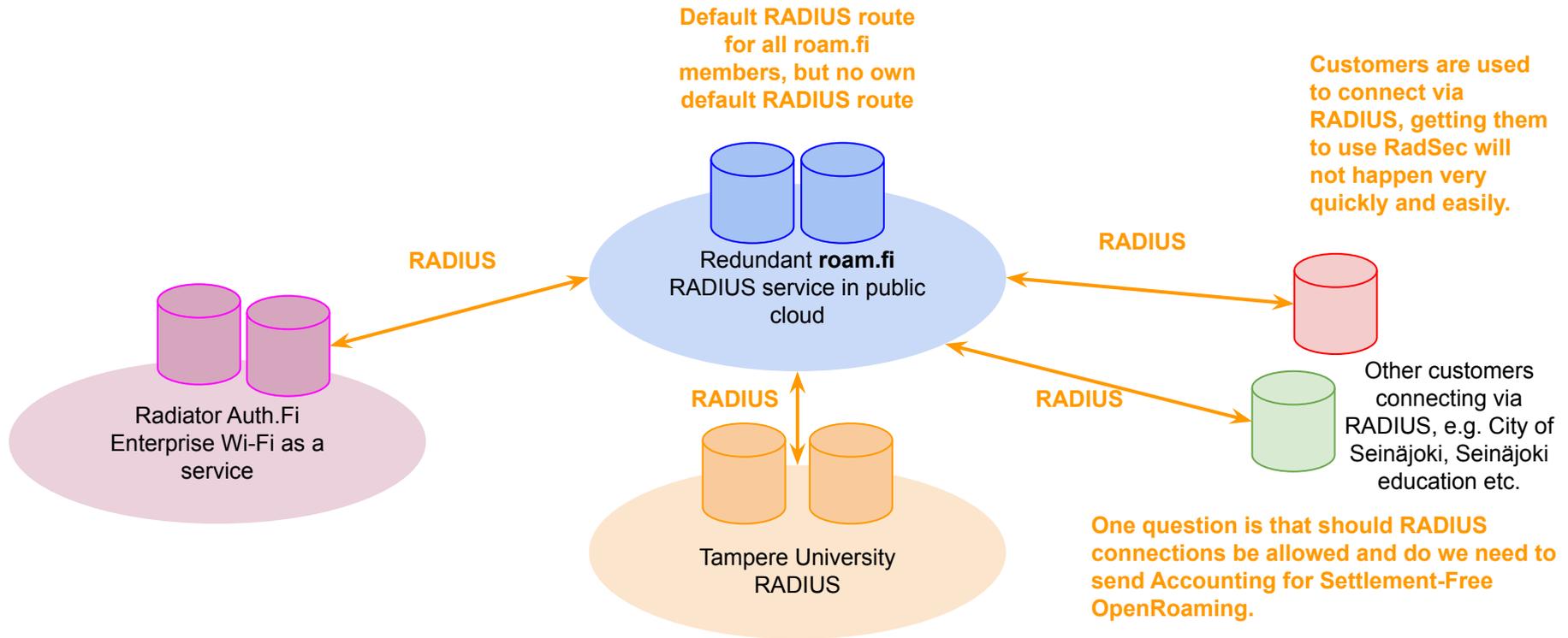




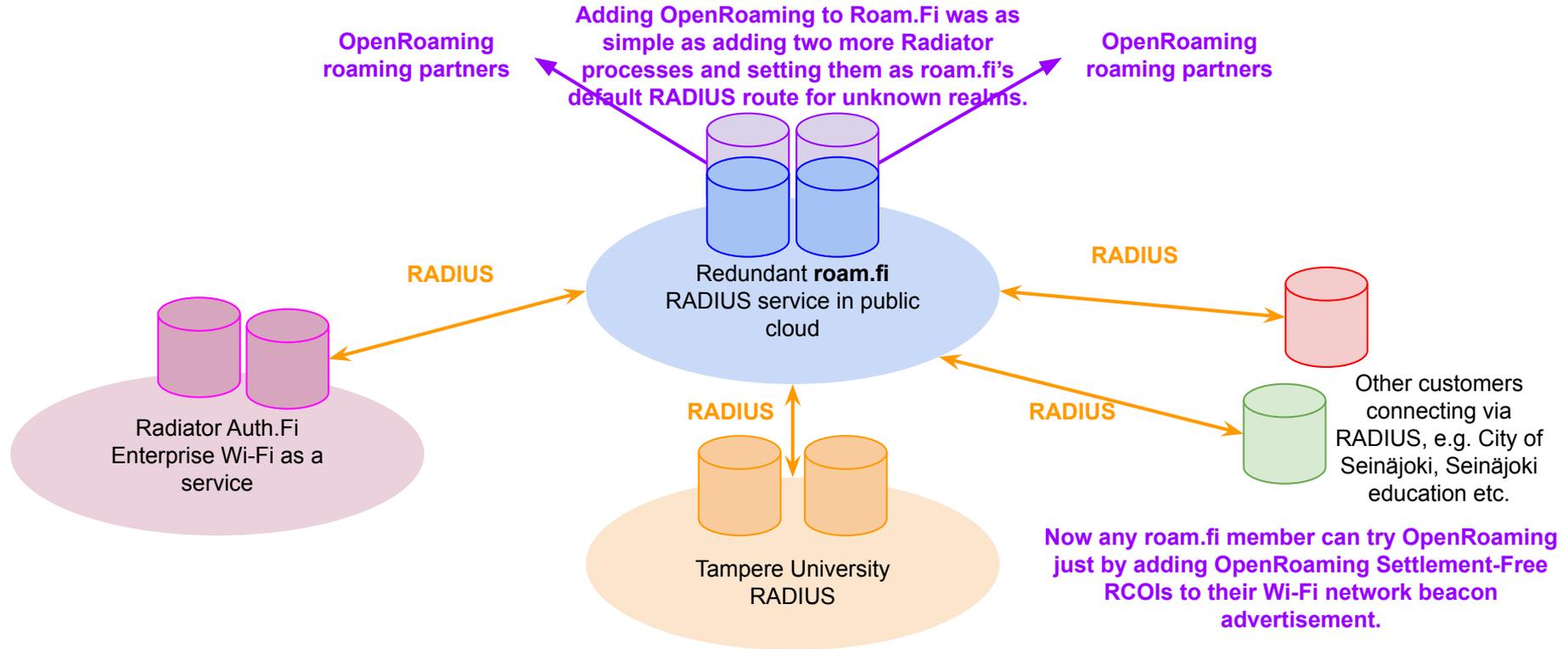
# Case: roam.fi

**Deploying OpenRoaming to regional Wi-Fi roaming service**

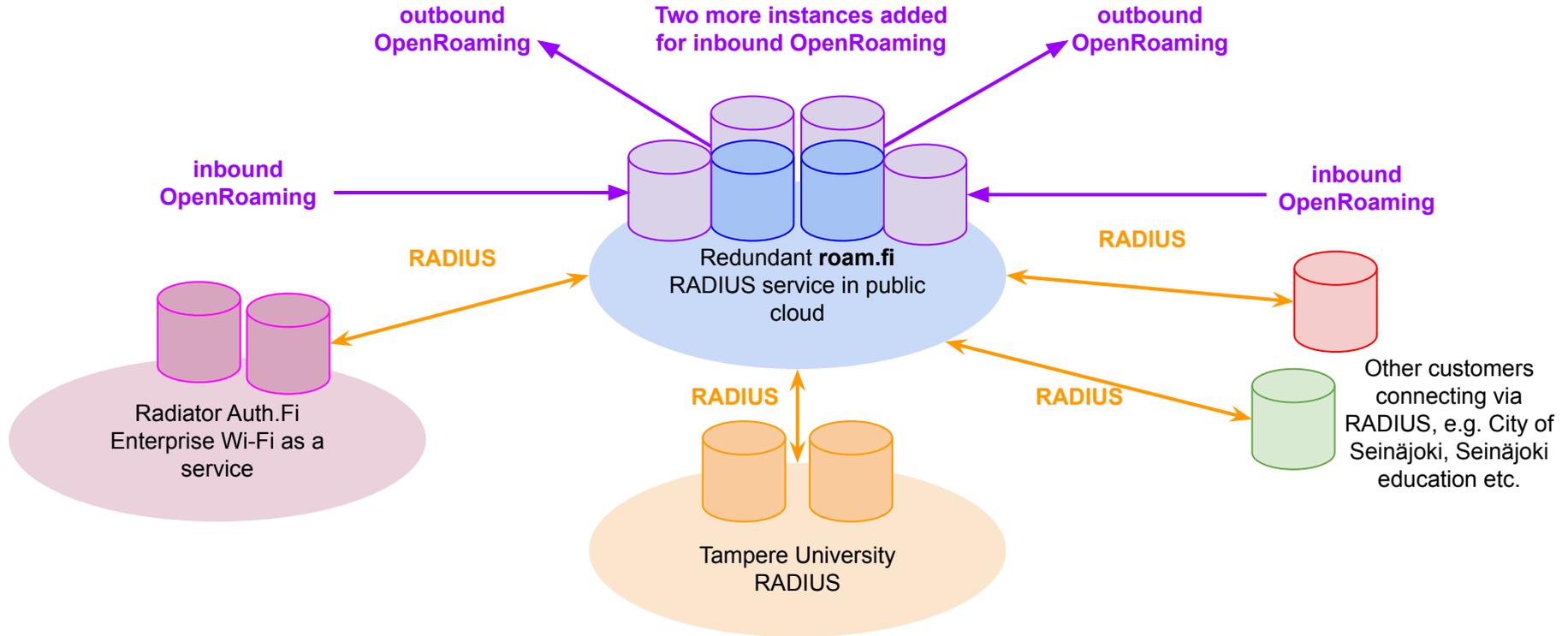
# Existing Roam.Fi Architecture



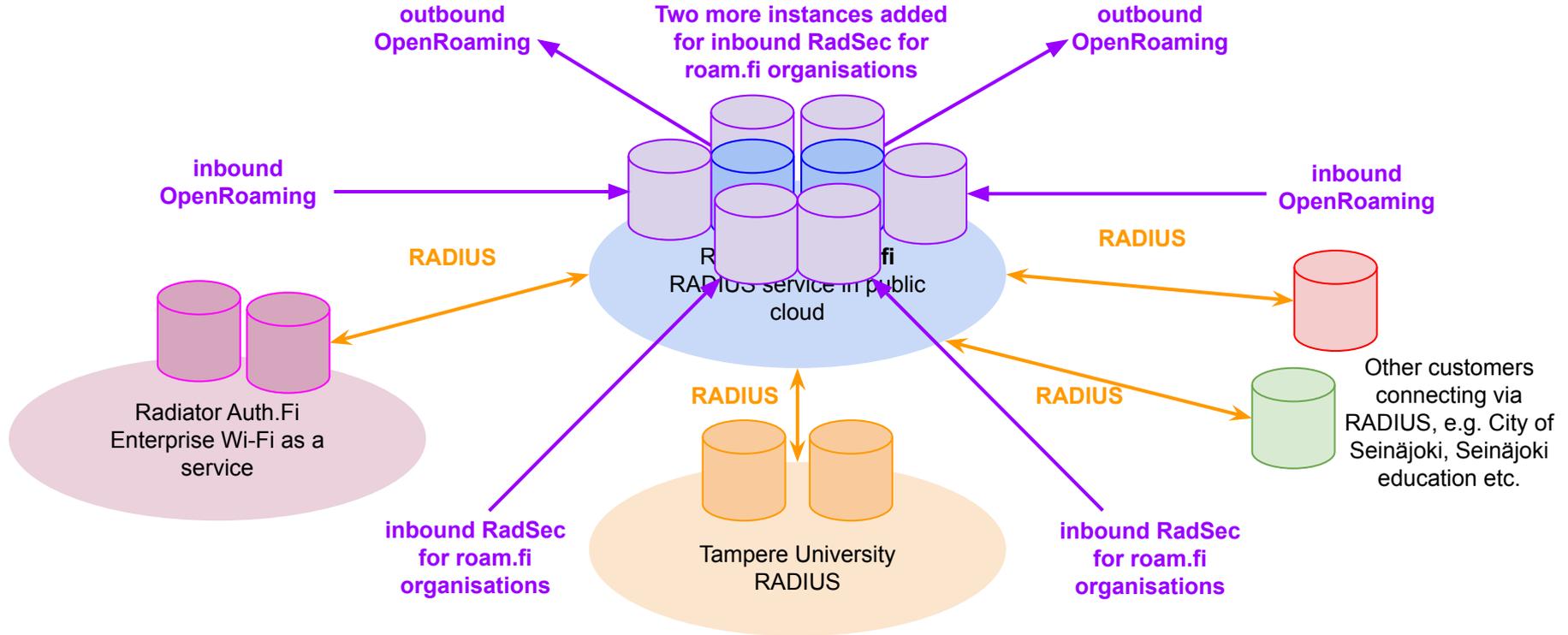
# Starting with outbound OpenRoaming



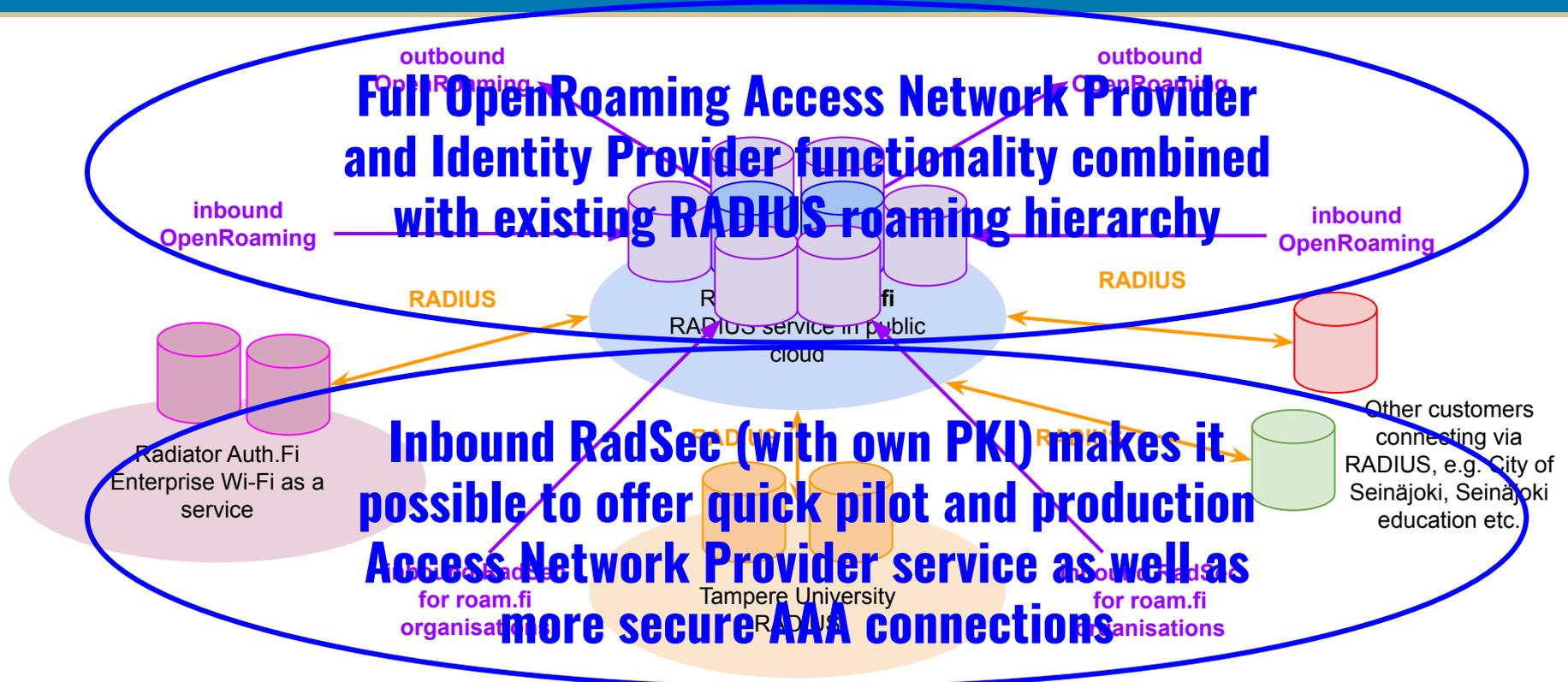
# Adding inbound OpenRoaming...



# Adding separate inbound RadSec instances...



# Benefits of the architecture



# What is the quickest way to start testing?



Radiator



# Get OpenRoaming as a Service



- With a separate service there are no membership, certificate issuing or configuration delays
- You can start testing OpenRoaming only by configuring your Wi-Fi network equipment and AAA connections
- Service available from multiple providers: Radiator Software, Single Digits, Global Reach Technology ...

# What can Radiator Software do for you?



- **Via Roam.Fi and Radiator Auth.Fi services** we can provide you with **full OpenRoaming connectivity** with **RadSec**
- **Radiator has all the features needed** from RADIUS server **for OpenRoaming**.
- In addition Radiator has **complementing functionality** such as **Diameter** and **SIM authentication** (with **SIM privacy**) support.
- With **Radiator Expert Services** we can support you whether you are interested in **building OpenRoaming-as-a-Service** or just **deploying or piloting it in your Wi-Fi network**.

# Where can one find help to configure Radiator for OpenRoaming?



# Radiator OpenRoaming Configuration Repository

- Radiator architecture, configuration templates and a configuration guide for OpenRoaming
- Based on the presented (and cleaned) roam.fi OpenRoaming deployment and configuration
- Settlement-Free inbound and outbound OpenRoaming, local RadSec/RADIUS connectivity, pub.3gppnetwork.org all supported
- Workshops, consultation available for deploying the configuration for pilots or production
- Location (GitHub) any day now:  
<https://github.com/radiator-software/radiator-openroaming>



Radiator

# Thank you. Questions, Comments?

Follow Radiator Software for more information...

Radiator Software **blog**:

<https://blog.radiatorsoftware.com/>

Twitter:

<https://twitter.com/RadiatorAAA>

Materials:

<https://radiatorsoftware.com/webinars/>

<https://slideshare.net/radiatorsoftware/>

Bookings for conference calls:

<https://radiatorsoftware.com/contact/> / [info@radiatorsoftware.com](mailto:info@radiatorsoftware.com)



Radiator