

Operational Aspects of Proxy-ARP/ND in EVPN

draft-snr-bess-evpn-proxy-arp-nd-01

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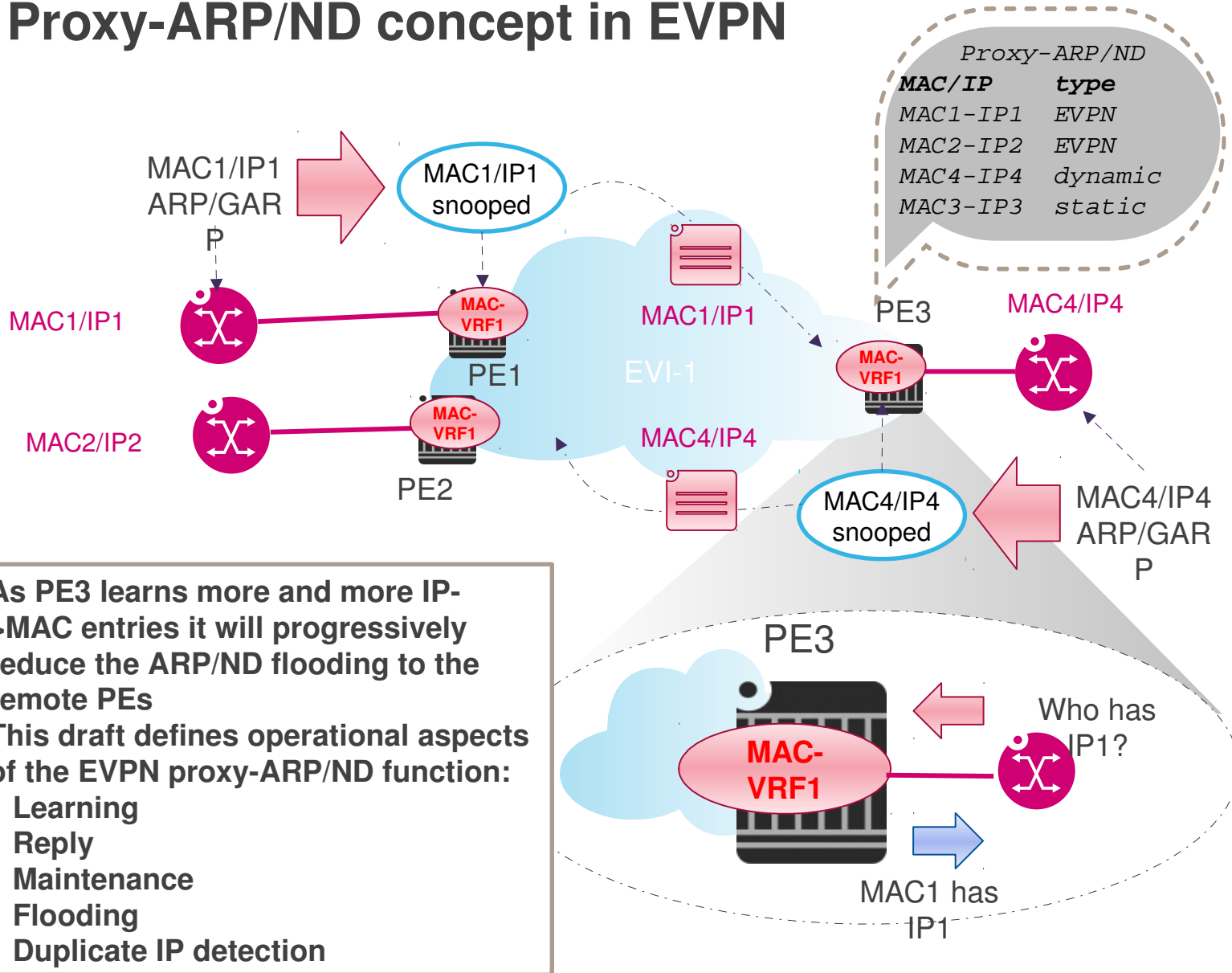
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The Proxy-ARP/ND concept in EVPN



- ✓ As PE3 learns more and more IP->MAC entries it will progressively reduce the ARP/ND flooding to the remote PEs
- ✓ This draft defines operational aspects of the EVPN proxy-ARP/ND function:
 - Learning
 - Reply
 - Maintenance
 - Flooding
 - Duplicate IP detection

Changes in rev 01 (1)

- Great feedback received for the previous version. Rev 01 is the result of the WG feedback.
 - Special thanks to Erik, Robert, Tony and others
- The draft is now including the DC use-case in addition to the existing IXP use-case.
 - New section detailing deployment scenarios in IXPs and DCs
- Support for static entries with a list of potential MACs (only one active at the time)
 - Allows the smooth replacement of CE hardware in IXP networks

Changes in rev 01 (2)

- Support for IPv6 anycast
 - Requires learning and propagation of the ‘O-bit’ in EVPN ->> draft-snr-bess-evpn-na-flags-02
 - Requires disabling duplicate IP detection
- Support for ‘unicast-forward’ option for ARP-Request/NS messages that include unknown options
 - Unknown options are defined as options not described in [RFC0826] and [RFC4861]
- Clarification of the duplicate IP detection mechanism
- Security Considerations section added

Conclusions and next steps

- Based on the feedback received this work seems to be important for the WG
- The authors would like to request WG adoption