RSVP Resource Sharing
Remote Identification Association

draft-narayanan-tsvwg-rsvp-resource-sharing-02

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History

narayanan-tsvwg-rsvp-resource-sharing-01

- Non-GMPLS "Resource Sharing" Association
- Upstream Association
- Extended Association ID

- Resource Sharing Remote Identification Association

berger-ccamp-assoc-info-00

- ASSOCIATION Object as defined in RFC 4872 and RFC 4873

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- Resource Sharing Remote Identification Association

berger-ccamp-assoc-info-01

- ASSOCIATION Object as defined in RFC 4872 and RFC 4873

- Non-GMPLS "Resource Sharing" Association
- Upstream Association
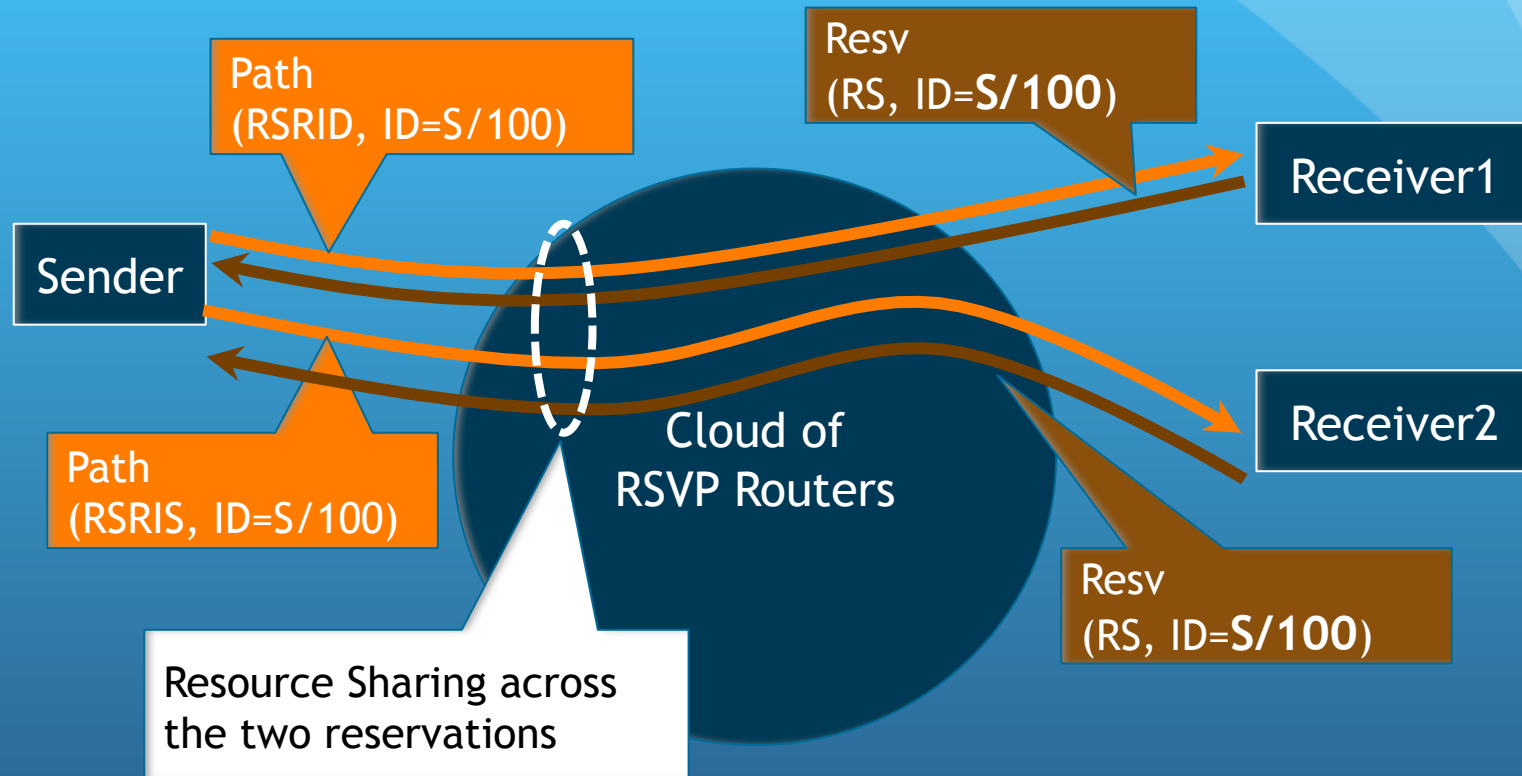- Extended Association ID

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Summary

- Extension to draft-berger-ccamp-assoc-info

- Standards Track

- defines a new association type called "Resource Sharing Remote Identification"

Resource Sharing Remote Identification association

- can be used by the sender to convey to the receiver information that can then be used by the receiver to identify an upstream initiated resource sharing

- useful in upstream initiated resource sharing applications where the identification of the resource sharing association is not known a priori by the receiver, and instead is known by the sender

- type-specific association rule:

    The Resource Sharing Remote Identification association does not create any association across Path states.

Resource Sharing Remote Identification association

Path (RSRID, ID=S/100)

Resv (RS, ID=**S/100**)

Sender

Receiver1

Path (RSRIS, ID=S/100)

Cloud of RSVP Routers

Receiver2

Resv (RS, ID=**S/100**)

Resource Sharing across the two reservations

RSRID = "Resource Sharing Remote Identification" association
RS= "Resource Sharing" association
ID= Association Identification

Next Step

- Please review

Backup Slides

Recap of problem

- Currently RSVP flows with different SESSION objects cannot share resources

- There are some use cases where this is important
  - Symmetric NAT
  - VoIP call sharing

- Proposed solution: separate resource sharing from SESSION object

Problem: VoIP features

- Sharing bandwidth between calls currently in call-waiting

- Shared calls between shared-line extensions at different locations

- Sharing not possible in RSVP for reservations going to different {L3,L4} destinations
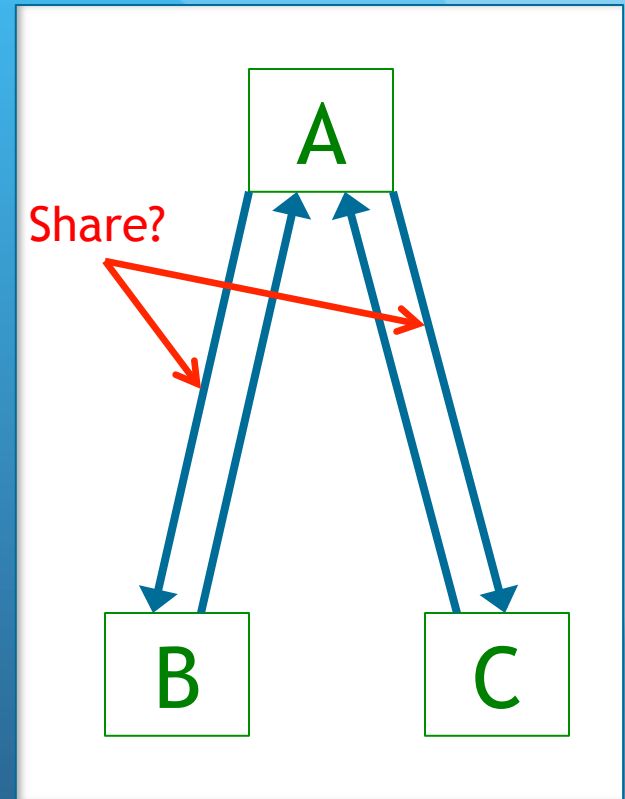
Problem: Symmetric NAT

- Unidirectional flows to the same destination, traversing symmetric NAT

- NAT issues different destination ports to the different senders

- Sharing not possible in RSVP for reservations going to different {L3,L4} destinations