SRv6 Policy SID List Optimization

draft-ali-spring-srv6-policy-sid-list-optimization-01

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Problem Statement

- In some use cases, an SRv6 policy's SID list ends with the policy endpoint's node SID, and the traffic steered (over policy) already ensures that it is taken to the policy endpoint.
  - For example, service SID, a binding SID for transit policies, an EPE SID
- Carrying back-to-back end-point node SID is inefficient
- The End-point node SID exclusion is not possible in all use cases

Draft History

- Presented PCE and BGP changes at IETF-121
- Revised versions of the BGP, BGP-LS, and PCE drafts incorporating feedback were subsequently presented at IETF-122
- Need for a common Spring document was raised during IETF-122
- The author published draft-ali-spring-srv6-policy-sid-list-optimization
- The draft was presented in Spring at IETF123
  - There is an ongoing adoption call

Solution Summary

- Allow SR Policy APIs to control weather to install or skip the final Node SID during instantiation of an SRv6 Policy, depending on the type of traffic steered over it.
- Describes the common procedures for SRv6 Policies instantiation from various sources
  - Policy instantiation when using PCEP [I-D.all-pce-srv6-policy- sid- list-optimization]
  - Policy instantiation when using BGP [I-D.liu-idr-sr-segment-list-optimize]
  - Policy instantiation via NETCONF; authors are in discussion with authors of [I-D.ietf-spring-sr-policy-yang]
- SID List Optimization Advertisement in bgp-ls [I-D.ali-idr-srv6-policy-sl-opt-distribution]
- MSD Considerations
- OAM Considerations

Next Steps

- The authors would like to request your comments and support for the ongoing adoption call