VIDEO COMPANION / NRS8T2P

AES67 switch configuration

Use this single-switch example for multicast AES67. Verify the actual endpoints' common clock profile, timing domain, payload, channel count, packet time and discovery or SDP workflow.

Set up the media path

1. Confirm model and firmware. In Configuration > Ports, verify the required link speed and Ethernet frame size. A 1,500-byte IP MTU normally uses a 1,518-byte untagged Ethernet frame including FCS. Allow the required additional tag overhead on trunks according to how the switch counts frames.
2. In Configuration > QoS > Port Classification, enable DSCP-based classification for trusted media paths when required. In DSCP-Based QoS, map the endpoint-confirmed timing and media markings. Example: PTPv2 marked 46 above media marked 34. Only add DSCP 26 if the actual design needs it. Verify the egress queues.
3. In Configuration > IPMC > IGMP Snooping, enable global and media-VLAN snooping. Verify one active querier and the supported IGMP version. Set the intended IPv4 query source on NRS where available. Keep Fast Leave off unless validated on a single-receiver port.

Confirm clock, audio and persistence

- Allow ordinary PTPv2 forwarding for this example. Only configure a switch clock role when the timing architecture specifies it. Check endpoint clock lock, stream subscription, uninterrupted audio and errors.
- Save the pages, then use Maintenance > Configuration > Save startup-config where shown. Reload and verify the saved configuration. VLAN 1 in the video is an example.

Use the accompanying video for navigation. Follow the settings in this revised guide where the recording differs.

References

Niveo NRS managed-switch manual, rev. 3.1

Audio Engineering Society, AES67

IETF RFC 4541, IGMP and MLD snooping considerations

Documentation review. Validate with the exact firmware and endpoints before deployment.