

SCTP and NAT

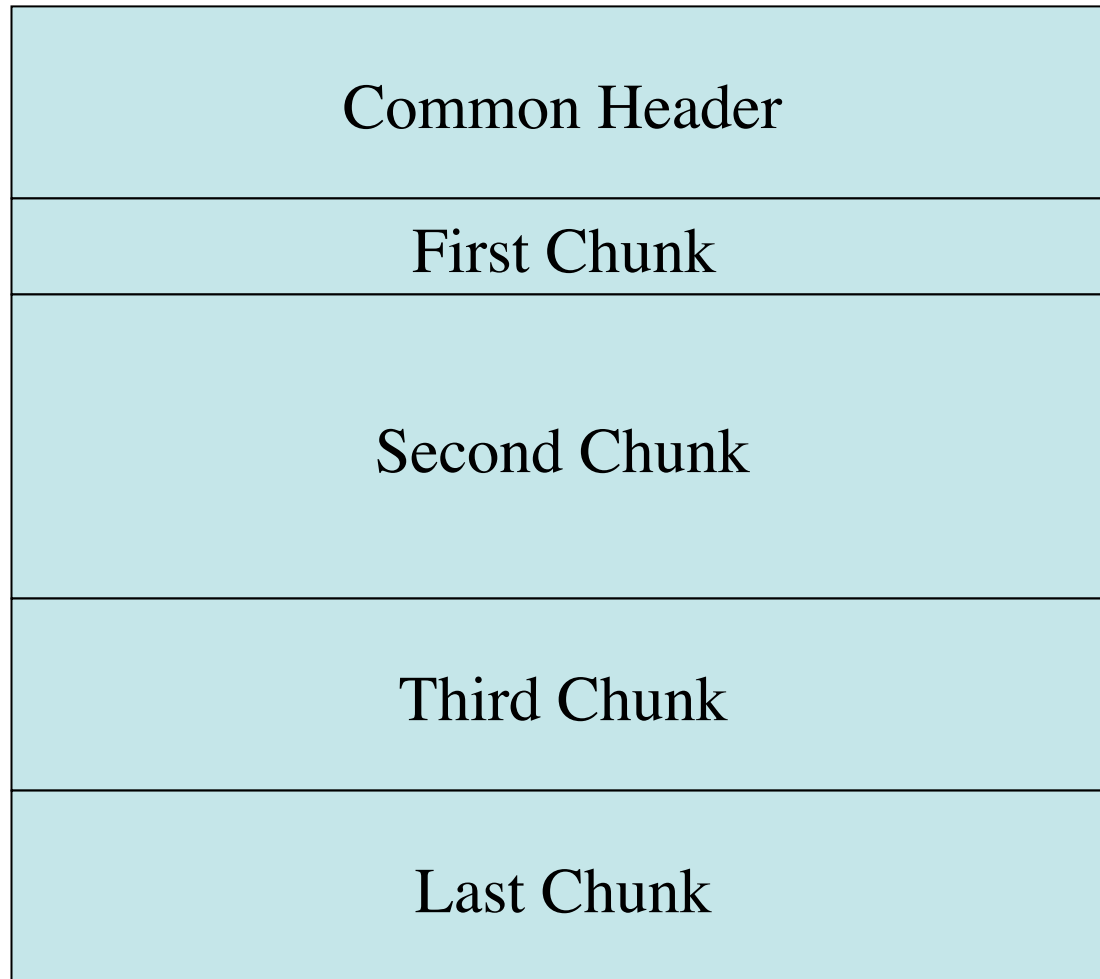
draft-ietf-behave-sctpnat-00.txt

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Message Format



Common Header Format

Source Port	Destination Port
Verification Tag	
Checksum	

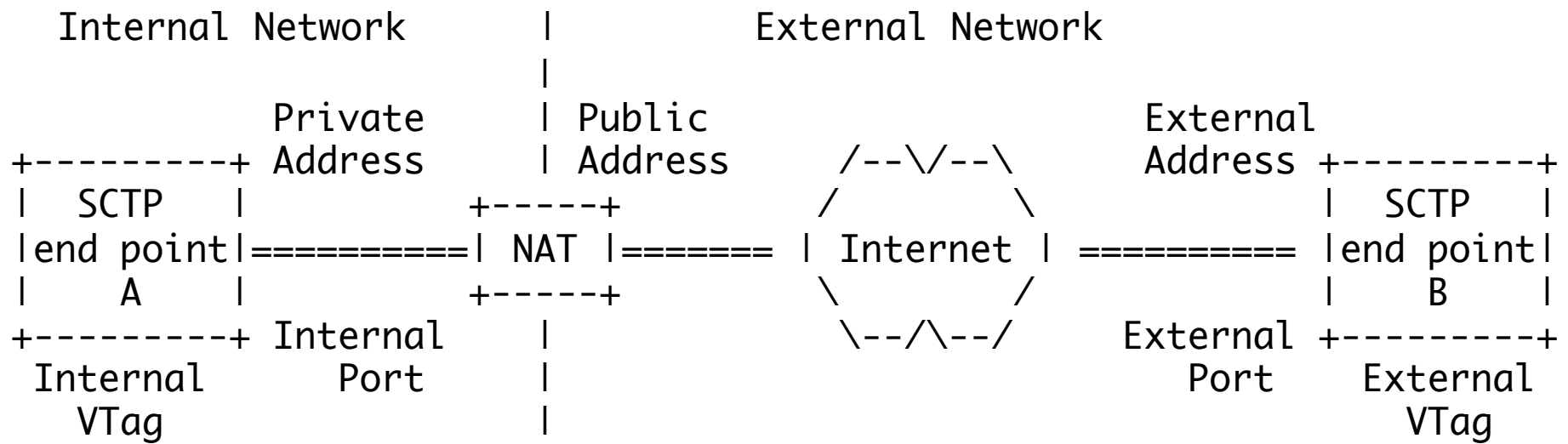
A NAT with NAPT capabilities for SCTP

- Does not use the port numbers to identify the SCTP association, but the verification tag.
- The IP address is modified based on the port numbers and the verification tag.
- No recalculation of the checksum is necessary.
- No change of the port number is required.
- If an ephemeral port number is used one has a $32+14 = 46$ bit random number for identifying the association.
- Every packet contains only one verification tag (except for the INIT-ACK).

Changes

- Address single- and multi-homed scenarios.
- Address client-server and peer to peer scenarios.
- Adopted terminology.
- Clarified figures.
- We added a lot of examples, showing the message flow and the state changes in the NAT box.
- Addressed all comments we got.

Terminology



Implementations

- The Swinburne University of Technology has implemented the middlebox behavior on FreeBSD.
- Münster University of Applied Sciences has implemented implemented the middlebox and endpoint behavior in a simulation tool.
- Münster University of Applied Sciences is working on the middlebox behavior on Linux.
- Endpoint behavior on FreeBSD is also coming...

To Do

- Incorporate some of the comments received from the Swinburne University of Technology.
- Add some more examples.
- IPv6?

Questions