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# PING for MASQUE

IETF 112, November 2021

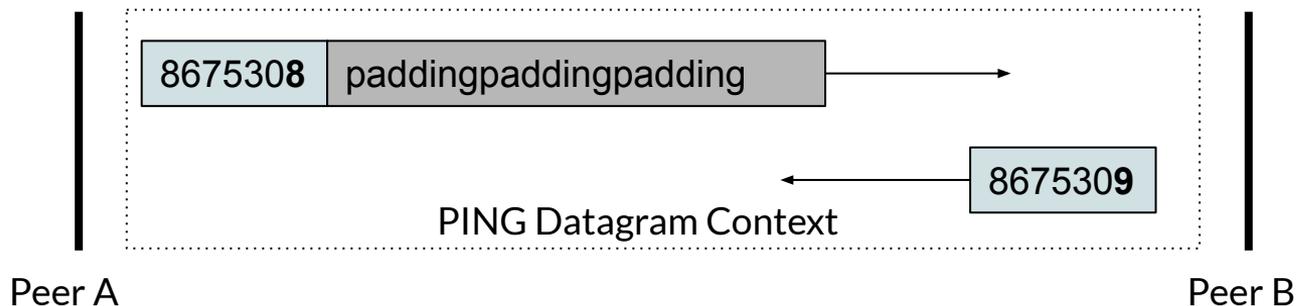
Ben Schwartz

Slides v00

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# What

- PING is an HTTP **Datagram Format Type**
- Pings are sent between the HTTP client and origin
  - Can be sent in either direction
  - Opaque to intermediaries



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# Why

- Enables DPLPMTUD for the HTTP Datagram MTU
  - HTTP supports intermediaries, so endpoints can't determine the Datagram path characteristics from measurements at a lower layer
  - Important for CONNECT-IP:
    - Allows advertising the correct MTU on a virtual interface.
    - If the virtual MTU would be <1280, the endpoint may need to send packets in (MTU, 1280] reliably to remain [RFC-compliant](#).
- Also good for measuring RTT and loss rates in any application (e.g. for performance debugging)

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# Status

- Seeking WG adoption in MASQUE
- Depends on Datagram Contexts
- Most useful when combined with an end-to-end reliable datagram delivery mechanism (e.g. an OPAQUE\_DATAGRAM capsule type)