The key point

• We need to finish this document
Change from -07 to -08

• Some people on this list felt that we should use CRLF as the keep alive for TCP

• Wrote text so that the WG could look at it and decide if this was the way they wanted to go
  – Added multiple keep alive mechanisms CRLF, STUN, TCP
  – Changed syntax of tags in URI to support this
    old: sip.example.com;keep-alive=stun
    new: sip:example.com;keep-crlf;keep-stun
Summary — The Good

• Implementations that *only* do TCP, will not need to implement STUN
• Implementations will not need to multiplex TCP and STUN
Summary — The Bad

• You have to do RFC 3263 transport resolution *before* you know what keep alive scheme to use
  – Tricky if application does keepalive processing and SIP stack does DNS
• If outbound URI says sip:example.com;keep-crlf but NAPTR ends up selecting UDP.
  – You have no resulting keepalive mechanism and outbound will not work
• It is complicated to handle corner cases
  – Outbound proxy set says “use STUN”, but when you option probe for that proxy says “use CRLF”
Options

• Option 1: Don’t do CRLF keep alive. Use text in (-07) version of draft.
• Option 2: Keep text in this version (-08).
• Recommendations
  – Cullen: Option 1
  – Rohan: Option 2
When does the client have to do keepalives?

- Sometimes the server expects keepalives to detect client liveness, sometimes it doesn’t
- Sometimes the client doesn’t need/want aggressive keepalives. (ex: not behind a NAT and wants to minimize battery consumption)

Proposal:
- ;keepalive-timer parameter in URI means that the server needs the client to send supported keepalives according to the timing described in the draft.
- Absence of the parameter means that the client gets to decide when/if to send keepalives (but no more frequently than in the draft).
- No longer a need for ;keep-tcp parameter. The client can just do these if ;keepalive-timer is absent.
An Outbound Diet?

Do we want to simplify this draft?

- One type of instance ID (UUID)
- One algorithm for flow tokens (the other one only works with SIPS)
- The configuration of the URI indicates that you can do STUN. Incorrect configurations are considered an error, like sending SIP to the IMAP port
- Drop advice about OPTION probing for stun (you could still do it if you wanted, just not discussed in spec)
- In the current draft, if the flow works, then fails in the first 120 seconds, it is treated differently than after 120 seconds. Do we need this?