
Backbone Infrastructure Attacks and Protections

draft-savola-rtgwg-backbone-attacks-03.txt

Pekka Savola
CSC/FUNET

Introduction & Background

■ Background: originated in 2006

- ICMP and TCP-RST attacks, ingress filtering etc. were a hot topic
- Understanding in IETF lacking wrt attack/protection applicability
- Last discussed at IETF66 at OPSEC & RPSEC WGs, no clear resolution

■ An ops view of ISP backbone network attacks

- Assumes certain degree of ingress/egress filtering in the network
- Could apply in ~all Tier3+ and enterprise networks

■ Target audience

- IETF people working on standardization of protections
- Ops people in applicable deployments

Some related work

- RFC 4778 (i.e. draft-ietf-opsec-current-practises)
 - More generic, did not analyze attack/protection big picture
- draft-ietf-opsec-infrastructure-security (halted)
 - A set of "tools", but not the big picture
- draft-zinin-rtg-dos-02 (May 2005, expired)
 - Implementation approaches for control plane protection
- Non-IETF: Team Cymru, secure router templates
 - Offers quite a few tips but no big picture

- Observation: attempts at protection listings
 - But no analysis of attacks/protections
 - Ops view of a big picture missing so far
 - Is IETF the wrong forum or ..?

Next steps?

- Is this useful enough to be published as an RFC?
 - If yes, is the scope of the document appropriate?
 - If not, how should it be changed?
- Is OPSEC the right place to work on this?
- How many have read the document?
 - How many think this is essentially ready?