

HIP DNS Extensions

draft-ietf-hip-dns-01.txt

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Minneapolis, MN, USA

Wednesday, March 9th, 2005

Goals

- Two new DNS RRs used by HIP nodes
- The HIPHI allows a HIP node to store:
 - Its HI and/or HIT
 - Related to the public key field of an IPSECKEY RR
- The HIPRVS allows a HIP node to store:
 - Its Rendezvous Servers' FQDN or IP address
 - Related to the gateway field of an IPSECKEY RR

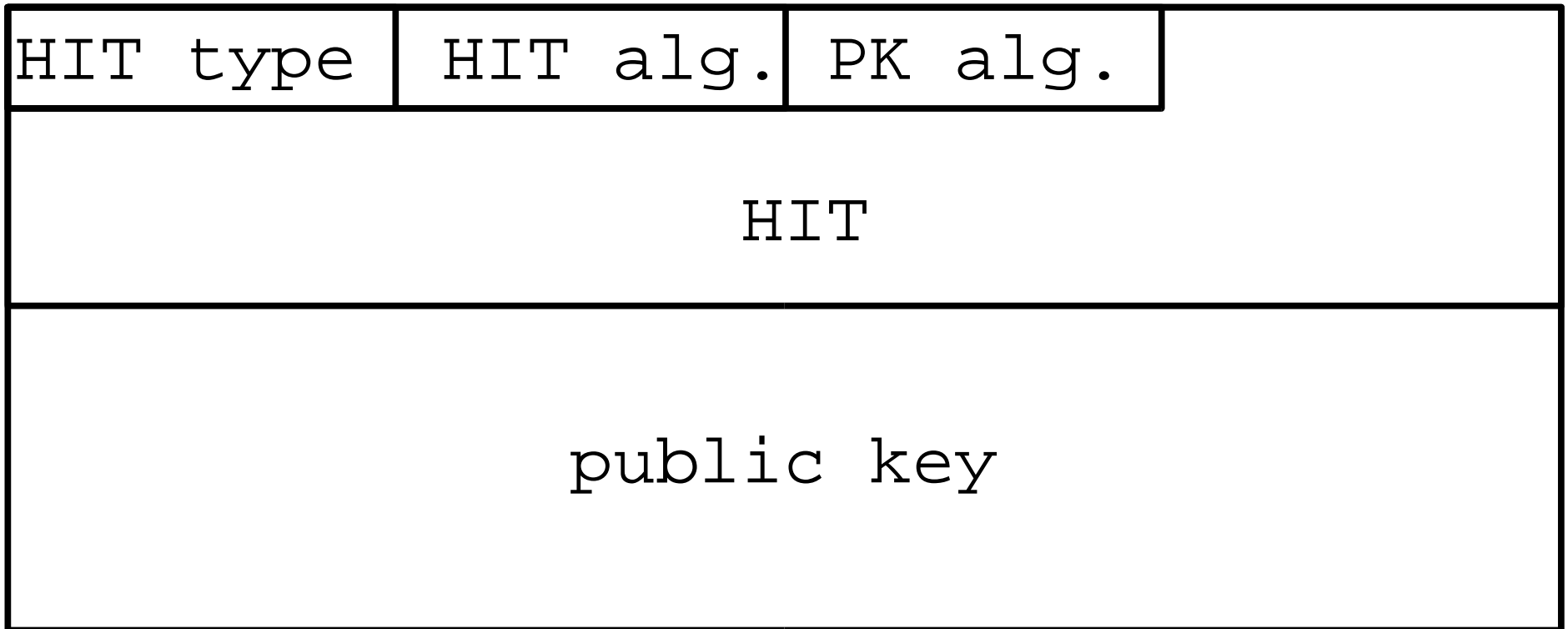
Changelog

Since -00

- Rewritten
 - Introduction
 - Usage Scenarios
- Added
 - RRs presentation format
 - Framed after *draft-ietf-ipseckey-rr-12*
(Thanks to its authors !)
 - Behavior when look-up returns multiple HIs and IPs

HIPHI RR

0 1 2 3
01234567890123456789012345678901



HIT type={1,2} HIT alg.={SHA1}
PK alg.={RSA,DSA}

HIPRVS RR

0 1 2 3
01234567890123456789012345678901

preference	type
Rendezvous Server	
...	
Rendezvous Server	

Presentation Formats

- HIT
 - Base16 encoding (aka Hex)
 - « . » if not present
- HI
 - Base64 encoding
 - « . » if not present

Using Multiple HIs and IPs

- What if:
 - A given FQDN maps to multiple His/HITs and IPs
 - Each HIs/HITs maps to a subset of IPs
- Initiating with either of these His/HITs and IPs:
 - MUST **accept any** of the His/HITs in R1
 - MAY attempt an **opportunistic** exchange

Next Steps

- Ready for WG Last Call?

Questions or comments...

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