Internet Addressing

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Addressing (Length)

8	(6+2)	(ARPAnet, IMPs)
16		
32	(8+24)	(IP-4)
48		(Ethernet)
64	(53?)	
128 bits		(IP-6)
Variable/extensible		(STN, Myrinet)

If extensible: up? down? either? both?

The Argument that Won

Who needs extensibility ?!
32 bits provide addresses for more than four billion hosts. Who needs more?

Addressing (Structure)

* Flat
* Structured (by levels)

If structured: how many levels?

Fixed?

If fixed: 2? (8, 24)

3? (8, x, 24-x)

4?

Variable (extensible, as needed)?

The Argument that Won

Who needs structure ?!

We are not building phone systems!

Observations

Classes are not Structure!

The A/B/C-classes improves the utilization of the 32-bit address space, but does not provide structure.

Structured Routing

Structured addresses do not imply structured routing.

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