Major IXes in Japan

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NSPIXP-2/3

☆ **NSPIXP-2 in Tokyo: 1 bldg, dual stack**
- 69 AS (56 GbE and 30 FE)
  - +12 FE for IPv6 (1 IPv6 only)
- 2 foundry swtiches connected by a 10GE
  - 4 GbE trunk as backup, by STP
- Inbound traffic: 12 to 6 Gbps

☆ **NSPIXP-3 in Osaka: IPv4 only**
- 24 ISPs (4 GbE and 21 FE)
- 3 bldgs connected by 2 10GE and 1 GbE, by RSTP
- Inbound traffic: 0.5 to 0.3 Gbps

NSPIXP-6, Distributed NSPIXP-2

☆ **NSPIXP-6 in Tokyo and Osaka: IPv6 only**
  - 2001:200:0:1800::/64 (part of WIDE sTLA)
  - 47 ISPs (1 GbE and 47 FE)
  - Inbound traffic: 0.1 to 0.2 Gbps

☆ **Distributed NSPIXP-2**
  - L2 extension of NSPIXP-2
  - 5 new bldgs in Tokyo
  - Links: DF or WDM
    - 10GE or 802.3ad aggregated 4 GbE
  - Primary and Backup switches/links
    - Resiliency by RSTP
  - Currently in beta testing
    - Not yet connected to NSPIXP-2

JPIX

☆ **Tokyo: IPv4 only**
- 6 bldgs in Tokyo and 1 bldg in Nagoya
  - Interconnected by 2-4 GbE links
- 104 ISPs (GbE, FE, or FDDI)
  - 60% are connected by GbE
- Inbound traffic: 20 to 10 Gbps

☆ **Experimental IPv6 in Tokyo**
- 2001:07FA::/64 (micro allocation)
- 11 ISPs, 11 FE

JPNAP

- ☆ **JPNAP Tokyo: 2 bldgs, IPv4 only**
  - Available ports: FE, GbE, 10GE
  - 27 ISPs
  - Inbound traffic: 12.6 to 5.5 Gbps
- ☆ **JPNAP Osaka: 2 bldgs, IPv4 only**
  - Available ports: FE and GbE
  - 9 ISPs
  - Inbound traffic: 0.7 to 0.4 5Gbps
- ☆ **JPNAP6: 2 bldgs in Tokyo, IPv6 only**
  - Available ports: FE
  - 2001:07FA:0:3::/64 (micro allocation)
  - 8 ISPs

Summary

☆ **Traffic grows in all IXes**
- ADSL/Cable/Fiber access getting common

☆ **NSPIXP/JPIX/JPNAP**
- competition and collaboration

☆ **NSPIXP-2**
- http://nspixp.sfc.wide.ad.jp/

☆ **NSPIXP-6**
- http://www.wide.ad.jp/nspixp6/

☆ **JPIX**
- http://www.jpix.ad.jp/

☆ **JPNAP**
- http://www.mfeed.ad.jp/