## Snap-Shot Info: UniVie - ACOnet and IPv6

Rhodes, Sept. 11, 2002 IPv6 Working Group

- ACOnet ,,itself"
- Vienna Internet eXchange (VIX)
- 6NET (EU Comm. IST Project)

#### **ACOnet**

- Started with legacy equipment (4500, 2500)
- Some native wire stuff & tunnels
- New IPv6 hub in Vienna
  - 7500 for UniVie, 7206 for ACOnet (6NET)
  - aVLAN for IPv6 on national GigE network
- Business model
  - V6 packets do not (necessarily :-) cost as much as global IPv4 traffic
- We are seeing interest by both local research groups and sites (~ a dozen pref.s)

# Vienna Internet eXchange: doing native IPv6 on a VLAN

- Separate VLAN available in both sites for IPv6 peerings
- Some peerings already established (~6)
  - more to come soon (benefitted from "new" IPv6 address policy)
- Business model
  - Not charging for the additional "plugs"
  - Limited time offer (end of '02 .. middle '03 ?)

### Research & Projects

- Testing IPv6 implementations, and new functionality:
  - More recent IOS versions (cisco)
  - v6 capabilities of GigE switches (black diamond and others)
  - IPv6MultiCast (tunnelled again, BSD boxes, arghh, interesting;-)
  - DNSv6 and DNSsec on/for IPv6 (premature??)
  - Started to look at `nsd´ (together w/GRNET)
  - Network mgmt., SNMPv3 (investigating problem space)

### Research & Projects (cont.)

- 6NET: [this is NOT a 6NET presentation!]
  - IST project, sponsored by the European Commission
  - Grown to 35 partners by now (Europe + Asia)
    - both R&D and commercial entites
  - Set of STM-1 wires across Europe, + to US and Asia
  - 12K and 7206 boxes
    - broad mix of access and down-stream fan-out technologies
  - Found bugs already in various places (IS-IS/iBGP)
    - And we are free to keep them ©
  - How to "control" routing opposite 6Bone
    - (short AS paths [tunnels] vs. long AS paths [native])
  - Test-driving RPSLng to describe 6NET routing config.