GigaRing SWS & I/O Status

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Conference
Minneapolis, Minnesota**

GigaRing SWS & I/O Status

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Content

- **SWS–ION Releases & Schedules**
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- **Future SWS–ION Features**
- **I/O Enhancements in UNICOS and UNICOS/mk**

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SWS–ION Releases & Schedules

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Timeline

- **SWS–ION 4.0 – February 4, 1999**
- **SWS–ION 5.0 –** *June 28, 1999*
- **SWS–ION 5.1 –** *3rd or 4th Quarter, 1999*
- **SWS–ION 5.2 –** *not scheduled yet*

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SWS–ION 4.0 Features

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Cray SV1 System

- **Cray SV1 Support**
    - SV1 boot sequence
    - Revision A support

- **HPN performance improvement (~10%)**

- **Display failing FCN RAID–3 spindle**

- **dring only logs folds/masks when necessary**

- **GigaRing proxy priority changed**

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SWS–ION 5.0 Features

SWS O2 & SV1 SuperCluster Support

- **SWS O2 Introduction**
  - Only supports J90 & SV1 systems
  - SV1 SuperCluster supported only by O2

- **SV1 SuperCluster**
  - Enhance GigaRing recovery
  - Dring locking
  - Shared GigaRing resiliency

- **FCN Initial Install Support**

- **Solaris Y2K Compliance**

SWS–ION 5.1 Features

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Auto–Recovery

- **Auto–Recovery**
  - SV1 SuperCluster resiliency
  - Unattended operation
  - Mike Wolf's talk: 9:00 Thursday in Ballroom 3

- **Investigating FCN performance enhancement with write–cache**

- **Reduce duplicate console messages**

- **Possibly others**

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Future SWS–ION Features

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Considering

- **Shared GigaRing document**
- **Future disk technology**
  - 36 GByte / 10K RPM drives
- **SV1 dumpsys enhancements**
- **Improve networking performance**

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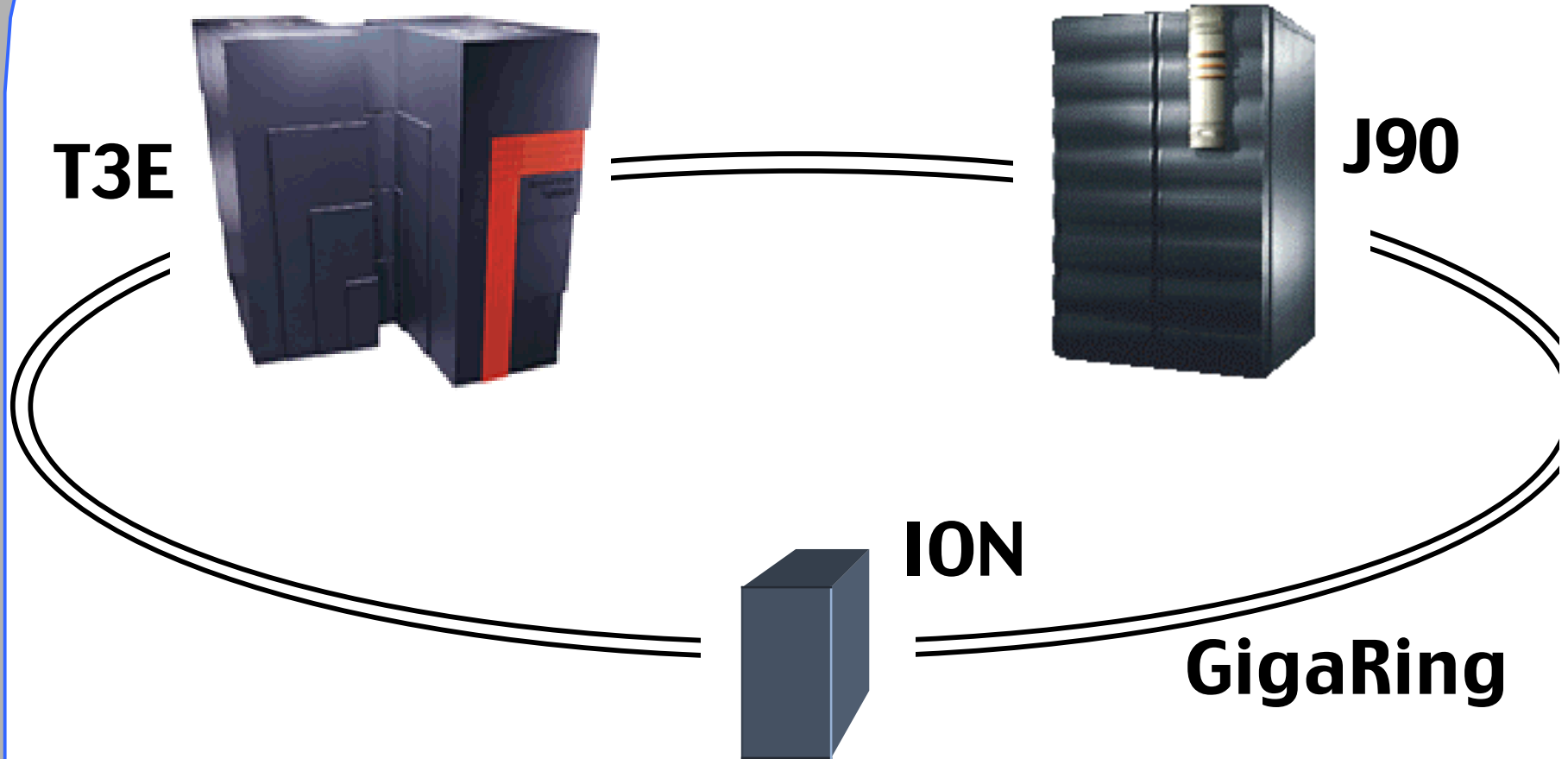# I/O Enhancements in OS

UNICOS

- **Command for initializing mainframe GigaRing connections**

- **Multithreaded network interrupts**
  - **9 – 50% performance improvement for multiple network interfaces**

- **Reset GigaRing connection on panic (next slide)**

UNICOS and UNICOS/mk

- **BDS block size option on cp(1)**

Shared GigaRing Example

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T3E

J90

ION

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I/O Enhancements in OS

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Considering

- BDS 2.1 server
- Improve host to host performance
- Improve NFS performance

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Summary

Driven by:

- **New hardware**
- **Resiliency**
- **Performance**
- **Ease of use**

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