

**Southeast Networking Summit Meeting
February 20-21, 2007—Atlanta, Georgia
Summary Meeting Notes**

AGENDA

For the agenda, presentations and related background materials:

<http://www.sura.org/events/SURAITRONCMtg.htm>

ATTENDEES:

64 attendees: <http://www.sura.org/events/docs/ReglistSENetwork.xls>

DAY TWO – PANEL DISCUSSION

Participants: Ron Hutchins, Peter O’Neil, Jim Pepin, Brian Voss, Bill Wing

Focus Question: What are the challenges and opportunities for our universities, our networks, our region?

Our Institutions:

- Worrying about this national network stuff is distracting our attention—would like to be able to stop worrying about it
- The commodity market has improved dramatically over the past 10 years and it seems likely many educational institutions, including some universities, could get by with their commercial ISP connections
- Our research community has been the historic driver of new services
- ORNL is developing/pursuing a “Lab of the South” vision, which would be a “distributed national laboratory” that leverages ORNL physical assets—it would be dependent on a high-performance network infrastructure that can be used any way we want to

Our Networks:

- Need to get to one national network
- “We don’t need the same network twice”
- The NLR, in particular, provides a unique enabling resource in the SE
- Some NLR connected institutions could likely drop their I2 connection
- It would be interesting to see how truly dependent our institutions are at this point on having a national R&E networking infrastructure at all
- Believe there is a fundamental differences between I2 and NLR in how they operate and that NLR is more focused on research
- Sees I2 as more a “Telco” model
- See RON-to-RON connectivity and peering as the way to go with a “light-weight” national network
- Sees the NLR as intrinsically RON oriented
- Thinks networking services need to be built round the various campus affinity communities with their own governance structures

- We need to focus on how the RONS do business
- Need to look at the value provided by each provider
- The RONS have a responsibility to work together
- It's important to be able to do network research – have non-production facilities available
- The RONS have more in common with each other than with I2
- The Quilt was created originally for a specific purpose: to give regionals clout with I2

Our Region:

- We in the SE are not going to be able to resolve the I2-NLR “mess”
- We shouldn't try to force a merger between I2 and NLR at this point
- Impressed with what PNWGP along with CENIC and the FRGP have been able to accomplish in the northwest and west
- Like the Ron Johnson in-it-for-the-long-haul perspective on finding ways to foster connectivity and networking “in-fill” in their region
- Believe there are opportunities for common projects in our region
- The west coast focus on researcher affinity groups is a good model for the SE
- We need to build a governance model that matches what we're trying to do

BREAK-OUT SESSIONS

Facilitators: Pricilla Hancock, Marc Hoit, David Mathews-Morgan, Dick Newman, Don Riley

Focus Questions:

1. How can the SE region collaborate/cooperate to provide better services to their institutions?
2. Are there creative ways to utilize/justify two national R&E network infrastructures?
3. How can we (in the SE) leverage/influence the national networking entities/agenda?

Ideas combined from all break-out sessions are as follows:

- 1) *How can the SE region collaborate/cooperate to provide better services to their institutions?*
 - Listen to researchers
 - Consistent outreach (pooling knowledge)
 - Strategy on outreach across institutions
 - Inventory what institutions want/need
 - Inventory of where collaborations exist or could exist (resource list)
 - Share traffic analyses (as part of inventory)
 - Dedicated pipes
 - RON peering
 - Access to research networks
 - Dynamic provisioning (of interest to small set of users)
 - Work together at political levels (external, e.g., Southern Governor's Association and internal, e.g., among senior administrators including CIOs)
 - Leverage the Quilt

- Interregional collaborations
- Resolving points of contention and differences
- Stimulate vertical communications/affinities
- SURAGrid (leverage it to grow)
- Collective decision making - by the group of RONS
- Cross-border fiber to interconnect RONS, but suggested two priority items:
 - Collectively do "traffic analysis" & study impact
 - Negotiate with I2 for synchronized renewals - and extensions of current contracts
- Share information and leverage costs with each other
- Get organized in the region
- Collective power to steer national directions
- Leverage the existing infrastructure (gigaPOPs and exchange points)
- Focus on research and applications
- Work on network "in-fill" in the region

2) *Are there creative ways to utilize/justify two national R&E network infrastructures?*

- NLR does not have a pay-to-play K-12 program like I2—how comparable is the connectivity?
- Demand/require new service contracts that focus on specific services (a subset of services approach, not a shotgun one, i.e., "unbundled offerings")
- Use one network for dynamic provisioning but not the other (i.e., different service capabilities)
- Optimal aggregation for different layers (1, 2, and 3) may not be the same, so take advantage of it and pick the network that does it best
- Lack of I2-NLR peering creates inefficient routes, so need to work on solving this by forcing I2 to peer with NLR
- Consider whether the IP (layer 3) services of both I2 and NLR are necessary
- Leverage investment in NLR infrastructure to minimize connections and associated connectivity fees: use NLR waves/services for "backhaul" to share aggregated connectivity
- Make one commercial and one research
- Treat as competing providers and pick the best one for your needs
- I2 focus on layer 4 and up, NLR focus on layers 1-3
- I2 use the NLR fiber

3) *How can we (in the SE) leverage/influence the national networking entities/agenda?*

- Collective action
- Operate with the knowledge that SE is nominally ½ of the business (revenue) of both national networking organizations
- Build RONS' relationships
- This meeting (and more like it) is one way
- Identify and communicate specific requirements to each organization
- Be selective about where we are together and communicate those common needs (then vote as a block)

- Actively participate in I2's organizational activities (four councils, ½ or better on Board)
- Carefully coordinate between ourselves and our representatives to these organizations (I2, NLR, Quilt, plus....)
- Actively participate in I2's Governance and Nominations Committee
- Vote with your feet
- Leverage investment in NLR infrastructure to minimize connections and associated connectivity fees: use NLR waves/services for "backhaul" to share aggregated connectivity
- Look at usage data to evaluate need/value
- Super aggregation in the region
- SURA negotiate fair prices for services provided

WRAP-UP Session

The following wrap-up presentations were given and are contained on the meeting website:

- Larry Conrad presented some of his thoughts on possible connectivity scenarios for our institutions, action options for our region, and organizational scenarios for our region.
- Don Riley presented "SURA/SERON Regional Vision" which referenced the Ron Johnson presentation, and presented some thoughts attempting to integrate with the SURA IT Strategic Plan and SE regional networking.

WRAP-UP DISCUSSION

There were a set of specific actions identified for post-meeting follow-up:

1. Work to align I2 contracts for SE members/connectors—Gary Crane
2. Conduct a "traffic analysis" study to help institutions better understand their R&E network connectivity needs—Peter O'Neil
3. Pursue inter-connecting the RONS and assist network "in-fill"—Don Riley
4. Super-aggregation?—(pending until #2 completed)
5. Establish an ongoing cooperative organization leveraging SURA—Larry Conrad
6. Improve communications between RONS and with the universities—(combined with #5)
7. Get active w/I2 governance structures—Pricilla Hancock and Dick Newman

These were prioritized as follows, most important to least important: 2, 1, 3, 4, 5/6, 7

(The planning group made the indicated coordination assignments in their meeting after the summit meeting adjourned.)

Two other ideas were also raised:

- Consider organizing a follow-on meeting with other RONS (outside the SE)
- Flesh out a matrix comparing the various connectivity scenarios described in Larry's wrap-up presentation

To close, Dan Updegrave conducted a short "plus-delta" assessment of the two-day meeting was conducted:

<u>Plus</u>	<u>Delta</u>
The Day One agenda	The survey mechanism at end of Day One
Break-out sessions	Day Two too short—needed another ½ day
Panel session	Nothing “committed”
	Risk of bias by participants

SUBMITTED BY: Larry Conrad