

# TransPAC, NEAAR, NetSage @ GLIF-Am

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**September 15, 2017**

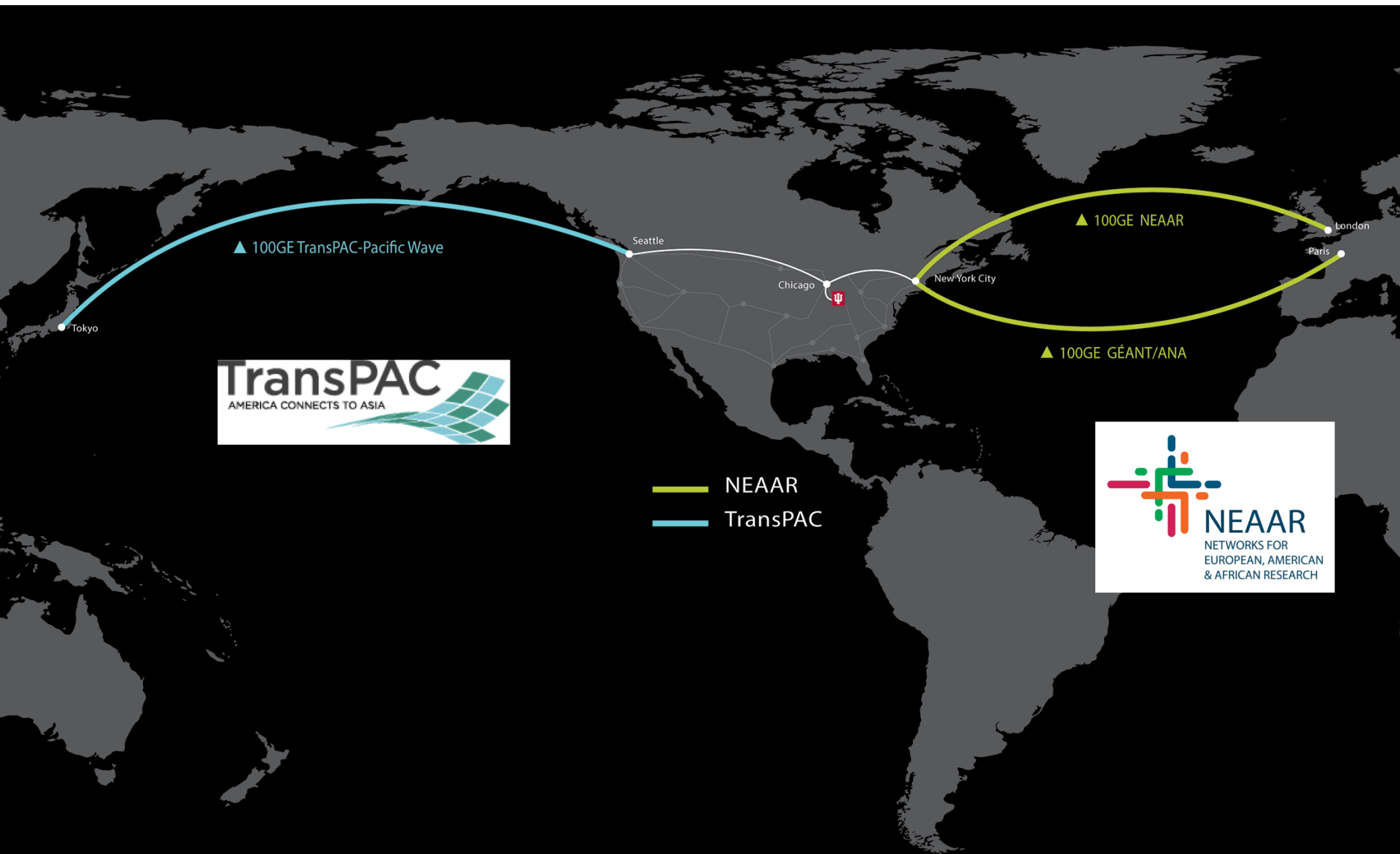


**INDIANA UNIVERSITY**

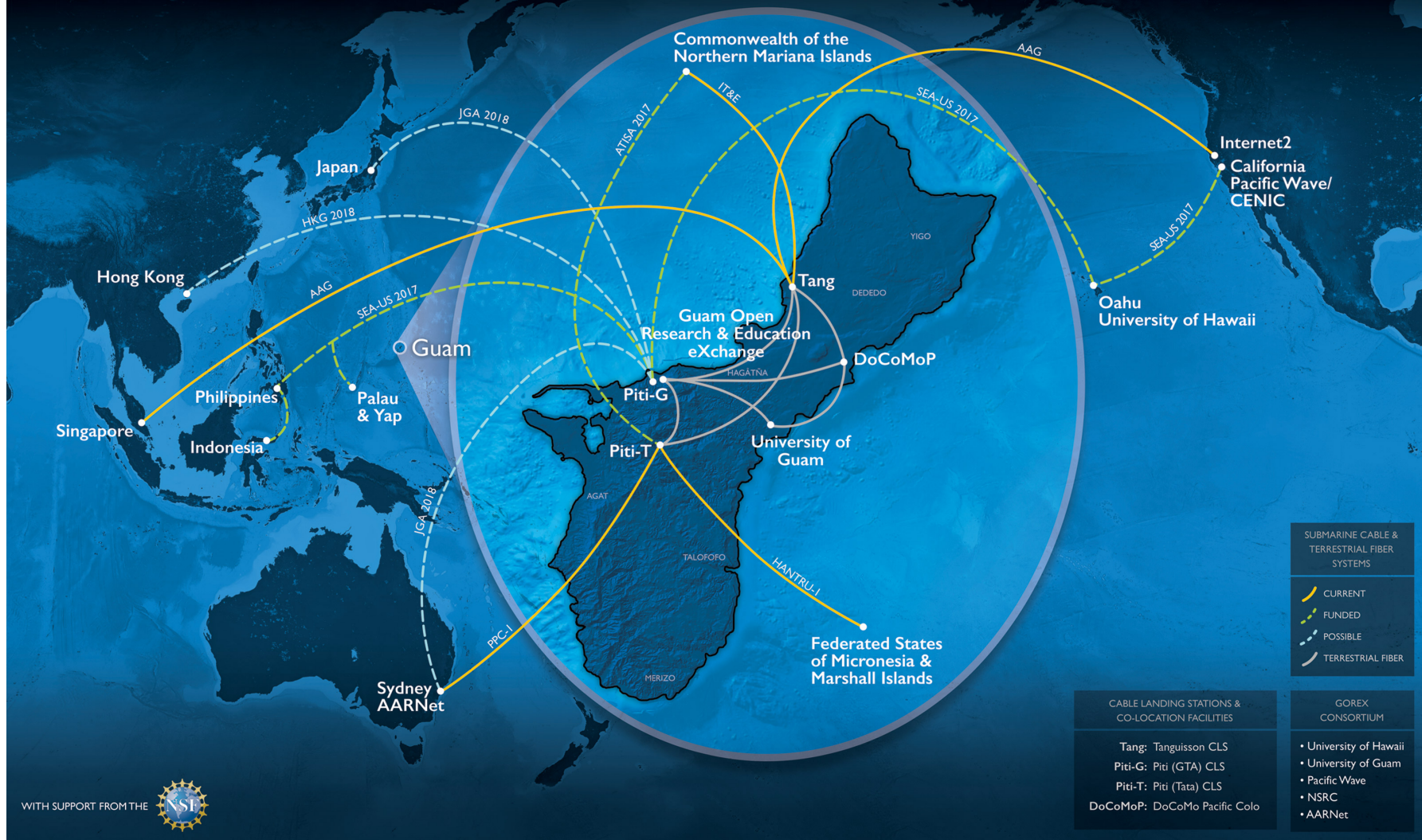


**INTERNATIONAL  
NETWORKS**  
At Indiana University

# International Networks @IU Links

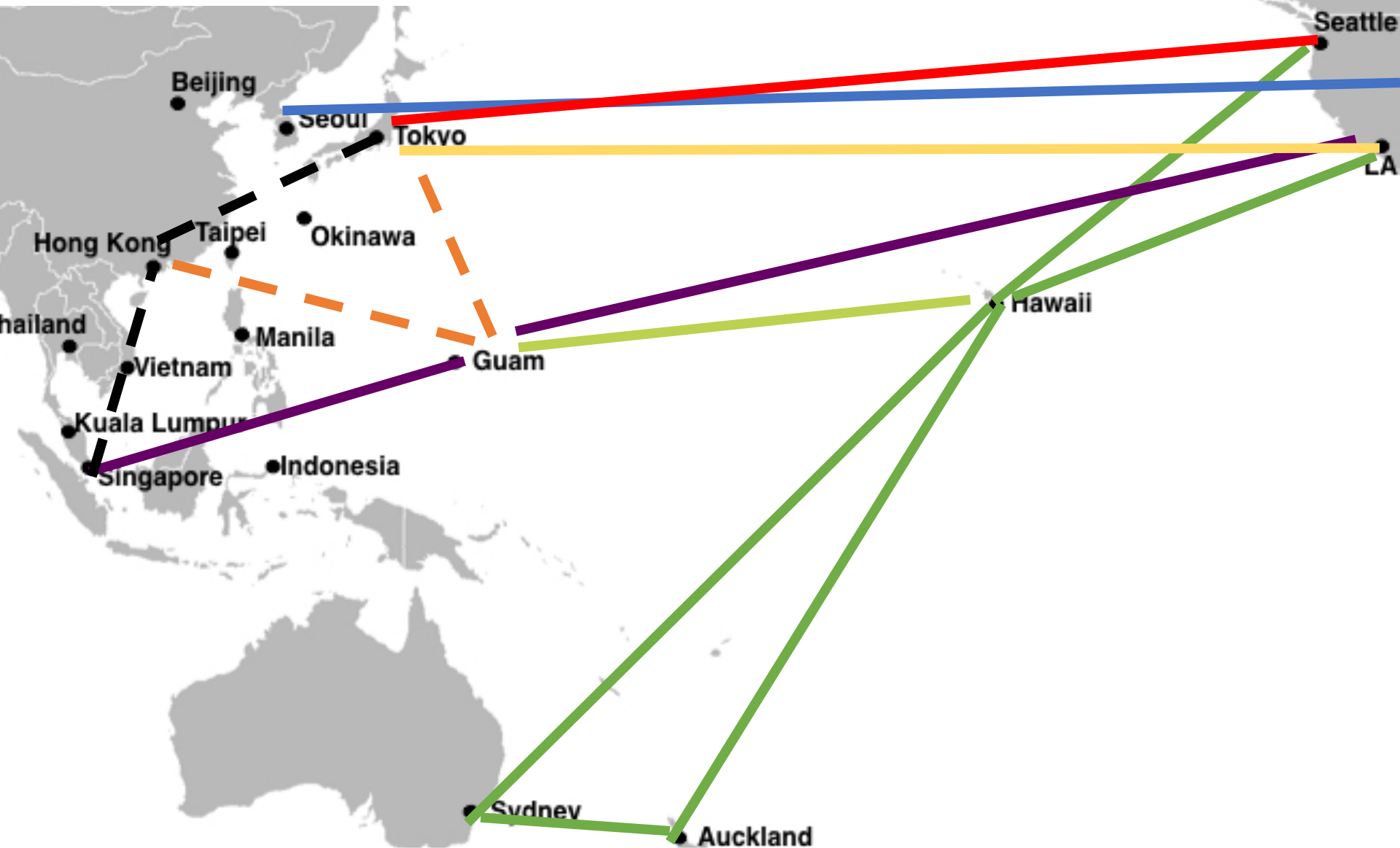


# GOREX: Guam Open Research & Education eXchange



WITH SUPPORT FROM THE 

# nt 100G TransPacific R&E Networks

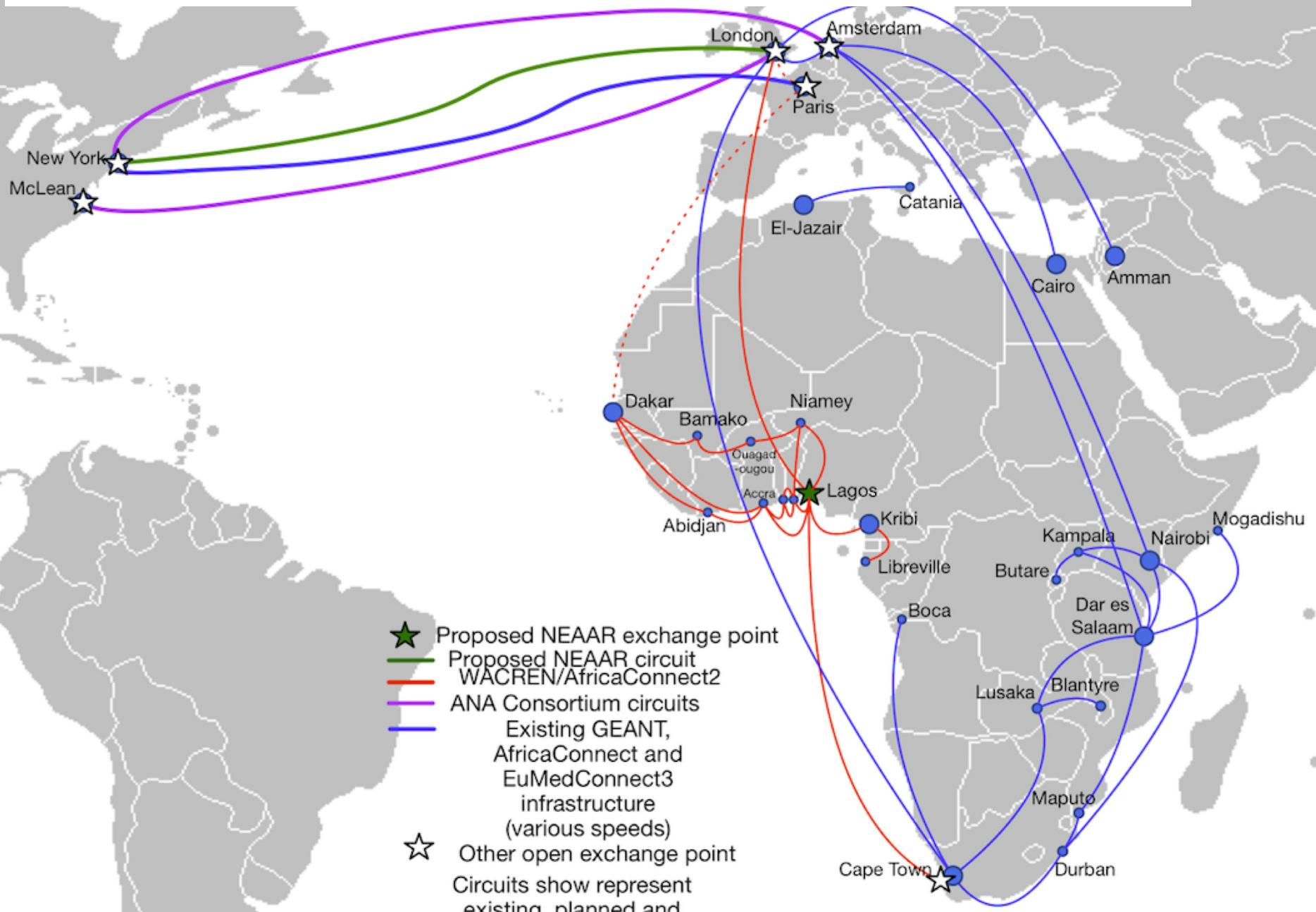


# TransPAC - Training and Outreach

- **perfSONAR training**
  - APAN43
  - APAN44
- **International OIN**
  - PregiNET/Manila Feb 2017
- **Planning: something at APAN45**
- **Engagement**
  - Bioinformatics – U. Peking CBI, BGI/BIG



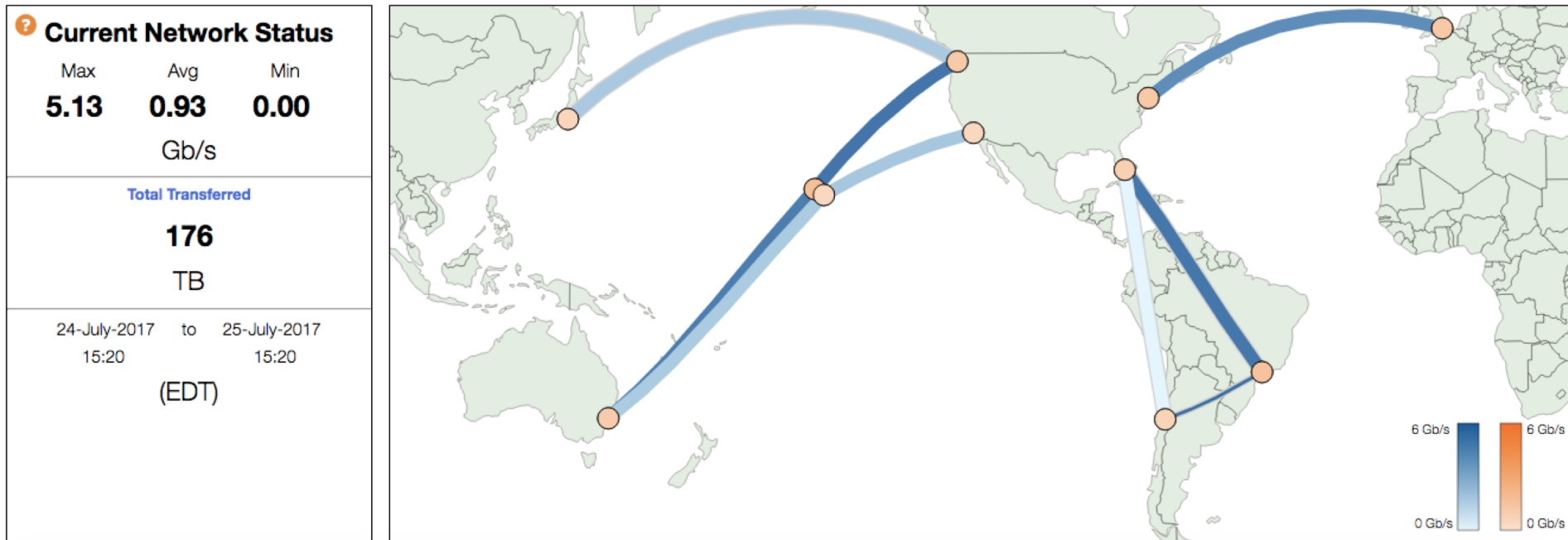
# NEAAR Current and planned R&E Networks



# NEAAR - Training and Outreach

- **PerfSONAR Workshops**
  - May 2017 – Johannesburg, S. Africa
  - Oct 2017 – Accra, Ghana
  - Nov 2017 – Addis, Ethiopia (Joint with UbuntuNet Connect)
  - 2-3 a year planned 2018-2020
- **Engagement**
  - Writ large – both European and African collaborations with US researchers
  - NSF, NIH, EU funded included
  - More info in AR

# NetSage: Network measurement, analysis, and visualization



<http://portal.netsage.global>



# Year 3 Focus

- **What are the top sites that use the IRNC links?**
- **What are the top science projects that use the IRNC links?**
- **How can we best identify a list of top talkers for each link?**

# Science Registry

- **Goal: Understanding network traffic**
- **Map IP addresses to:**
  - **AS Numbers**
  - **Universities**
  - **Project name**
  - **Science type**
- **Seeding with top 100 talkers from TP and NEAR**
- **Community input will be ongoing**

# DTN Node Monitoring

- Recent supplement to extend prototype
- Deploy Tstat on DTN
  - Collect Header data similar to Sflow
  - Also packet loss
- Analysis from ground truth

# Acknowledgements

- **IN@IU is funded by**
  - US NSF award #0962968 for TransPAC3
  - US NSF award #1450904 for TransPAC4
  - US NSF award #0962973 for ACE
  - US NSF award #1540933 for NetSage
  - US NSF award #1638863 for NEAAR
- **The TransPAC PacificWave 100gb/s network fabric is provided by Pacific Northwest GigaPop**

# That's it

- **Group Website:**  
<http://www.in.iu.edu/>
- **Andrew Lee – [leea@iu.edu](mailto:leea@iu.edu)**
- **Questions/Comments?**