Network Operations Groups around the World

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RIPE NCC Regional Meeting

Moscow

29 Sept - 1 Oct 2010

Internet Operations Groups

- Where network engineers and operators meet their colleagues
  - Peering & Business relationships
  - Industry relationship
  - Technology discussions
  - Operational best practices
  - Compare experiences (supplier, operational,…)
  - Purchasing decisions influenced
  - Networking software features worked out
  - Employment opportunities
  - Keeping the Internet Working

AfNOG

- **African Ops Conference**
  - Established in 2000
  - Still centred around Workshops, based on the recently defunct INET Workshops organised by ISOC
  - Co-located with one of two AfriNIC meetings
- **Meets once per year in April/May**
- **Typical attendance around 100**
- **Moves around Africa**
  - 2010 was in Kigali, Rwanda
  - 2011 will be in Dar es Salaam, Tanzania
  - 2012 will be in Banjul, Gambia
  - AfNOG goal is to visit every country on the continent, bringing training, leaving legacy of local operations community

AfNOG (2)

- Programme
  - 5 days of workshops
    - 4 parallel workshops including System Administration, Scalable Services and Scalable Infrastructure
    - Expanded programme planned for 2011 onwards
  - 2 days of tutorials
    - 3 parallel tutorials, usually more detailed content than the workshops
  - 1 day of conference
- Website:
  - www.afnog.org

APRICOT

- Asia and Pacific Operations Conference
  - Established in 1996
  - Co-located with one of two APNIC meetings
- Held annually on the last week of February
- Typical attendance around 700
- Moves around AP region
  - 2010 was in Kuala Lumpur (734 participants, 53 countries)

APRICOT (2)

- **Programme**
  - 5 days of technical hands-on workshops
    - 5 (or more) parallel workshops
  - 4 days of tutorials and conference
    - Plenary sessions
    - Parallel streams (maximum of 4)
    - BoFs
    - AP organisations hold side meetings
  - 1 day APNIC Member Meeting
- **Committees**
  - Management committee organises the conference
  - Programme committee organises tutorial and plenary content
- **Website:**
  - www.apricot.net

APRICOT (3)

- **APRICOT 2011**
  - Hong Kong, 15th – 25th February
  - Will be held jointly with APAN 31
  - First joint conference of commercial and R&E network operations groups
- **APRICOT 2012**
  - New Delhi, 22nd February – 3rd March
  - SANOG 19 will be part of APRICOT 2012
- **Forward planning is vital**
  - Work starts 9 months prior to the event
  - Future host MUST participate on organisation committee and organisation activities of the prior event

MENOG

- **Middle East Network Operators Group**
  - First meeting in April 2007
  - (Following RIPE NCC regional meeting in Bahrain in November 2006)
- **Meets twice per year (April and Oct/Nov)**
- **MENOG 6 was in Riyadh in April 2010**
  - Two 3 day workshops
    - IPv4/v6 Routing & Robust DNS Infrastructure
  - 140 attendees from 19 countries
- **MENOG 7 will be in Istanbul in October 2010**
  - Three 5 day workshops (Routing, Network Management, Network Security)

MENOG (2)

- Programme
  - 2 days plenary conference
  - 1 day of tutorials
  - 5 days of workshop (as from Oct 2010)
  - Incorporates the RIPE NCC Middle East Regional Meeting
- Still early days, building the "brand" and awareness across the region
- Coordination team involving founders
- Programme committee works on the plenary & tutorial content
- Website:
  - www.menog.net

NANOG

- **North American Network Operations Group**
  - Evolved from NSFNET 'Regional Techs' meeting in 1994
  - Attracts participants from Europe and Asia too
- **Three meetings per year in North America**
  - One meeting held jointly with ARIN
  - NANOG 49
    - San Francisco, 13 – 16 June 2010
  - NANOG 50 (preceeds ARIN 26)
    - Atlanta, 3 – 6 October 2010
  - NANOG 51
    - Miami, 30 January – 2 February 2011

NANOG (2)

- **Three day event with well established formula:**
  - Plenary sessions
  - Panel discussions
  - BoFs (Peering & Security are long running events)
  - Tutorials
- **Around 500 participants and depends on:**
  - Location & Forward Planning
  - Programme quality and its early publication
- **Committees:**
  - Steering Committee provides general direction
  - Programme Committee builds programme for entire event
- **Website**
  - www.nanog.org

PacNOG

- **South Pacific Ops Group**
  - Launched after APNIC 18 in 2004 in Fiji
  - Covers the Pacific Islands
- **Meets twice a year as from 2009:**
  - PacNOG 7: Was in American Samoa at end of June 2010
  - PacNOG 8: Will be in Federated States of Micronesia in November 2010 (celebrates arrival of fibre in FSM)
  - Planning for 2011 is well under way
- **Organised by a Coordination Committee including the founders and APNIC regional representative**
- **Financial support from ISOC, NSRC, PITA & local host**

PacNOG (2)

- **Programme**
  - Very much focused on training and education
  - 1 day of conference including country activity reports
  - 5 days of workshops
    - Usually a mixture of routing, peering & IXPs, VoIP, LAMP, service infrastructure, services, and security
- **Website:**
  - www.pacnog.org

SANOG

- **South Asia Ops Group**
  - Established in 2003, focusing on South Asia
  - Covers countries between Bangladesh and Afghanistan
- **Two events per year (January and July)**
- **Typical attendance now 250**
- **Moves around South Asia**
  - SANOG 16 was in July 2010 in Paro, Bhutan
  - SANOG 17 will be in January 2011 in Colombo
  - SANOG 18 will be in August 2011 in Pokhara, Nepal
- **Yet to visit Maldives and Afghanistan**

SANOG (2)

- Programme
  - 5 days of technical hands-on workshops
    - 3 parallel workshops (similar to APRICOT content)
  - 2 days of tutorials
    - 3 parallel tutorials
  - 1.5 days of conference
    - Includes APNIC specific content
- Organising and Programme committee put the event together with localhost
  - SANOG is well known across South Asia
- Website:
  - www.sanog.org

New NOGs

- **NOG creation is a recent phenomenon**
  - Local Language, Needs, Culture

- **SANOG and NZNOG are common models**
  - Avoid temptation to introduce bureaucracy
  - Primary purpose to ensure network engineers & operators have opportunity to meet and interact

- **Potential new Regional NOGs:**
  - Caribbean
    - CaribNOG was launched in August 2010
    - www.caribnog.org
  - Latin America
    - LacNOG has started under the auspices of LACNIC

Country NOGs

- New Country NOGs are going from strength to strength
- Examples:
  - PLNOG, DENOG, AusNOG
- Joining more established NOGs such as:
  - NZNOG, JANOG, UKNOF, SwiNOG

NZNOG

- New Zealand Operators Group
- Meets once per year
- Programme
  - 1 day of Tutorials
  - 2 days of Conference
  - NZNOG 2010 held 3 day workshops (for first time)
- Around 120 participants (!)
- Fairly informal structure
  - Led by "guides"
  - Has a board of trustees (legal requirement to hold "the money")
- Website:
  - www.nznog.org

JANOG

- Japan Network Operators Group
- Running since 1997
- Meets twice per year
- In Japanese
- 300-400 participants (depending on location)
- 2 days Conference
  - Wide range of topics
- Website:
  - www.janog.gr.jp

More information

- ## Other NOGs:
  - www.bugest.net/nogs.html

- ## Meeting planning:
  - "Network Education and Training Calendar of Events" maintained by the NSRC
  - ws.edu.isoc.org/calendar
  - **Desirable to avoid conflicts and overlaps**

Questions?