

# 65th IFIP WG 10.4 Meeting

Sorrento - Italy

*January 23-27, 2014*



**65th IFIP WG 10.4 Meeting**

**Sorrento - Italy**

***January 23-27, 2014***



**Business  
Meeting**

# Business Meeting Agenda (17:00)

- Upcoming events: DSNs and other sponsored events ...
- Awards
- Future WG Meetings AND workshops
- Workshop theme ideas
- Discussion on the IFIP statement on intentional weakening of security and trust mechanisms in ICT and the Internet by major actors
  - ◆ (search «IFIP statement on Undermining Security and Trust Mechanisms»)
- **Members only portion**

# Upcoming Events

- DSN

# IEEE/IFIP International Conference on Dependable Systems and Networks



## Atlanta, GA, US (2014)

- ◆ General Chair: **Doug Blough** (Georgia Tech, US)
- ◆ Program co-Chairs: **Nuno Neves** (Univ. Lisbon, Portugal), **Mike Reiter** (UNC Chapel Hill, US)

## Rio de Janeiro, Brazil (2015)

- ◆ General Chair: **Eliane Martins** (State Univ of Campinas, Brazil)
- ◆ Program co-Chairs: **Yair Amir** (Johns Hopkins Univ., US), **Johan Karlsson** (Chalmers Univ., Sweden)

## Toulouse, France (2016)

- ◆ General Chair: **TBD** (LAAS-CNRS, France)

# IEEE/IFIP International Conference on Dependable Systems and Networks



## Atlanta, GA, US (2014)

- ◆ General Chair: **Doug Blough** (Georgia Tech, US)
- ◆ Program co-Chairs: **Nuno Neves** (Univ. Lisbon, Portugal), **Mike Reiter** (UNC Chapel Hill, US)

# DSN 2014: Atlanta, Georgia, USA

- *Dates: June 23-26, 2014*

- *Location:*

  - ◆ Georgia Tech Hotel & Conference Center

  - ◆ Close to High Museum of Art, Atlanta Botanical Garden, CNN Center, Georgia Aquarium, etc.

- *Cost:*

  - ◆ *Hotel room rate: \$154/night (compare to \$189/night in 2012, \$179/night in 2010)*

  - ◆ Trying to maintain registration fees of 2012

- *PC Co-Chairs: Mike Reiter and Nuno Neves*



# The 44th Annual IEEE/IFIP International Conference on Dependable Systems and Networks (DSN 2014)

June 23 - 26, 2014  
Atlanta, Georgia USA



## Organizing Committee:

### General Chair:

Doug Blough, Georgia Tech

### Program Co-Chairs:

Michael Reiter, UNC Chapel Hill  
Nuno Neves, Univ. of Lisboa

### [List of PC Members](#)

### Finance Chair:

Bo Hong, Georgia Tech

### Workshops Co-Chairs:

Saurabh Bagchi, Purdue Univ.  
Adam J. Oliner, UC Berkeley

### Registration Chair:

David Taylor, Univ. of Waterloo

### Publications Chair:

Meng-Lai Yin, Cal Poly Pomona

### Fast Abstracts Chair:

Karthik Pattabiraman, Univ. of  
British Columbia

### Student Forum Chair:

Cristina Nita-Rotaru, Purdue Univ.

## Call for Contributions

The Annual IEEE/IFIP International Conference on Dependable Systems and Networks (DSN) is the most prestigious international forum for presenting research results in the field of dependable computing. Authors are invited to submit original papers on the research and practice of creating, validating, deploying, and maintaining dependable and secure systems and networks.

All aspects of dependable and secure systems and networks are within the scope of DSN including innovative architectures, protocols and algorithms as well as experimentation with and assessment of dependable and secure systems.

DSN's current thematic areas of emphasis are:

- **Hardware** (e.g., microprocessors, VLSI, storage systems, and nanoscale systems)
- **Software** (e.g., applications, middleware, and operating systems)
- **Cyber-physical systems** (e.g., embedded systems, networked embedded systems, SCADA, automotive, aerospace, and medical systems, and smart grid)
- **Socio-technical systems** (e.g., virtual worlds, human-computer interaction, and online social networking)
- **Cloud computing** (e.g., storage, computing, platforms, and applications)
- **Networks** (e.g., wireless, next-generation networks, and software-defined networking)
- **Models, paradigms and methodologies** for programming, evaluating, assessing, and experimenting with dependable and secure systems

DSN welcomes research papers, practical experience papers, and tool descriptions in any of these thematic areas. Innovative papers in other areas of dependable and secure systems and networks will also be considered. Papers will be assessed with criteria appropriate to each category. The conference favors work that explores new territory, continues a significant research dialogue, or reflects on experience with (or measurements of) state-of-the-art implementations. Submissions will be judged on originality, significance, correctness and impact.

See  
<http://dsn.org>

# Award Updates

# DSN Best paper award

**NEW !**

- Phase 1 (ran by PC coChairs):
  - ◆ Short list of up to 6 papers eligible for the Best Paper Award
- Phase 2 (before DSN program announced):
  - ◆ SC trims list down to 1-3 candidates for the Best Paper Award.
- Phase 3 - Voting (by constituency at the conference)
  - ◆ Finalists of Best paper award are presented in a plenary session
  - ◆ Every registered person has a right to vote
  - ◆ Winner will be announced at the Banquet

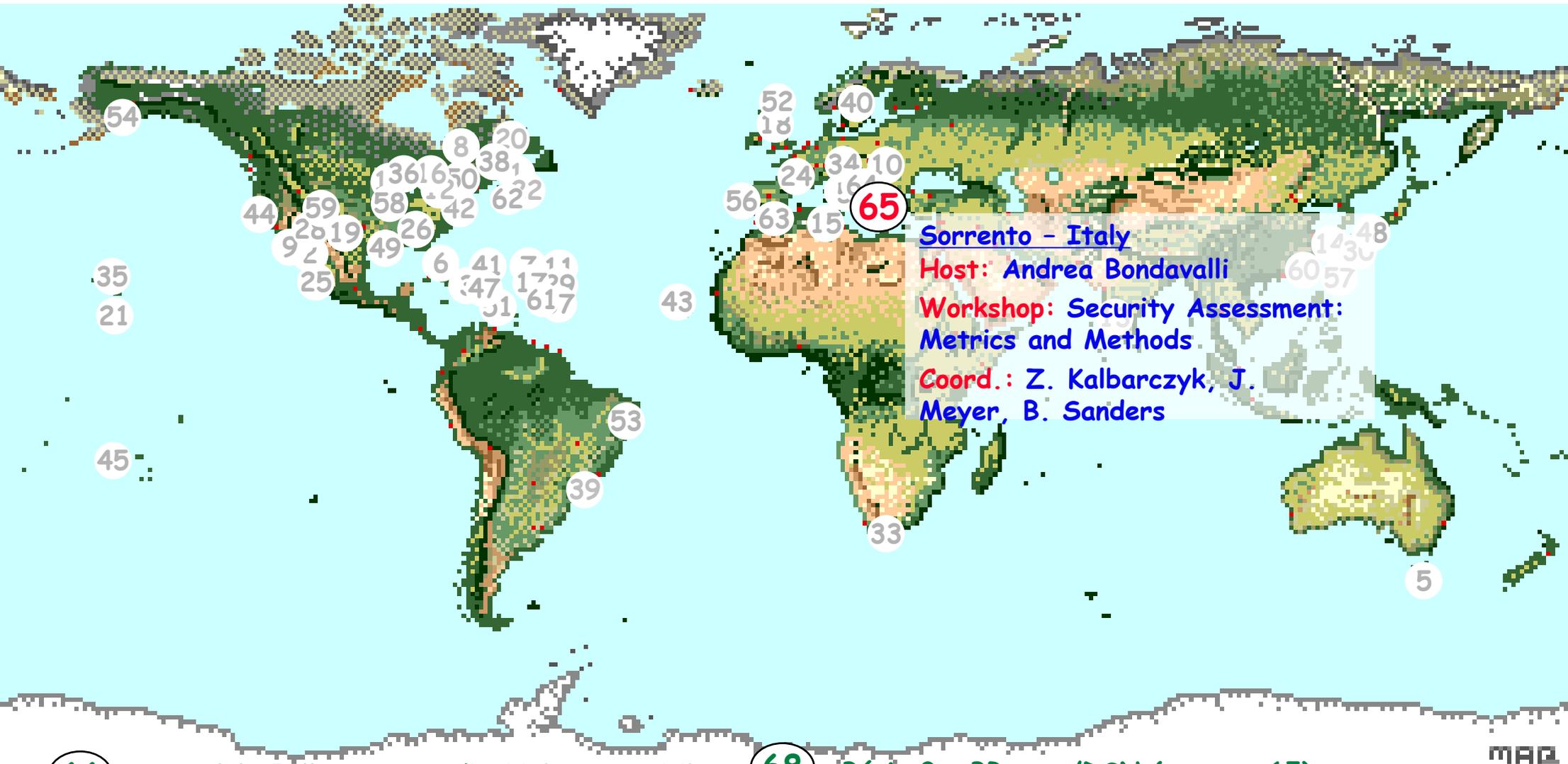
# DSN Best paper vs. Carter award

- DSN Best paper (BPA) vs. Carter (CA) award:
- Two different objectives:
  - ◆ CA: An outstanding paper based on a graduate dissertation
  - ◆ BPA: Strictly THE best paper(s) at the conference
- SC takes CA candidates (as it is now) and Max 6 candidates to BPA and performs a unique process
- SC outputs
  - ◆ 1 CA winner
  - ◆ Max 3 candidates to BPA

# Award Updates

- **Jean-Claude Laprie Award in Dependable Computing (2014)**
  - ◆ **Scope:** Outstanding paper(s) have significantly influenced the theory and/or practice of dependable computing.
  - ◆ **Committee:** Dan Siewiorek (Chair)
    - Dave Rennels (UCLA, US)
    - David Powell (LAAS, FR)
    - William Sanders (U. Illinois U-C, US)
    - Andrea Bondavalli (U. Firenze, IT)
  - ◆ **Selection:**
    - ☞ ONGOING

# Future Working Group Meetings



**66** Amicalola Falls, US — w/DSN (summer 14)

**67** ??, ?? — (winter 15)

**68** Búzios?, BR — w/DSN (summer 15)

**69** ??, ?? — (winter 16)

# 65th Meeting (winter 2014)

**DONE!**

**Location: Sorrento, Italy**

Napolitan area (Peninsula Sorrentina)

**Host: Andrea Bondavalli**

**Dates: 23-27 January 2014**

**Hotels: Parco dei Principi / La Residenza compound**

**Costs: ~ 80-110 EURO/night hotel; ~350euros reg.**

**-Includes**

- Breakfast

**Workshop: Security Assessment: Metrics and Methods**

(Z. Kalbarczyk, J. Meyer, W. Sanders)

# 66th Meeting (summer 2014)

**ORIGINAL  
SLIDE AT BM  
see chges next slide**

**Location: Amicalola Falls**

**Host: Phil Koopman and Marilyn Wolf**

**Dates: after DSN14**

**Hotels: The Amicalola Falls State Park & Lodge**

**Costs: \$800 reg. including 3night hotel**

**AND Bus transportation from DSN and back to ATL.**

▪ **Hotel Includes**

- Breakfast and all meals
- Swimming pool, wellness and fitness facilities

▪ **NB: 50 rooms; no alternate hotel !!**

**Workshop: Energy Cyber-Physical Systems Assurance** (in a broad sense of the word) --- (Phil Koopman and Marilyn Wolf)

# 66th Meeting (summer 2014)

**CURRENT  
STATUS QUO**

Location: Amicalola Falls

Host: Phil Koopman

Dates: after DSN14

Hotels: The Amicalola Falls State Park & Lodge

Costs: \$800 reg. including 3night hotel

**AND** Bus transportation from DSN and back to ATL.

- Hotel Includes

- Breakfast and all meals
- Swimming pool, wellness and fitness facilities

- NB: 50 rooms; no alternate hotel !!

**Workshop:** on Smart Grids Security and Dependability ---  
(Kevin Driscoll and Nuno Neves)

# Summer 2014 Venue: Amicalola Falls State Park



- Georgia mountains--- heart of Cherokee gold country.
- Access to the Southern terminus of Appalachian Trail.
- 1.5 hours from ATL and worldwide connections.
- Host:  
Marilyn Wolf, GA Tech.

# Travel

- ATL Airport provides worldwide connections.
  - ◆ Charter bus after DSN



# 67th Meeting (winter 2015)

**PROPOSALS  
WELCOME !**

Location: TBD

Host: TBD

Dates: TBD

Hotels: TBD

Costs: ~ TBD /night hotel; ~ TBD reg.

▪ Hotel Includes

- Breakfast
- Swimming pool, wellness and fitness facilities
- WiFi

**Workshop** : proposal by Roy Maxion for "Science of Security"

# 68th Meeting (summer 2015)

**PROPOSAL  
TABLED**

Location: Armação de Búzios - Brasil

Host: Eliane Martins

Dates: after DSN 15

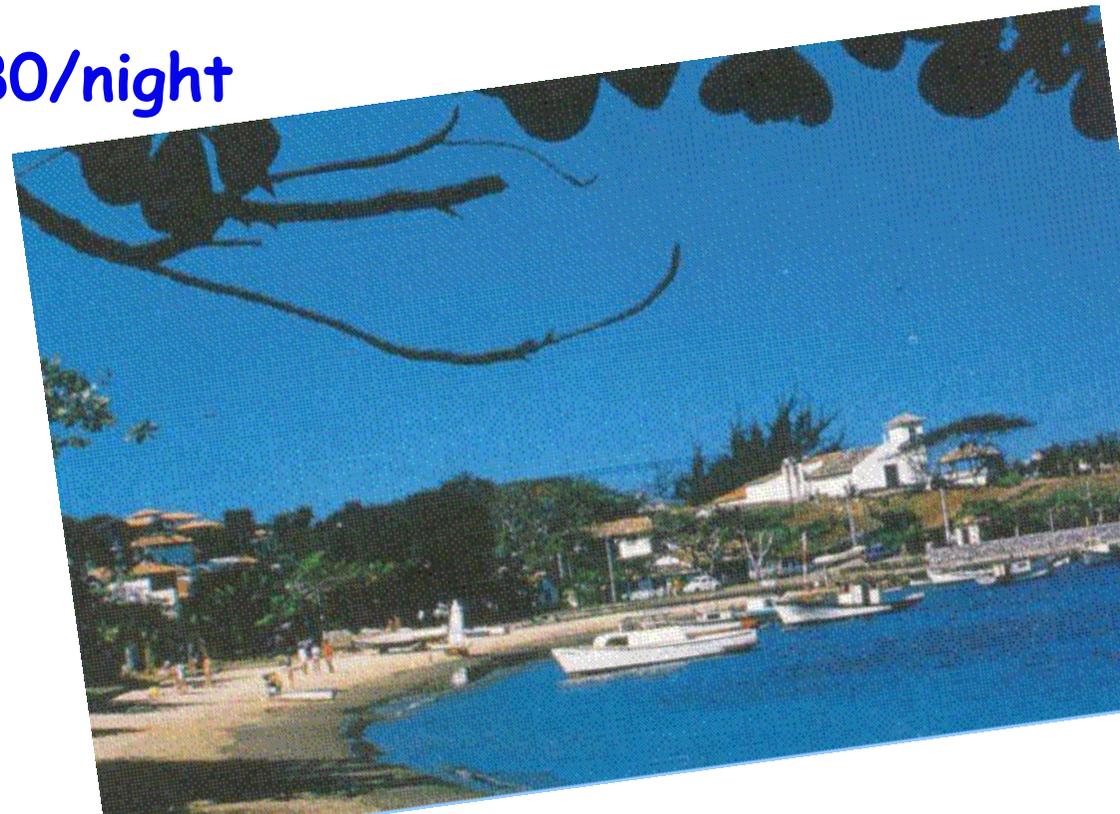
■ Hotels: Hotel Atlântico Búzios

■ Costs: ~ US\$160 -US\$280/night

▪Includes

- TBD

**Workshop ideas TBD**



# Workshops outlook

- Summer 2013 (Visegrad-Hungary)
  - ◆ Research-papers workshop, **DONE**
  
- Winter 2014 (Sorrento-Italy)
  - ◆ Security Assessment: Metrics and Methods, **DONE**
  
- Summer 2014 (Amicalola Falls near-Atlanta-US)
  - ◆ Smart Grids Security and Dependability
  
- Winter 2015 (tbd)
  - ◆ tbd
  
- Summer 2015 (tbd)
  - ◆ tbd

# Major Workshop Topics

distributed computing, parallel computing, real-time systems, certification of dependable systems, specification methods, design diversity, specification and validation of hard dependability requirements, methodologies for experiments, VLSI testing and fault tolerance, hardware- and-software testing and validation, fault tolerance in new architectures, communication networks, algorithms for distributed agreement, cars and computers, accidental vs. intentional faults, robotics and dependability, limits in dependability, avionics and dependability, dependability issues in medical computing, security and dependability, tools for dependable system design and evaluation, railway safety, safety cases, dependability in automotive electronics, computer systems benchmarking with applications to dependability, time and dependability, dependability, survivability, and integrity in e-commerce transactions and infrastructure, dependability benchmarking, utilization of formal methods in dependable systems, challenges and directions for dependable computing, dependability and survivability, middleware for adaptivity and dependability, measuring assurance in cyberspace + hardware design and dependability, open source and dependability, human computer interaction and dependability, autonomic web computing, grid computing and dependability, nomadic computing and dependability, infrastructure security and operational challenges of service provider networks, critical infrastructure protection, achieving and assessing safety, Security Assessment, CPS dependability, Dependability in Cloud Systems,

# Workshop ideas

## (OTHER FUTURE)

- Medical systems (assisted living, health informatics, applied biomedical engineering)
- CPS for automotive, Safety-Security-Dependability vs. Autonomy-Adaptivity-Cooperation
- Autonomous human-machine interaction, cooperative robots
- Socio-technical issues of security research and training (ethics, "ethical hacking", awareness)
- Economics of security and/or dependability
- Foundational research on Dep & Sec
- Other focused topics on CPS (a property, a kind)
  
- Members please consider organizing, also in collaboration with non-member colleagues. Please contact me (PJV)

# IFIP statement on intentional weakening of security and trust mechanisms in ICT and the Internet by government agencies and other major actors (Oct 2013)

- «There is reason to believe that major practical pillars of trust in the Internet are being intentionally weakened in a systematic way at the behest of government organizations and other major actors in the field. »
- «This is endangering and undermining the fabric of the Internet and the Information Society, and contradicts the claim of those actors to be trusted with e.g. sensitive personal information.»
- «Moreover, any deliberately introduced weakening or backdoor is equally exploitable by (ostensibly) legitimate and illegitimate third parties alike.»

# IFIP statement on intentional weakening of security and trust mechanisms in ICT

- Food for discussion and WG positioning:
- The political and social implications
- The technical and scientific implications

# IFIP statement on intentional weakening of security and trust mechanisms in ICT

(IFIP proposed action/discussion points)

- A stop on government-sponsored measures that are intentionally weakening the security mechanism of ICT and internet technologies;
- Open and frank descriptions, explanations, and discussions of current and future weaknesses, e.g. on the steps that have been taken to prevent illegitimate exploitation, and a pause, while the implications of the weaknesses become better understood;
- An open trust infrastructure, that resists domination by major players;
- Transparency of ICT and the related infrastructures and operation procedures, e.g. if the risk calculation employed says that the cost of the increase in fraud is worth the increase in security;
- Implementation of protection mechanisms that users can really control;
- An infrastructure of independent institutions to assess the security and reliability of complex ICT.