NATO
Science for Peace and Security (SPS) Programme

“Opportunities for Collaboration”

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Braga, 23 June 2009
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* **Historical Background,**

* **The SPS Committee & Programme,**
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* **Conclusions.**
* Science for Peace and Security (SPS) is an integral part of PDD composed of:
  • Public Information and Press,
  • SPS Programme.
Historical Background

* Started in the **1950s** based on initiatives from Canada, Norway and Italy, to allow scientist to have a dialogue across the transatlantic,
  - Science Committee in 1958,
  - Committee on Challenges of Modern Society in 1968,

* **End of the Cold War:** New NATO partners including the Russian Federation.
NATO has developed partnerships with non-NATO countries since 1991 to promote security dialogue and cooperation as well as to help often newly independent states build a solid democratic environment and modernize armed forces.
SPS Committee

* Established by North Atlantic Council on 28 June 2006:

* Primary NATO body over a programme for enhancing cooperation with all Partners based on science and innovation,

* Conducts activities aligned with NATO’s Strategic Objectives - especially Partnership,

* Has a ‘horizon-scanning’ role in identifying future threats, raising awareness and finding solutions, organizing “Security Science Forum” every two years.
The Second Security Science Forum on
“Environmental Security”
NATO HQ, Brussels, 12 March 2008

http://www.nato.int/science
SPS Objectives

* Contribute to security, stability and peace among nations through scientific cooperation,

* Promote NATO’s values and image in Partner and MD countries and society at large,
  • Young generation of ‘Leaders of Tomorrow’,

* Provide seed money for seed projects.
* Defence against terrorism:

- CBRN agents (rapid detection, rapid diagnosis of their effects on people, physical protection, decontamination, destruction),
- Novel and rapid methods of detection,
- Medical countermeasures,
- Explosive detection,
- Eco-terrorism countermeasures,
- Computer terrorism countermeasures.
SPS Key Priorities (2/3)

* Countering other threats to security:

- Environmental security,
  (management of water and other non-renewable resources, desertification, land erosion, energy security, maritime security, radioactive waste tailings, sustainable development),

- Defence related environmental security,

- Human and societal dynamics,
  (impact of terrorism on our societies, the assessment and management of risks, security related political science and international relations),
SPS Key Priorities (3/3)

- Forecast and prevention of catastrophes,
- Food security,
- Information security & technology,
- Conducting regional studies including cross-border activities,
- Preventing conflicts in relation to scarcity of resources,
- Non-traditional threats to security,
- Modeling sustainable consumption.

Posted on the SPS website: www.nato.int/science
A Unique Network of Cooperation

NATO Countries (28)
Albania, Belgium, Bulgaria, Canada, Croatia, Czech Republic, Denmark, Estonia, France, Germany, Greece, Hungary, Iceland, Italy, Latvia, Lithuania, Luxembourg, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Turkey, United Kingdom, United States.

Partner Countries (22)
Armenia, Austria, Azerbaijan, Belarus, Bosnia & Herzegovina, Finland, Georgia, Malta, Moldova, Montenegro, Ireland, Kyrgyz Republic, Kazakhstan, Russia, Serbia, Sweden, Switzerland, Tajikistan, the former Yugoslav Republic of Macedonia(*), Turkmenistan, Ukraine, Uzbekistan.

Mediterranean Dialogue Countries (7)
Algeria, Egypt, Israel, Jordan, Mauritania, Morocco, Tunisia.

Total: 57 countries

(*) Turkey recognizes the Republic of Macedonia with its constitutional name.
Cooperation with other International Organisations

* Exchange of information,

* Launch joint activities between SPS and OSCE, UNDP, UNEP, EU, Environment & Security (ENVSEC) Initiative, OCDE (This Conference is an opportunity to establish links),

…
Who can apply?

* **The applicant must be an expert** in the field for which he/she is applying,

* **An application is only eligible if submitted jointly by two persons from:**
  
  - a NATO and a Partner country or
  - a NATO and a Mediterranean Dialogue country.
Advisory Panels (1/2)

* Composed of recognized national experts nominated by the NATO, Partner and Mediterranean Dialogue countries,

* Provide peer-review of applications and proposals,

* Ensure quality and relevance.
* Current Panels:
  - Chemical / Biological / Physics Panel (CBP),
  - Information and Communications Security Panel (ICS),
  - Human & Societal Dynamics Panel (HSD),
  - Environmental Security Panel (ESP).
Grant Mechanisms

* Technical Workshops,  
  - ARWs
  - ANWs

* Training Courses,  
  - ASIs
  - ATCs

* Team Collaborations,  
  - CLGs

* Multi-year Projects,  
  - NIGs
  - SfPPs

* National Funded Activities.
Examples of Nanotechnology Activities under SPS Programme (1/3)

* **On-going Science for Peace Projects:**

- Nanosecond Radiation Pulses for Rapid Explosives Detection and Nuclear Agents (Poland, Russia, & Estonia),

- Development of a Novel Sensing Technique Based on Nanomechanics for Rapid Detection of Bioagents (Italy, Israel, Czech Republic, & Ukraine),

- Development of Nanostructured Multilayer Ceramic Capacitors: A Breakthrough in Miniaturization (USA, Ukraine, & Russia),

- Nanometarials for Photochemical and Photoelectrochemical Purification Processes (Greece, Bulgaria, & UK).
Examples of Nanotechnology Activities under SPS Programme (2/3)

**Upcoming Workshops:**


  http://www.ioffe.ru/natoarw/ (US & Russia)


  http://www.i.com.ua/~ppn (Slovenia & Ukraine)
Examples of Nanotechnology Activities under SPS Programme (3/3)

**Advanced Study Institutes:**


[http://www.natoasi.itu.edu.tr/](http://www.natoasi.itu.edu.tr/) (UK & Ukraine)

**Collaborative Linkage Grants:**


(UK, Ukraine, Czech Republic, Italy, & Hungary)
Examples of Cooperation with other International Organizations (1/3)

ENVSEC Initiative:  
http://www.envsec.org/projects.php

* There are 16 projects are on-going in the Balkans, South Caucasus, Central Asia, and Eastern Europe (11 completed).

* Some examples of topics:
  - Uranium Waste and Tailings Sites in the Ferghana Valley,
  - SEMIREAD- Investigation of the Radiological Situation in the Sarzhal Region of the Semipalatinsk Nuclear Test Site,
  - Study of Radioactive Waste Disposal Sites in Turkmenistan,
  - Integrated water resources management for wetlands restoration in the Aral Sea basin,
  - Assessment and Mitigation of Seismic Risk in Tashkent and Bishkek,
  - South Caucasus Cooperative River River Monitoring.
Examples of Cooperation with other International Organizations (2/3)

Security Advancing a Framework for Enquiry (SAFE) Initiative with European Science Foundation (ESF):

* Models of Security, Sarajevo, Bosnia & Herzegovina, June 2007.
Examples of Cooperation with other International Organizations (3/3)

NATO SPS & OSCE Workshop


Valencia, 10 December 2007
Examples (1/3)

Activities co-organised by NATO Centre of Excellence-Defence Against Terrorism-Turkey

“Training the Trainers of the Amputee Players-Victims of Terrorism”
Ankara, May 2007

“The Media: Vital Ground for Terrorist Operation”
Ankara, June 2006

Key Speaker: Jonathan Charles, BBC
SfP Project

“Destruction of Melange in Azerbaijan & Uzbekistan”
in cooperation with NAMSA
Networking Infrastructure Grants

“Virtual Silk Highway”

Satellite-based Internet access for 9 countries of South Caucasus, Central Asia and Afghanistan

NATO Bucharest Summit video conference with Kabul University, Afghanistan
2-3 April 2008
1st Science Partnership Prize Winners, the “Grand Gathering”, October 2002

Left to right: Dr.K.Gardner, DASG.Sci.&Env.Aff.; Prof.A.Khalatov, Ukraine; Mr.L.Robertson, NATO Sec.Gen.; Prof.A.Kozlov, Russia; Prof.N.Syred, UK; Mr.J.Fournet, ASG.Sci.&Env.Aff.
How to apply?

* Identify a topic which you wish to open to international cooperation,

* Determine the appropriate mechanism,

* Find a qualified collaborator from a Partner or Mediterranean Dialogue country if you are a NATO country scientist, or vice versa,

* Visit the NATO SPS website for downloadable application forms and instructions,

* Complete the application form with your collaborator and submit it.
Dissemination of Information

* SPS website www.nato.int/science is the primary source for applicants and for on-line publications.

* Results of SPS awards are published in books under the NATO Science for Peace and Security Series,
  - Advanced Study Institutes (ASIs),
  - Advanced Research Workshops (ARWs).
Conclusions

* NATO-sponsored civil science cooperation is focused on security and on NATO, Partner and Mediterranean Dialogue (MD) country priorities,

* **Effective tool for connecting nations** through their academic communities,

* Strong impact in Partner and MD countries,
  - Building network, capacity, training of young experts, & regional cooperation.

* Seed money for seed projects,

* **Rapid grant approval / low bureaucracy,**
THANK YOU FOR YOUR ATTENTION!

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