Space Security and Governance - the Role of Space Middle Powers

10th United Nations Workshop on Space Law
Dr Natália Archinard, 6.9.2016
Outline

- Threats to space activities
- Different approaches
- Global space governance (before 2010)
- GGE & ICOC
- Global space governance (after 2015)
- Difficulties & Opportunities
- Space Middle Powers
- Example: Switzerland
- Possible way forward (I & II)
Threats to space activities

- Use of force against space objects and space systems:
  - Ground to space (e.g. kinetic ASAT, lasers)
  - Space to space (e.g. dual use satellites, any manoeuvrable space object)
  - Ground to ground (e.g. attacks on ground stations)
  - Space to ground (in development?)
- Radio frequency interference (intentional and non-intentional)
- Cyber attacks (e.g. on ground stations, in orbit, on signal)
- Space debris (and Near Earth Objects - NEOs)
- Space weather
Different approaches

1° Focus on ARMS CONTROL: preventing the placement of weapons in outer space and the use of force against space objects through a LEGALLY BINDING treaty
   e.g. draft PPWT proposed by Russia and China at the CD

2° Priority on PEACEFUL USES: through NON-LEGALLY BINDING instruments (guidelines, code of conducts, etc.)
   e.g. proposal by EU for an International Code of Conduct

Difficulty: these are silo approaches. Today, there is no clear frontier between civilian and military space activities.
Scheme of global space governance (before 2010)

- UNCOPUOS
- UNOOSA
- UNGA
- CD UNDC
- UNODA
- UNIDIR

Safety & Sustainability

Only Civilian?

Security

Military only here?
Bridge builder n°1: GGE

- Established by UNGA Res 65/68 (2010)
- Group of 15 Governmental Experts (GGE) of both the **space** and the **disarmament** communities
- Presented consensual report to UNGA (ref. A/68/189) (2013)
- Contains **civil and military** TCBMs and defines **criteria**
  - Recommended closer cooperation between UNOOSA and UNODA (and UNIDIR)
  - Joint meeting 1st and 4th Committees at UNGA 70th (2015)

**Status:** implementation started
Bridge builder n°2 : ICOC

- Proposal by the European Union (EU) for an International Code of Conduct (ICOC) for space activities (2012-2015)
- Addresses civil (including commercial) and non-aggressive military activities (common understanding for “peaceful purposes”), but not arms control
- Both process and content were criticized:
  - No UN mandate
  - Lack of transparency and inclusiveness
  - Reference to Art. 51 of UN Charter (self-defence)

Status: project on hold
Scheme of global space governance (after 2015)

**UNCOPUOS** → **UNOOSA**

- **Peaceful purposes** = Civilian and non-aggressive military
- **Security**
- **Safety**
- **Sustainability**

**ICOC?**

**C1+C4**

**UNGSA**

**CD** → **UNDC**

**UNODA** → **UNIDIR**

- **Arms control**

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Difficulties

• Main space-faring nations have different approaches
• Space dominance and military strategies
• Geopolitical non-space related tensions
• History of international initiatives in the last years created some misunderstanding and crispation
• Space security as such and at large is not a subject on the agenda of any single intergovernmental forum with mixed representation (space and international security/disarmament).
Opportunities for further progress

- **UNCOPUOS:**
  - A/RES/70/82, §13: “the Committee should continue to consider the broader perspective of space security”
  - Adoption of 1st set of LTSSA guidelines in 2016 and extension of work until 2018
  - Progress on security-related subjects like NEOs and NPS
  - Process towards UNISPACE+50 in 2018
  - Proposals for Expert group “space objects and events” and for a Unified centre for data exchange

- **UNGA:** Joint panel on space security and sustainability in 2017
- **UNDC:** «outer space» on the agenda for 2017
- Closer collaboration between UNOOSA, UNODA and UNIDIR
Space Middle Powers (*)

Middle Powers satisfying:

- Reliance on space with limited autonomy
- High level of economic resources
- Global diplomatic presence (not only space) and respected opinion on international stage.

They have specific reliance, hence incentive, and the potential to have a strong impact in international discussions on space security.

(*) See "The Realities of Middle Power Space Reliance", by D. Golston with B. Baseley-Walker, UN Institute for Disarmament Research (UNIDIR), with the support of the Swiss government, 2015
Example: Switzerland

- No national space agency
- Strong use of space-based data, services and products
- Member of ESA, Eumetsat, Eutelsat IGO, WMO, ITU, etc.
- Swiss industry and universities participate in almost all ongoing ESA activities and in non-ESA space projects
- Active in international diplomacy in almost all areas including space governance and space security
Food for thought for a possible way forward (part I)

• **Non-traditional space actors** may consider playing a more prominent role in international discussions

• **New approaches** and/or new initiatives

• A first objective could be to **reach common understanding** on basic building blocks required for making progresses, such as for instance:
  - General principles of «good conduct» in outer space
  - Focused effective measures to improve safety and sustainability of space activities (e.g. data exchange)
  - Concrete implementation of (GGE’s) TCBMs
Food for thought for a possible way forward (part II)

• It seems advisable that the work be conducted in a constructive and pragmatic way.
• It seems important that the forum be universal and representative with mixed expertise.
• It seems essential that the process be transparent and inclusive in order to allow for global ownership.
Thank you for your kind attention!

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