Japanese Space Law - Legislation on Space Activities -

Hiroshi KATAOKA Counselor

Cabinet Secretariat
Secretariat of Strategic Headquarters for Space Policy

Overview

- 1. Background
- 2. Outline of the WG Report
- 3. Authorization for Space Activities
- 4. Liability for Third Party's Damage
- 5. Summary

1. Background (1/2)

Basic Space Law

Entered into force in Aug. 2008

Based on the Basic Space law

Strategic Headquarters

Established in Aug. 2008

Formulation of Basic Plan for Space Policy finalized in Jun. 2009

Restructuring of Space related Organizations

Legislation on Space Activities

1. Background (2/2)

Strategic Headquarters for Space Policy

Dr. Yukio Hatoyama

Prime Minister **Director-General**

Mr. Hirofumi Hirano

Chief Cabinet Secretary

Deputy Director-General

Mr. Seiji Maehara

Minister for Space Policy **Deputy Director-General**

* The Headquarters comprises all ministers.

Special Committee on Space Policy

Working Group for

Restructuring of Space Related Organizations

Secretariat of Strategic Headquarters for Space Policy Deputy Secretary-General

Counselor

in charge of general affairs

Counselor

in charge of Basic Plan for Space Policy

Counselor

in charge of review of bodies related to space activities

Counselor

in charge of coordination

Working Group for Legislation on Space Activities



Mr. Toshio Kosuge
Professor,
Digital Hollywood University
Chairperson



Dr. Setsuko Aoki
Professor,
Keio University
Acting Chairperson

2. Outline of the WG Report (1/3)

I. Schedule of the WG for Legislation

1. First meeting (11/19/2008) Major Issues and Schedules

2. Second meeting (1/26/2009) Definition Issues, Registration and Requests from the Industry

3. Third meeting (3/12/2009) Government Authorization and Supervision

4. Fourth meeting (5/25/2009) Liability, Rescue, and Commercialization

5. Fifth meeting (7/6/2009) Drafting of the interim report #1

6. Sixth meeting (8/24/2009) Drafting of the interim report #2



Reported to the Special Committee on Space Policy, and invited comments from the public (Oct. 2009)



Final Report (Mar. 2010)

2. Outline of the WG Report (2/3)

II. Background of the New Legislation

Launching of space objects were solely conducted by JAXA, the activities of which were authorized and supervised by the Ministry of Education, Culture, Sports, Science and Technology (MEXT) (virtually no need for national legislation)



In April 2007, JAXA's H-IIA rockets were transferred to a private company, Mitsubishi Heavy Industry, Ltd. Yet, JAXA is still responsible for the launching of H-IIA, so MEXT supervises it through the JAXA Act and related rules and regulations.

Art.35 of the Basic Space Law requires the legislation of a space activities act to regulate and promote private space activities.

2. Outline of the WG Report (3/3)

III. Purposes of the New Legislation

- Create a legal framework to comply with the international agreements in the era of private space activities (Art. 6 OST)
- Secure compensation for possible victims
- Nurture robust space industry
- Ensure that space activities meet national and international interests

3. Authorization for Space Activities (1/5)

I. Scope of Authorization

- (1) Launch, (2) Procurement of a foreign launch, (3) Reentry
- (4) Satellite operation, (5) Launch & reentry site operation

II. Scope of Application

- In the territory of Japan: all natural persons, corporations, governmental agencies and other legal bodies
- Irrespective of the places: natural persons with Japanese nationality, corporations and other legal bodies founded by Japanese law, as well as Japanese governmental agencies.

3. Authorization for Space Activities (2/5)

III. Criteria of authorization

1. Launch (Reentry) Authorization

- Policy Review
 - Consistency with national and international peace and security
 - Consistency with obligations under international agreements
- Technological & Financial Ability
- Safety Review
 - Launch (Reentry) vehicle & payload
 - Launch facilities (authorized launch site, etc)
 - Safety measures of launch plan (including ground safety and flight safety)
- Debris mitigation requirements
- * Identical conditions apply to the "Procurement of a foreign launch Authorization", with certain exemptions where appropriate review is conducted by the relevant foreign authority.

3. Authorization for Space Activities (3/5)

2. Satellite Operation Authorization

- Policy Review
 - Consistency with national and international peace and security
 - Consistency with obligations under international agreements
- Technological & Financial Ability
- Debris mitigation requirements
- * A Satellite Operator can operate several satellites with one license.

3. Launch & Reentry Site Operation Authorization

- Policy Review
 - Consistency with national and international peace and security
 - Consistency with obligations under international agreements
- Technological & Financial Ability
- Safety Review

3. Authorization for Space Activities (4/5)

IV. Space Debris Mitigation

* Details to be determined taking into consideration the UN Space Debris Mitigation Guidelines and the ITU rules

1. Launch & Procurement of a Foreign Launch

Debris mitigation as a requirement for launch authorization

2. Satellite Operator

• Responsible for the re-orbit of GEO satellites at the end of operation.

3. Efforts for the Future

- Increased international attention towards space debris issues.
- The Government will promote efforts to better cope with space debris issues.

3. Authorization for Space Activities (5/5)

V. Ministry in charge of Space Activities Act (Organization for Authorizing)

To be determined.

("WG for Restructuring of Space Related Organizations" proposed the Cabinet Office be in charge of the legislation on space activities)

4. Liability for Third Party's Damage (1/3)

I. Strict Liability

- Strict liability is applied to space operators for damages on the surface of the Earth or to aircraft in flight. (cf Art. 2 LC)
- Fault liability is applied for damages elsewhere than the above mentioned, including Outer Space.

II. Exclusive Liability of the Launch Provider

Launch (Reentry) Provider is exclusively liable for the Third Party's Damage on the surface of the Earth or to aircraft in flight caused by the launch (reentry) activity, so that other parties concerned (manufacturers and launch users) are exempted from TPL.

4. Liability for Third Party's Damage (2/3)

III. Obligatory TPL Insurance

- Launch (Reentry) Provider will pay for the damage within the limit of TPL insurance coverage required by the Government.
- The Government decides the mandatory amount of TPL insurance in order to secure enough coverage to save the victims, acceptability in the insurance market, etc.

Ref. Current amount of TPL insurance for the launch of H-IIA; 20B Yen
(Approx. US\$ 200M)

IV. Government Indemnification

Government indemnification will be applied when and to the extent of damage not covered by the TPL insurance.

4. Liability for Third Party's Damage (3/3)

 Liability for Third Party's Damage on the surface of the Earth or to aircraft in flight caused by the launch (reentry)

Government indemnification Measures Government The government indemnifies claims against a Launch (Reentry) Provider for damage not covered by the compensation measurement below Required amount of Compensation Measuremer · damage or loss caused Obtain Third Party Liability insurance Ref. 20B Yen (Approx.) Amount of Liability by fragments US\$200M) for H-IIA (civil contract) or Deposit to the of the upper based on JAXA Act. stage rocket government after the pavload · War, Civil separated into War or nominal orbit Insurrection • (for) death, bodily injury, or property damage or etc. loss to third party on the surface of the Earth or to aircraft in flight resulting from a launch (reentry) of Anomalously huge natural a space object disaster Scope where ▶ -Scope where Launch (Reentry) Provider is liable no one is liable Launch (Reentry) Provider Relief • Measures to prevent further Claims payment damage

Third Party Victim

5. Summary (1/2)

- Based on the WG Report as well as information gathered from a commissioned study on legislation in foreign countries, <u>Japanese Government is developing new legislation</u> that authorizes and supervises space activities in Japan or by Japanese nationals.
- Strict and exclusive liability applied to the Launch (Reentry) Provider for the third party's damage on the surface of the Earth caused by the launch (reentry) activity.
- Launch (Reentry) Provider must obtain TPL insurance, and the Government will pay for damages exceeding required insurance.

5. Summary (2/2)

(Future tasks)

- Legislation to promote a robust space industry.
- Further development of safety standards for <u>human space</u> <u>flight, air launch or sea launch</u> licensing.

Thank you for your attention!