

## **ICG WORKING GROUP A**

# Compatibility and Interoperability of Global and Regional Navigation Satellite Systems and Satellite-based Augmentations

# **ICG-8 Meeting**

# Dubai, UAE 9 – 14 November 2013 AGENDA

Monday-Wednesday, 11-13 November, 2013

# Monday, 11 November

#### 1115-1130

- 1) WG-A Co-chairs Opening Remarks
- 2) Approval of the Agenda

# 1130-1300 - Session 1: GNSS Updates

- 1) System Provider Updates additional information\*
  - China
  - EU/ESA
  - India
  - Japan
  - Russia
  - U.S.

#### 1300 - Lunch

<sup>\*</sup> Note: This is an opportunity for group discussion on any information relevant to WG-A that requires clarification or elaboration based on the system provider updates presented in the plenary session on Sunday, 10 November.

# 1400-1600 - Session 2: GNSS Compatibility

1) PRESENTATION: Signal Anomalies Monitoring

Valery Tyubalin (Russia)

2) PRESENTATION: Suggestions on the list of parameters to be included in the Civil Service System Performance Document.

Alexey BOLKUNOV (Russia)

3) PRESENTATION: Key Technology Research on GNSS Open Service Performance Standard

Jianwen LI (China)

4) Report of the Compatibility Sub-group

Takahiro MITOME, Dominic HAYES

5) Conclusions, Actions, and Recommendation from the Intersessional Meeting

Sergey REVNIVYKH, David TURNER
Takahiro MITOME, Dominic HAYES

#### Approval of proposed Recommendation 8A.2.1 - IMT-GNSS Compatibility

ICG members are encouraged to actively participate in the ITU-R and regional WRC-15 preparatory work on new IMT spectrum allocations (including JTG 4-5-6-7 until August 2014), to ensure that proposals do not impact existing and future GNSS operations. Members may also consider forming links with other satellite groups already defending satellite spectrum.

# Approval of proposed **Recommendation 8A.2.2 - Providers Update to Current and Future System**

System Providers should provide updated information regarding global and regional navigation satellite systems and augmentations in time for the publication of a new edition of the Providers Forum's Current and Planned Global and Regional Navigation Satellite Systems and Satellite-Based Augmentation Systems before ICG-10. The updated information should include observed or expected open service performance.

### 1600-1620 - Coffee Break

# 1620-1800 — Joint Session 4 with WG-B & D: Open Service Information Sharing and Service Performance Monitoring (International GNSS Monitoring and Assessment)

1) PRESENTATION: Suggestions on the International GNSS Monitoring and Assessment System based on Russian Experience

Oleg DENISSENKO (Russia)

2) PRESENTATION: iGMAS Progress

Xurong DONG (China)

- 3) Report of the Sub-group on International GNSS Monitoring and Assessment Satoshi KOGURE, Xurong DONG, Ruth Neilan
- 4) Sub-group and Working Group Discussion

# **Tuesday, 12 November**

# 0900-1100 — Session 3: Spectrum Protection - Interference Detection, and Mitigation (IDM)

- 1) PRESENTATION: Report on Outcomes of the Second IDM Workshop (April 2013)

  \*\*Jeffrey AUERBACH (USA)\*\*
- 2) PRESENTATION: Draft of Education Material on the GNSS signal features

  EC Presenter (TBD)
- 3) PRESENTATION: Overview of the International IDM System Concept

  Stanislav KIZIMA (Russia)
- 4) PRESENTATION: U.S. Activities in response to 2<sup>nd</sup> IDM Workshop

  \*\*Rick HAMILTON (USA)\*\*

- 5) PRESENTATION: Proposal on GNSS Interference Detection and Report Template

  Weimin ZHEN (China)
- 6) Actions, and Recommendation from the Intersessional Meeting

  Sergev REVNIVYKH, David TURNER

# Approval of proposed **Recommendation 8A.3.1 - Education & Outreach Regarding Sources of GNSS Interference**

The ICG should develop educational material such as a downloadable pamphlet or other web content on sources of interference to GNSS. The material should include an explanation why radio navigation satellite services (RNSS) are different than radio communications services and more vulnerable to interference, and will emphasize the importance of GNSS services to critical public and private sector functions, infrastructure, and economic activity.

# Approval of proposed **Recommendation 8A.3.2 - GNSS Interference Detection Reporting Procedures**

Working Group A should form a Task Force on GNSS Interference Detection reporting procedures and system development

- Initially, the task force will focus on developing a common set of information to be reported to GNSS civil service centers
- Next, the task force will focus on establishing routine communications among the centers
- Finally the task force will develop guidelines for common capabilities to be considered in the development of future national IDM networks

#### 1100-1120 - Coffee Break

# 1120-1300 - Session 5: GNSS Interoperability

1) PRESENTATION: U.S. Outcomes and Views of the Interoperability Workshop (April 2013)

Jeffrey Auerbach (USA)

2) PRESENTATION: Russian Industry Views of the Outcomes of the Interoperability Workshop (April 2013)

Sergey SILIN (Russia)

3) PRESENTATION: Broadcast of System Time Scales Offsets within Navigation Message. Assessment of Feasibility

Arcady Tyulyakov, Andry Druzhin (Russia)

4) PRESENTATION: The positioning accuracy influenced by interoperability space-time parameter

Xiaochun LU (China)

5) Actions, and Recommendation from the Intersessional Meeting

Sergey REVNIVYKH, David TURNER

### Approval of proposed Recommendation 8A.5.1 - Interoperability Task Force

Consistent with the principle of interoperability and its definition, and the implementation of previous ICG recommendations related to interoperability, Working Group A should form a task force to complete efforts to collect and analyze user community and industry views on interoperability

- The task force will analyze the results of the April 2013 interoperability workshop and adjust the questions for industry accordingly, in preparation for additional workshops to be hosted by each system provider
- The results of each workshop will be consolidated and analyzed by the Task Force in preparation for the 2014 intersessional meeting of Working Group A and ICG-9

# Wednesday, 13 November

#### **0900-1100 – Session 6: Conclusion**

- 1) Any unfinished business from previous sessions
- 2) Final review of recommendations and WG-A Plenary Presentation
- 3) Possible time and location for intersessional meeting
- 4) Closing remarks

5) Adjourn