

Gentlemen

Thank you for reminding me of my commitment to report on these meetings. I am chagrined I have been lax, and encourage you to continue to remind me in the future.

December 6 & 7, 2023 in Houston, Texas

The meeting was preceded by a visit to the local U.S. Coast Guard command to understand the scope of operations and how GPS and PNT was used in each area. Of particular interest was the many and varied ways it was essential to vessel traffic management and safety in one of the world's busiest ports. Navigation and communication need in the Gulf of Mexico with its 3,500+ oil and gas platforms and rich fisheries was also discussed. The group also visited the Johnson Space Center and heard about various aspects of NASA's projects including the need for cis-lunar navigation.

A reception sponsored by the Resilient Navigation and Timing Foundation the evening of 5 December celebrated the 50th anniversary of GPS' approval as a program. The event included the Editor-in-Chief of GPS World, Matteo Luccio, interviewing DR Brad Parkinson the GPS program's first chief architect. An article about and video of that interview is available here: <https://www.gpsworld.com/celebrating-50-years-of-gps-an-evening-with-the-father-of-gps/>

The board's public meetings on the 6th and 7th included updates on several projects, reports from government, interesting and informative presentations. Several discussions concerned ways to advance the board's proposal for an internet-based High Accuracy and Resilience Service for GPS. Another presentation discussed the many on-going efforts to establish PNT service from satellite constellations in Low Earth Orbit.

Video of the proceedings and many of the slides presented are available here: <https://www.gps.gov/governance/advisory/meetings/2023-12/>

April 24 & 25, 2024 in Colorado Springs, Colorado

Many members of the board arrived early and participated in a visit to Schriever, U.S. Space Force Base from where the GPS constellation is monitored and controlled. Included were very interesting briefings/ discussions about the constellation, detection and responses to interference events, and the progress of system modernization projects. Some members also visited the installation at Cheyenne Mountain.

The evening before the board's public meeting, GEN David Thompson, who recently retired as the first Vice Chief of Space Operations for US Space Force, spoke at a reception hosted by the Resilient Navigation and Timing Foundation. He offered his perspectives on GPS and PNT saying that relying on one source of PNT was a bad idea. "We need multi-nav," he said. Video of his talk is available here: <https://rntfnd.org/2024/04/26/we-need-multi-nav-gen-david-thompson-us-space-force-ret-at-rnt-foundation/>

The board's public meeting focused on its themes of Protect, Toughen, and Augment. Included were lively discussions about accelerating setting L-5 healthy, and the current Federal Communications Commission rule that GNSS providers must get permission before their systems may be used in the U.S. There was also lively discussion about the methodology used and some draft findings by a small group of board members who had examined terrestrial PNT systems.

Several recommendations and refinements to previous recommendations to government were proposed. The specific language of each has yet to be finalized.

Video of the proceedings and many of the slides presented are available here: <https://www.gps.gov/governance/advisory/meetings/2024-04/>

Hope that scratches the itch! Please let me know if you need more.

Very best regards,

Dana

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