Questions/Answers of the Federal Aviation Administration (FAA) System Wide Information Management (SWIM) Industry Collaboration Workshop and SWIM Industry-FAA Team (SWIFT) Meeting #15

August 19th, 2021

Zoom Conferencing System Virtual Event

- 1.1. NAS Producer Programs: Common Support Service Weather (CSS-Wx) & NextGen Weather Processor (NWP) Updates Audience Questions & Answers:
 - 1.1.1. *Is CSS-Wx leveraging Elroy?*
 - 1.1.1.1. CSS-Wx & NWP Team: Currently, the CSS-Wx and NWP vendors are using Agile development methodologies and using organic tools in support of that process. These programs are not currently using the Elroy platform or processes, at this time.
 - 1.1.2. How does this connect? Point to point??
 - 1.1.2.1. CSS-Wx & NWP Team: Providing data will publish data to SWIM through the NAS Enterprise Security Gateway. Data will be made available to those user with access to SWIM via cloud as well. This will support cloud-to-cloud exchange, which may be of interest to users, using ESCS (Enhanced SWIM Cloud) update coming in future SWIFT. Point-to-point will be an option.
 - 1.1.3. Will these weather services be able to provide the TAF and METAR information which some airlines get from third party service provider companies (these companies charge for these services)?
 - 1.1.3.1. CSS-Wx & NWP Team: FAA will receive TAFs & METARS using xml based data. There are discussions on whether the FAA should provide that, or whether to direct community to NWS as the authoritative source for that data vs being a distributor of that data. We will work with the program to track this and report back to the community.
 - 1.1.4. *Is there a bandwidth estimate for NESG connection?*
 - 1.1.4.1. CSS-Wx & NWP Team: Every product has a size and frequency, which drives bandwidth requirement. The program will publish information on size estimate via a catalog of services, allowing users to determine estimate requirements and ability to plan, accordingly.
 - 1.1.5. Particularly interested in the imagery data (thinking map tiles). Will that data be accessible from a web-friendly mechanism (e.g. HTTP API) instead of SCDS as noted on the slide?
 - 1.1.5.1. CSS-Wx & NWP Team: Data will be available in various formats and given ESCS capabilities, there will be accessible to users in varying methods. WMS & WMTS come to mind. Web mapping services and web mapping tile service will also be available.
 - 1.1.6. *Is Water Vapor Imagery going to be considered?*
 - 1.1.6.1. CSS-Wx & NWP Team: Not at this time, just infrared, similar to the current Corridor Integrated Weather Service (CIWS).
 - 1.1.7. Will there be any training/user guides to TMUs/FLMs and others with access to the toolset?
 - 1.1.7.1. CSS-Wx & NWP Team: Yes, there will be a manual for AWD. And training for people to go to sites and for users on site: going through different scenarios. There will be an ELMS course on online and then people on site for in-person training for AWD.
- 2. Weather Information Services Update Integrated Terminal Weather Services (ITWS)

- 2.1. If you are taking in this data similar to the other systems, why are there two systems?
 - 2.1.1. ITWS Team: ITWS is an early provider of the data and will be subsumed by the future systems (I.e., CSS-Wx and NWP).
 - 2.1.2. XML data can be too bulky if data transfer rate is a bottleneck. Has alternative formats such as json been considered?
 - 2.1.2.1. ITWS Team: Currently available via XML; future considerations for JSON. Gridded products and Alert products are provided separately, which help reduce bottleneck.

3. SWIM Flight Data Publication Service (SFDPS) Operational Context Document Review

- 3.1. Is Airspace Information now available in AIXM5 as a SWIM service? I searched the FAA SWIM Registry, and I did not find this service.
 - 3.1.1. Xavier Pratt LS Technologies: That may be part of October update. We will find out and follow up with you.

4. NAS Common Reference (NCR)

- 4.1. How does NCR handle the TFMData restriction messages, that can sometimes be very cryptic in their impact?
 - 4.1.1.NCR Team: Business rules in the NCR evaluate each message type and process them individually, tailored with layers and iterative, for processing the data.
 - 4.1.2. *How far back in time does the NCR constraint data go?*
 - 4.1.2.1. NCR Team: Current and future...looking at the historical data will be part of the planned demo coming up shortly.
 - 4.1.3. Can you give an example use case for a histogram of term frequency?
 - 4.1.3.1. NCR Team: If you get a lot of NOTAMS, for example, do you have to sift through 145 NOTAMS. By using keywords (and the demo enables that) allows use to search from the histogram for prioritization.
 - 4.1.4.By Ops, do you mean SCDS? Or through NESG?
 - 4.1.4.1. NCR Team: Internal FAA OPS, and will eventually be distributed by NESG in the first half of next year, which will be capable of supporting web services. SCDS is currently not planned to support web services; however, there is currently efforts to determine feasibility of including web services support through the Enhanced SWIM Cloud Service (ESCS). We will provide an update in a near future SWIFT meeting.