NATCA Safety & Tech Update
Week of November 7, 2016

Airport Capacity Decision Support Tool (ADEST): Kristen Laubach represents the membership as the Article 114 Representative for ADEST. Her report is below.

Airport Capacity Decision Support Tool (ADEST) experienced a bit of a setback this month. Some operational issues arose resulting in malfunctions in both the development and staging phases. Currently the program has been down for the past three weeks and we are patiently waiting for the program to get back up and running.

CAMERAS: Mike Foote (LAX) leads NATCA's work on the Camera Working Group. This group discusses the use of cameras on the airport surface and also provides guidance for the Agency. Mr. Foote's update for this week is below.

There has still been no official contact or movement on anything to do with cameras. The agency has said the non-remote tower camera use is on hold pending the outcome of the virtual/remote tower testing. Having said that, I just spent the week at AFTIL and saw on their white board a list of towers that AFTIL had scheduled for what they called a "quick look". The list included much of the core 30 airports.

A gentleman named Rudi Harmon from AJW C243 explained to me that these airports have had construction projects that have blocked some line of sight on the airfield.   These quick looks were designed to look <u>back </u>and determine the impacts and possible mitigations.   "Mitigations" for line of sight normally starts with cameras in my experience. Doesn't always get there, but normally.

I told Rudi about our camera workgroup and the DCPs for both the 7110.65 and the .3.   I also mentioned the SRM D we completed had identified as a hazard the fact that the FAA was about to create a "camera policy" would certainly lead to the proliferation of cameras in the NAS and then exponentially increase the safety hazard we intended to keep to small localized areas on airports. Our solution was to not allow cameras to be used as long-term solutions on large portions of the airport.   This was reflected in our DCPs.

I was told that the remote/virtual camera applications seemed to have steam behind them, but the more localized camera as line of sight mitigations was not moving. He identified the same issue Dale and I had a few years back. That being the agency only has a 7460 process to deal with these issues and between an airports (LAX, JFK etc.) obvious desire to build what they have proposed and how the Airports division operates, it is insufficient to prevent this on going and ever increasing hazard.

It does appear that cameras will continue to proliferate in the NAS minus an actual program and rules. Just by inertia. In many cases they will not use cameras and deal with loss of line of sight with restrictions the airport and users may not like. Air Traffic managers and Facility reps don't have the tools to stop, or in many cases ensure the players fully understand we do not have a camera program in the NAS and the restrictions they may get could be hard on all involved. My fear is unless something changes in this 7460-approval process and the FAA finally formalizes our agreed to DCPs, this hazard is only going to grow.

NextGen Distance Measuring Equipment (NG DME) Program: Samed Rizvi (PCT) is the NG DME National Representative. Mr. Rizvi forwarded the information below for the membership.

NextGen DME intends on providing a backup to GNSS. Currently, 70% of the air carrier fleet is equipped with IRU (Inertial Navigation Unit) and DME, which allows those aircraft to fly RNAV routes during a GNSS interruption. The other 30% of the fleet reverts to conventional routing in this situation. NextGen DME intends on enhancing DME coverage to provide RNAV coverage for non-IRU equipped aircraft during GNSS interruptions.

Implementation will require the installation, upgrading, and removal or various DME sites across the country. By the end of the year, MITRE will be providing a report on operational procedure impacts due to the discontinuation of certain DME's. Once this report is reviewed, we will have a better understanding of any impacts on the controller workforce and individual facilities.

- Phrase 1 of implementation is proposed to take place from 2017-2021. Phase 1 intends on installing 90 new DME's, replace 50 due to capacity, and discontinue 67 that are not required for coverage.

- MITRE will be providing a preliminary analysis on operational procedure impact due to the discontinuation of 135 DME's by December 3, 2016.

- The NextGen DME team is exploring Canadian border DME sites and DME sites listed as "non-public use" as part of the total solution.

- The team is working on a site survey strategy. The strategy will:
  - Define Site Survey Requirements
  - Identify Categories of Sites
  - Determine Sample Site Survey Target Numbers
  - Determine Available Service Area Resources
  - Document Strategy in Implementation Plan

RNAV and PERFORMANCE BASED NAVIGATION (PBN): Bennie Hutto (PCT) is the Article 114 Representative for RNAV and PBN criteria work. Mr. Hutto's report for the membership is below**.**

RNAV ATS Routes
We are still in the process of working with AJV-14 and AFS-400 regarding the "Lateral Protected Airspace Criteria for RNAV ATS Routes", which we hope will lead to change in criteria and reduction in the basic width of an RNAV route.

Pilot Controller Procedures & Systems Integration (PCPSI)
Our next meeting is scheduled for November 8th-10th in Henderson, NV, in which Andy Marsovari, NATCA Procedures Rep will be attending, as I will be in Montreal for the ICAO PBN Study WG meeting. Items that will be discussed or presented is as follows:

- Obstacle Departure Procedures Issues
- Speed Guidance AIM Examples - Rich Boll (NBAA)
- Data Comm Program Update and Operational Considerations
- Inclusion of Minimum Safe Altitude (MSA) Information on SIDs & STARs - Ted Thompson – (Jeppesen) - ACF (IPG) Agenda Item 16-02-310
- Visual Approach Issues
- Departure Clearance (Climb Via DCP) SRM Report
- Canada CV/DV Phraseology Implementation Briefing & Work Shop - US Bulletins and Briefing Material for Canada implementation
- Runway Transition Guidance - Review final DCP
- TCAS Phraseology Guidance
- Reference to Class B Airspace & Visual Clearances / Visual Flight Procedures
- Increasing Complexity of Speed Restriction Notes on SIDs & STARs - Ted Thompson – Jeppesen - ACF (IPG) Agenda Item 16-02-328 - Update from ACF meeting
- Briefing Strips for STARs & SIDs – Report Findings - Kathy Abbott – FAA
- Overview of Jeppesen's New SID / STAR To-Scale Charting Enhancements - Ted Thompson – Jeppesen

NextGen Integration Work group (NIWG) PBN

We held our last meeting on September 19, 2016, and discussed how we should move forward regarding Established on RNP (EoR). At this time, we continue to work on the safety analysis for EoRs, but nothing has been finalized. The NIWG has recommended sites for Radius to Fix (RF) and Track to Fix (TF) for independent and dependent operations as follows:

- Independent Operations using RF for trips and duals - DEN, IAH and BNA for trips and duals.
- Dependent Operations using RF for duals only - SEA, DAL, and PDX.
- Independent Operations using TF for trips and duals - ATL, CLT, DFW.
- Dependent Operations using TF for duals only – PHL.

Established on Departure Operations (EDO)

The HITL schedule has been agreed upon and all Subject Matter Experts (SMEs) have been selected. The HITL schedule will be as follows:

- **Dry Run:** November 7 - 10, 2016 (ZTL and A80)
  Group 1: November 28 – Dec 2, 2016 – Facilities other than A80 and ZTL with similar traffic complexity
- **Group 2**: December 5 – 9, 2016 – A80 and ZTL
  Group 3: December 12 – 16, 2016 – A80 and ZTL

National Strategic Production Planning (NSPP)

We meet every Tuesday and discuss the procedures that are scheduled for implementation across the country and have no issues to report at this time.

Digital Approach Procedure Initiative

We are still working on Phase 2 of this initiative where the primary approach that would be advertised on the ATIS when weather conditions are below Visual Approach minimums would be the RNAV (GPS) at those facilities where the majority of aircraft can fly this type of procedure and RNAV (RNP) approaches at locations where the majority of aircraft can fly this type of procedure. The facilities that have agreed to participate are PHL, SJC, SMF, and NCT. We traveled to PHL on October 25th and met with NATCA and Management to brief them on what the program was about to ensure they understood and could participate. Everyone was in agreement and the start date will be December 19th and will last for 120 days. Additionally, we will meet with NCT and SMF on November 15th and SJC on November 16th.

Performance Based Operations Rulemaking Committee (PARC) Navigation (NAV) WG

We met in Atlanta on October 19th and 20th where we discussed the follow:

- ATC Climb Gradients
- Precipitous Terrain
- RF Display Action Team

UNMANNED AIRCRAFT SYSTEMS (UAS): Steve Weidner (ZMP) is the NATCA Article 114 Representative for UAS. Jeff Richards (ZAU) is assisting Mr. Weidner on this project due to the workload and activity associated with it. Below is the update for the membership.

Small UAS Rule/Part 107

The agency continues the implementation of the small UAS rule that went into effect on August 29th. The agency is phasing in operations for Class B, C, D and E Surface areas. As of October 31st, authorizations were being granted for Class C, D and E surface areas. The agency is still on track to begin approvals for Class B airspace on December 5th. As a reminder, all authorizations are to be requested through headquarters via the [faa.gov/uas](faa.gov/uas) website. No approvals are to be made at the local level.

The agency continues to conduct weekly telcon/webinars that are available for all employees to answer questions about the new rule and its implementation. The calls occur at 1pm Eastern Time and are repeated weekly on Wednesdays and will continue through December 21st. Mr. Weidner and Mr. Richards will be participating in these calls. Here is the link to register for these Webinar's: https://attendee.gotowebinar.com/register/3378736936558080770. Additionally, Mr. Weidner and Mr. Richards can be reach for questions on the small rule at Part107@natca.net.

The Future of small UAS Approval Process

The authorization process described in the above section is time consuming and labor intensive. Given the volume of requests expected, manually approving each request will not be feasible. Therefore, the Agency issued a Request For Information (RFI) several weeks ago regarding the development of an automated UAS Notification and Authorization (N&A) systems.

The RFI will NOT be leading to a Request For Proposals (RFP), which would mean the FAA is going to award a contract for the design and implementation of an N&A system. Rather, the Agency wants to meet with industry partners with the capability of developing such a system to develop a common data-sharing program. The Agency received great interest in the RFI and Mr. Weidner and Mr. Richards have been working with the agency to define the requirements for an approval system. The process for reviewing the RFI's is now complete and the Agency will begin to schedule in-person meetings/demos with the RFI respondents who demonstrated knowledge and ability to create an N&A system.

UAS Safety Team (UAST)

The FAA has sponsored the creation of a UAS Safety Team to work issues with UAS safety as integration occurs. The UAST is being modeled after the Commercial Aviation Safety Team (CAST) and the General Aviation Joint

Steering Committee (GAJSC). Both of these committees have an established track record of improving the safety record of their respective aviation communities. It is the goal of the Agency that by establishing the UAST, which is co-chaired by and Agency and Industry representative, UAS integration can occur with the greatest level of safety possible.

The first meeting of the UAST was held in Washington DC on October 18-19. Mr. Weidner attended the UAST meeting on behalf of NATCA. The majority of this first meeting was spent on background and establishing a structure and order.