



Friends and Partners in Aviation Weather

Agenda for the Fall 2019 FPAW Meeting

23-24 October 2019

Room N259

Location: NBAA Business Aviation Convention and Exhibition (BACE), Las Vegas Convention Center, Room N259, 3150 Paradise Rd, Las Vegas, NV 89109

Wednesday, 23 October 2019

08:00 – 12:00 Planning of Upcoming FPAW Meetings

Leads: Matt Fronzak (MITRE) and Dr. Matthias Steiner (NCAR)

We will identify topics and session leads for the Spring 2020 FPAW Meeting in Washington, DC. We will discuss potential topics applicable to the Fall 2020 FPAW Meeting. In any remaining time, we will talk about a topic near and dear to all our hearts, namely the evolution and future of FPAW.

13:00 – 13:10 Welcome

Matt Fronzak (MITRE) and Dr. Matthias Steiner (NCAR)

13:10 – 13:20 Keynote Comments

Steve Brown (NBAA)

13:20 – 17:00 Weather Information from the Flight Deck

Leads: Steve Darr (Dynamic Aerospace), Gary Pokodner (FAA) and John Steventon (FAA)

This session will be focused on the flow of weather information from the flight deck, ranging from automated sensor-based observations to EFB-augmented and pilot-reported observations (PIREPS). An FPAW position on the question of ADS-Wx equipage will be sought and, if consensus is achieved, communicated to the joint RTCA/EUROCAE Combined Surveillance Committee (CSC). The status of efforts to improve the collection of weather from the flight deck and the benefits of such efforts will be discussed by presenters, panelists and the audience. An examination of revised FAA guidance including Flight Standards Weather Policy and the newly published FAA Weather Handbook will take place. Finally, PIREPs will be looked at from multiple perspectives, in anticipation of a PIREP Summit early in 2020.

13:20 - 14:20 Part 1: Automated Weather from the Flight Deck: ADS-Wx

Steve Darr (Dynamic Aerospace), Dr. Terra Ladwig (NOAA ESRL), Matt Fronzak (MITRE), Dr. Matthias Steiner (NCAR)

14:35 -15:35 Part 2: Semi-Automated Weather from the Flight Deck and An FAA Weather Policy and Handbook Update

John Steventon (FAA), Bruce Landsberg (NTSB), Walter Combs (FAA)

15:50 - 16:50 Part 3: PIREPs: Precursor to a Summit

Gary Pokodner (FAA), John Steventon (FAA), Tom George (AOPA), Caesar Matos (ALPA),
Andy McClure (FAA)

Thursday, 24 October 2019

08:00 – 08:30 FPAW Update

Leads: Matt Fronzak (MITRE) and Dr. Matthias Steiner (NCAR)

The FPAW Co-Chairs will provide an update on the status of FPAW communications and discuss other organizational and administrative questions.

08:30 – 12:00 Convective Weather Information: What’s Available and How Users See and Interpret It

Leads: John Kosak (NBAA)

Presenters, panelists and audience members in this session will explore the universe of convective weather products available to non-meteorologist end users such as pilots, flight attendants, dispatchers and air traffic controllers, how to best navigate this tricky landscape, and what to look forward to in the coming years. Included will be a short presentation from the FAA’s Weather Information Mitigation and Transition (WIMAT) team to talk about all the different convective forecast products that the FAA currently produces, why they think they are or are not necessary, and what the WIMAT team thinks we need or don’t need going forward. Finally, panelists and audience members will discuss the differences in how all the parties “see” thunderstorms through the various product and sensor displays, and how minor differences in the way a storm is viewed can lead to major decision-making disconnects. We hope to have a short discussion of how radar works and why that is important. If we have pilots, dispatchers and controllers all looking at something different, what are the impacts to the safety and efficiency of the NAS?

08:30 - 10:00 Part 1: Convective Forecast Products

Kevin Johnston (FAA), Jack May (AvMet Applications), John Kosak (NBAA), Dr. Terra Ladwig (NOAA ESRL)

10:30 - 12:00 Part 2: The Challenges of Differing Views of Convective Weather

John Kosak (NBAA), Dr. David Strahle, Eric Avila (NATCA)

13:00 – 17:00 Weather for Emerging Modes of Transportation

Leads: Rex Alexander (Vertical Flight Society), Joel Siegel (Booz Allen Hamilton), Dr. Matthias Steiner (NCAR)

This session will discuss the weather support needs of future entrants such as Urban Air Mobility (UAM) and Unmanned Aerial Systems (UAS) into the National Airspace System. These smaller vehicles, with different flight capabilities such as electric vertical takeoff and landing (eVTOL), are more susceptible to weather impacts such as icing and

turbulence and therefore require higher resolution forecasting. Presenters, panelists and the audience will discuss potential challenges with microscale weather forecasts, and how these forecasts will impact Unmanned Traffic Management (UTM) and Beyond Visual Line of Site (BVLOS) operations.

13:00 - 14:15 Part 1: Requirements and Challenges

Rex Alexander (Vertical Flight Society), Dr. Joseph Rios (NASA), Marilyn Pearson (FAA)

14:30 - 15:45 Part 2: Weather Forecasting

Joel Siegel (Booz Allen Hamilton), Dr. Matthias Steiner (NCAR), Stephanie Avey (NWS AWC), Don Berchoff (TruWeather)

16:00 - 17:00 Part 3: Weather and Automation

Dr. Matthias Steiner (NCAR), Kevin Kronfeld (Collins Aerospace), Marilyn Pearson (FAA), Joel Siegel (Booz Allen Hamilton)