U.S. Department
of Transportation

Federal Aviation
Administration

Air Traffic Bulletin

Issue # 2006-2
June 2006

A Communication from the
Vice President, System Operations Services

In this Issue:

Airbus A380

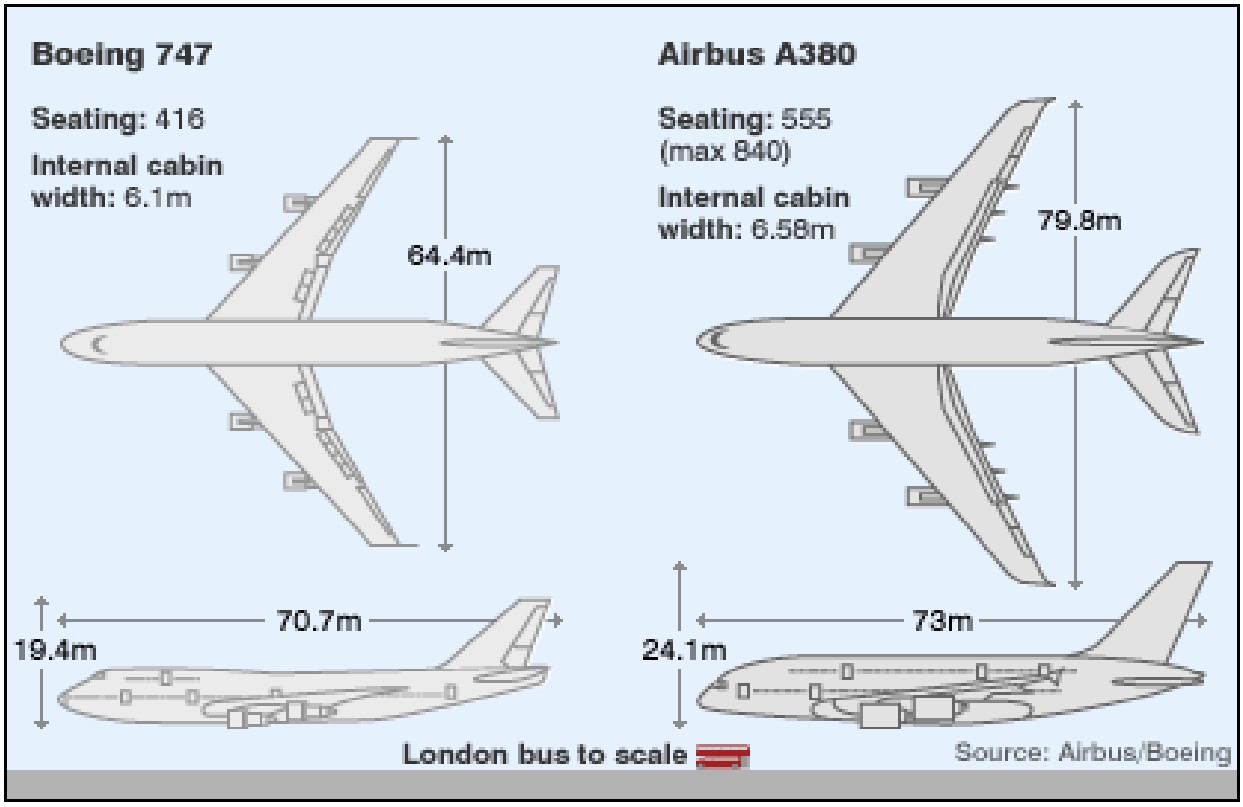
/TERF/ The Airbus A380-800 was officially launched on January 20, 2005. It successfully made its maiden flight from Toulouse, France, on April 27, 2005. The first four A380s will be used in the flight test certification program, which includes 2,200 hours of flight time. To date, Airbus has received 132 confirmed A380-800 passenger orders, 27 A380-800F freighter orders, and options for 60 more aircraft from 16 current customers. They expect to sell 700-750 aircraft by 2020. Federal Aviation Administration Flight Standards (ANM-100) is tentatively planning to certify the A380-800 for entry into the United States in September 2006.

The A380-800 weighs approximately 1.3 million pounds and will be capable of carrying up to 840 passengers in single-class economy seating. It will cruise at 0.85 mach at 43,000 feet with a range of 9,400 nautical miles.

The A380-800 is one third larger and heavier than the current generation of B747-400 heavy jet aircraft. Because of its size, it is the first commercial aircraft to fall into the more restrictive Airplane Design Group VI category which limits its operational use to airports with 200-foot wide runways and 100-foot wide taxiways. Airbus has requested FAA Modification of Standard waivers to these requirements. The figure on the next page shows a comparison of the B747-400 to the A380-800.

Singapore Airlines is the first passenger launch customer for the A380-800. It expects to operate the A380 between Europe, Asia, and the United States beginning in 2007. San Francisco, Los Angeles, and John F. Kennedy International Airports are scheduled to receive A380 service. No U.S.-flag air carrier to date has purchased, ordered, or optioned the passenger version of the A380-800. However, the freighter configuration (A380-800F) is being purchased by the Federal Express Corporation and the United Parcel Service Company and is scheduled to enter service in 2008. The freighter will be capable of carrying 150 tons of cargo over 5,600 nautical miles; it will weigh approximately 1.7 million pounds when loaded and will operate from the Memphis and Ted Stevens Anchorage International Airports. **(AJT-1)**

Distribution: ZAT-423, ZAT-464



Airspace Flow Program

Overview

/*TERF/ While working toward better ways to manage en route congestion in the National Airspace System (NAS), the collaborative decisionmaking (CDM) community has long recognized the potential value of a capability to apply strategic departure control to flights while still on the ground. A number of significant barriers, however, have blocked progress historically toward this goal. Recent new capabilities and structural improvements in the CDM suite of tools have now opened the door to the development and deployment of such a capability.

Serious discussion of the potential deployment of such a system began in the fall of 2004. The responsibility for resolving operational details and identifying a feasible path to deployment was given to the Flow Evaluation Team, a newly formed subgroup in CDM. The capability resulting from this program has been named the Airspace Flow Program (AFP).

Concept

The foundation of the AFP is an integration of the flow evaluation area/flow constrained area (FEA/FCA) function of the traffic situation display (TSD) with the flight schedule monitor (FSM). The David J. Hurley Air Traffic Control System Command Center (ATCSCC), after consultation with the field traffic management coordinators and the customers, will create an FEA or FCA in the TSD. If the FEA/FCA is designated as "FSM-eligible," then the Enhanced Traffic Management System (ETMS) will begin to generate an aggregate demand list (ADL) containing detailed information about every flight in the FEA/FCA. Anyone with an FSM connection can then choose to monitor that FEA/FCA the same as monitoring an airport. ETMS will revise the flight list every 5 minutes based on flight changes, so the picture presented by FSM will remain current. When the projected demand is expected to exceed the capacity, the ATCSCC can issue an AFP. In an AFP, flights in the FEA/FCA will be issued controlled departure times to provide a smooth and managed flow of traffic to the constrained area.

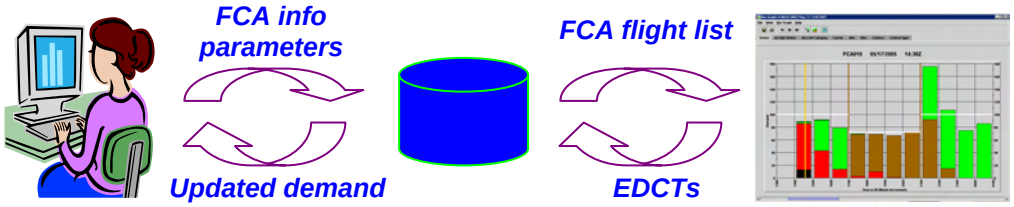
Benefits
The principal goal for the initial deployment of AFP, scheduled for June 2006, is to better manage en route traffic during severe weather events - - avoiding unnecessary delay for flights not near the weather constraint while having all flights in the constrained area share equally in the solution. Experience gained through simulation exercises and the first season of deployment will identify and prioritize the capabilities for the future.

AFP Delay Reporting: A Step Forward for the Operations Network (OPSNET)

There is good news--a change is coming to FAA Order 7210.55C, Operational Data Reporting Requirements. According to general notice 2/11, paragraph 11 of Order 7210.55C will be revised to state that AFP delay reporting is automated. Therefore, field facilities are exempt from making any OPSNET data entries for AFP-delayed flights. At this time, there is no change to the current requirement to report delays associated with airport ground delay programs (GDP).

To allow adequate time to review and validate the AFP delays generated by our automated process, next-day OPSNET reports will not include the AFP delay totals. Once the delays have been imported into the database, the reports will be updated and posted to the ATCSCC Web page (http://www.atcscc.faa.gov/) as soon as possible the following day.

Summary
AFPs mark a significant new step in en route traffic management. Under a phased approach to deployment, the first release of AFP will have only limited scope, to minimize risk and increase the likelihood of a successful deployment. Field facilities need to be aware that AFPs will "capture" more general aviation and military aircraft than GDPs and understand AFP expect departure clearance times (EDCT) are assigned without regard to the destination airport.
(AJR-1)



Specialists create FCAs in the TSD | **ETMS manages the data exchange** | **FSM monitors and manages the demand**

EDCT Compliance

/*TER/F/ The EDCT window. When EDCTs are assigned through a GDP, the departure terminal must, to the extent possible, plan ground movement of aircraft destined to the affected airport(s) so that flights are sequenced to depart no earlier than 5 minutes before, and no later than 5 minutes after, the EDCT. Do not release aircraft on their assigned EDCT if a ground stop (GS) applicable to that aircraft is in effect, unless approval has been received from the originator of the GS.

The aircraft operator is responsible to operate in a manner consistent with departing within the EDCT window. Air traffic control (ATC) should provide the departing flight every opportunity to meet the EDCT. A review of EDCT compliance in GDPs indicates we are currently achieving a 65 percent compliance rate.

The impact of departing before or after the EDCT window. The EDCT is calculated based on the arrival slot at the destination. When flights do not depart within the EDCT window, it can cause extra flights at the arrival

airport that can lead to an excessive holding situation. Too much holding at the arrival airport often results in diversions and added workload, including the possibility of a GS, a revision to the GDP, and new EDCTs being issued for most of the aircraft. A national GDP requires facility personnel and our customers to prioritize operations to ensure GDP aircraft can meet the EDCT window.

Miles-In-Trail (MIT) Restrictions. It is recognized that flights may have MIT restrictions imposed on them in addition to their EDCT. These MIT restrictions may be necessary to control additional capacity issues, in the terminal or en route environment. Every effort should be made to comply with the EDCT and MIT restriction. In the event that a facility is unable to comply with the EDCT window and MIT restriction, the ATCSCC must be notified.

A flight taxis consistent with meeting the EDCT window. An aircraft may taxi consistent with meeting the EDCT, but may be delayed by something outside the pilot's control, such as an aircraft emergency or airport surface constraint. The flight should be released even if it is outside the EDCT window. The facility is not required to coordinate the late departure. When time permits, document the event for next-day quality assurance.

A flight taxis late or requests taxi too late to meet the EDCT window. Facilities without FSM should contact their overlying facility to request a new EDCT. Facilities with FSM may use the EDCT change request (ECR) tool to assign a new EDCT using the slot credit substitution (SCS) method, followed by the unlimited delay option, when available. All EDCT amendments not obtained using the ECR tool must be coordinated through the ATCSCC via the appropriate protocol.

An aircraft taxis too early to meet the EDCT window. There are reasons why a flight may taxi too early for an EDCT. The pilot may have an earlier EDCT than the tower indicates due to substitutions or the aircraft may need to leave the gate so that another aircraft may use it. The controller should first verify the EDCT with the pilot. If the pilot's EDCT agrees with the tower's EDCT, then the flight should be held on the airport and released within the EDCT window. If the pilot's EDCT doesn't agree with the tower's EDCT then apply the "Trust and Verify" procedures. All requests to amend EDCTs earlier than the current EDCT must be coordinated with the ATCSCC.

Trust and Verify. "Trust and Verify" was adopted to ensure that an aircraft wouldn't be held past its EDCT when there was a discrepancy between the pilot's EDCT and the tower's EDCT. There are reasons why the tower might not have an updated EDCT, and subjecting the flight to additional delay may not be appropriate. If the pilot's EDCT is different, and there is time to verify the EDCT via the FSM (where available) or through coordination with the ATCSCC through the appropriate traffic management unit (TMU), then do so. Verification must be completed before the pilot-provided EDCT. If the verification cannot be completed, release the aircraft and report the discrepancy to the ATCSCC through the appropriate TMU. If the verification is completed, the aircraft should be released consistent with the verified EDCT, unless otherwise coordinated. If there is time, documenting the event may be useful for next-day analysis.

Airspace Flow Program. A new delay program is under development, and will be deployed in June 2006. AFPs will use the same software logic as GDPs; however, they will be applied to a volume of airspace or specific NAS element such as an airway or fix. AFPs will "capture" more general aviation and military aircraft than GDPs. Additionally, controllers will see flights assigned EDCTs to airports that are not normally associated with our historical GDP airports. The EDCT will be issued based upon the airspace or route the flight is traversing. It will be equally important for facilities to comply with AFP EDCTs as it is for GDP EDCTs.

Summary. Effectively meeting EDCTs requires ATC and our customers to work together to meet the EDCT window. Aircraft operators must load their passengers and cargo and be

ready to taxi in a manner consistent to meet the EDCT window. ATC must issue control instructions consistent with meeting the window. This is based on the specific airport environment. For example, a busy hub airport at 5 p.m. on a weekday afternoon is going to be different than that same airport during a lull in the middle of the morning. Neither ATC nor the aircraft operator can be successful without the cooperation of the other. To improve system efficiency, it is incumbent upon all affected parties to participate fully in ensuring EDCT compliance to the maximum extent possible. **(AJR-1)**

Parts 121 and 135 Deicing Operations

/TERF/ The FAA has reevaluated its deicing requirements and issued new guidance for part 121 and part 135 operations. FAA regulations state that "no person may take off an aircraft when frost, ice or snow is adhering to the wings. . . ." and "no person may dispatch, release, or take off an aircraft any time conditions are such that frost, ice, or snow may reasonably be expected to adhere to the aircraft. . . ." (title 14, Code of Federal Regulations, sections 121.629(b) and (c)).

Ice pellets are particularly dangerous to aircraft. Ice pellets result when frozen precipitation liquefies while falling through a layer of air with a temperature above the freezing level. This moisture refreezes as it continues to fall through colder air. While in a liquid state, these supercooled droplets can, upon striking an object, such as an aircraft, instantly freeze to form clear ice. While ice pellets are not adhering to aircraft during taxi, takeoff conditions may expose the aircraft to significant risk of inflight icing that may exceed the capability of the aircraft's anti-ice or deicing equipment. Considering these facts, the FAA does not recommend departing aircraft in any ice pellet condition.

While operators and aircrews make a determination to "go or no go" based on weather conditions, air traffic controllers need to be aware of ice pellet scenarios. The aircraft may request delayed departure for additional deicing treatment. FAA Notices 8000.313 (Parts 121 and 135 Operations Specification for Deicing/Anti-Icing, Operations in Ice Pellets without Deice/Anti-Ice Fluids), 8000.308 (Reevaluation of Deicing/Anti-Icing Programs), and 8000.309 (Dispatching During Precipitation Conditions of Ice Pellets, Snow Pellets, or Other Icing Events for Which No Holdover Times Exist) have more specific information. **(AJT-1)**

FAA Order (FAAO) 7610.4, Special Military Operations, Improvements

/TERF/ FAA Order 7610.4, Special Military Operations, is being improved and will have two major changes. The new order consolidates several FAA orders and mandatory briefing items (MBI) on "man-made threats to aviation" subjects. The second change is the document's name and security classification.

The FAAO 7610.4L version will incorporate and update the guidance from the following orders and associated MBIs to provide controllers a single location for this information.

- FAA Notice 7110.422, Aircraft Hijack and Suspicious Inflight Activities – Response and Notification Procedures, which superceded FAAO 7110.49D, Unlawful Interference, Hijack/Bomb (Threat) Aboard Aircraft – Procedures and Covert Signals, and FAAO 7110.306A, Reporting of Suspicious Aircraft and Pilot Activities
- FAAO 7110.307, MANPADS Event Reporting
- FAAO 2100.6B, Flight Restrictions in the Proximity of the Presidential and Other Parties

The new title, "Special Operations" removes the word "military" to more accurately reflect civilian aviation involvement. The security classification of FAAO 7610.4 will change to Sensitive Security Information (SSI) as the document now incorporates the SSI orders listed above.

FAAO 7610.4L has completed field coordination and is going through final comment and

review. Publication will take place as soon as all comments are properly addressed. FAAO 7610.4K is currently available through your publications personnel. **(AJT-1)**

Vectorless Radar Patterns

/*TERF/ Flight management systems (FMS) are now being used to eliminate vectors from radar patterns. Working with the local air traffic control facility, major carriers are coordinating special procedures that mirror the radar pattern and terminate as a visual approach. These procedures allow carriers to let down in instrument meteorological conditions and still follow the same ground track, altitudes, turn points, and speed requirements as previously developed for either visual arrivals or radar patterns. Since the developed routing leads the aircrew to a visual approach, the FMS procedure terminates at the minimum vectoring altitude (MVA) and ceiling requirements must be at least 500 feet above the MVA.

The advantages to the aircrew and controller are the more stable arrivals along with a reduced workload. Controllers still need to have radar coverage and to monitor the flights. These procedures were not evaluated for terminal instrument procedures criteria nor flight inspected since they occur at or above the (flight inspected) MVA. The required coordination, letter of agreement, and facility controller training will ensure these new procedures won't surprise a controller if they become operational at your location. Orlando Approach has taken the lead in developing such procedures with Delta Airlines. Many major carriers (and ATC facilities) are also very interested in developing similar arrivals. FAA Notice N8000.302, Special Stand-Alone Area Navigation (RNAV) Transition Procedures, dated August 5, 2005, provides the criteria for these procedures and can be found at: http://www.faa.gov/library/. While the procedures take some effort to develop, they will save substantial workload once they are in place. **(AJT-1)**

OPSNET Workgroup: Working to Improve OPSNET

/TERF/ An OPSNET Workgroup was established in June 2005 to provide input and feedback into the process of revising Order 7210.55C, as well as suggesting improvements for both the near- and long-term, providing clarification of reporting practices and policies, and raising user concerns and questions from the field. Each Director of Tactical Operations (DTO) was asked to name one or more representatives to participate on the workgroup. To date, two telecons and one meeting have been held, resulting in a new and improved set of frequently asked questions for the ATCSCC quality assurance Web page, and consensus on several delay charging issues that will be reflected in the next revision of the OPSNET order.

Entering accurate delay information and traffic counts into OPSNET is essential, since the data are viewed and used by virtually the entire FAA. Everyone from facility managers, service areas, and the ATCSCC all the way up to the headquarters level, including the Chief Operating Officer of the Air Traffic Organization (ATO) and the Administrator, view some form of the data or analysis on a daily basis. The ATC Daily Report that is produced each morning for the FAA's executive managers includes delay information for any facility with 26 or more delays and traffic counts for the en route centers and 45 select airports. The airlines are also able to view selected OPSNET data through a Web page, helping them to assess their previous day's operations.

At its initial meeting, the workgroup agreed that it would be helpful if the facilities could enter delay information into OPSNET on a real-time basis, throughout the day as delays are occurring, as opposed to waiting until day's end. This would lead to more accurate data, especially more accurate delay charging, since the personnel on shift most familiar with the impacting conditions would be the ones entering the information. Frequently, the entering of data for the entire day is saved for personnel on the midnight shift. This not only increases their workload but

results in people with less firsthand knowledge of the events that took place entering impacting condition and "charged to" information.

Another item discussed by the workgroup that might be the most exciting for field personnel is the possibility of having data on traffic management system (TMS) delays, i.e., national ground delay programs and ground stops, automatically populated in OPSNET directly from traffic flow management systems/tools, so that ATC and traffic management personnel would no longer have to enter that type of information on a daily basis. This could result in substantial time savings for the FAA, in terms of the time required to enter, verify, and correct data on TMS delays. The workgroup has made a request for further definition of requirements and costs for implementing this improvement.

An issue of importance that the workgroup wishes to communicate to the facilities is the need to update the "Facility Administration" area within the OPSNET Web page. This area contains local facility information, including primary and 24-hour contact information. It is important that this information be up-to-date in case the facility needs to be contacted regarding any of the data entered from the previous day.

Since the deployment of the OPSNET Web user interface, entering data has become much more user-friendly. Several helpful navigation links appear along the bottom edge of all pages in the OPSNET Web application.

- The **ATCSCC Intranet** link takes you to the ATCSCC Intranet home page.
- The **What's New** link gives all of the recent changes to the OPSNET Web site for facilities.
- The **Need Assistance?** link takes you to a page that shows the OPSNET Hotline hours of operation and lists some contact telephone numbers.
- The **Information Quality** link takes you to the OPSNET subsection of the quality assurance section of the ATCSCC Intranet Web site, where some OPSNET miscues, frequently asked questions, and the current OPSNET order can be viewed.
- The **Contact Us** link initiates your e-mail client so you can send the OPSNET Hotline a message.
- The **User's Manual** link takes you to the OPSNET Web User's Manual.

The workgroup may recommend that other links be added in the future to make the process of using the OPSNET Web page even easier for the facilities. **(AJR-1)**

In this publication, the option(s) for which a briefing is required are indicated by an asterisk (*) followed by one or more letter designators, i.e., ****T*** *= Tower, combined tower/approach control,* ****R*** *= TRACON,* ****E*** *= ARTCC (En Route), or* ****F*** *= AFSS/FSS. (Reference 7210.3, para. 2-2-9.)*

This table lists Bulletins published since 2001. They can also be found on the Internet at www.faa.gov/atpubs

2001	2002	2003	2004	2005	2006
01-1 WINTER	02-1 FEBRUARY	03-1 MAY	04-1 ** MARCH	05-1 APRIL	06-1 FEBRUARY
01-2 ** FEBRUARY	02-2 JULY	03-2 ** JUNE	04-2 ** APRIL	05-2 MAY	06-2 JUNE
01-3 ** MARCH	02-3A ** SEPTEMBER	03-3 AUGUST	04-3 MAY	05-3 **JULY	
01-4 SPRING	02-4 SEPTEMBER	03-4 OCTOBER	04-4 ** JULY	05-4 **OCTOBER	
01-5** JULY	02-5 ** OCTOBER	03-5 ** NOVEMBER	04-5 AUGUST		
01-6 SEPTEMBER		03-6 DECEMBER	04-6 OCTOBER		
01-7 DECEMBER			04-7 ** NOVEMBER		

** Special Edition