



International Civil Aviation Organization

**The Fourth Meeting of the Air Traffic Flow Management Task Force
(ATFM/TF/4) and BOBCAT Workshop**

Bangkok, Thailand, 7 to 11 November 2005

Agenda Item 6: Operational Trial Arrangements

REVIEW OF AIP SUPPLEMENT

(Presented by Singapore)

Attached is a copy of the AIP SUPP for review by the Meeting.

.....

DRAFT AIP SUPPLEMENT**OPERATIONAL TRIAL OF AIR TRAFFIC FLOW MANAGEMENT (ATFM) OVER BAY OF BENGAL****1 Introduction**

- 1.1 The purpose of this AIP Supplement (SUP) is to provide details on the implementation of the operational trial of an air traffic flow management (ATFM) system. Aircraft operators and air traffic services (ATS) providers may gain significant benefits.
- 1.2 Benefits to be gained from the ATFM system:
 - (a) reduction in ground and en-route delays
 - (b) maximise capacity and optimum flow of air traffic within the area

2 Identification of ATFM airspace

- 2.1 Within the Bay of Bengal, Pakistan and South Asia airspace of ICAO Asia/Pacific Region, an integrated air traffic flow management (ATFM) service is being established to manage westbound air traffic transiting the Kabul FIR by satisfying minimum spacing requirements at established gate way points.
- 2.2 Effective on _____ 2006, the operational trials of the ATFM system will be implemented. Westbound flights intending to transit the Kabul FIR on ATS routes A466, L750, N644 and V390 from FL280 to FL390 inclusive between 2000UTC and 2400UTC shall participate in the operational trials of the ATFM system.
- 2.3 ATS providers in the Bangkok, Chennai, Delhi, Dhaka, Karachi, Kolkata, Kuala Lumpur, Lahore, Mumbai, Singapore and Yangon FIRs will also participate in the operational trials of the ATFM system.

3 Provision of ATFM services.

- 3.1 The ATFM service is advisory in nature and will be provided by the Bay of Bengal Co-operative Air Traffic Flow Management Advisory System (BOBCAT) of Aeronautical Radio of Thailand.
- 3.2 The BOBCAT will be responsible for the ATFM activities within the Bay of Bengal and South Asia areas and will be supported by the Air Traffic Flow Management Unit (ATFMU) in Bangkok ACC and the ATS providers in the participating FIRs in para 2.3.
- 3.3 The ATFMU will operate from 0800UTC to 2400UTC daily for westbound flights and the contact details are as follows:

BOBCAT ATFMU

Telephone:

ATFN:

E-mail:

Fax:

- 3.4 Detailed information in respect of the air traffic flow management operations has been included in the Bay of Bengal and South Asia ATFM Handbook and is also available at www.____.____.

4 ATFM Operating Procedures

4.1 Slot allocation procedures

- 4.1.1 Slot allocation is an ATFM measure established to regulate the demand to the level of the airspace capacity and to smooth out the traffic flows making full use of the available airspace capacity.
- 4.1.2 Dispatchers of westbound flights from departure airports within the Bay of Bengal and South Asia areas or traversing through the participating FIRs and transiting through the Kabul FIR are required to log-on to the BOBCAT ATFM system and submit a set of choice of gate-way point arrival and flight levels before the cut-off time.
- 4.1.3 Dispatchers of westbound flights traversing Bangkok, Kuala Lumpur, Singapore and Yangon FIRs should request for slot allocation from FL310 to FL390. Departing westbound flights from airports within the Delhi, Dhaka, Chennai, Mumbai, Karachi, Kolkata and Lahore FIRs would be given priority for FL280.
- 4.1.4 After the cut-off time, the BOBCAT will process the requests for the flights and notify the dispatcher through the web-site.

ETA at gate-way	Slot request	Slot allocation
in Kabul FIR	cut-off time	notification
2000UTC-2059UTC	1000UTC	1100UTC
2100UTC-2159UTC	1100UTC	1200UTC
2200UTC-2259UTC	1200UTC	1300UTC
2300UTC-2359UTC	1300UTC	1400UTC

- 4.1.5 BOBCAT will publish all available ETO on all flight levels to the gate way points within the Kabul FIR with applicable Mach Number. Dispatcher, who could not request for slot allocation, may request slot assignment in real time based on the available slots after the requests for slot allocation have been processed. Once airline dispatchers receive the slot allocations, they will submit flight plans based on the slot allocations. The flight plans and the wheel-up time (WUT) will be transmitted to BOBCAT as well as ATS units concerned. Airline operators are responsible for following the advice given by the BOBCAT.
- 4.1.6 The allocated slots assignment will also be make known to the ATS providers in the participating FIRs in Para 2.3

5 Procedures for Operations of Special Flights Exempted from ATFM system.

- 5.1 Westbound flights transiting the Kabul FIR on ATS routes A466, L750, N644 and V390 from FL280 to FL390 inclusive between 2000UTC and 2400UTC shall participate in the operational trials of the ATFM system except for the following flights:
- (a) humanitarian or mercy purposes;
 - (b) State aircraft of such importance that any delay will jeopardise the success of the mission.
- 5.2 Operator of the above flights seeking exemption from participating in the ATFM system shall obtain approval from _____(???) and include in Field 18 of the flight plan STS/ATFMEXEMPTED.

6 Contingency Planning

- 6.1 Procedures for westbound flight that could not meet the WUT.
- 6.1.1 The WUT is a nominal time with a tolerance of 3 (?) minutes which is primarily intended to enable ATC to allow for aerodrome congestion problems. However, the westbound flight should endeavour to meet the allocated gate-way slot-time in Kabul FIR.
- 6.2 Procedures for westbound flights that could not meet the gate-way time.
- 6.2.1 Pilot of the westbound flight shall inform ATC in _____ FIR when the flight could not meet the allocated gate-way slot-time due to one reason or the other. The westbound flight concerned will not have priority for the assignment of gate-way slot in Kabul FIR.

4.1 MODIFICATION OF ESTIMATED OFF BLOCK TIME (EOBT)

4.1.1 Introduction

It is a prime requirement or both ATC and ATFM, that the EOBT of a flight shall be an accurate EOBT. This applies to all flights, whether subject to ATFM or not.

These procedures are to enable an Airline Operator (AO) to meet this requirement whenever they know that the EOBT of a flight will require modification.

The ICAO requirement is that delays in excess of thirty (30) minutes should be communicated. This requirement is mandatory. The rules concerning modification to an EOBT for flights, which are departing, arriving or over-flying BOB will change: the requirement in BOB is that any change (+ or -) in an EOBT of more than ____ minutes shall be communicated.

There are two categories of flights concerned: those, which have an ATFM slot, issued by the BOBCAT, and those who have not

4.1.2 Procedure for modifying the EOBT of a flight not having received an ATFM SLOT from the BOBCAT

Procedure:

To amend the EOBT to a later time, a DLA (or CHG) message shall be sent to ARO for onward transmission to BOBCAT.

To amend the EOBT to an earlier time, a CNL message shall be sent to ARO followed ____ minutes later by a new flight plan with the new EOBT indicated.

ARO in turn will transmit the FPL to BOBCAT.

4.1.3 Procedure for modifying the EOBT of a flight, which has received an ATFM SLOT from the BOBCAT

AO should note that an EOBT should not be modified simply in response to any possible delay due to an ATFM slot. If the EOBT established by the AO can no longer be met for reasons other than ATFM, then:

If the EOBT of a flight has changed or is no longer realistic then the following procedure shall be used:

- a. If a flight has an ATFM slot (WUT) which cannot be met, then the AO shall send a DLA (or CHG) message to ARO with the new EOBT of the flight. This may trigger a revised WUT.
- b. If a flight has an ATFM slot (WUT) with some delay and the AO is aware that the original EOBT cannot be met but the existing WUT is acceptable then a DLA (or CHG) message shall be sent to ARO with the new EOBT of the flight. However, in order not to trigger a new WUT with a worse delay, the following formula may be used:
 - o Take the current WUT, minus the taxi time, minus 10 minutes and send the new EOBT.

In both cases (a) and (b), ARO will transmit the message to BOBCAT as well as FMPs without delay.

However, as BOBCAT systems are continuously seeking to give zero delay, the WUT of the flight will never be earlier than the new EOBT plus the taxi time.

It is not possible to amend the EOBT to an earlier time than the EOBT given in the flight plan however, if a flight is ready to go off blocks earlier than the current EOBT, then there are two options available:

- c. The AO may ask the local ATC Unit (TWR) or the FMP to send a Ready (REA) message. In this case, the flight is considered as "ready to depart" from the filing time of the REA message.
- d. The AO may contact BOBCAT Help Desk who have the possibility to input an earlier EOBT into the TACT system (max -30 minutes). Each case is treated on its merits and may be refused if it is considered that "abuse" is involved.