

## AIR TRAFFIC FLOW MANAGEMENT UPDATE NO 4

Hello All,

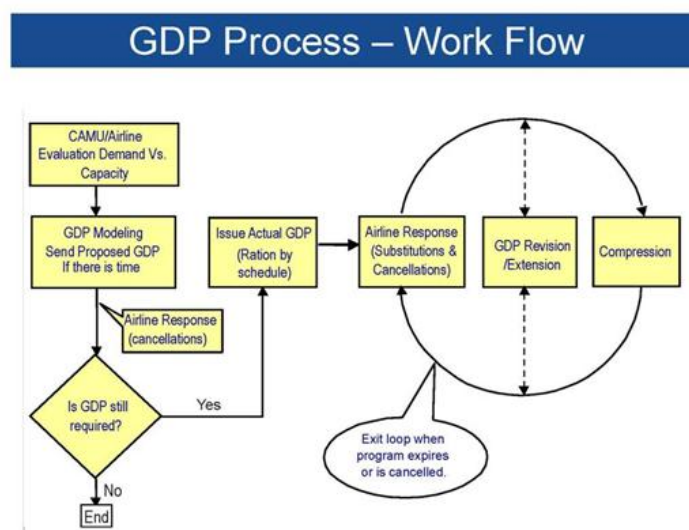
As discussed in update 3, CDM is very important and attached please find an article from Metron, Inc, regarding CDM in the US. The CAMU Enhanced ATFM system will be using advance 4D projections in its calculations. It is an interesting read.

We promised to release information about the CAMU WEB and the AMC, but will release that information during the second week of October 2009. Today we will focus on one of the traffic management initiatives (TMI) available to manage traffic demand. Namely, the Ground Delay Program (GDP). Next week we will focus on another TMI called an Airspace Flow Program (AFP), as the name suggests it is used to manage airspace demands. The most common TMI is the GDP. A GDP is a type of traffic management initiative that is intended to control traffic arriving to and departing from an aerodrome.

Aircraft are delayed at their departure aerodrome in order to manage demand with capacity at the departure aerodrome, en-route or at their arrival aerodrome. Flights are assigned new departure times (CTOT). Ground Delay Programs will normally be implemented at aerodromes where capacity has been reduced because of weather conditions, equipment failures, large number of pop up traffic is expected or when demand exceeds capacity for a sustained period.

- ✚ Most useful when the need to manage traffic is necessary or when demand exceeds the aerodromes capacity
- ✚ To balance capacity and demand at an impacted aerodrome
- ✚ Delays taken on the ground, not en-route
- ✚ Reduces airborne congestion
- ✚ Delivers a smooth and sometimes reduced arrival rate to aerodrome

*The flow chart below illustrates the GDP process*



CAMU Enhanced ATFM system will use airport slot data as a baseline GDPs for FAJS, FACT and FADN. After CDM with the ATM community, CAMU may activate TMIs (change in the departure or arrival rate) in those locations where it is necessary. The system extracts all the flights entering the specified airspace and sequences them in the order they would have arrived at the airspace in the absence of any restriction. On this basis, the Calculated Take-Off Time (CTOT) for the flight is calculated. It is this information, Calculated Take-Off Time (CTOT), which is transmitted to the Aircraft Operator concerned via AFTN/E-mail/SMS, and published on the CAMU Website, as well as to the control tower at the aerodrome of departure. In addition to this fundamental process, a number of other mechanisms will act to compensate for factors such as late received flight plans and modifications.

*The graphic below represents a screen shot of the ATFM system that manages a GDP*

*Ground Delay Tool (GDT) Mode windows*

- ✚ *GDT Setup: where you specify parameters that will be used to model the program.*
- ✚ *Bar Graph: graphical view to compare original vs. modeled results of the program.*
- ✚ *Map: reflects the program's scope. May also be used to specify the scope of the program.*
- ✚ *Data Graph: statistics corresponding to the modeled program. Graph and statistics not displayed until you model a program.*

## GDT Mode Default Display

