Fix and Airport Based Programs in Support of SWAP

Multiple Airport Ground Delay Programs: One Ground Delay Program (GDP) for a number of airports rather then individual Ground Delay Programs could reduce the traffic demand into a constrained area without putting the majority of delays on one particular customer base. Presently GDP's are implemented for major airports in a particular area for support of SWAP. This gives delays to the Air Carrier and Air Taxi customers and lets the General Aviation (GA) customers fly free of delay into surrounding airports. The purpose of the SWAP GDP is to reduce the en route volume caused by the thunderstorms, but the en route volume is made up of more then Air Carrier and Air Taxi traffic, it also includes large numbers of General Aviation traffic. By implementing a GDP for all the airports in the area you are reducing the en route volume and giving equitable delays to all the customers. In order for these programs to work effectively they would need to be implemented early base on forecasted weather conditions and would need the full support of the controllers. The early implementation would allow for better compliance by the GA community and better planning for the Air Carrier and Air Taxi operators. The controller would play a key role in program compliance. General Aviation traffic departing VFR requesting an IFR clearance would need to be given a FA delay by the controller and then held as far away from the event as possible. GA traffic requesting an IFR clearance just outside of the impacted airport would need to be held outside the TCA VFR until their Control Time of Arrival.

Multiple Airport/Selected Fix Programs: During major severe weather events Multi-Airport/Selected Fix Programs would allow a Traffic Management Specialist to run a single Ground Delay Program for numerous airports in an impacted area. In addition, selected fixes could be regulated to control the flow of the traffic through impacted enroute areas. This would give the Specialist the ability to adjust the flow of traffic over the impacted fixes as well as the airport rate.

Multiple Fix Program: A Multi-Fix Program could be implemented to meter traffic over a particular fix or over numerous fixes. A Traffic Management Specialist could set a flow rate over a fix or over numerous fixes located in their center to reduce the traffic flow through impacted sector/sectors.

Playbook Spacing Program (PSP): A PSP would be used in conjunction with Playbook plays. When a Playbook play is implemented a PSP is implemented along with it to reduce the impact of the play on the center absorbing the additional traffic. This program would eliminate large mile in trail restrictions and reduce the uncertainty of DSP delays that are normally associated with en route weather. The advantage of the PSP over a normal fix load Program is that you are delaying the aircraft that are actually being impacted by the weather or the volume caused by the weather, not the aircraft on the front side of the weather.

The Playbook Spacing Program would allow a certain number of aircraft over a fix associated with a Playbook. The playbook fix would be selected depending on the location of the weather (i.e. a line of TSTMS stretches from ROD to BNA, so a West

MGM playbook is used and a PSP using MGM as the fix is implemented). A Playbook Spacing Program could also be implemented to allow a limited flow of traffic to continue through an impacted area on a specified route. The PSP set at a low number would allow the traffic to deviate around the weather and still make the sector manageable for the controller. This "reduced flow" route could be available to the Command Center's Tactical Customer Advocate (TCA) to allow them to release aircraft on this route that are unable to fly the longer reroutes.

If a large severe weather event is forecast, a plan could be developed on the strategic Planning Telcon to include multiple Playbook Spacing Programs, along with possible exit strategies. These multiple programs could be implemented to allow the users to pick and choose the playbook route they would like to fly. This would allow the users to choose their own route to destinations, instead of being pinned done to one particular route assigned by the ATCSCC. If the weather doesn't develop as forecast, the exit strategies that were planned ahead of time would be executed.

The strategic plan could also include a Playbook Spacing Program for aircraft over the impacted fix landing other then major destinations. For example, a West MGM 2 playbook is implemented for N90 arrivals because of weather over BNA. Rather then delaying the N90 arrivals, the program is developed to include all traffic on the West MGM 2 landing anywhere other than the N90 area. The N90 traffic flow is not delayed, but the traffic over MGM and in that particular sector is reduced to a manageable level.

Distance Based Ground Delay Programs: The use of Distance Based Ground Delay Programs during SWAP events would be more effective and more equitable than the present day "Tier" Ground Delay Program. A Distance Based GDP would allow the Traffic Management Specialist to capture traffic within a defined distanced as opposed to all the traffic in a specific tier or center.

Programs in Support of SWAP Guidelines: Ground Delay Programs should be discussed on the SPT. Programs should initially be run at a VFR rate. A trigger would be set in place to reduce the rate of the program at a pre-agreed upon time. Triggers could include several aircraft deviating around TSTMS or thunderstorms entering a center/sector. Pathfinder aircraft could be released on a preset basis to check the restricted routes for increased through put. All other traffic management tools should be used, i.e. tunneling, capping during an event to increase through put. All mile in-trail restriction should be reviewed and reduced once the program rates are reduced. Once the VFR rate of the program is lowered to an IFR rate consideration should be given to releasing aircraft that are not being impacted by the weather, as long as gridlock is not a factor at the destination. CIWIS and ITWIS should be used to their potential. Procedures could be written to use these tools to time the opening and closing of routes. A representative from the Command center, a representative from the field facility being impacted and the ATA representatives could work together using the CIWIS/ITWIS to determine the opening and closing of the impacted routes. By using these tools traffic could be released on a forecasted basis and be there once the weather moves off the route.