Interagency Aviation Safety Alert

No. IASA 12-02 **May 18, 2012**

Subject: Aerial Supervision and Fire Traffic Area

Area of Concern: All Fire Aviation Operations

Distribution: All Aviation Operations and Incident Command Teams

ISSUE: Aerial supervision challenges resulting from increasingly complex fire management operations.

BACKGROUND: A recent program risk assessment and feedback from field units uncovered potential, critical vulnerabilities within the existing aerial supervision system. Currently, the system assigns Aerial Supervisdion Modules (ASM), Air Tactical Group Supervisor (ATGS), Leadplane and Helicopter Coordinator (HLCO) platforms in mixed response levels to significantly more complex firefighting scenarios than in the past.

The nature of air tactical work has changed as the firefighting environment continues to evolve. Increased wildland/urban interface fires and the size of fires bring many challenges to the aerial supervision position in terms of communication issues, airspace management, and an increasing scope of responsibility. As a result, this position has become one of the most complicated and demanding within the Incident Command System (ICS). Recent SAFECOMS have cited a correlation between their increasing scope of responsibility and near mid-air collisions.

DISCUSSION: Current command and control systems are often operated successfully in the initial attack role, but become challenged to adequately manage increasingly complex airspace and the associated traffic in and around the Fire Traffic Area (FTA). Confusion is occasionally caused by the differences in operational tactics used by the various deployed supervision modules (ASM, ATGS, etc). Hazards most often arise during the transition period between these platforms especially when a single crew leadplane is used to relieve an ASM managing multiple fixed and rotor wing platforms. In this scenario, the scope of responsibility is far too great.

Next generation airtankers are likely to be either jet or turboprop powered aircraft. Controlling this type of traffic within the FTA may be further complicated by the additional volume of airspace required to maneuver these newer tankers as result of their increased speed, especially if they're sharing the same FTA with traditional airtanker aircraft. On the ground, many tanker bases did not envision the additional ramp area required for larger jets to maneuver in the pit areas. This could negatively impact the reload process when operating multiple platforms in those confined areas. These combined factors will require intense traffic management from aerial supervisors and dispatchers in order to ensure operations remain efficient both in the air and on the ground.

Unfortunately, Interagency currency requirements for aerial supervisors have not kept pace with some recent changes to aerial firefighting operations. Most aerial supervision personnel maintain only the minimum required currency and may be unprepared for more complex, dynamic airspace management required to maintain a safe working environment for incident aircraft. Some examples include incomplete airspace clearances, failure to set up aircraft initial reporting points (IPs) and transition corridors, clearing unsafe altitudes, and failure to notify other aircraft of new assets entering the working area.

KEY POINTS:

- The existing system of command and control occasionally struggles to maintain adequate management of complex airspace and traffic control situations in or around the FTA.
- Interagency training and currency requirements for aerial supervision positions have not kept pace with changes in the aerial firefighting environment.
- Failure to establish and comply with standardized operational procedures creates the potential for mid-air collisions.
- The program has not kept abreast of technology that is applicable to the complexity introduced in the fire traffic area.
- Aerial supervision is not a primary duty for many functioning within this capacity, in fact, over half are hired as Administratively Determined (AD's) which causes problems with currency and proficiency.
- Air traffic management within the FTA will be further complicated by the additional airspeed and subsequent airspace required to maneuver newer tankers.
- Traffic management to and from reload bases could be a challenge for both aerial supervisors and dispatchers.

RECOMMENDATIONS:

- Maintain span of control as established in the Interagency Aerial Supervision Guide. When complexity dictates, delegate duties to HLCO and/or leadplane resources.
- Ensure air traffic is managed safely and efficiently by providing adequate separation and use procedures to sequence of the flow of aircraft both to and from the working area (i.e. holding for Initial Point, and departure and arrival gate times).
- Be aware that a large mix of different types of aircraft operating in a confined area with different operating characteristics (i.e. helicopters, airtankers, SEATS, scoopers) significantly increases the complexity and associated risk.
- Safety of flight is paramount but be aware of geographic and geopolitical constraints that affect operations. Seek guidance from leadership whenever in doubt.
- Frequency management includes limiting voice communications and transition briefings to essential information only.
- Provide refresher training in accordance with the Aerial Supervision Guide in order to assist personnel in obtaining tools for managing issues related to the emergence of new platforms.

/s/ Keith Raley

Keith Raley
Chief, Aviation Safety &
Program Evaluations

/s/ Ron Hanks

Ron Hanks
Branch Chief, Aviation Safety
Management Systems