

AIRSHOW MANUAL

By Robert Sheffield

(Robert Sheffield operates the *World Airshow Congress* web site (kcairshow@al.com). He provides many interesting pages of information for the airshow sponsor/producer. This manual is copyrighted by Robert and is provided as a service to the airshow industry by him. Please check out his web site, it is well worth your time. Hugh Oldham)

Congratulations!

You have just taken the first step to put yourself and air show back into the cockpit.

Now, Don't let your budget run wild,
Keep a sharp lookout on Safety (Ground and Air),
Have a good Emergency Contingency Plan,
Contract the Professional Fliers with appropriate license and insurance,
Attend the Safety Briefing,
Ensure the FAA is Happy,
Fire Marshall Permits,
Concessions on Site,
Health Permits,
Novelties Set-Up,
Port-O-Lets on Site and Scheduled Service between Shows,
Schedule Trash Pick-Up,
FBO Re-fuel Plan,
Starter Units POL & Hazmat Team Available,
Aircraft Rescue and Fire Fighters Briefed,
Commercial Booth Space/Chairs & Tables,
Military Recruiters On Site,
Media Booth Staffed,

Credentials,
Special Parking Passes,
Water for the Spectators,
Crowdline Secure... Perimeter Secure,
Acro-Box Sterile,
Hospitality in place,
Ticket-Sellers,
Ticket-Takers,
Program Sellers,
Communications, Radios and Cell Phones,
Copier, Fax Machine,
Operations Office Staffed,
Transportation or Bus Service for Participants,
Transport for the Spectators,
Handicapped Parking & Special Needs Considerations,
Brief the Announcer for Public and Sponsor Announcements,
Police Escort for the Military Teams,
Volunteers, Lost and Found,
Public Telephones,
VIP Tents Catered and Re-supplied,
and don't forget...
Entertain the Corporate Sponsors

This manual is a planning aid, and is in no way intended to address all the circumstances in planning an airshow. There is no warranty of any kind, express or implied, concerning this manual. The publisher of this information and its agents are released from liability arising out of the use of the manual even if injuries or death result from the sole active or passive negligence of its' material contents, of its' agents, or a willful act or failure to act, or as a result of any breach of contract, warranty or other duty, however imposed. This manual is copyrighted and the manual or

any portion thereof may not be reproduced without permission of the author, just e-mail me!

THE AIR SHOW SITE

Consider two (2) things in selecting an air show site.

1. What kind of aircraft will be participating in the air show?

For smaller aircraft the site will require an area (a rectangular box) that will can be secured and clear of an obstructions, obstacles and people that is 1,000 feet wide, and approximately 4,000 feet long and from ground level to 2,500 AGL (Above Ground Level), up to 15, 000 MSL (Mean Sea-Level). Jet aircraft will require an area 3,000 feet wide, approximately 13, 200 feet long with the same altitude requirements.

An easy method to determine where this rectangular box can be located at the air show site is to draw the area required on a plastic sheet (to scale) and place it over an aerial or topographical map.

2. How large is the expected crowd?

The crowd attendance must be projected, and then the air show site can be configured to accommodate the spectators with parking and a festival seating area. Another area that must be considered is the access route, junctions and intersections that will be traveled by the crowd to gain entry (and exit) to the air show.

An extreme amount of answers will be required before the actual air show is in progress; here are a few answers to the questions you may encounter:

OFF AIRPORT SITE

The show site may be an airport or an off site facility that will accommodate and appease a large crowd and the aircraft involved in the air show. With the off site facility there must be an airport within a reasonable measure to support the aircraft involved in the air show.

Reasonable measure may be construed by 1.) How much fuel will it take to get from the supporting airport to the off site air show facility? 2.) How much fuel will it to do the required maneuvers for the performance? 3.) How much fuel will it take to get back to the supporting airport? What is the fuel capacity of the aircraft and can the aircraft make the round trip?

ON AIRPORT SITE

In selecting the air show site, the major contributing factor will be: Can the aircraft, scheduled to perform, do their maneuvers within the "*aerobatic box*" while maintaining the required distance from the "*crowd line*" without violating any congested areas? An aerial map (with known distance) of the show site area will be necessary to determine this factor. The distance required would also be affected by the type of aircraft that are performing.

Since it has been determined that the air show site can permit the maneuvers the immediate factor is: Can the supporting Fixed-Based Operator (FBO) maintain the aircraft? Is the runway length, long enough? Is the runway width, wide enough? Is the runway and static display area weight requirements within the capacity of the aircraft? Can the airport perimeter be secured? Are there adequate access routes to accommodate the traffic? What is the impact of closing the airport or intermingling air show acts between scheduled airline traffic?

AIRPORT FACILITY

The airport manager will be instrumental in answering a majority of these questions. The airport manager, along with the aircraft commander, can also request the necessary waivers appropriate if the aircraft exceed any of the airport requirements. However, now that the waiver, for an overweight aircraft, has been approved where will the overweight aircraft be parked and what is the weight capacity of the parking area in the static display ramp?

If the airport is also being used for the show site, the airport manager just became an essential member of the air show planning staff. The airport manager, his airport maintenance staff, tower facility, Emergency Fire and Rescue Team will be the means to providing the keys to necessary access gates, sweeping runways and taxi-ways, mowing the grass in parking areas, communicating to aircraft outside the waived airspace area and providing the necessary coverage of emergency support equipment.

AIRCRAFT SUPPORT

Can the supporting airport provide the correct fuel type and quantity necessary for the entire air show at the appropriate and flow rate, refueling trucks, tug vehicles, and certain petroleum products necessary? Can the airport provide hanger space? The list of supporting factors goes on and on and this is just to support the aircraft.

Determine the requirements of the aircraft expected at the air show. Consolidate an accurate listing of the participating aircraft's length, width, weight and servicing requirements. The servicing requirements may request that a particular starting unit be available for an aircraft to participate. What about stairs up and down for the spectators to view the aircraft or aircraft signage?

The Fixed Based Operator (FBO) at the airport will be essential in satisfying a majority of the questions pertaining to the aircraft support requirements and how the FBO can accommodate these aircraft. At some airport facilities, a number of FBO's may be available and it might become necessary to negotiate fuel prices, government contract fuel and the method of payment by the aircraft owner or the air show producer.

TRAFFICKING

Now that it has been determined that the airport is suitable for the performing and static aircraft, what about the crowd? How is the crowd contained? What about the traffic? Where will they park? How will they be ticketed? What facilities are available to them?

Working from the outside - in, the spectators first impression of the air show is the traffic. Months prior to the air show the trafficking authorities should be notified and a meeting place determined because the air show will bring Super Bowl size traffic to area that is hardly accommodating and during the construction season. A follow up meeting may be required in order to discuss updated information, to plot who is covering what intersection, and where any road maintenance may occur.

Consult with the local Police Department, Sheriff's Department and State Troopers that have the authority within the jurisdiction of the show site area. Notify them of the dates and times of the air show and what will be the anticipated crowd size on each day.

From these estimates a traffic plan can be devised and possible traffic "*bottlenecks*" can be identified in advance to expedite traffic and identify potentially trouble areas. Traffic signs will speed the flow of traffic, however air show fabricated signage on city or state roads without the approval of the police authorities may be a violation. Air show signs within the air show site are essential to traffic flow.

Once the traffic plan has been worked and reworked a diagram should be

printed and displayed in the local newspaper. This will assist motorists, not only those who attend the air show but those who need to avoid the traffic congestion.

TICKETING

Advance ticket sales for the air show should begin at a minimum of ninety days from the date of the air show. Advanced ticketing sales can be negotiated with a local computer ticket sales company. The advantages of utilizing a computer ticket sales company might be: Tickets can be obtained from any of their outlets, within the surrounding area or outside the area, air show advertising can be included in the monthly ticketing brochures and the ticket can include the sponsor's name. Keep in mind that they will handle the advance tickets. A method of handling day of show tickets will have to be determined.

There are two (2) methods the air show spectator can be ticketed for the air show on the day of the air show. One method is from the spectator's automobile or after they have parked, the spectator is funneled through the ticketing line. If the air show decides on the automobile method they must consider the backup of traffic onto the major arteries of traffic flow into the air show site. And how many chutes should be made available to expedite the transaction and proceed to the parking area. The spectator funneled through the ticketing line may speed the traffic flow into the air show site, allow them to park and then sold a ticket at the entrance gate to the static display ramp area.

The spectator has purchased a festival type seating ticket which allows him access to the air show area. Other methods, to generate revenue, are offering the spectator a seat in an area on the flight line for an additional cost.

SPECTATOR CONVENIENCES

Food and Beverage:

Concession companies are very skilled and adept to the air show spectators requirements for food and beverage. In addition, the net return can exceed the start up costs for the equipment necessary in order for the air show to feed the spectator. Still in both cases, the Local Fire Marshall must be contacted and the necessary permits obtained to construct tents and health permits obtained to serve the food.

Water:

Spectators will require ample amounts of water. Water buffalo's or bladders can be obtained from the local National Guard or Army Reserve Units. These facilities may need to be re-supplied during the air show, or placed under a tent for the added shade to keep the water fresh or cool. Signage should be placed around the water to help identify the area to spectators. Trash containers should be placed around this area and made available for waste.

Portable Conveniences/Rest Room Facilities:

Portable facilities will be required for the spectators. These facilities will also require necessities to accommodate the special needs of other spectators. The portable rest rooms will need to be serviced overnight or between shows. A serviceman may be required on site to manage unforeseeable situations.

Public Address Announcements:

The public address should reach each to each end of the crowd line an approximately one hundred feet in depth. It should not be over powering, sound garbled or disruptive. The volume should be controlled that spectators are able to speak to one another without having to scream.

The public address system is a critical piece of equipment. It should be used for public safety information (No Smoking around static displays), to help relocate lost children, in case of an emergency and to keep the crowd and media informed.

Baby Changing Room:

For the prepared parents the air show must be prepared. This facility will provide a convenient location for the expecting parents. Many arena or stadium facilities are equipped to handle baby changing in the rest rooms, at an air show, one room or one tent with side curtains is adequate. Equip the area with tables, chairs for the breast-fed babies and trash cans for diaper disposal.

Automatic Teller Machine (ATM):

Spectators arrive at the air show site with a limited amount of funds. Once they have paid for their tickets and food there may be circumstance for an ATM. Keep in mind that the ATM will require a data phone line to transmit

approval codes for the transaction to be accomplished. It may also require servicing overnight or between shows. The air show may have to weigh the benefits versus losing the sale. Does the novelty company contracted accept credit cards?

Lost and Found Booth:

The lost and found booth is a spectacular site for a spectator who has lost their child or an item. While maintaining a Lost and Found Booth insure that there are accommodations for the children such as toys, books, coloring books or games to occupy them while they are separated from their family. Also, maintain a sign out log for those retrieving their child. This may be the only means to identify to whom the child was turned over. Ensure there is communications with the public address system to make periodic lost children announcements.

Public Telephones:

Coin-operated telephones situated on a trailer located away from the main throw of the public address speakers are ideal. Contact your local telephone company to coordinate this service.

First Aid:

First Aid will be required for cuts and bruises and transport to the local hospital. Assign a facility, hanger or room for the first aid area. It should be staffed with air show personnel and qualified Emergency Medical Technicians and ambulance(s). An ample supply of cots and water should be in the First Aid area. This area should be curtained out from the site of other spectators. The staff will act as a liaison between the patient and the injured spectators friends or relative. The staff will keep an accurate log of each incident and where the patient was transported.

First Aid Sub-Stations can be located throughout the spectator area or static display area. These can be used for minor incidents. It will also allow an attendant on site more rapidly than confining the medical area to one location. It also allows the medical attendant to administer aid or call for back up assistance.

Roving medical attendants in carts structured for moving spectators are unique in providing a rapid response to an incident and the transportability to capability to transfer the patient to the main first aid area.

In all cases, ambulances should be on site to protect against the worst situations. The ambulances should be staffed with qualified Emergency Medical Technicians (EMT's). Transportation may be required from where the person is injured to the first aid area or local hospital. Moving or transporting a spectator involved in an incident that requires medical attention should not be moved. A medical injury requires the attention of qualified technicians. The decision to move a spectator should come from the qualified Emergency Medical Technicians.

Information Booth:

Air show sites are so large that information booths may be necessary. This will assist the spectator and inform the spectators of the different locations of attractions and general information questions. Have some maps available and the attendants should be well informed of the air show site.

Performer Autograph Area:

The performer autograph area is a designated area that the announcer can inform the spectator that the performers will be signing autographs. This accomplishes the necessity for the performers to enter act with the general public.

THE AIR SHOW STAFF

The personnel listed are the key staff positions, responsibilities and duties of the Air Show Organizations:

AIR SHOW DIRECTOR

The Air Show Director is responsible for all aspects of presenting the Air Show. The Air Show Director will set policy, formulate the financing and budget (establish ticket prices) and will monitor the conduct of the air show. The Air Show Director will act as the liaison between the air show board and the governmental agencies (Federal, State, County, City) and will assure compliance to all regulations necessary to produce the air show.

The Air Show Director is responsible for the approval of the air show's site. Approval for the air show rests upon two principal approvals. The approval of the show site facility manager and the Flight Standards District Officer (FSDO) of the Federal Aviation Administration (FAA) that regulates the air space over the show site.

In an attempt to produce the air show the permission of the landowner or

airport authority must be acquired before preparing for the air show. Once the permission is acquired, planning can begin for the air show.

Working together, at the same time, approval for the airspace over the show site must also be approved. Approval for the show site without the approval for the airspace is a static display ramp. Consequently, while working on the approval of the air show site, work for the approval of the airspace.

Now that the FSDO has been alerted of the airspace requirements and preliminary approval has been granted for the airspace does not necessarily mean you have acquired everything that is essential. Although approval for the site has been granted, the show site may be shared by:

- a.) commercial traffic restricting the time required for the airspace requested or
- b.) The show site is close to an airport facility so that it may restrict the necessary airspace altitude required.

The Air Show Director is responsible for the conduct of air show, the staff, spectators, aircraft, air show site, all contractual agreements and financial obligations.

DIRECTOR OF AIR SHOW OPERATIONS

The Director of Air Show Operations is the manager of all Air and Ground Operations activities. The Director of Operations must be capable of interacting with the government agencies, individuals and groups that have an interest in the Air and Ground Operations of an Air Show.

The Director of Air Show Operations will contract all air show elements and coordinate Department of Defense (DOD) and military participation. The Director of Air Show Operations will contract acts and coordinate military participation.

The Director of Air Show Operations is responsible for the safe and orderly presentation of the air show consistent with all applicable Federal Aviation Regulations, [FAA - Federal Aviation Administration](#), State, County, City and Municipal Regulations.

Advisory Circular 91.45C (Waivers: Aviation Events), FAR Part 91.303 (Aerobatic Flight), FAR 91.117 Aircraft Speed, FAR 91.119 (Minimum Safe Altitudes: General, FAR Part 103, FAR Part 133.35, Order 8700.1,

Chapters 49 and 50, change 4 & 9, FAA Form 7711-2 and FAA Air Show Bulletins. [Federal Aviation Regulations, Part 91.](#)

The Director of Air Show Operations will act as the liaison for the air show and complete early and ongoing communications with the Airport Manager, the Flight Standards District Office (FSDO), Tower and Air Traffic Control (ATC) representatives.

a. The Director of Air Show Operations will coordinate activities with the Airport Manager in respect to ramp space, fixed based operations, parking and hanger space requirements.

b. The Director of Air Show Operations will be responsible for filing the FAA Form 7711-2, Application for a Certificate of Waiver or Authorization and NOTAMS with the FAA. This entitles the Director of Air Show Operations the authority to cancel air acts or the event if deemed necessary for the safe conduct of the air show.

c. The Director of Air Show Operations will monitor the Safety Brief with the FAA's Inspector in Charge and supervise the signing of the waiver by the performers, check pilots flight license, statement of aerobatic competency, flight physical and insurance (notice: expiration date).

The Director of Air Show Operations is responsible for contracting a security company and determining the security needs and requirements of the air show.

Air Show Site Security Plan:

- Main Entrance Gates
- Perimeter Security
- Static Display Security
- Parking Lot Security
- Performer Aircraft Area
- Crowdline Security
- Overnight Security
- Airport Office Security
- VIP Area Security
- Commercial Display Security

The Director of Air Show Operations will determine all support requirements for the air show, to include set-up and teardown and task each coordinator with the responsibility of fulfilling the requirements.

DIRECTOR OF AIR SHOW OPERATIONS STAFF

1. Air Operations Coordinator

The Air Operations Manager/Air Boss will be briefed by the Director of Air Show Operations. The Air Operations Manager will be briefed on the total content of the air and ground operations of the air show to include minor and major emergency procedures.

The Air Operations Manager will be responsible to conduct the Pilot's Briefing. This briefing will be conducted in accordance with AC 91-45C and 8700.1 Chapter 50, Section 2, paragraph 5.D and will include the No-Brief-No Fly Rule.

The Air Operations Manager is responsible for air show traffic control inside the area defined in the FAA Form 7711-2 at the times specified.

2. Announcer

The Announcer will be responsible for keeping the crowd informed. The Announcer's duties will include making general public address announcements for the public awareness and safety. These announcements will include:

- No Smoking Within 50 Feet of the Aircraft
- Deposit of Trash/To prevent damage to aircraft
- The importance of drinking water
- The use of sun block
- Show-Line
- Restricted Areas

The Announcer will be the key person to control the crowd during an emergency and maintaining control of the Flight line.

3. Pyrotechnics Contractor

A pyro contractor will be responsible for any pyrotechnic requirements at the air show. References will be collected on specific pyro companies. Only pyro contractors with necessary insurance coverage's will be considered.

The transportation, handling or discharging of pyrotechnics or explosives will be controlled by a federally licensed pyrotechnics expert.

Coordination of all pyrotechnics will begin with the license requirements for

the state, county and specific facility. The hazardous materials office of the fire department will be notified.

A secure, remote area will be designated for storage and staging of all pyro materials and activities: ground and aerial.

The pyro contractor must attend the Pilot Briefing and give a detailed thorough briefing to everyone concerned regarding the pyro performance.

The pyro will pose no potential problems to the FAA airways or navigational aids to the runways or airport.

A communications link will be established with the pyro contractor to coordinate activities or response with the Airport Fire and Rescue Chief.

Grassy areas may be burned, under the supervision of the Airport Fire and Rescue Chief prior to the discharge of any pyro to eliminate the possible problems of fires caused by pyro.

Pyro will be clearly marked with orange cones.

4. Ground Operations Coordinator

The Ground Operations are as important to a safe and successful air show as flight operations. The Grounds Operations Coordinator is responsible for the ramp layout, sanitation of the runways, taxiways and static display area of FOD and the Airfield Fire Fighters.

The Grounds Operations Coordinator will be provided a vehicle and personnel to coordinate trash control. The Grounds Operation Coordinator will coordinate trash containers and disposal of trash after each days performance.

The Grounds Operations Coordinator will review all on-site locations with the Director of Air Show Operations and determine the most advantageous sites for:

- Commercial Display Area
- Static Display Area
- Concession and Novelty
- Vendor Area
- First-Aid Area
- Lost and Found Area
- Crowdline

Spectator Parking
VIP Parking
Handicapped Parking
Performer Parking
VIP/Sponsor Parking
Show Center
Power/Electrical
Water
Trash Collection Areas
Entry Points
Main Office Area
Briefing Room
Security Office
Communications Center
Portable Rest Room Designate VIP Area and Tents
Announcer's Stand

The Grounds Operations Coordinator will review all air show elements contracts and determine their requirements. The Grounds Operations Coordinator will compile the air show elements and distribute these requirements to the appropriate coordinator.

1. Arrival Schedule and Parking Plan

- a. Chocks and Tie-Downs (Hanger Space for performers aircraft)
- b. Ramp and Taxi-way cleanliness (FOD)
- c. Fire Bottles
- d. Ground Support Equipment and Aircraft Services (Coordinated with the FBO)
- e. Aircraft movement after arrival
- f. Servicing Fuels
- g. Ramp Coordinator
- h. Departure Schedule

2. The Departure Briefing will be conducted during the Sunday Briefing.

- a. Assign Teams with Equipment (POL Specialist, Air/Elec. Starts, and Tow Bars)
- b. Sequence Aircraft
- c. Tug all aircraft to clear staging area.
- d. Assign a starting crew
- e. Have all fuel available

5. Air Act Coordinator

The Act Coordinator will communicate with each act contracted and coordinate air show information prior to the show, arrival at the show site and departure from the airfield. The following information is some of the performer requirements:

- General Show Information
- Prime Contact Information
- Tentative Show Schedule
- Waiver Provisions
- Media Appearance Information/Media Show
- Lodging/Housing
- Social Schedule/Special Dress Requirements
- Arrival Time at Air Show
- Short Brief
- Receive Information Packet
- Map of the City and Area
- Show Briefing Time & Location
- Press Show
- Practice Times
- Frequencies
- Alternate Frequencies
- Layout of Aerobatic Area
- Special Events
- Presentations
- VIP Tents
- Sponsors
- Logistical Support
- Hanger Space
- Tie-Down Availability
- Vehicles
- Tools/Equipment Storage
- Security

6. Military Teams Coordinator

The Military Teams Coordinator will be responsible for collecting support manual information from each Military Team and detailing that information to each particular Coordinator.

The Military Teams Coordinator will brief and assist the military teams. The

Military Teams Coordinator will disseminate the same information as the Act Coordinator.

7. Display Aircraft Coordinator

The Display Aircraft Coordinator will communicate the same information as the Act Coordinator to the Display/Static Aircraft Crew. The Display Aircraft briefing is modified to include information necessary for static display only.

The Display Aircraft will be chalked and roped off. This will eliminate possible injuries to the crowd while walking underneath the aircraft or possible damage to the aircraft.

8. Maintenance Support Coordinator

The Maintenance Support Coordinator will coordinate directly with Fixed Based Operator (FBO) on the airfield. Maintenance Support will be collected from the performers requirements and communicated to the FBO.

A meeting with the Fixed Based Operator will be necessary to determine his total capability. Any shortcoming of equipment will be passed on to the Director of Air Show Operations to determine a course to locate the equipment.

The Maintenance Support Coordinator will be responsible for fuel, oil and smoke oil allocations. The Maintenance Support Coordinator will require a pick-up truck for transporting necessary equipment from the FBO site to the aircraft staging area. No aircraft will be refueled without the supervision of the aircraft owner or crew chief. No aircraft will be re-supplied with smoke oil without the supervision of aircraft owner or crew chief.

The Maintenance Support Coordinator will assure that no refueling will take place in the crowd or while the crowd is surrounding the aircraft. While refueling, the Maintenance Support Coordinator will ensure that fire bottles are stationed at the aircraft and that the aircraft is properly grounded.

9. Security Coordinator

Security is linked to jurisdiction. Who has the jurisdiction in a particular location? A state road or site would be the jurisdiction of the State Patrol. An area or road governed by the county would be the jurisdiction of the County Sheriff. The city can have jurisdiction on city property or roads. The air show's site is the jurisdiction of the air show's producers.

An air show site may have entry via a federal interstate onto a County Highway then access a city road. Consult with the local Police Department, Sheriff's Department and State Troopers that have the authority within the jurisdiction of the show site area. Notify them of the dates and times of the air show and what will be the anticipated crowd size on each day.

Security comes in two forms; outside or perimeter security and security within the air show's site. The perimeter must be secured to prevent the public from the access to the aerobatic box area and becoming a possible safety violation and the FAA stopping the show until they are removed.

The Security Coordinator will be responsible for Airfield Security, Static Display Overnight Security, Security of Performers Aircraft and security of the Crowdline.

The Security Coordinator will ensure the spectators maintain a 100' distance from any aircraft starting its' engine(s). If necessary, the aircraft will be required to be towed to a clear area before starting its' engine(s). Crowd should be kept clear of prop-blast or engine exhaust of jet aircraft.

The Aircraft Security Coordinator will be advised of security area (performer aircraft area and static display area), total number of aircraft, times pilots should be with their aircraft, fire equipment location and whom to notify in case of emergency.

The Security Coordinator will be responsible securing an accident area detailed by the Director of Air Show Operations.

10. Housing/Transportation Coordinator

The Housing/Transportation Coordinator will be responsible for getting the major acts (performer aircraft) and the Display/Static Aircraft their hotel rooms and transportation in the most expedient manner. The Housing/Transportation Coordinator will be set up in a tent in the performer aircraft pit area. The Act Coordinator and Display Aircraft Coordinator will direct their pilots and crew to the Housing/Transportation Coordinator.

A representative from the hotel and rental agency will be present along with the housing/Transportation Coordinator to assist with sign in/sign out of hotel and transportation.

The Housing/Transportation Coordinator will ensure that each act receives an information packet and map of the area.

The Display/Static Aircraft will be assigned housing and informed of transportation to and from the airfield.

11. Special Events Coordinator

The Special Events Coordinator will coordinate any special social requirements to the Act Coordinator and Display Aircraft Coordinator. The information should include: time, dress, location and any special presentations.

The Special Events Coordinator will establish credential requirements for these functions.

The Special Events Coordinator will establish credential requirements for the Concessionaires, Vendors and Exhibitors.

12. Fly-In Coordinator

The Fly-In aircraft is an opportunity to familiarize your airport and FBO with new potential business to the airport and FBO. The fly-in aircraft experience should be enjoyable however; the potential for problems may arise if not accurately coordinated.

The Fly-In Coordinator must determine the fly-in capacity that the air show or FBO can adequately and safely handle.

The Fly-In Coordinator will advise the pilot of aircraft tie-down area and where the FBO is located and inform the flying public of the procedures and limitations.

The fly-in aircraft will have to be informed of arrival schedule, taxi instructions and departure plans.

The fly-in aircraft will require appropriate credentials for access to their aircraft and ticketing requirements for the air show.

13. Media Coordinator

The Media Coordinator will be responsible for the previous air show media evaluation, the purchase, barter or trade of all electronic media, billboards, fliers, handbills, posters and the production of all advertisement materials for the air show.

The Media Coordinator duties include: coordinating with the Acts Coordinator for press information on performers to assist in constructing

media kits, scheduling advance interviews, coordinating a press pass for the media and hosting the Media Tent at the press and air show.

The Media Coordinator will notify and schedule the media for the Press Show. The Media Coordinator will host the Media Tent during the air show performance and brief the media of their boundaries of operation.

The Media coordinator will coordinate with the Act Coordinator who will supply necessary material from the contracted acts, the Security coordinator to arrange the appropriate credentials and the parking coordinator to arrange appropriate parking permits.

In case of an accident the Media Coordinator will take charge of the media and assemble them in the media briefing room. The Media Coordinator will notify the media of the pertinent information. This information will include: act, name (pending notification of relatives), aircraft type, location of accident and when or at what time the accident occurred. Any statement of probable cause of the accident will be made by the Director of Air Show Operations, the Federal Aviation Administration representative or the Airport Manager.

14. Marketing Sales Coordinator

The Marketing Sales Coordinator will be responsible for design and publishing a sponsorship proposal package for corporate sales of the air show. The Marketing Sales Coordinator will target specific sponsors, determine a proposal package for cash and in-kind services and contract the targeted sponsors.

The Marketing Sales Coordinator will coordinate commercial booth space sales for the air show. The marketing coordinator will coordinate with the ground operations coordinator, draw up the amount of booth space available, and arrange for any special requirements for the exhibitor.

Booth space can be sold in 10' x 10' sections.

Example



The ground operations coordinator can tape off the appropriate sections inside the hanger of portable structure prior to the events.

1. Consider marking the hanger floor with chalk or contractor tape to identify the appropriate booth.
2. Leave the appropriate spacing between the rows and isles for spectator traffic.
3. No fuel inside the hanger.
4. Mark emergency exits.
5. Arrange for adequate fire protection.

15. Vehicular Traffic Coordinator

Months prior to the air show the trafficking authorities should be notified and a meeting place determined because the air show will bring Super Bowl size traffic to area that is hardly accommodating. A follow up meeting may be required in order to discuss updated information, to plot who is covering what intersection, and where any road maintenance may occur.

Consult with the local Police Department, Sheriff's Department and State Troopers that have the authority within the jurisdiction of the show site area. Notify them of the dates and times of the air show and what will be the anticipated crowd size on each day. From these estimates a traffic plan can be devised and possible traffic "*bottlenecks*" can be identified in advance to expedite traffic and identify potentially trouble areas. Traffic signs will speed the flow of traffic however air show fabricated signage on city or state roads without the approval of the police authorities may be a violation. Air show signs within the air show site is essential.

The Traffic Coordinator is responsible for air show vehicular traffic control inside and outside the airport and is responsible for providing an orderly and planned traffic control plan for the air show spectators, airport tenants, VIP's, performers and emergency evacuation routes.

The Traffic Coordinator shall ensure that traffic on and off the airport is moved expeditiously and professionally both inbound and outbound, before, during and after the air show performance. The Traffic Controller shall coordinate directly with local law enforcement agencies and formulate any necessary plans to accommodate this movement of traffic.

The Traffic Coordinator is responsible for ensuring that airport tenants have access to and from their work places.

Traffic

1. Outside Airport Area

a. The Traffic Coordinator will utilize traffic message signs to route traffic to the airport:

Example: Air Show Traffic Exit 1 Mile
Air Show Traffic Keep Right

b. The perimeter of the airport will be marked, *"No Parking, By Order of Local Police"*.

2. Inside Airport Area

a. All tenant parking will be marked, No Parking.

b. VIP area will be identified and marked.

c. Spectator parking will be identified and marked.

3. Flight-Line

a. ONLY essential vehicles and those identified with Flight line passes will be allowed on the Flight line during the show. Any vehicle deemed as not necessary for essential operation of the air show operations will be requested to leave the Flight line.

16. Parking Coordinator

The Parking Coordinator will plan and utilize the space available, which will portray the efficient use of airport property and minimize inconvenience to the public. Vehicles will be parked so as not to restrict any gates or fire lanes.

Vehicles, which obstruct gates or fire lanes, will be towed immediately at the owners expense. The Parking Coordinator will secure a towing company that will comply with the policies of the air show and be available for jump starts and vehicle assistance at the owners expense.

The parking plan will include clearly marked handicapped parking spaces. Tenant parking lots will not be used without permission from the tenant.

The parking area will require trash barrels (a substantial amount of waste is disposed of in the parking area and will require policing after the air show.

17. Medical Coordinator First Aid Station(s)

Emergency response to spectators and other persons should be addressed relative to the level of need and the nature of the emergency. Well-marked medical first aid locations will be established in the spectator area. These stations will be shaded and will have proper first aid medical equipment. The personnel staffing these stations will be certified paramedics and will be equipped with mobile capabilities to move into the crowd, static and staging areas. The first aid stations are designed to treat heat-related incidents and minor injuries.

Another level of emergency care will be an Emergency Medical Service (EMS) type vehicle capable of treating and transporting to outside medical facilities any emergency beyond the first aid station capability.

18. Volunteer Coordinator

The volunteer coordinator will be responsible for soliciting voluntary staffing support for the air show. The volunteer coordinator will determine the staffing requirements, brief volunteers, scheduling volunteers, arrange volunteer check-in area and assign volunteer staff to positions.

The volunteer coordinator will acquire the necessary credentials and parking areas required for the volunteer staff.

19. VIP and Sponsorship Hospitality Area Coordinator

The VIP Coordinator is responsible for identifying the locations for the VIP and Hospitality areas, set-up and teardown and hosting the compound during the performance of the air show.

The VIP Coordinators duties will include: Coordinating location assignment and personnel to construct the compound, locate tents, tables, chairs, table dressings, security fencing to secure the area, coordinate a pass system, position portable facilities, provide ice, beverages, containers, coolers and detailing security for access to the area.

The VIP Coordinator will arrange this area to be catered and coordinate beverages to be served.

A mini-bus should be acquired to transport VIP's from the parking area to the VIP area and back to the parking area after the show.

The VIP Coordinator will arrange any hanger party, contract for any special

equipment, arrange for tables, chairs, caterer, band or DJ, staging, electrical beverages, determine a method to identify minors and facility Lighting.

The VIP coordinator will arrange for a Pilot's Lounge that will provide comfort and communications (telephone and facsimile machine) to the supporting pilots and crew. This area will accommodate the pilots and the crew from the heat and the crowd. This lounge will be equipped to handle message board operations.

20. Concessionaires/Vendors/Exhibitor Coordinator

The Concessionaires, Vendors and Exhibitors Coordinator will coordinate with the Ground Operations Coordinator and arrange any special requirements. Only contractors that possess the appropriate licenses, permits and insurance should be allowed to contract with the air show.

The contracted concessionaire and novelty vendor will require an office, communications and a re-supply area designated for concessionaires, vendors and exhibitors. This area should have parking and electrical power for forty (40) foot trailers and refrigerator trailers.

The Concessionaires, Vendors and Exhibitors will receive credentials from the Security Coordinator for access to the airport and set up area. These credentials will also permit parking in a designated area close to the concessions or exhibit area.

The Concessionaires/Vendors and Exhibitors coordinator will coordinate with the Marketing Coordinator to arrange commercial booth space for exhibitors.

21. Trash Coordinator

The Trash Coordinator will be responsible for the collection of trash and FOD.

The Trash Coordinator will be responsible to the Ground Operations Coordinator.

The Trash Coordinator duties will include policing of the airport grounds and parking areas before, during and after each day at the air show. The Trash Coordinator will arrange with local service to be picked up each day. The Trash Coordinator will arrange and locate trash receptacles and thirty (30) yard dumpsters around the flight line.

22. Ticketing and Revenue/Accounting Coordinator

There are two (2) methods that the air show's spectator can be ticketed for the air show. One method is from the spectator's automobile or after they have parked, the spectator is funneled through the ticketing line. If the air show decides on the automobile method they must consider the backup of traffic onto the major arteries of traffic flow into the air show site. In addition, how many chutes should be made available to expedite the transaction and proceed to the parking area? The spectator funneled through the ticketing line may speed the traffic flow into the air show site, allow them to park and then sold a ticket at the entrance gate to the static display ramp area.

The accounting coordinator will be responsible for updating the air show budget, making advance deposits to performers and military teams, determining performer method of payment schedule, arrange for the handling and accounting of cash payments, be available to sign checks on short notice and arrange for novelties closeout and concessions closeout at the conclusion of the air show. The accounting coordinator will also prepare the Air Show Profit/Loss Statement.

The accounting coordinator will arrange a cash pick-up at Ticketing Booths.

Prior to the air show, the accounting coordinator will establish with local outlets a method of advance ticket sales. The accounting coordinator will monitor advance ticket sales and establish a method of coupon redemption.

During the air show the accounting coordinator will arrange for qualified staff to sale tickets at the entrance gates, arrange for a cash float for change, arrange cash pick-ups, cash drawers, money bags, counters and aprons.

23. Independent Safety Observer

An independent safety observer will be assigned by and report directly to the Director of Air Show Operations. The Independent Safety Observer will utilize a checklist to monitor all air and ground operations activities throughout the aviation event. During the aviation event, the independent safety observer should immediately report any unsafe situation to the Director of Air and Ground Operations.

24. Operations Assistant

The Operations Assistant(s) will be directly responsible to the Director of Air Show Operations. The Operations Assistants will have a good working knowledge of each Coordinator position and will be available to assist each Coordinator with their position.

DEVELOPING THE EMERGENCY PLAN

INTRODUCTION

Overview

The Emergency Plan can never be tested until there an emergency occurs. The incident range can extend from a minor or simple impairment to a major catastrophe where fatality numbers are huge. The best remedy to test the plan is to orchestrate all those entities that will be involved and have a detailed walk-through, a tabletop exercise testing the Airport Emergency and Air Show Plan. A list of attendees is listed below:

Airport Manager
Air Traffic Control Chief
Airport Fire & Rescue Commander
Local Police Authority
State Police Authority
County Sheriff Authority
Hospital Network Authority
Ambulance Representative
Life Flight Helicopter Representative
Air Show Director
Air Operations Coordinator
Ground Operations Coordinator
Air Show Security Coordinator
Disaster Relief Agencies

The Emergency Plan is written to designate who is in charge during a particular emergency, reducing the reaction time to respond to an emergency, assuring the proper emergency equipment responds and identifies, examines and reduces the potential emergency areas. In order to do this effectively the Emergency Plan must be written and a walk-through exercise conducted.

The Emergency Plan will accompany the pre-existing Airport Emergency Plan.

WHO'S IN CHARGE?

The Aircraft Rescue and Fire Fighting (ARFF) Chief will determine action to be taken dictated by the nature of the incident and the airport accident plan policy. The airport manager will direct and coordinate the overall incident response to include mutual assistance support from off the airport EMS, security and response to the media.

For major accident response, the ARFF Chief will assume the In-Charge role and all activities will cease, the airport will belong to the fire chief. Once this organization has been established, the airport accident plan will be executed.

The air show's operations have ceased, the control of the airport has been turned over to the airport manager and the local tower facility is in operation. The airport accident plan is executed and the air show emergency plan is in effect. The ARFF is busy controlling the accident site and it is now the air show responsibility to control the massive crowd situation. Once the area of the accident has been secured the air show will have to contend with the massive number of spectators who will leave the air show site and deal with the family member(s) who might be involved with the accident and the media.

THE AIR SHOW EMERGENCY PLAN

PURPOSE

The purpose of the emergency plan is to provide direction to those having responsibilities in order to assist them in the intellectual execution of an air show emergency. This plan can only provide the basis for action in case of an emergency, the succeeding action depends on the character of the emergency, and they are issued after consultation with all the appropriate authorities.

Members of the air show's staff are not to make statements to the press or the general public about an emergency situation. Statements will only be made by the _____ (i.e..... Airport Manager, Airport Relations Director)

EVENT DESCRIPTION

Describe the Event: The XYZ Air Show will be conducted at the county airport on Saturday and Sunday, July 30 & 31, 1996. A crowd of

approximately 15,000 is expected on Saturday July 30 and a crowd of approximately 30,000 is expected on July 31, 1996 between the hours of 0900 and 1700 local time.

CRITICAL TIMES

The critical times of the air show will begin with the Press show on Friday and including the standard performances on Saturday and Sunday. Specific times will be listed on the FAA Form 7711-2.

The air show will expect arrivals on Friday, July 28, 1996 between 0900 and 1200. Departures will occur on Sunday, July 31, 1996 after 6:00pm.

The airport will be closed to aircraft traffic between:

Thursday, July 28, 1996 1000 - 1200 Jet Team Arrival

Friday, July 29, 1996 1200 - 1700 Press Show

Saturday, July 30, 1996 1200 - 1700 Show

Sunday, July 31, 1996 1200 - 1700 Show

EMERGENCY CHAIN OF COMMAND

Air Show Director

Air Show Ground and Air Operations Director

Air Operations Coordinator

Ground Operations Coordinator

Security Coordinator

ROLES AND RESPONSIBILITIES

Air Show Director is in overall charge of the air show and spectators. The Air Show Director will assist the airport manager in maintaining control of the accident site.

Air Show Ground and Air Operations Director will coordinate with the air operations coordinator and ground operations coordinator and security coordinator and assist the air show director.

Air Operations Coordinator will cease air operations and return the control of air operations to the Air Traffic Control (ATC) Facility.

Ground Operations Coordinator will coordinate and assist the air show ground and operations director.

Security Coordinator will maintain security of the air show and secure the

accident site.

CROWD CONTROL

During a spectator or an aircraft accident, crowd control will be the responsibility of the Security Chief. Spectators must be kept away from the area of incident.

EMERGENCY SERVICES

List Emergency Medical Assets

Listed below are the organizations providing Emergency Medical Service Support:

1. Services on Airport
 - a. Airport Fire and Rescue
2. Services off Airport
 - a. City Fire Departments
3. Medical Services
 - a. Local Ambulance Services
4. Security Services
 - a. Local Sheriff
 - b. Local Police
 - c. State Patrol
 - d. Hired Security Staff
 - e. Volunteer Security Staff

Planning, communication and readiness are essential to an effective Safety and Emergency Program at the air show. The air show operations staff must discipline itself to meet the critical challenge in implementing safety and decreasing ground and air accidents which may occur. The objective is to maintain the highest level of public and aircrew safety. The most important element of the safety procedures and emergency policy is to communicate them clearly to the air show staff, the Aircraft Rescue and Fire Fighting (ARFF) Chief, airport manager, tower control chief and ground emergency units. No emergency plan is complete without reviewing the Airport Disaster and Community Emergency Plan.

Reaction to an aircraft accident during an air show should be identical to that which would take place at the airport at any other time. Simply, at the moment of the incident, on scene authority reverts from air show control to the responsible Aircraft Rescue and Fire Fighting (ARFF) chief. The

rationale is that on scene response should be addressed by qualified personnel with proper equipment.

MILITARY EMERGENCY

If the accident involves a military aircraft, the Senior Military Officer on the airport will be in charge of the on-scene control and reclamation, if he/she is so authorized by the Federal Government.

The ARFF Chief will be required to know oil and fuel types, which will be used, and how to access the variety of aircraft you will have at the air show.

EMERGENCY EXIT ROUTE

Access routes to display aircraft and participant aircraft will be defined. A route to and from the air show will be designated as the emergency entrance. A determination will be made as to the method of evacuation either by helicopter or by land.

A specific route will be designated for emergency vehicles for egress and ingress to the airport. This route will be extended from the flight line to a distance that clears the air show spectator congestion. This route is a dedicated route for emergency use only and will be free of traffic at all times.

COMMUNICATIONS

Communications to outside sources will be critical for multiple casualty situations by the Emergency Medical Services Chief (EMS) and Aircraft Rescue and Fire Fighting (ARFF) Chief.

Good communications are essential to the air show. A communications link must be established between the Air Operations Manager, Air Show Announcer, Air Traffic Control (Tower), Remote Air Traffic Control (Approach Control), Emergency Medical Services and the Director of Air Show Operations and his staff.

The objective is to organize the communications net as to isolate critical functions on a dedicated frequency.

Arrangements must be made with the local ATC facility to use a frequency that is not otherwise used in the area. This frequency will be used for the arriving aircraft and to control the air show. This frequency should not be the tower or ground control frequency at the airport.

Frequencies must be approved with the Federal Communications Commission (FCC) sixty (60) days prior to the air show.

For a military "fly-by" an UHF radio will be required at the show control point Air Operations Manager/Air Boss.

Communications Net

Air Show Directors Net

Air Show Operations
Coordinators
Ramp Coordination
Announcer
Air Operations Manager/Air Boss
Security
Law Enforcement
Crowd Control
Parking/Traffic
Airport Fire and Rescue-Emergency Response
Chief's Net
Medical Station(s)
Emergency Frequencies
Show Control Frequency
Ground Control Frequency
Emergency Alternate VHF/UHF Radio Frequency
Emergency Alternate Airport
Military Approach Frequency
Tower Frequency
Civilian Approach Frequency
Tower Frequency

AIR SHOW COMMUNICATIONS NET (EXAMPLE)



The Air Show Communications net is designed to be a contingency plan for three (3) types of emergency situations:

Ground Emergency involving spectators Air Emergency involving the pilot and crew Air/Ground Emergency involving pilot/crew and spectators

The Air Show Director is in communication with the airport manager and the officials in charge of the area where the air show is being presented. Each of those entities has communications with their appropriate emergency agencies.

The Air & Ground Operations Director is in communications with the Air Operations Coordinator, Ground Operations Coordinator and the Emergency Center.

The Ground Operations coordinator informs the emergency center of a spectator incident involving accidents with spectators or spectators and vehicles.

AIR SHOW EMERGENCY COMMUNICATIONS NET (EXAMPLE)



The Air Show Communications Net, after a major incident occurs, transforms into the Air Show Emergency Communications Net. This occurs primarily because the air show command has been shifted to the Airport Manager and he is in control and in direct communications with the airport rescue.

The airport manager is also in communications with the city/country representatives to coordinate off airport site emergency information. The incident could involve an aircraft accident off airport site and require a city/county agency to react to the accident.

The airport manager is also in communications with the local tower authority, because the airport operations have ceased and the tower is coordinating any Life Flight helicopter operations. In all accidents involving the spectators or an aircraft, the Security Coordinator will be required to secure the area.

MEDIA

In the event of an airport crash or other major event, no one is to discuss

the incident with the news media. This is the responsibility of the airport representatives and the Director of Air Show. A briefing room will be established. Keep the media informed of the briefing room location and times of the briefing.

In a controlled situation, where casualties have been removed, the site is secured and a crane is preparing the wreckage to be moved, this may be the opportunity for the media to visit the accident site. Again, the Airport Fire and Rescue is in charge of the accident site, the airport manager is in charge of the airport and the air show has drawn this media attention. It's not your obligation to mention it, your responsibilities may include providing the transportation to and from the accident site.

As the air show representative, you will probably be too busy trying to locate all the information about the pilot/crew, type of aircraft and pertinent information about the aircraft, that you have obtained since you met this aircraft/crew on Friday. Also, locate any liability waivers the pilot signed at the conclusion of the air show flight briefing.

IDENTIFY POTENTIAL ACCIDENT AREAS

To assist in eliminating possible incidents the emergency plan can identify potential emergencies. List the areas that are suspect to danger and the different kinds of incidents that may occur in that area.

A vehicle accident can occur at any entry point, within the parking area and along the roadside. This type of incident may involve another automobile or pedestrian(s).

Within the crowd, there are several incidents, which may occur. Individual medical problems, heat related incidents and dehydration, strokes and heart attacks, the crowd congestion becomes a problem.

Aircraft pose another incident problem. Mixing the aircraft with a crowd that is not familiar with aircraft also pose problems. Be cautious regarding aircraft and crowd incidents. Check the aircraft and the spectator area. Equipment protruding from the aircraft may cause an incident.

Fire: In the event of a fire in the display area, spectator area, parking lot or any other area, the ARFF Chief is to be notified and he will take charge of the fire scene. Fires could occur in the static display area, service ramp area and performing aircraft staging area.

Hazardous Materials: In the event of a fuel or oil spill, the ARFF Chief is to be notified and he will take charge of the clean up.

Aircraft Accidents: In the event of an airport crash, control of the airport will be released to the ARFF Chief and all activities will cease. Several types of accident that might occur are:

Single aircraft incident: on runway, on taxi-ways, in crowd, off-site Multi-Aircraft Accidents: on-runway, on taxi-ways, in crowd, off site

End of Show: At the conclusion of the air show, try to identify areas that were vulnerable as the crowd was coming into the air show. The spectators will be rushed to get to their cars and travel home.

In the event that someone is in need of Emergency First Aid, the person should be taken to one of the First Aid Tents. If this is not feasible, an Emergency Medical Squad should be contacted. If there is a suspected fracture, back or neck injury, do not attempt to move the victim. Wait for the Emergency Medical Squad.

Cancellation of Emergency

When the alert is terminated, and the Federal Aviation Administration authority has given permission to move the aircraft, the Airport Fire and Rescue Chief will designate the necessary fire fighting equipment to stand by until the aircraft has been removed.