


VDFP General Aviation Firefighting for Structural Firefighters

VIRGINIA DEPARTMENT OF FIRE PROGRAMS
Aviation Firefighting for Structural Firefighters



Chapter 6
The Airport/Aircraft Emergency Plan

THE AIRPORT/AIRCRAFT EMERGENCY PLAN

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Learning Objectives

- Explain the purpose of an airport/aircraft emergency plan
- Name some of the agencies involved in the emergency plan
- Identify some of the relevant NFPA documents relating to developing and airport/aircraft emergency plan

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Learning Objectives

- Give an example of an alert notification system that can be used with the plan
- Explain the significance of a grid map
- Identify the significance of an airport preplan

THE AIRPORT/AIRCRAFT EMERGENCY PLAN

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Introduction	THE AIRPORT/AIRCRAFT EMERGENCY PLAN
<ul style="list-style-type: none">• The aircraft/airport emergency plan is the coordinating document that spells out what agencies are involved, and what needs to be done when an incident involving an airport or aircraft occurs• Having an airport/aircraft emergency plan is a good idea even if you do not have an airport in your area• Management by crisis can be avoided by developing plans before the emergency	
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The Airport/Aircraft Emergency Plan	THE AIRPORT/AIRCRAFT EMERGENCY PLAN
<ul style="list-style-type: none">• Why have an emergency plan?<ul style="list-style-type: none">– Incidents involving aircraft or an airport can be challenging, unique, and complex– Getting various agencies to work together takes practice and planning– Specific details include who is in charge, what roles each agency plays, how coordination occurs between state, local, and federal agencies	
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The Airport/Aircraft Emergency Plan	THE AIRPORT/AIRCRAFT EMERGENCY PLAN
<ul style="list-style-type: none">• When should you make an emergency plan?<ul style="list-style-type: none">– Before an incident occurs but after the need to have one has been identified– If you have the responsibility for protecting an airport, you need a plan– Airport/aircraft plans need to focus on the most likely scenarios and need to be flexible and adaptable<ul style="list-style-type: none">• Common scenarios include landing gear problems and single engine crashes near an airport	
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The Airport/Aircraft Emergency Plan

THE AIRPORT/AIRCRAFT EMERGENCY PLAN

- Who is included in the plan?
 - The plan should include a listing of all the agencies expected to be involved in an airport or aircraft emergency. Local agencies might include:
 - Airport Manager
 - Local Fire and Police Departments
 - Local Hospital(s)
 - Fixed Base Operators
 - News Media
 - Funeral Homes
 - CISD Teams
 - In addition:
 - State Police
 - FAA
 - NTSB
 - Red Cross
 - Mutual Aid Companies
 - Coast Guard
 - Civil Air Patrol
 - FBI
 - TSA
 - U.S. Customs
 - Emergency Management
 - Local Businesses for heavy machinery, environmental clean-up crews, rehabilitation supplies, etc.

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The Airport/Aircraft Emergency Plan

THE AIRPORT/AIRCRAFT EMERGENCY PLAN

- What is in the plan?
 - The plan spells out who is in charge, the goals of the involved agencies and their relationships
 - The plan should incorporate the Incident Command Structure
 - If an airport is involved, the plan should include other incidents at the airport that do not involve aircraft
 - Security should also be a concern, not just crowd control but who has access to the emergency site

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The Airport/Aircraft Emergency Plan

THE AIRPORT/AIRCRAFT EMERGENCY PLAN

- What is in the plan?
 - The plan should include up to date contact information for all agencies involved
 - The plan should include staging areas for agencies and operations to include how to access secured areas
 - Logistical considerations such as food, water, shelter, restrooms, lighting, etc

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The Airport/Aircraft Emergency Plan

- Where is the plan kept?
 - If an airport is involved, it would be viewed as the “coordinating agency of authority” and the airport manager typically would be responsible
 - If not, then the local jurisdiction (city, town, county, fire department, emergency management organization, etc.) may have the responsibility

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The Airport/Aircraft Emergency Plan

- When should the plan be used?
 - Any part of the plan can be initiated at any time there is an incident involving an airport or aircraft
 - The plan should be used as a guide for training exercise and drills
 - Hands on training for the local fire and emergency services should be conducted regularly to include: fuel spills, foam application, simulated aircraft incidents, etc.

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The Airport/Aircraft Emergency Plan

- How often should the plan be updated?
 - The plan should be reviewed after each significant incident
 - Annually to insure all data is current
 - When the plan is updated, forward a copy to all involved agencies

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The Airport/Aircraft Emergency Plan

- How do you make an emergency plan?
Who makes it?
 - The plan is a cooperative effort involving input from all who are a part of it
 - The airport is usually the key in coordinating the plan
 - References are available to help write a plan:
 - National Fire Protection Association 424, Guide for Airport/Community Emergency Planning
 - FAA Advisory Circular 150/5200-31A, Airport Emergency Plan (9-30-99)

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Standard Operating Polices, Procedures, and Guidelines

- The primary purpose of standard operating policies and procedures is to make all fire personnel know the game plan

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Standard Operating Polices, Procedures, and Guidelines

- A good SOP for dealing with GA aircraft should include:
 - Personnel and equipment resources that initially respond to this type incident
 - Who needs to be notified
 - Specific actions to ensure safety of personnel
 - Reference to using ICS
 - Reference to obtaining additional resources
 - Suggested actions to be taken to mitigate the incident

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Standard Operating Polices, Procedures, and Guidelines

- Guidelines must be based on local conditions
- The focus on aircraft accidents is life safety of the emergency crews and the occupants of the aircraft
- Several polices or procedures may be complied to deal with the variety of airport/aircraft emergencies

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Preplanning

- Information for an airport preplan should include:
 - Location, capacity, and shutoffs of mobile and stationary fuel trucks
 - Location of hangar fire department connections
 - Location of water sources
 - How to get hangar door open
 - Which buildings are likely to be occupies and when
 - The types and how many aircraft found at the airport
 - Other hazards such as cleaning fluids, oxygen, cargo, etc.
 - What kind of construction are the hangars and other buildings?
 - Who the airport manager is and the best way to contact him/her
 - Where the drains and sewers are located
 - Emergency crew access points
 - Staging areas

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Grid Map

- A simple crosshatch of lines overlaid on a map for the purpose of creating definable locations everyone who has a similar grid map can find
- Used because plane crashes can be hard to locate
- Should be a part of any airport emergency plan

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Alert Notification

- There are many ways the fire department and the airport can work together to determine how best to categorize emergencies and determine what the appropriate response should be
- Every fire department is different, however many have adopted the NFPA 424 procedures for aircraft alerts

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Alert Notification

- Alert I – an aircraft has a problem that normally would not inhibit a safe landing
 - For example, inactive landing gear lights when a pilot believes the gear is down and locked

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Alert Notification

- Alert II – An aircraft has a problem that will possibly result in an accident
 - For example, an on board fire, inability to get one or more parts of the landing gear extended, and running out of fuel

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Alert Notification	THE AIRPORT/AIRCRAFT EMERGENCY PLAN
<ul style="list-style-type: none">• Alert III – An aircraft accident has occurred<ul style="list-style-type: none">– Initial responding units are directed to the scene of an accident– Size up for such incidents should include:<ul style="list-style-type: none">• How many people are involved both with and around the downed aircraft?• What other structures are involved besides the aircraft?• Is there fuel spillage?• Is there fire?• Is there runoff?• What are the exposures?• Will terrain and weather conditions help or hinder mitigation?	6-22

Drills	THE AIRPORT/AIRCRAFT EMERGENCY PLAN
<ul style="list-style-type: none">• Some type of hands-on drill involving the airport or simulated aircraft incidents or fuel spills should be conducted regularly• Types of hands-on drills could include walk-throughs of the local airport facilities, speaking with pilots mechanics, airport officials, and seeing actual aircraft	6-23

Summary	THE AIRPORT/AIRCRAFT EMERGENCY PLAN
<ul style="list-style-type: none">• Any fire department responsible for protecting a GA airport should have a plan• A comprehensive plan is beneficial to departmental personnel in terms of safety and effectiveness• A plan cannot stand alone, specific SOPs and SOGs that address local issues are essential• A plan is only good as the effort and training that goes into it!• Testing the plan is a must!	6-24
