

Drafting Operations

Edgerton Fire Protection District

April 2012

Introduction

The information contained within this drill packet has been put together to be used as a tool, to guide you through a drafting drill. This packet was compiled using several reference sources:

- *NFPA 1142 Standard on Water Supplies for Suburban and Rural Firefighting*
- *Drafting Drills*, Lowell Fire Department, Captain Dana R. Price
- www.27-7fire.com *Water Supply and Tender Operations Course Guide*

Objective

- Establishing a water supply from anything other than a working wet hydrant is a labor-intensive, time-consuming process. It also involves knowing and being able to execute a wide range of skills in a very short period of time. This session will test the pump operator's ability to operate the pumper at draft from a static water supply source.

Safety Considerations

- Tenders should always be driven completely full or empty. Partial loads affect the safety of driving the vehicle.
- Consider removing bunker coats and wearing personal flotation devices when working within 10' of the water's edge.
- This type of operation often includes the backing of apparatus. Care should be taken to ensure that the applicable SOG's are followed.

Preparation

- Review the reference material and procedures to ensure that you are familiar with the session content.
- Perform a pre-trip inspection on the vehicle to be used in the practical evolution. Make sure all the equipment is on the truck and that there is plenty of priming oil in the reservoir.
- Locate a suitable site for drafting operations, if this site is on private property obtain permission from the property owner.

Pumping From Draft

- The process of raising water from a static source to supply a pumper is known as drafting.
- This type of operation may occur from any type of static water source including:
 - Lakes
 - Ponds
 - Streams
 - Portable Tanks

Principles of Lift

- During drafting operations, there is generally an elevation difference between the static water source and the center of the pump.
- This elevation difference is known as **lift**.
- During the process of drafting, air is pumped out of the intake hose and the fire pump, creating a pressure differential between the inside of the pump and intake hose and the atmosphere.

Dependable Lift

- Taking into consideration the surrounding atmospheric pressure and friction loss in the intake hose, every fire pump in good repair should be able to lift water at least 15 feet.

Choosing the Drafting Site

- Good drafting sites in the response district should be identified during pre-incident planning activities.
- The body of water should be large enough to supply the pumper at its rated capacity.
- A site should be chosen which allows 24 inches of water completely around the strainer.
- The pumper must be parked on stable ground.

Potential Drafting Sites

- Bingham Rd. – Sumner Township
- Highwood Clubhouse
- Mallwood
 - Road 3
 - Road 7
- Boat Launch
 - Anchor Inn
 - Harbor Recreation
 - Carp Pens
 - Bubba D's
- Others?

Draft Site Considerations

- Safety
- Weather conditions
 - Too wet?
 - Too cold?
- Is there adequate room for all necessary apparatus to work efficiently at the site?
- Other Considerations?

Radio Operations

- IC or Operations may choose to move all water supplies to the Blue channel.
- Portable radios may not work if the draft site is too far from the incident.

Discussion Questions

- Is there anything that can be done to improve safety?
- What techniques worked the best? Why?
- Is there any additional equipment needed?
- How can we improve our response?

Questions or Concerns?

