**PIERCE COUNTY**

**TACTICAL OPERATIONS MANUAL**

**OPERATIONAL GUIDELINE**

**Air Management**

**Purpose**

The purpose of the air management policy is to improve firefighter safety by describing how we will manage the air in our SCBA cylinders while operating in the hazard zone at an incident.

**RESPONSIBILITY**

***#1 Rule of Air Management***

***All members utilizing an SCBA in the hazard zone of an incident shall monitor the amount of air in their SCBA cylinder as well as their rate of air consumption in order to exit the hazard zone prior to the low air alarm activation of the SCBA.***

***Company officers shall frequently assess their crew's air consumption rates and decide the crew's exit time based on the individual with the greatest assumed air consumption rate. It is the individual firefighter's responsibility to continually assess and report their air consumption to their company officer.***

**PROCEDURE**

Firefighters shall exit the hazard zone of an incident with an emergency reserve of air. It is critical that firefighters understand that the initial 75% of the air supply is the "working and exiting air". This includes air utilized for gaining access, working toward the tactical objectives, and exiting the hazard zone. The remaining 25% of the air supply is the emergency reserve to be used only in the event an emergency occurs while exiting such as becoming lost, trapped, or entangled upon exiting the hazard zone.

**Strategic Level Air Management**

The incident commander shall consider air management a critical fireground factor when evaluating the risk management profile of a building, performing size-up, and determining the strategy. Command will assist companies in air management by:

1. Controlling position and function of crews in the hazard zone (accountability)
2. Maintaining an awareness of how long crews have been working (elapsed time notifications)
3. Insuring adequate resources are on-scene to maintain a tactical reserve (layered resources)
4. Assigning companies to multiple points of egress (150' rule)
5. Relieving and rotating operating crews as needed (recycle / rehab / on-deck).

To enhance firefighter safety, command shall maintain a tactical reserve of companies on-scene. An extra company should be assigned to a forward "on-deck" position within each division/group to facilitate rapid relief and replacement of companies that are exiting the hazard zone. The forward or "on-deck" company will also be ready and available to rapidly deploy for firefighter rescue in the event the need arises (RIC).

**Task Level Air Management**

On the fireground every firefighter is responsible for managing their own air supply and frequently communicating the status of their air supply to the company officer. In turn, the company officer will give frequent progress reports including air status to command or the division/group officer. Prior to entry into the hazard zone, the company officer will brief their crew on the plan for achieving the tactical objectives including exiting the hazard zone together.

***All members of the crew will exit prior to the low air alarm sounding on the SCBA.***

**Air Emergencies**

An air emergency is defined as: "*anytime the breathing apparatus being used cannot deliver air to the user as designed; whether by mechanical failure or if the individual has consumed the air supply beyond the designed work cycle, or an individual becomes lost or trapped within an IDHL environment regardless of air supply".*

Activation of the low-air warning (vibe alert/whistle) is an ***immediate action*** item for the individual and the crew involved. Immediate action is described as notifying command of low-air alarm activation and immediately exiting the IDLH atmosphere intact as a crew and notifying command that you are out with a PAR after exiting. If a crew member is unable to exit due to being lost, trapped, or injured an immediate May-Day shall be called.

In a situation such as a low air activation while still inside an IDLH atmosphere but near an exit and able to reach the exterior safely, the notification from the crew to command will trigger a set of questions from the IC to the crew. The IC should determine:

1. Where are you in the building?
2. Are you able to exit safely?
3. Notify me with a PAR when you are clear of the building

The IC will then notify the division/group officer if established and/or the RIC/on-deck crew stating, “I have a crew/individual that has a low air activation going off and exiting the - - - - side of the building.” This will give personnel that could affect a rescue a heads up that there could be a possible emergency and rescue personnel can position themselves accordingly.

After notification of a low-air alert, the IC will begin monitoring time elapsed since receiving notification of the low air alarm. If the individual and crew involved have not exited the building within an appropriate time frame based on their response, then command would react accordingly to the circumstances of the event. This may include emergency traffic, or a May-Day declaration and deployment of a RIC crew, based upon experience or circumstances that the IC is presented with.

**Summary of Key Points**

1. Maximum IDLH operating distance is 150 feet
2. Everyone exits and is out of the hazard zone prior to low air alarm activation.
3. Low-air warning (vibe alert/whistle) while operating in an IDLH is considered an air emergency and requires immediate action. (Notification to Command and exiting the IDLH atmosphere intact as a crew).
4. May-Day should be called if unable to leave IDLH atmosphere.