



TRADITIONS TRAINING, LLC.

“COMBAT READY” FIREFIGHTING
FIREGROUND PROVEN TIPS, TECHNIQUES & DRILLS

Fire Engineering®

Horizontal Ventilation (Its ok to take windows!)

Ventilation by definition is the replacement of stale or noxious air with fresh air. Or the fire service definition, the systematic removal of smoke and heated gases from a burning structure. So in other words, the faster we can lean and lift/remove the “bad stuff”, the more tenable the environment becomes for trapped victims. At the same time it gives fire attack crews the ability to make a harder, faster, more aggressive interior push. However, ventilation must be properly coordinated with fire attack as to not cause the fire to grow.

Some people have misheard the conversation lately and claim that “studies” indicate we shouldn’t ventilate. That is blatantly incorrect. It is well recognized (including in “studies”) that ventilation does improve conditions, so long as water is being applied on the fire and fire attack as the upper hand. The rest becomes an issue of proper method, location, and timing.

To be fast and diligent with ventilation you must also be an educated firefighter. Knowing how you are going to affect the fire makes you a more versatile asset to the overall operation. Horizontal ventilation is a “go to” tactic at times because of how quick it can be performed and the amount of relief that it gives. Proper ventilation of a standard 35 ¾” x 47 ¼” single hung window roughly (12 sq ft) can considerably improve the conditions inside residential structures from 1600-1800 sq ft.

Horizontal ventilation can be one of the fastest, most efficient forms of ventilation that can be done on a fire ground. It is also a great tactic to be used in coordination with vertical ventilation if necessary. When performing horizontal ventilation make sure you take windows as close to the fire as possible and take them ahead of travel path of fire attack crews, so as to not accelerate fire growth in their direction.

When properly performed, it can almost be looked at as “instantaneous relief” in a sense. Taking windows (horizontal ventilation) can be frowned upon at times by the “window police” - but let us revert back to being an educated firefighter and taking a systematic approach. Properly performed horizontal ventilation *improves* tenability and conditions for crews and victims and is therefore well worth any damage it may cause. When a line is on the fire and high heat and/or low visibility conditions exist, horizontal ventilation is a quick and easy asset!



photo by Robert Busbee