

With regard to Fire and Life Safety Codes, this is a state/local issue vis a vis Fire Marshall approval. **International Fire Code 104.9, Alternative materials and methods**, states, “The fire code official is authorized to approve an *alternative material or method of construction* where the fire code official finds that *the proposed design is satisfactory and complies with the intent of the provisions of this code*, and that the material, method or work offered is, for the purpose intended, at least the equivalent of that prescribed in this code in quality, strength, effectiveness, fire resistance, durability and safety.

International Fire Code 104.8, Modifications, goes on to state, “Whenever there are practical difficulties involved in carrying out the provisions of this code, the fire code official shall have the authority to grant modifications for individual cases, *provided the fire code official shall first find that special individual reason makes the strict letter of this code impractical and the modification is in compliance with the intent and purpose of this code and that such modification does not lessen health, life and fire safety requirements.*

The RhinoWare Door Barricade System is to be installed, in field, on existing doors in existing occupancies as well as new occupancies, in classrooms and other-use rooms. Codes for existing occupancies are more general in nature as they must cover generations of buildings constructed to meet codes at differing levels of code evolution. This leaves significant room for interpretation with local AHJ’s having the *final authority* of what is code compliant and what is not. **Campus Safety Products, LLC** has introduced the **RhinoWare™ Door Barricade System**, door-mounted barricade, to AHJ’s and facility managers around the country and the interest is extremely high as code compliance is evident and AHJ approval expected; pending an appropriate rating for installation on rated doors that do not impair other rated hardware nor diminish the rating on the rated door itself.

Below are some key code issues and their related interpretation/justification:

Second Single-motion for Egress

In the context of installing door barricade devices on existing classroom and office doors, pending changes in **Chapter 15 Existing Educational Occupancies** of the 2018 edition of NFPA 101, *Life Safety Code*, recognize that use of such devices needs to be addressed separately (and differently) from new doors. Specifically, item 3 under **Section 15.2.2.2.4, Classroom Door Locking to Prevent Unwanted Entry**, permits two distinctly separate releasing operations from the egress-side (the classroom/office side) of the door, provided that no keys, tools, or special knowledge or effort is needed to open the door. *The RhinoWare™ Door Barricade System requires a second single-motion for egress (but ONLY while ENGAGED during an Emergency Lockdown scenario), requiring no special keys, tools, or special knowledge. This has been proven by demonstrations with uninformed kindergarteners.*

Height of Mounted Barricade

Item 4 under 15.2.2.2.4 requires the releasing mechanism to be located no lower than 34 inches and no higher than 48 inches above the finished floor. While that requirement is clearly stated, it conflicts with the requirements of **Chapter 7 Means of Egress, Section 7.2.1.5.10.1**, which states: “The releasing mechanism for any latch shall be located as follows: (1) Not less than 34 in. (865 mm) above the finished floor for other than existing installations.” [Italics and underlining added for emphasis.] The phrase “...for other than existing installations” permits the releasing mechanisms on existing doors **to be located lower than 34 inches above the finished floor.**

A fair interpretation of 15.2.2.2.4 (4) is that it addresses the installation and use of locking and latching devices used for the normal operation of doors, not standalone auxiliary security devices that can be installed on existing doors to reinforce them against forced entry.

At this point, it is worth pointing out that the codes (e.g., IBC and the IFC) permit the installation of locks that are used for security purposes to be installed at any location. **IBC Section 1010.1.9.2 Hardware Height** states: “...Locks used only for security purposes and not used for normal operation are permitted at any height.” In the case of door barricade devices, they are only intended to be deployed/engaged during emergency conditions; they are not used under normal operating conditions. Similarly, the exception under section 404.2.6 Door Hardware, of ICC/ANSI A117.1 *Accessible and Usable Buildings and Facilities* (2009 edition), permit locks used only for security purposes to be installed at any location. **RhinoWare™ Door Barricade System will be mounted on the egress-side of the door (either push or pull-side), at the base of the door, in such a position that the barricade blade will register and enter the floor plate hole as designed.**

Opening a Door from Outside a Room

Items 1 and 2 under Section 15.2.2.2.4 of NFPA 101 require the locking devices to be lockable and releasable from the classroom side of the doors without any key, tool, or special knowledge and effort. Some auxiliary door barricade devices meet these requirements. The emphasis of these requirements is on the manipulation of the locking devices by people who are in the room.

Item 6 under Section 15.2.2.2.4 requires doors to be “...capable of being unlocked and opened from outside the room by staff with the necessary key or other credential.” The phrase “...or other credential” is subjective, leaving interpretation to AHJs and other users of the code. “Other credential” could be interpreted to be proprietary releasing devices used by staff (and first responders) to open doors from outside of the rooms.

Similarly, item 1 under **Section 1010.1.4.4, Locking Arrangements in Educational Occupancies** of the pending 2018 edition of the IBC requires: “The door shall be capable of being unlocked from outside the room with a key or other approved means.” In this case, the phrase “...other approved means” permits AHJs to determine what means of releasing devices are acceptable in their jurisdiction. **The RhinoWare™ Door Barricade System can be released from the side opposite the barricade mounting using the proprietary RhinoWare™ Tactical Breach Tool to be approved and distributed by local AHJ’s to local law enforcement, or be stored in a facility’s Knox Box.**

The installation of the door-mounted RhinoWare barricade will be preceded with a door inspection to ensure compliance pre-installation, and will be followed by a post-installation inspection to ensure post-installation compliance with NFPA guidelines. Additional periodic inspections will be required and RhinoWare is supplemented with an overall plan to ensure proper response and actuation during lockdown drills, consistent with other fire and life safety drills.

Campus Safety Products, LLC believes the **RhinoWare Door Barricade System** is the best option for schools, businesses, governments and others to provide secure-in-place protection while honoring life safety codes in case of fire.

THIS IS IMPORTANT TO NOTE: There are approximately 98,000 public schools in the United States (putting the total number of public and private schools well over 100,000). Since the early 1990’s, there have been approximately 4,000 school fires with ZERO fatalities. During this same time period, there have been **194 school shootings in the United States with a total of 290 fatalities and 366 injured**. In fact, since the shooting in Newtown, CT, there have been over 300 more school shootings in the United States!

It is our position that the possibility of implementing a device which is only engaged at the onset of an Emergency Lockdown event supersedes any perceived threat of fire safety due to hindered egress. The important thing to remember and emphasize with your local Fire Marshal is the **change of emergency**. A lockdown/active shooter present **is the emergency**. As such, precautions must be taken to protect the students and staff **IN PLACE**. The fire codes are exit-related and suppression-related tools. These codes **do not help** as related to lockdown or shooter present situations. A device that denies entry to an unwanted individual but allows an authorized user entry after the lockdown/active shooter emergency seems a logical compromise.

Schools, public and private, have many layers of fire protection. Sprinkler protection, rated walls and doors, alarm systems, and fire extinguisher along with fire drills make a very safe environment for our children. A device used only in an emergency event requiring lockdown, such as the **RhinoWare Door Barricade System**, can provide an additional level of critical protection for children and adults.

