



EL DORADO HILLS FIRE DEPARTMENT PROTECTION STANDARD

AUTOMATIC GATES ON FIRE ACCESS ROADWAYS
STANDARD #B-002 EFFECTIVE 03-30-2009

PURPOSE

It is the intent of this standard to provide for quick, reliable and easy access of emergency response fire apparatus into gated communities.

SCOPE

This standard shall apply to all residential communities installing access control devices or systems.

AUTHORITY

Chapter 5, Section 503.6 of the California Fire Code, 2007 Edition, requires that the installation of security gates across a fire apparatus access road shall be approved by the Fire Chief. Where security gates are installed, they shall have an approved means of emergency operation. The security gates and the emergency operation shall be maintained operational at all times.

The Fire Chief is authorized to modify any of the provisions of this standard upon application in writing by the owner, a lessee, or a duly authorized representative where there are practical difficulties in the way of carrying out the provisions of this standard, provided that the spirit of the standard shall be complied with and public safety is secured. The particulars of such modification and the decision of the Fire Chief shall be entered upon the records of the Department and a signed copy shall be furnished to the applicant.

REQUIRMENTS

GATES/ACCESS CONTROL DEVICES

A. Installation Requirement

1. Entrance roads (at the gate) shall have a minimum unobstructed width of fifteen (15) feet each lane if divided, or twenty (20) feet total width if not divided. In all cases, unobstructed vertical clearance shall not be less than thirteen (13) feet six (6) inches.
2. All automatic gates shall be equipped with a "Knox" emergency access override system that consists of a low security key activated switch located in accordance with Fire Department requirements.

3. All automatic gates shall also be equipped with both 3M Opticom Control device. The device shall be placed in a location allowing operation from 75 feet away.
4. Linear receiver device (approved by the Fire Department) to allow remote activation by emergency vehicles. Shall be programmed to operate with the Fire Departments current transmitters.
5. Automatic gates shall be equipped with a mechanical release.
6. A loop system located on the inside portion of the access roadway shall permit vehicular traffic to open the gate from the inside by driving over the loop. This process shall not take any special knowledge, actions or codes to open the gate to exit the area. The loop system shall also keep the gate open as long as vehicular traffic is passing through it.
7. All automatic gates shall be designed to automatically open and remain in a fully opened position during power failures.
8. Gates creating a dead-end road in excess of one hundred fifty (150) feet in length shall be provided with approved provisions for the turning around of fire apparatus.
9. The gradient for the fire apparatus access road shall not exceed the maximum approved by the Fire Department. The intent is to provide a level landing area on either side of the gate to allow emergency apparatus to be parked in a safe manner when it is necessary to exit the vehicle for manual gate activation.
10. All vehicle access control devices or systems must reach the fully open position within a total time not to exceed one second for each foot total width.
11. The receiving devices shall be installed so the signal from the transmitter will open the gate approximately 75 feet from the gate location.
12. In order to ensure that the gate/access control devices are properly maintained, a copy of the maintenance contract for the control device or system is required to be supplied to the AHJ. This maintenance contract shall include a monthly testing of the control devices, an annual preventative maintenance inspection and emergency repairs as required to maintain the gate and control devices in operative condition. If at any time this maintenance contract is voided for any reason, the access gates shall be locked in the open position and will remain locked until such time as the maintenance contract is restored.

13. Prohibited Devices: All required vehicle access openings shall provide both ingress and egress. Direction limiting devices, such as fixed tire spikes, are prohibited. No device may be used which will delay the ingress or egress of emergency responders. The total number of vehicle access control gates or systems, through which emergency equipment must pass to reach any address, shall not exceed one.

B. Plans

1. Plans for the installation of automatic gates on fire apparatus shall be submitted to the AHJ for approval prior to installation.
2. The number of plans required to be submitted per the direction of the AHJ.

C. Testing and Acceptance

1. Gates and access control equipment shall not be placed into service prior to being inspected and tested by the AHJ.

D. Emergency Access Only Road Restriction Devices “as directed by the El Dorado County Board of Supervisors”

1. When it is determined by an El Dorado County Governing Body to deviate from this standard and allow “emergency access only” gates or other delayed access restriction devices such devices shall conform to the following criteria:
 - a. Emergency access roads shall be 20 feet wide travel surface
 - b. Vertical clearance shall be a minimum of 13 foot 6 inches
 - c. Shall open from either side without any special knowledge or effort
 - d. This emergency access device shall be approved by the AHJ
 - e. A sign shall be posted “Emergency Use Only”