other personal protective equipment capable of providing protection against shock hazard must be used to prevent direct contact with the cable.

- (b) High-voltage insulated gloves, sleeves, and other insulated personal protective equipment must—
- (1) Have a voltage rating of at least Class 1 (7,500 volts) that meets or exceeds ASTM F496-97, "Standard Specification for In-Service Care of Insulating Gloves and Sleeves" (1997).
- (2) Be examined before each use for visible signs of damage;
- (3) Be removed from the underground area of the mine or destroyed when damaged or defective; and
- (4) Be electrically tested every 6 months in accordance with publication ASTM F496-97. ASTM F496-97 (Standard Specification for In-Service Care of Insulating Gloves and Sleeves, 1997) is incorporated by reference and may be inspected at any MSHA Coal Mine Safety and Health district office, or at MSHA's Office of Standards, Regulations, and Variances, 1100 Wilson Blvd., Room 2352, Arlington, Virginia 22209-3939, and at the National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call 202-741-6030, or http://www.archives.gov/ 90 to: federal\_register/

code\_of\_federal\_regulations/

ibr\_locations.html. In addition, copies of the document can be purchased from the American Society for Testing and Materials, 100 Barr Harbor Drive, West Conshohocken, Pennsylvania 19428–2959. This incorporation by reference was approved by the Director of the Federal Register in accordance with 5 U.S.C. 552(a) and 1 CFR part 51.

[67 FR 11001, Mar. 11, 2002, as amended at 67 FR 38386, June 4, 2002; 71 FR 16668, Apr. 3, 2006]

## §75.819 Motor-starter enclosures; barriers and interlocks.

Compartment separation and cover interlock switches for motor-starter enclosures must be maintained in accordance with the approval requirements of paragraphs (a) and (b) of §18.53 of part 18 of this chapter.

## § 75.820 Electrical work; troubleshooting and testing.

- (a) Electrical work on all circuits and equipment associated with high-voltage longwalls must be performed only by persons qualified under §75.153 to perform electrical work on all circuits and equipment.
- (b) Prior to performing electrical work, except for troubleshooting and testing of energized circuits and equipment as provided for in paragraph (d) of this section, a qualified person must do the following:
- (1) Deenergize the circuit or equipment with a circuit-interrupting device.
- (2) Open the circuit disconnecting device. On high-voltage circuits, ground the power conductors until work on the circuit is completed.
- (3) Lock out the disconnecting device with a padlock. When more than one qualified person is performing work, each person must install an individual padlock.
- (4) Tag the disconnecting device to identify each person working and the circuit or equipment on which work is being performed.
- (c) Each padlock and tag must be removed only by the person who installed them, except that, if that person is unavailable at the mine, the lock and tag may be removed by a person authorized by the operator, provided—
- (1) The authorized person is qualified under paragraph (a) of this section; and
- (2) The operator ensures that the person who installed the lock and tag is aware of the removal before that person resumes work on the affected circuit or equipment.
- (d) Troubleshooting and testing of energized circuits must be performed only—
- (1) On low- and medium-voltage circuits;
- (2) When the purpose of troubleshooting and testing is to determine voltages and currents; and
- (3) By persons qualified to perform electrical work and who wear protective gloves on circuits that exceed 40 volts in accordance with the following table: