

available because it is not currently in production, the manufacturer will notify MSHA when it is available. Representatives of the applicant and other persons agreed upon by MSHA and the applicant may be present during audit tests and evaluations. MSHA will also consider requests by others to observe tests.

(c) A conveyor belt will be subject to audit for cause at any time MSHA believes the approval holder product is not in compliance with the technical requirements of the approval.

§ 14.11 Revocation.

(a) MSHA may revoke for cause an approval issued under this Part if the conveyor belt—

(1) Fails to meet the technical requirements; or

(2) Creates a danger or hazard when used in a mine.

(b) Prior to revoking an approval, the approval holder will be informed in writing of MSHA's intention to revoke. The notice will—

(1) Explain the reasons for the proposed revocation; and

(2) Provide the approval holder an opportunity to demonstrate or achieve compliance with the product approval requirements.

(c) Upon request to MSHA, the approval holder will be given the opportunity for a hearing.

(d) If a conveyor belt poses an imminent danger to the safety or health of miners, an approval may be immediately suspended without written notice of the Agency's intention to revoke.

Subpart B—Technical Requirements

§ 14.20 Flame resistance.

Conveyor belts for use in underground coal mines must be flame-resistant and:

(a) Tested in accordance with § 14.22 of this part; or

(b) Tested in accordance with an alternate test determined by MSHA to be equivalent under 30 CFR §§6.20 and 14.4(e).

§ 14.21 Laboratory-scale flame test apparatus.

The principal parts of the apparatus used to test for flame resistance of conveyor belts are as follows—

(a) A horizontal test chamber 66 inches (167.6 cm) long by 18 inches (45.7 cm) square (inside dimensions) constructed from 1 inch (2.5 cm) thick Marinite I®, or equivalent insulating material.

(b) A 16-gauge (0.16 cm) stainless steel duct section which tapers over a length of at least 24 inches (61 cm) from a 20 inch (51 cm) square cross-sectional area at the test chamber connection to a 12 inch (30.5 cm) diameter exhaust duct, or equivalent. The interior surface of the tapered duct section must be lined with ½ inch (1.27 cm) thick ceramic blanket insulation, or equivalent insulating material. The tapered duct must be tightly connected to the test chamber.

(c) A U-shaped gas-fueled impinged jet burner ignition source, measuring 12 inches (30.5 cm) long and 4 inches (10.2 cm) wide, with two parallel rows of 6 jets each. Each jet is spaced alternately along the U-shaped burner tube. The 2 rows of jets are slanted so that they point toward each other and the flame from each jet impinges upon each other in pairs. The burner fuel must be at least 98 percent methane (technical grade) or natural gas containing at least 96 percent combustible gases, which includes not less than 93 percent methane.

(d) A removable steel rack, consisting of 2 parallel rails and supports that form a 7 ± ⅛ inches (17.8 ± 0.3 cm) wide by 60 ± ⅛ inches (152.4 ± 0.3 cm) long assembly to hold a belt sample.

(1) The 2 parallel rails, with a 5 ± ⅛ inches (12.7 ± 0.3 cm) space between them, comprise the top of the rack. The rails and supports must be constructed of slotted angle iron with holes along the top surface.

(2) The top surface of the rack must be 8 ± ⅛ inches (20.3 ± 0.3 cm) from the inside roof of the test chamber.

§ 14.22 Test for flame resistance of conveyor belts.

(a) *Test procedures.* The test must be conducted in the following sequence

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using a flame test apparatus meeting the specifications of §14.21:

(1) Lay three samples of the belt, $60 \pm \frac{1}{4}$ inches (152.4 ± 0.6 cm) long by $9 \pm \frac{1}{8}$ inches (22.9 ± 0.3 cm) wide, flat at a temperature of 70 ± 10 °Fahrenheit (21 ± 5 °Centigrade) for at least 24 hours prior to the test;

(2) For each of three tests, place one belt sample with the load-carrying surface facing up on the rails of the rack so that the sample extends $1 \pm \frac{1}{8}$ inch (2.5 ± 0.3 cm) beyond the front of the rails and $1 \pm \frac{1}{8}$ inch (2.5 ± 0.3 cm) from the outer lengthwise edge of each rail;

(3) Fasten the sample to the rails of the rack with steel washers and cotter pins. The cotter pins shall extend at least $\frac{3}{4}$ inch (1.9 cm) below the rails. Equivalent fasteners may be used. Make a series of 5 holes approximately $\frac{9}{32}$ inch (0.7 cm) in diameter along both edges of the belt sample, starting at the first rail hole within 2 inches (5.1 cm) from the front edge of the sample. Make the next hole $5 \pm \frac{1}{4}$ inches (12.7 ± 0.6 cm) from the first, the third hole $5 \pm \frac{1}{4}$ inches (12.7 ± 0.6 cm) from the second, the fourth hole approximately midway along the length of the sample, and the fifth hole near the end of the sample. After placing a washer over each sample hole, insert a cotter pin through the hole and spread it apart to secure the sample to the rail;

(4) Center the rack and sample in the test chamber with the front end of the sample $6 \pm \frac{1}{2}$ inches (15.2 ± 1.27 cm) from the entrance;

(5) Measure the airflow with a 4-inch (10.2 cm) diameter vane anemometer, or an equivalent device, placed on the centerline of the belt sample $12 \pm \frac{1}{2}$ inches (30.5 ± 1.27 cm) from the chamber entrance. Adjust the airflow passing through the chamber to 200 ± 20 ft/min (61 ± 6 m/min);

(6) Before starting the test on each sample, the inner surface temperature of the chamber roof measured at points $6 \pm \frac{1}{2}$, $30 \pm \frac{1}{2}$, and $60 \pm \frac{1}{2}$ inches (15.2 ± 1.27 , 76.2 ± 1.27 , and 152.4 ± 1.27 cm) from the front entrance of the chamber must not exceed 95 °Fahrenheit (35 °Centigrade) at any of these points with the specified airflow passing through the chamber. The temperature of the air entering the chamber during the test on each sample must not be

less than 50 °Fahrenheit (10 °Centigrade);

(7) Center the burner in front of the sample's leading edge with the plane, defined by the tips of the burner jets, $\frac{3}{4} \pm \frac{1}{8}$ inch (1.9 ± 0.3 cm) from the front edge of the belt;

(8) With the burner lowered away from the sample, set the gas flow at 1.2 ± 0.1 standard cubic feet per minute (SCFM) (34 ± 2.8 liters per minute) and then ignite the gas burner. Maintain the gas flow to the burner throughout the 5 to 5.1 minute ignition period;

(9) After applying the burner flame to the front edge of the sample for a 5 to 5.1 minute ignition period, lower the burner away from the sample and extinguish the burner flame;

(10) After completion of each test, determine the undamaged portion across the entire width of the sample. Blistering without charring does not constitute damage.

(b) *Acceptable performance.* Each tested sample must exhibit an undamaged portion across its entire width.

(c) MSHA may modify the procedures of the flammability test for belts constructed of thicknesses more than $\frac{3}{4}$ inch (1.9 cm).

§ 14.23 New technology.

MSHA may approve a conveyor belt that incorporates technology for which the requirements of this part are not applicable if the Agency determines that the conveyor belt is as safe as those which meet the requirements of this part.

PART 15—REQUIREMENTS FOR APPROVAL OF EXPLOSIVES AND SHEATHED EXPLOSIVE UNITS

Subpart A—General Provisions

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