

worker, shall be provided, and where practicable, shall maintain immediate access to a working radio. When immediate access to a working radio is not available, the employee responsible for on-track safety or lone worker shall be equipped with a radio capable of monitoring transmissions from train movements in the vicinity. A railroad with fewer than 400,000 annual employee work hours may provide immediate access to working wireless communications as an alternative to a working radio.

(c) This section does not apply to:

(1) Railroads which have fewer than 400,000 annual employee work hours, and which do not operate trains in excess of 25 miles per hour; or

(2) Railroad operations where the work location of the roadway work group or lone worker:

(i) Is physically inaccessible to trains; or

(ii) Has no through traffic or traffic on adjacent tracks during the period when roadway workers will be present.

§ 220.13 Reporting emergencies.

(a) Employees shall immediately report by the quickest means available derailments, collisions, storms, wash-outs, fires, obstructions to tracks, and other hazardous conditions which could result in death or injury, damage to property or serious disruption of railroad operations.

(b) In reporting emergencies, employees shall follow:

(1) The procedures of § 220.47 when using a radio; or

(2) The procedures specified for reporting emergencies in the railroad's timetables or timetable special instructions, when using another means of wireless communications.

(c) Employees shall describe as completely as possible the nature, degree and location of the hazard.

(d) An alternative means of communications capability shall be provided whenever the control center is unattended or unable to receive radio transmissions during a period in which railroad operations are conducted.

Subpart B—Radio and Wireless Communication Procedures

§ 220.21 Railroad operating rules; radio communications; record-keeping.

(a) The operating rules of each railroad with respect to radio communications shall conform to the requirements of this part.

(b) Thirty days before commencing to use radio communications in connection with railroad operations each railroad shall retain one copy of its current operating rules with respect to radio communications at the locations prescribed in paragraphs (b) (1) and (b)(2) of this section. Each amendment to these operating rules shall be filed at such locations within 30 days after it is issued. These records shall be made available to representatives of the Federal Railroad Administration for inspection and photocopying during normal business hours.

(1) Each Class I railroad, each Class II railroad, each railroad providing intercity rail passenger service, and each railroad providing commuter service in a metropolitan or suburban area shall retain such rules at each of its division headquarters and at its system headquarters; and (2) Each Class III railroad and any other railroad subject to this part but not subject to paragraph (b)(1) of this section shall retain such rules at the system headquarters of the railroad.

(c) For purposes of this section, the terms Class I railroad, Class II railroad, and Class III railroad have the meaning given these terms in 49 CFR Part 1201.

§ 220.23 Publication of radio information.

Each railroad shall designate where radio base stations are installed, where wayside stations may be contacted, and the appropriate radio channels used by these stations in connection with railroad operations by publishing them in a timetable or special instruction. The publication shall indicate the periods during which base and wayside radio stations are operational.

§ 220.25

§ 220.25 Instruction and operational testing of employees.

Each employee who a railroad authorizes to use a radio in connection with a railroad operation, shall be:

(a) Provided with a copy of the railroad's operating rules governing the use of radio communication in a railroad operation;

(b) Instructed in the proper use of radio communication as part of the program of instruction prescribed in §217.11 of this chapter; and

(c) Periodically tested under the operational testing requirements in §217.9 of this chapter.

§ 220.27 Identification.

(a) Except as provided in paragraph (c) of this section, the identification of each wayside, base or yard station shall include at least the following minimum elements, stated in the order listed:

(1) Name of railroad. An abbreviated name or initial letters of the railroad may be used where the name or initials are in general usage and are understood in the railroad industry; and

(2) Name and location of office or other unique designation.

(b) Except as provided in paragraph (c) of this section, the identification of each mobile station shall consist of the following elements, stated in the order listed:

(1) Name of railroad. An abbreviated name or initial letters of the railroad may be used where the name or initial letters are in general usage and are understood in the railroad industry;

(2) Train name (number), if one has been assigned, or other appropriate unit designation; and

(3) When necessary, the word "locomotive", "motorcar", or other unique identifier which indicates to the listener the precise mobile transmitting station.

(c) If positive identification is achieved in connection with switching, classification, and similar operations wholly within a yard, fixed and mobile units may use short identification after the initial transmission and acknowledgment consistent with applicable Federal Communications Commission regulations governing "Station Identification".

49 CFR Ch. II (10-1-11 Edition)

§ 220.29 Statement of letters and numbers in radio communications.

(a) If necessary for clarity, a phonetic alphabet shall be used to pronounce any letter used as an initial, except initial letters of railroads. See appendix A of this part for the recommended phonetic alphabet.

(b) A word which needs to be spelled for clarity, such as a station name, shall first be pronounced, and then spelled. If necessary, the word shall be spelled again, using a phonetic alphabet.

(c) Numbers shall be spoken by digit, except that exact multiples of hundreds and thousands may be stated as such. A decimal point shall be indicated by the words "decimal," "dot," or "point." (See appendix B to this part, for a recommended guide to the pronunciation of numbers.)

§ 220.31 Initiating a radio transmission.

BEFORE TRANSMITTING BY RADIO, AN EMPLOYEE SHALL:

(a) Listen to ensure that the channel on which the employee intends to transmit is not already in use;

(b) Identify the employee's station in accordance with the requirements of § 220.27; and

(c) Verify that the employee has made radio contact with the person or station with whom the employee intends to communicate by listening for an acknowledgment. If the station acknowledging the employee's transmission fails to identify itself properly, the employee shall require a proper identification before proceeding with the transmission.

§ 220.33 Receiving a radio transmission.

(a) Upon receiving a radio call, an employee shall promptly acknowledge the call, identifying the employee's station in accordance with the requirements of § 220.27 and stand by to receive. An employee need not attend the radio during the time that this would interfere with other immediate duties relating to the safety of railroad operations.

(b) An employee who receives a transmission shall repeat it to the

Federal Railroad Administration, DOT

§ 220.49

transmitting party unless the communication:

(1) Relates to yard switching operations;

(2) Is a recorded message from an automatic alarm device; or

(3) Is general in nature and does not contain any information, instruction or advice which could affect the safety of a railroad operation.

§ 220.35 Ending a radio transmission.

(a) Except for transmissions relating to yard switching operations, at the close of each transmission to which a response is expected, the transmitting employee shall say "over" to indicate to the receiving employee that the transmission is ended.

(b) Except for transmissions relating to yard switching operations, at the close of each transmission to which no response is expected, the transmitting employee shall state the employee's identification followed by the word "out" to indicate to the receiving employee that the exchange of transmissions is complete.

§ 220.37 Testing radio and wireless communication equipment.

(a) Each radio, and all primary and redundant wireless communication equipment used under §§ 220.9 and 220.11, shall be tested as soon as practicable to ensure that the equipment functions as intended prior to the commencement of the work assignment.

(b) The test of a radio shall consist of an exchange of voice transmissions with another radio. The employee receiving the transmission shall advise the employee conducting the test of the clarity of the transmission.

§ 220.38 Communication equipment failure.

(a) Any radio or wireless communication device found not to be functioning as intended when tested pursuant to § 220.37 shall be removed from service and the dispatcher or other employee designated by the railroad shall be so notified as soon as practicable.

(b) If a radio or wireless communication device fails on the controlling locomotive en route, the train may continue until the earlier of—

(1) The next calendar day inspection, or

(2) The nearest forward point where the radio or wireless communication device can be repaired or replaced.

§ 220.39 Continuous radio monitoring.

Each radio used in a railroad operation shall be turned on to the appropriate channel as designated in § 220.23 and adjusted to receive communications.

§ 220.41 [Reserved]

§ 220.43 Radio communications consistent with federal regulations and railroad operating rules.

Radio communication shall not be used in connection with a railroad operation in a manner which conflicts with the requirements of this part, Federal Communication Commission regulations, or the railroad's operating rules. The use of citizen band radios for railroad operating purposes is prohibited.

§ 220.45 Radio communication shall be complete.

Any radio communication which is not fully understood or completed in accordance with the requirements of this part and the operating rules of the railroad, shall not be acted upon and shall be treated as though not sent.

§ 220.47 Emergency radio transmissions.

An initial emergency radio transmission shall be preceded by the word "emergency," repeated three times. An emergency transmission shall have priority over all other transmissions and the frequency or channel shall be kept clear of non-emergency traffic for the duration of the emergency communication.

§ 220.49 Radio communication used in shoving, backing or pushing movements.

When radio communication is used in connection with the shoving, backing or pushing of a train, locomotive, car, or on-track equipment, the employee directing the movement shall specify the distance of the movement, and the

§ 220.51

movement shall stop in one-half the remaining distance unless additional instructions are received. If the instructions are not understood, the movement shall be stopped immediately and may not be resumed until the misunderstanding has been resolved, radio contact has been restored, or communication has been achieved by hand signals or other procedures in accordance with the operating rules of the railroad.

§ 220.51 Radio communications and signal indications.

(a) No information may be given by radio to a train or engine crew about the position or aspect displayed by a fixed signal. However, a radio may be used by a train crew member to communicate information about the position or aspect displayed by a fixed signal to other members of the same crew.

(b) Except as provided in the railroad's operating rules, radio communication shall not be used to convey instructions which would have the effect of overriding the indication of a fixed signal.

§ 220.61 Radio transmission of mandatory directives.

(a) Each mandatory directive may be transmitted by radio only when authorized by the railroad's operating rules. The directive shall be transmitted in accordance with the railroad's operating rules and the requirements of this part.

(b) The procedure for transmission of a mandatory directive is as follows:

(1) The train dispatcher or operator shall call the addressees of the mandatory directive and state the intention to transmit the mandatory directive.

(2) Before the mandatory directive is transmitted, the employee to receive and copy shall state the employee's name, identification, location, and readiness to receive and copy. An employee operating the controls of moving equipment shall not receive and copy mandatory directives. A mandatory directive shall not be transmitted to employees on moving equipment, if such directive cannot be received and copied without impairing safe operation of the equipment.

49 CFR Ch. II (10–1–11 Edition)

(3) A mandatory directive shall be copied in writing by the receiving employee in the format prescribed in the railroad's operating rules.

(4) After the mandatory directive has been received and copied, it shall be immediately repeated in its entirety. After verifying the accuracy of the repeated mandatory directive, the train dispatcher or operator shall then state the time and name of the employee designated by the railroad who is authorized to issue mandatory directives. An employee copying a mandatory directive shall then acknowledge by repeating the time and name of the employee so designated by the railroad.

(5)(i) For train crews, before a mandatory directive is acted upon, the conductor and engineer shall each have a written copy of the mandatory directive and make certain that the mandatory directive is read and understood by all members of the crew who are responsible for the operation of the train. Mandatory directives which have been fulfilled or canceled shall be marked with an "X" or in accordance with the railroad's operating rules, and retained for the duration of the train crew's work assignment.

(ii) For on-track equipment, before a mandatory directive is acted upon, the employee responsible for on-track safety shall have a written copy of the mandatory directive, and make certain that the mandatory directive is acknowledged by all employees who are responsible for executing that mandatory directive. The employee responsible for on-track safety shall retain a copy of the mandatory directive while it is in effect.

(6) A mandatory directive which has not been completed or which does not comply with the requirements of the railroad's operating rules and this part, may not be acted upon and shall be treated as though not sent. Information contained in a mandatory directive may not be acted upon by persons other than those to whom the mandatory directive is addressed.

Subpart C—Electronic Devices

SOURCE: 75 FR 59602, Sept. 27, 2010, unless otherwise noted.