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NFPA 600 Private Fire Brigades 1986

National Fire Protection Association Batterymarch Park, Quincy, MA 02269

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The Board of Directors reaffirms that the National Fire Protection Association recognizes that the toxicity of the products of combustion is an important factor in the loss of life from fire. NFPA has dealt with that subject in its technical committee documents for many years.

There is a concern that the growing use of synthetic materials may produce more or additional toxic products of combustion in a fire environment. The Board has, therefore, asked all NFPA technical committees to review the documents for which they are responsible to be sure that the documents respond to this current concern. To assist the committees in meeting this request, the Board has appointed an advisory committee to provide specific guidance to the technical committees on questions relating to assessing the hazards of the products of combustion.

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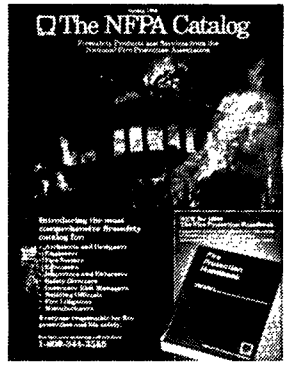

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NFPA 600

Recommendations for Organization, Training and Equipment of

Private Fire Brigades

1986 Edition

This edition of NFPA 600, *Recommendations for Organization, Training and Equipment of Private Fire Brigades*, was prepared by the Technical Committee on Loss Prevention Procedures and Practices and acted on by the National Fire Protection Association, Inc. at its Annual Meeting held May 19-22, 1986, in Atlanta, Georgia. It was issued by the Standards Council on June 11, 1986, with an effective date of July 1, 1986, and supersedes all previous editions.

The 1986 edition of this standard has been approved by the American National Standards Institute.

Changes other than editorial are indicated by a vertical rule in the margin of the pages on which they appear. These lines are included as an aid to the user in identifying changes from the previous edition.

Origin and Development of NFPA 600

In 1902 NFPA adopted *Suggestions for Organizing Private Fire Departments* recommended by the Committee on Private Fire Department Regulations. In 1912 NFPA adopted two pamphlets, *Organization and Execution of Exit Drills* and *Organization and Drilling of Private Fire Brigades*, on recommendation of the Committee on Private Fire Departments and Fire Drills. In 1924 the NFPA adopted *Suggestions for the Organization, Drilling and Equipment of Private Fire Brigades* on recommendation of the Committee on Field Practice, and revisions were adopted in 1930, 1937, and 1949.

Jurisdiction for the publication was transferred in 1948 to the new Committee on Fire Brigades and Watchmen, and a revised edition was published in 1955. The guide was completely revised in 1967.

In 1969 the Committee was reorganized as the Technical Committee on Loss Prevention Procedures and Practices, and the guide was reconfirmed in 1975. In 1981 a complete revision was accomplished, and partial revision has been made in this 1986 edition.

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(Alternate to D. K. Wilson)

This list represents the membership at the time the Committee was balloted on the text of this edition. Since that time, changes in the membership may have occurred.

NOTE: Membership on a Committee shall not in and of itself constitute an endorsement of the Association or any document developed by the Committee on which the member serves.

Contents

NFPA 600

Recommendations for Organization, Training and Equipment of

Private Fire Brigades

1986 Edition

NOTICE: An asterisk (*) following the number or letter designating a paragraph indicates explanatory material on that paragraph in Appendix A.

Information on referenced publications can be found in Chapter 7 and Appendix B.

Chapter 1 Introduction

1-1 Scope. This recommended practice deals with the organizing, operating, training, and equipping of private fire brigades. It contains general information and basic considerations common to all private fire brigades, irrespective of the size and nature of the property to be protected, but does not intend to specify requirements for any individual property.

The establishment of the type and size of a fire brigade is often set forth by governmental regulations. Various options as to types of fire brigades are included in the Occupational Safety and Health Standards, Subpart L, Fire Protection [*Code of Federal Regulations* (CFR), Title 29, Chapter XVII, Part 1910], of the Occupational Safety and Health Administration (OSHA), Department of Labor - U.S. Government. In addition, a listing of NFPA and other publications likely to affect decisions on private fire brigade organization and operations is contained in this recommended practice.

NOTE: Fire brigades include emergency groups having some basic duties as above, such as emergency brigades, emergency response teams, fire teams, and plant emergency organizations.

1-2 Purpose. The purpose of this recommended practice is to provide basic guidance with regard to the organizing, operating, training, and equipping of private fire brigades.

1-3 Definitions.

Approved. Acceptable to the "authority having jurisdiction."

NOTE: The National Fire Protection Association does not approve, inspect or certify any installations, procedures, equipment, or materials nor does it approve or evaluate testing laboratories. In determining the acceptability of installations or procedures, equipment or materials, the authority having jurisdiction may base acceptance on compliance with NFPA or other appropriate standards. In the absence of such standards, said authority may require evidence of proper installation, procedure or use. The authority having jurisdiction may also refer to the listings or labeling practices of an organization concerned with product evaluations which is in a position to determine compliance with appropriate standards for the current production of listed items.

Authority Having Jurisdiction. The "authority having jurisdiction" is the organization, office or individual responsible for "approving" equipment, an installation or a procedure.

NOTE: The phrase "authority having jurisdiction" is used in NFPA documents in a broad manner since jurisdictions and "approval" agencies vary as do their responsibilities. Where public safety is primary, the "authority having jurisdiction" may be a federal, state, local or other regional department or individual such as a fire chief, fire marshal, chief of a fire prevention bureau, labor department, health department, building official, electrical inspector, or others having statutory authority. For insurance purposes, an insurance inspection department, rating bureau, or other insurance company representative may be the "authority having jurisdiction." In many circumstances the property owner or his designated agent assumes the role of the "authority having jurisdiction"; at government installations, the commanding officer or departmental official may be the "authority having jurisdiction."

Should. Indicates a recommendation or that which is advised but not required.

Chapter 2 Organization

2-1 Type of Organization.

2-1.1 As response time is vital in fire loss control, every property should have a structured organization to deal with fires and related emergencies.

2-1.2 This organization may be provided by the property owner, the occupant, or both.

2-1.3 The potential magnitude of a fire emergency within the property or from outside the property should be evaluated to determine the type and nature of the organization to be provided.

2-2 Evaluation Factors.

2-2.1 A number of factors should be considered in evaluating the type of fire emergency organization for any given property.

2-2.2 Property Size. Evaluation should include consideration for the following:

(a) number of buildings on any given site,

(b) exposure from buildings and processes of others,

(c) outside facilities such as storage tanks and outside processing equipment,

(d) total yard area.

2-2.3 Property Accessibility. Evaluation should include consideration of primary and alternate means of access to the property and to the structures located on that property.

2-2.4 Building Size. Evaluation should include consideration of the total height above grade, levels below grade, total area, and exposure of each building and structure to each other.

2-2.5 Building Construction. Evaluation should include building and/or structure construction, such as fire resistive, noncombustible or combustible.

2-2.6 Building Contents. Evaluation should include the combustibility of the contents.

2-2.7 Fire Protection Equipment. Evaluation should include both the presence and absence of manual and automatic fire protection systems and equipment.

2-2.8 Fire Hazards. Evaluation should include the degree of fire hazards present. This evaluation may include but not be limited to housekeeping conditions, cutting, welding, hot work and open flame procedures, the handling and use of flammable and combustible liquids, the handling and use of combustible dusts, combustible loading, and continuity of combustibles.

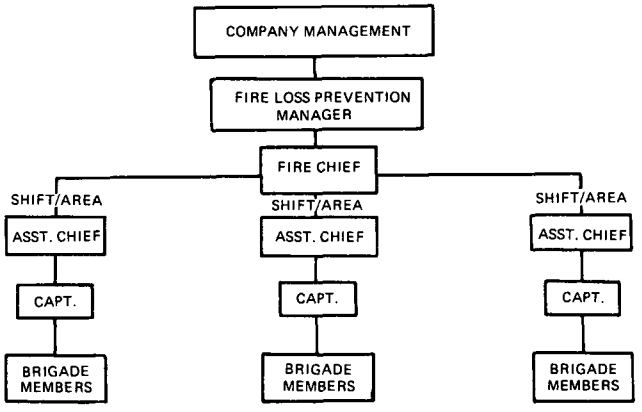
2-2.9 Personnel Safety. Evaluation should include the safety of all persons that are or could be exposed to fire emergency conditions such as fire exits, evacuation plans, drills, and rescue operations.

2-2.10 Public Fire Department Assistance. Evaluation should include both the availability and fire fighting capabilities of public fire departments.

2-3 The Fire Brigade or Brigades.

2-3.1 The numbers of persons in any given fire brigade organization should be based on a number of factors such as those noted in 2-2. In its most simple form, this organization consists of the manager of the property, assisted by selected personnel. In properties with complex or hazardous operations and where more persons are available, they should be organized as a team or teams to function as a private fire brigade. The availability of fire fighting assistance from a public fire or private fire department may affect the nature of private fire brigade organization. These do not necessarily take the place of a private fire brigade in parts of a large property. Individual fire brigades may respond to alarms in all areas of a property or each geographical or functional area may have a separate fire brigade organization according to the needs of the property. The organization should be such that a fire brigade is on duty on each working shift and at periods when the plant is shut down.

[*See Figures 2-3.1(a) and 2-3.1(b).*]



The chart may be increased or reduced in number to meet the needs of the establishment.

Figure 2-3.1(a) Organization Chart (By Position Only).

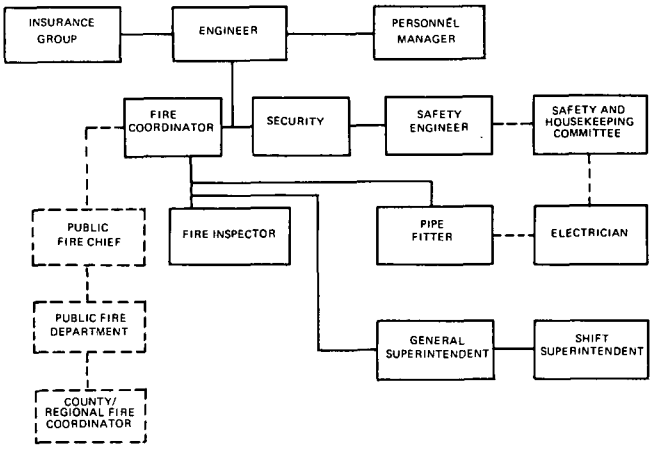


Figure 2-3.1(b)

2-3.2 Components. The equipment that must be put into service during a fire emergency should determine the number of persons required for each operating unit or company into which the brigade is organized and the total number of persons needed in the brigade. Operating units or companies may be composed of adequate personnel to operate a specific item of equipment, or a larger group to perform more complicated operations. Each unit or company should have a leader and each brigade should have a chief.

Chapter 3 Operation

3-1* Fire Brigade Management.

3-1.1 Responsibility of Company Management. Management should be responsible for the prevention of fire loss. They should:

(a) establish policy,

(b) establish authority and assign responsibility,

(c) provide budgeted funding for such items as meetings, training, and equipment.

3-1.2 Fire Loss Prevention Management. Fire loss prevention management should be responsible to:

(a) establish fire prevention and safety programs,

(b) establish the size and organization of brigades,

(c) coordinate the provision of basic, advanced, and special training,

(d) establish and maintain inspection programs,

(e) coordinate the maintenance and review of necessary reports and records,

(f) maintain liaison with local fire authorities,

(g) notify brigade members of special hazards.

3-2 Personnel Structure and Qualifications.

3-2.1 Fire Brigade Chief.

3-2.1.1 Abilities and Qualifications of Chief. The fire brigade chief should:

(a) have administrative, supervisory, and leadership abilities,

(b) have knowledge of fire prevention control,

(c) have technical knowledge of plant and procedures,

(d) be mentally alert and morally responsible,

(e) be physically capable.

3-2.1.2 Duties of Fire Brigade Chief. The fire brigade chief should:

(a) establish a chain of command within the brigade to act in his absence,

(b) assist in the selection process of brigade members,

(c) establish brigade roster — update and expand when necessary,

(d) keep assistant chiefs informed of all operations of the brigade,

(e) review all fire prevention inspections,

(f) preplan fire hazards and target areas,

(g) prepare and implement training programs,

(h) be responsible for the equipment and maintenance,

(i) recommend to management the purchase of new equipment and type needed,

(j) keep management informed as to the condition of all equipment and the status of the brigade; this should be done by monthly report,

(k) monitor hot work permits,

(l) assist in investigations and fire reports.

3-2.2 Assistant Fire Brigade Chiefs. Enough assistants should be appointed to cover the chief's position around the clock. Their rank, one to another and to the chief's, should be established to provide for succession in event of absence. Assistant fire brigade chiefs should have the same abilities as the fire brigade chief and the same duties assigned to them in the absence of the fire brigade chief.

3-2.3 Fire Brigade Members.

3-2.3.1 Membership of Brigade. Members of the fire brigade should consist of persons who can meet qualifications appropriate for fire brigade work at a particular property. Its membership should have representation from all departments to include, but not be limited to, maintenance personnel, electrical, plumbing, boiler operators, housekeeping, janitorial, storeroom, medical staff, dietary personnel, security personnel, guards, watchmen, management staff, and certain inmates in correctional institutions. Personnel not directly involved with the suppression and extinguishment should effect a prompt search for and evacuation of the building's occupants, especially the handicapped; should protect vital records and hazardous or critical materials; and should relay messages and verify the notification of the public fire department, directing them to the incident upon their arrival.

3-2.3.2 Availability of Personnel. To qualify as a member of the fire brigade, individuals should be available to answer alarms and to attend required training sessions. A prearranged schedule for availability should be established to prevent conflict of duties and to cover absences such as regular off-duty periods, vacations, and sickness.

3-2.3.3 Physical Requirements. Minimum physical requirements should be established. Only persons meeting physical, mental, and emotional requirements should be considered eligible to serve on the fire brigade. A periodic examination by a physician attesting to the fitness of an individual should be required.

NOTE: For the use of self-contained breathing apparatus, a complete annual respiratory examination should be given.

3-2.3.4 Identification. Members of the brigade should be given some appropriate identification (a card or badge, for example) for a number of purposes, including:

(a) assistance in reaching the plant in an emergency,

(b) identification by plant guards for movement within the plant or parts of it where fire brigade duties have to be performed, and

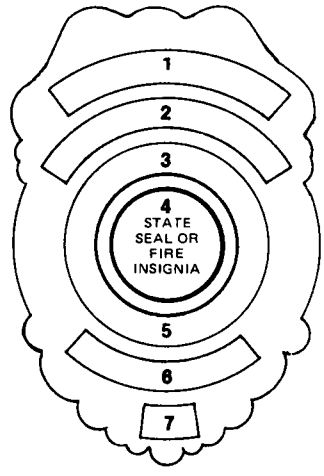
(c) response of other building occupants to their directions or to instructions by those who are responsible for fire suppression and evacuation.

(*See Figure 3-2.3.4.*)

IDENTIFICATION OF BRIGADE MEMBERS

XYZ COMPANY
PLANT FIRE BRIGADE
I hereby certify that _____
is a member in good standing.
Location _____
Signed _____
Title _____
– Expiration date is one year from issue –

FILL IN ONLY THOSE PANELS PERTAINING TO BADGE STYLE.



(1) RANK _____
(2) FIRE BRIGADE NAME _____
(3) COMPANY'S NAME _____
STATE SEAL OR FIRE EMBLEM NO.
(4) _____
(5) ------ _____
(6) UNIT _____
(7) BADGE NUMBER _____

Figure 3-2.3.4 Identification of Brigade Members.

Chapter 4 Training

4-1 Scope.

4-1.1 All members of the brigade, regardless of the type of fire fighting team or company that has been established, should be trained.

All members should be instructed in the handling of any and all of the fire and rescue apparatus provided.

4-1.2 All fire brigade leaders and instructors should be provided with training and education that is more comprehensive in nature than that provided to the general membership.

4-1.3 Members should be required to complete a specified program of instruction as a condition of continued membership in the brigade.

4-1.4* The training should include the principles and practices of fire fighting and the handling of other emergencies to the extent and degree required by the type of brigade established.

4-1.5 The training program should keep up with the problems presented by new hazards in the property and new equipment and procedures for its protection.

4-2 Purpose. Training should provide a means by which all brigade members increase knowledge and develop skills to perform individually or as a team member of a brigade. Teamwork and skill are the backbone of a good brigade.

4-2.1 Training should be conducted and supervised, where possible, by a state certified fire service instructor; public fire department or private consultants may also be able to provide a qualified instructor. Training should also include the special hazards of the site.

4-2.2 Members of the brigade should be afforded opportunities to improve their knowledge of fire prevention and fire fighting through attendance at outside meetings and special training classes.

4-3 Schedule. Fire loss prevention management should establish a schedule of training such that each brigade member receives a minimum of one hour of training per month.

4-3.1 Typical Subjects. Training subjects will vary, based on the type of brigade established. Suggested brigade training subjects may include but are not limited to:

Program Overview	Need for a trained brigade Classroom procedures Fireground procedures Fire Brigade response Multiple functions of a brigade member Communications
Plant Fire Brigade	Organizational make-up Leadership Response of brigade members
Basics of Fire Propagation and Behavior	Fire tetrahedron Stages of fire Spread of fire Methods of extinguishment Flammable liquid characteristics Any company hazardous material problems Classes of fire
Fire Prevention	Weekly inspections of all areas Evacuation drills Fire education systems for employees Maintaining good housekeeping Welding and cutting procedures program
Portable Extinguishers	Types and locations Discuss use of all portable extinguishers on Class A, B, C and D fires and provide hands-on practice
Hose and Hydrants	Locations in plant Discuss use of hose lines and nozzles and provide hands-on practice Discuss use of hydrants and provide hands-on practice Advantages of water Disadvantages of water Fire stream requirements Use of fog stream Flammable liquid fires Water and plant fire hazards Hose stream and electricity Hose stream and gas fires
Detection and Suppression Systems	Review and discuss fire detection systems Discuss water flow detection system Automatic sprinkler systems Discuss water supplies Deluge systems Foam/Water sprinklers Foam systems Halon systems Dry chemical systems Carbon dioxide systems Size up fire Plan method of attack Protection of exposures Confinement Extinguishment Overhaul
Ventilation	What is ventilation Reasons for ventilation Decision to ventilate Nature of smoke and gases Fire control Path of ventilation Ventilation precautions Ventilation problems
Salvage	What is salvage Equipment available When it should be done

XYZ COMPANY

MONTHLY FIRE BRIGADE MEETING REPORT		LOCATION	
DATE	PLACE	TIME	DURATION

ATTENDANCE

SUBJECT DISCUSSED.

RESULTS OF QUESTION AND ANSWER PERIOD:

PREPARE IN DUPLICATE. FORWARD ORIGINAL TO APPROPRIATE MANAGEMENT. RETAIN COPY IN BRIGADE FILE.

INSTRUCTOR

Figure 4-3.2(a).

XYZ COMPANY

MONTHLY FIRE BRIGADE MEETING REPORT		LOCATION ANYPLACE, U.S.A.	
DATE 00/00/00	PLACE CENTRAL DIVISION	TIME 2:00 PM	DURATION 1 HOUR

ATTENDANCE:

I. HARLAND, J. SEUL, A. IULIANO, R. QUEEN, B. WAELDE, D. BUTTS, E. LEE, A. KRAUKLIS, J. KOREN, E. ERICKSON

SUBJECT DISCUSSED.

THE MINUTES OF THE PREVIOUS MEETING WERE READ AND APPROVED. LT. BLAZE OF FIRE PREVENTION BUREAU, CITY OF ANYPLACE, PRESENTED A MOVIE, DURATION 30 MINUTES, ON FIRE BRIGADES AND THEIR ASSISTANCE TO THE LOCAL FIRE DEPARTMENTS. THIS WAS A VERY INFORMATIVE FILM. MANY GOOD POINTS WERE PRESENTED AFTER THE FILM BY THE LIEUTENANT ON OUR RESPONSIBILITIES IN HANDLING A FIRE UNTIL THE CITY FIRE DEPARTMENT ARRIVES. IN OTHER WORDS, WE ARE NOT PROFESSIONAL FIRE FIGHTERS, BUT DO OUR BEST TO CONTROL THE SITUATION UNTIL THEY DO ARRIVE.

RESULTS OF QUESTION AND ANSWER PERIOD

A FEW POINTS WERE PRESENTED BY LT. BLAZE ON THE EFFECTIVENESS OF THE CITY OF ANYPLACE FIRE DEPARTMENT WITH THE ASSISTANCE OF THE FIRE PREVENTION BUREAU ON THE LATEST EQUIPMENT, BOTH FIRE FIGHTING AND COMMUNICATIONS, TO ASSIST INDUSTRIES IN CASES OF DISASTER. FURTHER, THAT IT IS THE RESPONSIBILITY OF THE FIRE DEPARTMENT TO ASSIST IN ANY WAY POSSIBLE AFTER THE EXTINGUISHING OF A FIRE TO ASSIST IN CLEAN-UP AND PREVENTING EXCESS WATER DAMAGE, ETC. WE HAVE, AS PART OF OUR EQUIPMENT, A VACUUM PICK UP THAT IS USED ALSO FOR VARIOUS CLEANING TO BE AT THE DISPOSAL OF THE FIRE BRIGADE FOR PICKING UP EXCESS WATER, ETC., ON THE FLOOR. LT. BLAZE WAS VERY APPRECIATIVE OF OUR INVITATION TO LET THE CITY OF ANYPLACE FIRE PREVENTION BUREAU BE PRESENT AT OUR FIRE BRIGADE MEETING AND GIVE THE INSTRUCTIVE FILM AND TALK.

AFTER THE MEETING, LT. BLAZE MADE A TOUR OF THE PLANT AND WAS VERY COMPLIMENTARY OF THE HOUSEKEEPING ARRANGEMENT AND STORAGE OF PRODUCTS IN THE BUILDING.

PREPARE IN DUPLICATE. FORWARD ORIGINAL TO APPROPRIATE MANAGEMENT. RETAIN COPY IN BRIGADE FILE.

WHOMEVER
INSTRUCTOR

Figure 4-3.2(b).

	What should be protected How it should be protected
Protective Breathing Apparatus (Physical)	What it is and its components Correct use of breathing apparatus Correct inspection and maintenance after use Discuss safety precautions Discuss and practice emergency procedures
Personal Protective Equipment	For hostile environments as applicable

4-3.2 Fire Brigade Meeting Report. A meeting report form should be used to set forth training subjects, attendees, time, place, date, and discussions. [*See Figures 4-3.2(a) and 4-3.2(b).*]

4-4 Drills.

4-4.1 Scope.

4-4.1.1 The depth and frequency of drills will vary, based on the type of brigade established, but should be of sufficient depth and frequency to check the ability of members to carry out their assigned responsibilities and perform the operations they are expected to carry out with the fire equipment provided.

4-4.1.2 Drills should be held occasionally under adverse weather conditions to work out special procedures needed under those conditions.

4-4.1.3 Periodic drills and preplanning sessions should be held in conjunction with the public fire department.

4-4.2 Purpose. Drills should be used to check ability of members and leadership, use of equipment, and effectiveness of the team operation.

4-4.3 Schedule.

4-4.3.1 Drills should be carried out under the control of the chief and leaders of companies at a moderate pace with emphasis on effectiveness rather than speed. Periodically the drill should be lead by another officer to provide experience and confidence should the chief be unavailable.

4-4.3.2 During drills the equipment should be operated whenever possible. Hose lines should be stretched, charged, and water discharged. Respiratory protective equipment should be donned and used. Portable extinguishers should be discharged.

4-4.3.3 At the conclusion of a practice drill, all equipment should be promptly placed in readiness to respond to a fire call.

4-4.3.4 A critique should follow each drill to fully discuss what happened, to correct any flaws in procedures, and to discover any area that may need additional training. [*See Figures 4-3.2(a) and 4-3.2(b).*]

Chapter 5 Inspection and Maintenance

5-1 Scheduled Work. Certain duties in the periodic inspection and maintenance of plant fire equipment, both fixed and portable, may be assigned to members of the fire brigade. However, the plant manager or the fire loss prevention manager should establish the necessary schedules for such work and should assign these duties to specific personnel and see that these inspections and maintenance operations are carried out and reports filed with management.

5-2 Inspection and Service Personnel. Large plants should consider maintaining inspectors who are not necessarily members of the brigade to carry on a continuous inspection and service program for fire protection equipment. See *NFPA Inspection Manual* (*see Chapter 7*).

Chapter 6 Equipment

6-1 General. The fire brigade should be provided with equipment and tools of a variety and in such numbers as to enable it to perform the service for which it was intended and organized. Specific industries require special equipment; therefore, careful consideration should be given to special hazards and to the necessary equipment selected to combat fires of a special nature. The following is a list of principal categories of equipment that should be considered by the property manager, the loss prevention person, and the fire brigade chief as original equipment for the brigade and its maintenance or replacement.

(a) *Portable Fire Extinguishers.* See NFPA 10, *Standard for Portable Fire Extinguishers.*

(b) *Hose and Hose Accessories.* To include: a supply of hose in various quantities, compositions, and sizes in order to deliver ample water supply; combination shutoff nozzles; gated wyes; hydrant wrenches; hydrant valves; various adapters; hose spanners; hose clamps; hose jackets; rope tools or hose straps; hose bridges; and hose rollers. See NFPA 1962, *Standard for the Care, Use and Maintenance of Fire Hose Including Connections and Nozzles.*

(c) *Portable Lighting Equipment.* Includes portable electric generators, extension cords, electrical adapters, hand lights, and a supply of extra batteries.

(d) *Forcible Entry Tools.* Includes axes, saws, plaster hooks, pike poles, claw tools, door openers, crowbars, sledge hammers, wire and bolt cutters, roof cutters, and battering ram.

(e) *Ladders.* A selection of ladders of sufficient length for the work required.

(f) *Salvage and Overhaul.* Salvage covers, floor runners, brooms, squeegees, buckets, shovels, claw hammers, nails, rope, staples, bale hooks, smoke ejectors, plastic sheeting, portable pumps, water vacuums, electric extension cords, spare sprinkler heads, sprinkler stops, sprinkler wrenches, and assorted pipe plugs and caps.

(g) *Respiratory Protective Equipment.* Self-

contained portable breathing apparatus (SCBA) of the approved type, spare cylinders, air compressor, cascade or recharging station or the ability to have the cylinders recharged in a reasonable length of time.

(h) *Rescue and First Aid Equipment.* The exact equipment required should be governed by the extent to which members of the brigade have been trained. It may include first aid kits and resuscitation equipment (inhalator, resuscitator, or modification of these devices with spare cylinder).

(i) *Special Purpose Equipment.* Portable high-expansion foam-making devices, hand line foam-making devices, wheeled carbon dioxide, dry chemical and halon fire suppression equipment, emergency chemical neutralization equipment, and communication equipment.

(j) *Personnel Protective Equipment.* This may include helmets, fire coats, rubber boots, fire fighter-type protective footware, gloves, or mittens.

6-2 Transportation. The fire brigade should have transportation as needed for its particular objective. In some facilities, small trucks for inside use or motor trucks for outside use may be desirable.

6-3 Equipment Storage. Storage space for the fire brigade equipment should be provided so that it can be promptly obtained for use and proper maintenance. This may also be a convenient location to post a plan of water mains serving the property, showing all sectional valves, sprinkler valves, hydrants, and fire alarm boxes.

6-4 Inventory of Available Equipment. The property manager, the fire loss prevention staff person, or the fire brigade chief should maintain a list of the equipment available in the property that might be useful in fire brigade work, but that is not in the custody of the fire brigade. This includes such items as portable lighting equipment, power saws and other cutting tools, portable pumps, air moving equipment, electric motors for replacement purposes, tarpaulins, and roofing equipment. The list should show where each item of equipment is usually located and the name of the department or person in whose custody it may be found. A list of equipment and service agencies from which equipment, support, technical advisors, or assistance may be needed together with emergency telephone numbers should be kept up-to-date.

Chapter 7 Referenced Publications

7-1 The following documents or portions thereof are referenced within this recommended practice and should be considered part of the recommendations of this document. The edition indicated for each reference is current as of the date of the NFPA issuance of this document. These references are listed separately to facilitate updating to the latest edition by the user.

7-1.1 NFPA Publications. National Fire Protection Association, Batterymarch Park, Quincy, MA 02269.

NFPA 10-1984, *Standard for Portable Fire Extinguishers.*

NFPA 1962-1979, *Standard for the Care, Use, and Maintenance of Fire Hose Including Connections and Nozzles.*

SPP-11B-1976, *NFPA Inspection Manual.*

7-1.2 Other Publications.

Occupational Safety and Health Standards, Subpart L, Fire Protection, *Code of Federal Regulations,* Title 29, Chapter XVII, Part 1910. Director of Information and Consumer Affairs, Occupational Safety and Health Administration, 200 Constitution Avenue, N.W., Washington, D.C. 20210.

Appendix A

This Appendix is not a part of the recommendations of this NFPA document, but is included for information purposes only.

A-3-1 Management of any property has responsibility for fire loss prevention and for making plans in some detail for specific actions that are to be taken when fire breaks out.

Where there is a public fire department, and that department has not already initiated a prefire plan for the property, the management should initiate it, calling in the proper officers of the department and developing plans for a variety of situations in the property. The objective should be to anticipate, as far as possible, the emergencies and types of hazards that are likely to confront fire brigades and other personnel.

The term "fire loss prevention manager" is used to describe the functions of a person in management. It is not necessarily intended to be a model title for all plant persons to whom the described responsibilities are assigned.

A-4-1.4 Fire training facilities are best on site but may be available from local, county, or state fire service organizations. Good training facilities maximize the training program. Use of outside facilities may minimize the cost impact of providing such facilities and the problems of obtaining required burn permits.

The following is a partial list of facilities available for fire training, but is not intended to be a total list. It is recommended that you contact your local fire department for your local facility. Due to changes in local regulations, contact should be made to ascertain availability of facility and/or courses early in the planning stages of your program.

Burlington County Fire Academy
49 Rancocas Road
Mt. Holly, NJ 08060

Delaware State Fire School
RD2 - Box 166
Dover, DE 19901

Fireman Training Program
Div. of Continuing Education
Louisiana State University
Baton Rouge, LA 70803

Firemen's Training School
Texas A&M University
College Station, TX 77843

Georgia Fire Academy
534 Clay Street
Marietta, GA 30060

Iowa State University
Fire Extension Service
Ames, IA 50010

National Fire Academy
National Emergency Training Center
16825 South Seton Avenue
Emmitsburg, MD 21727-8995

Police & Fire Academy of Bergen County, New Jersey
P.O. Box 531
Mahwah, NJ 07430

Rockland County Fire Training Center
Firemen's Memorial Drive
Pomona, NY 10970

University of Maryland
Maryland Fire and Rescue Institute
College Park, MD 20742

York Technical College
Rock Hill, SC 29730

Appendix B Referenced Publications

B-1 The following documents or portions thereof are referenced within this recommended practice for informational purposes only and thus should not be considered part of the recommendations of this document. The edition indicated for each reference is current as of the date of the NFPA issuance of this document. These references are listed separately to facilitate updating to the latest edition by the user.

B-1.1 NFPA Publications. National Fire Protection Association, Batterymarch Park, Quincy, MA 02269.

NFPA 11-1983, *Standard for Low Expansion Foam and Combined Agent Systems*

NFPA 11A-1983, *Standard for Medium and High Expansion Foam Systems*

NFPA 12-1985, *Standard on Carbon Dioxide Extinguishing Systems*

NFPA 12A-1985, *Standard on Halon 1301 Fire Extinguishing Systems*

NFPA 12B-1985, *Standard on Halon 1211 Fire Extinguishing Systems*

NFPA 13-1985, *Standard for the Installation of Sprinkler Systems*

NFPA 13A-1981, *Recommended Practice for the Inspection, Testing and Maintenance of Sprinkler Systems*

NFPA 13E-1984, *Recommendations for Fire Department Operations in Properties Protected by Sprinkler and Standpipe Systems*

NFPA 14-1986, *Standard for the Installation of Standpipe and Hose Systems*

NFPA 15-1985, *Standard for Water Spray Fixed Systems for Fire Protection*

NFPA 16-1986, *Standard for the Installation of Deluge Foam-Water Sprinkler Systems and Foam-Water Spray Systems*

NFPA 17-1985, *Standard for Dry Chemical Extinguishing Systems*

NFPA 20-1983, *Standard for the Installation of Centrifugal Fire Pumps*

NFPA 22-1984, *Standard for Water Tanks for Private Fire Protection*

NFPA 24-1984, *Standard for the Installation of Private Fire Service Mains and Their Appurtenances*

NFPA 26-1983, *Recommended Practice for the Supervision of Valves Controlling Water Supply for Fire Protection*

NFPA 71-1985, *Standard for the Installation, Maintenance and Use of Central Station Signaling Systems*

NFPA 72A-1985, *Standard for the Installation, Maintenance and Use of Local Protective Signaling Systems*

NFPA 72B-1986, *Standard for the Installation, Maintenance and Use of Auxiliary Protective Signaling Systems for Fire Alarm Service*

NFPA 72C-1986, *Standard for the Installation, Maintenance and Use of Remote Station Protective Signaling Systems*

NFPA 72D-1986, *Standard for the Installation, Maintenance and Use of Proprietary Protective Signaling Systems*

NFPA 80-1986, *Standard for Fire Doors and Windows*

NFPA *101®*-1985, *Life Safety Code®*

NFPA 601-1986, *Standard for Guard Service in Fire Loss Prevention*

NFPA 602-1986, *Standard for Guard Operations in Fire Loss Prevention*

NFPA 1410-1979, *Training Standard on Initial Fire Attack*

NFPA 1901-1985, *Standard for Automotive Fire Apparatus*

NFPA 1931-1984, *Standard on Design and Design Verification Tests for Fire Department Ground Ladders*

NFPA 1961-1979, *Standard for Fire Hose*

NFPA 1963-1985, *Standard for Screw Threads and Gaskets for Fire Hose Connections*

NFPA 1981-1981, *Standard on Self-Contained Breathing Apparatus for Fire Fighters*

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SUBMITTING PROPOSALS ON NFPA TECHNICAL COMMITTEE DOCUMENTS

Contact NFPA Standards Administration for final date for receipt of proposals on a specific document.

INSTRUCTIONS

Please use the forms which follow for submitting proposed amendments. Use a separate form for each proposal.

1. For each document on which you are proposing amendment indicate:
   (a) The number and title of the document
   (b) The specific section or paragraph.

2. Check the box indicating whether or not this proposal recommends new text, revised text, or to delete text.

3. In the space identified as "Proposal" include the wording you propose as new or revised text, or indicate if you wish to delete text.

4. In the space titled "Statement of Problem and Substantiation for Proposal" state the problem which will be resolved by your recommendation and give the specific reason for your proposal including copies of tests, research papers, fire experience, etc. If a statement is more than 200 words in length, the technical committee is authorized to abstract it for the Technical Committee Report.

5. Check the box indicating whether or not this proposal is original material, and if it is not, indicate source.

6. If supplementary material (photographs, diagrams, reports, etc.) is included, you may be required to submit sufficient copies for all members and alternates of the technical committee.

NOTE: The NFPA Regulations Governing Committee Projects in Paragraph 10-10 state: Each proposal shall be submitted to the Council Secretary and shall include:

(a) identification of the submitter and his affiliation (Committee, organization, company) where appropriate, and

(b) identification of the document, paragraph of the document to which the proposal is directed, and

(c) a statement of the problem and substantiation for the proposal, and

(d) proposed text of proposal, including the wording to be added, revised (and how revised), or deleted.

FORM FOR PROPOSALS ON NFPA TECHNICAL COMMITTEE DOCUMENTS

Mail to: Secretary, Standards Council
National Fire Protection Association, Batterymarch Park, Quincy, Massachusetts 02269

Date 5/18/85 **Name** John B. Smith **Tel. No.** 617-555-1212

Address 9 Seattle St., Seattle, WA 02255

Representing (Please indicate organization, company or self) Fire Marshals Assn. of North America

1. a) **Document Title:** Protective Signaling Systems **NFPA No. & Year** NFPA 72D

   b) **Section/Paragraph:** 2-7.1 (Exception)

2. **Proposal recommends: (Check one)** ☐ new text
   ☐ revised text
   ☐ deleted text.

3. **Proposal (include proposed new or revised wording, or identification of wording to be deleted):**

   Delete exception.

4. **Statement of Problem and Substantiation for Proposal:**

   A properly installed and maintained system should be free of ground faults. The occurrence of one or more ground faults should be required to cause a "trouble" signal because it indicates a condition that could contribute to future malfunction of the system. Ground fault protection has been widely available on these systems for years and its cost is negligible. Requiring it on all systems will promote better installations, maintenance and reliability.

5. ☒ **This Proposal is original material.**
   ☐ **This Proposal is not original material; its source (if known) is as follows:** _____

(Note: Original material is considered to be the submitter's own idea based on or as a result of his own experience, thought, or research and, to the best of his knowledge, is not copied from another source.)

I agree to give NFPA all and full rights, including rights of copyright, in this Proposal and I understand that I acquire no rights in any publication of NFPA in which this Proposal in this or another similar or analogous form is used.

John B. Smith

Signature

PLEASE USE SEPARATE FORM FOR EACH PROPOSAL

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FORM FOR PROPOSALS ON NFPA TECHNICAL COMMITTEE DOCUMENTS

Mail to: Secretary, Standards Council
National Fire Protection Association, Batterymarch Park, Quincy, Massachusetts 02269

Date _____ Name _____ Tel. No. _____

Address _____

Representing (Please indicate organization, company or self) _____

1. a) Document Title: _____ NFPA No. & Year _____

   b) Section/Paragraph: _____

2. Proposal recommends: (Check one) ☐ new text
   ☐ revised text
   ☐ deleted text.

3. Proposal (include proposed new or revised wording, or identification of wording to be deleted):

Cut Here

4. Statement of Problem and Substantiation for Proposal:

5. ☐ This Proposal is original material.
   ☐ This Proposal is not original material; its source (if known) is as follows: _____

(Note: Original material is considered to be the submitter's own idea based on or as a result of his own experience, thought, or research and, to the best of his knowledge, is not copied from another source.)

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