

NFPA 1021

Fire Officer

Professional

Qualifications

1987 Edition



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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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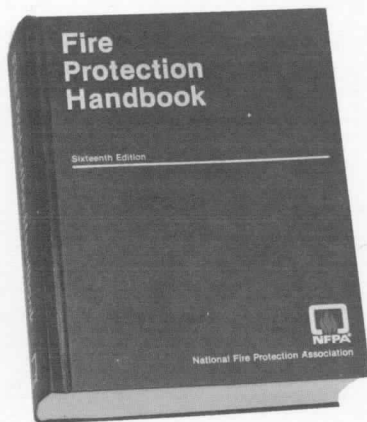
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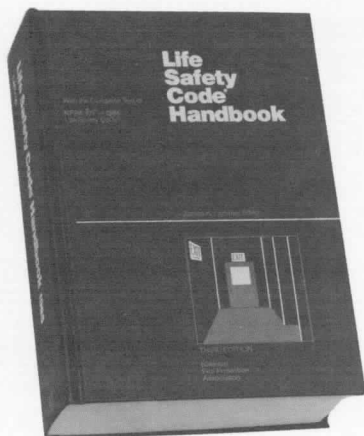
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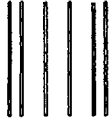
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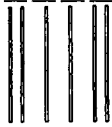
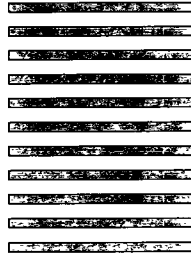
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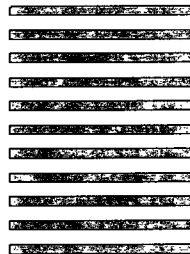
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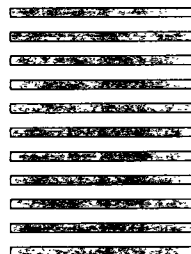
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National Professional Qualifications System
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Joint Council of National Fire Service Organizations

Fire Marshals Association of North America
International Association of Arson Investigators
International Association of Black Professional Fire Fighters
International Association of Fire Chiefs
International Association of Fire Fighters
International Fire Service Training Association
International Municipal Signal Association
International Society of Fire Service Instructors
Metropolitan Committee of International Association of Fire Chiefs
National Fire Protection Association
National Volunteer Fire Council

The Joint Council of National Fire Service Organizations consists of leaders of the principal national organizations representing the Fire Service of the United States. It meets periodically to review current developments and to establish areas of common interest where cooperative efforts of member organizations can be used for maximum results.

An important step in the establishment of national standards of professional competence for the fire service was taken by the Joint Council on October 25, 1972.

The Council decided that one area of common interest in which national collective action was desirable was in the establishment of standards upon which the levels of competency within the fire service could be determined.

A committee of the Council was delegated the responsibility of preparing an acceptable system for the development of the standards. Following several months of work, during which the suggestions of constituent organizations were incorporated, the Committee submitted the final proposal to the Joint Council and the following system was approved and established:

1. Committees to develop standards of professional competency, made up of peer group representation; and
2. An independent Board to oversee and validate standards developed and the implementation of such standards in a nationally coordinated continuing professional development program for the fire service.

The Secretariat for Committees and Board is to be provided by the staff of the National Fire Protection Association.

1. Fire Service Professional Standards Development Committees

There are four committees, each of which is made up of representatives of organizations which are constituent members of the Joint Council and certain other persons nominated by the Joint Council, collectively.

The four committees are respectively responsible for the development and preparation of recommended minimum standards of professional competence required of:

1. Fire Fighters
2. Fire Inspectors and Investigators

3. Fire Service Instructors

4. Fire Service Officers.

Each committee is established and operated under NFPA standards-making procedures with one important variation, which is that no draft standard shall be submitted to NFPA for final adoption until it has been approved by the National Professional Qualifications Board for the Fire Service.

Standards are prepared for use after final adoption as a basis for nationally standardized examinations by authorized agencies and the standards are available for adoption by federal, state and local authorities.

Committees do not determine, or become involved in, actual certification procedures or the direct implementation of the standards; they do assist implementing agencies by a continuing review and revision of the standards.

The authorized representation on each committee is as follows:

1. Fire Fighter Qualifications Committee

International Association of Fire Chiefs
International Association of Fire Fighters
International Association of Black Professional Fire Fighters
International Fire Service Training Association
International Society of Fire Service Instructors
National Fire Protection Association
Joint Council of National Fire Service Organizations

2. Fire Inspector and Investigator Qualifications Committee

Fire Marshals Association of North America
International Association of Arson Investigators
International Association of Fire Chiefs
International Association of Fire Fighters
National Fire Protection Association
Joint Council of National Fire Service Organizations

3. Fire Service Instructor Qualifications Committee

International Association of Fire Chiefs
International Association of Fire Fighters
International Fire Service Training Association
International Society of Fire Service Instructors
National Fire Protection Association
Joint Council of National Fire Service Organizations

4. Fire Service Officer Qualifications Committee

Fire Marshals Association of North America
International Association of Fire Chiefs
International Association of Fire Fighters
International Association of Black Professional Fire Fighters
International Society of Fire Service Instructors
Metropolitan Committee of the International Association of Fire Chiefs
National Fire Protection Association
Joint Council of National Fire Service Organizations

2. National Professional Qualifications Board for the Fire Service

A nine-person Board appointed by the Joint Council to act on behalf of the Council in the following duties and responsibilities:

(i) The Board is constituted to supervise a nationally coordinated continuing professional development program for the Fire Service.

- (ii) The Board shall be responsive to the needs and opinions of all groups involved with the Fire Service and of others, including individuals who have related interests.
- (iii) It shall identify and define levels of professional progression.
- (iv) It shall correlate, review and validate draft standards prepared by the Technical Committees established to produce professional standards for each level of fire service responsibility.
- (v) It shall approve all draft standards before such are submitted for final adoption procedures.
- (vi) It shall be responsible for the accreditation and supervision of any national programs of certification and shall coordinate with implementing agencies to ensure validity and reliability of the evaluation criteria used in connection with such programs.

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STATEMENT BY THE BOARD AS TO THE APPLICABILITY OF STANDARDS DEVELOPED UNDER THE SYSTEM

Application to Existing Positions

It is not the intent of the Board that these standards shall have the effect of rendering invalid any rank, qualification and appointment acquired prior to the adoption of this standard.

Upon adoption of any standard, the authority having jurisdiction shall classify its existing ranks, qualifications, and appointments to determine equivalency with an appropriate level of the standard.

An incumbent of a position established prior to adoption of a standard shall be considered qualified and eligible for future progression in accordance with the standards.

Existing Systems

Those existing systems of qualifications which meet or exceed these minimum standards should continue in force.

It is the intent, however, that existing systems of qualifications that fail to meet these standards be discontinued after adoption of the standard, so that all persons acquiring qualification thereafter do so in accordance with this standard.

The Board recognizes that, at present, wide variations exist in the standards of competence required of members of the fire service; and, that due to geographic considerations and the differing requirements of the many organizations providing fire protection, higher levels of competence than those provided in the standards produced under the National System may be desirable in certain areas.

The Board considers it essential that all members of the fire service eventually achieve the minimum standards.

Performance Objectives

The Board directed all committees to develop standards in terms of terminal performance objectives, which are considered the *minimum* necessary for a person to be considered competent to engage in providing fire service at the respective level and in the role specified by the standard, no matter where that person is serving.

In this connection, it is pointed out that the statement of performance objectives contained in the standards is not a training program outline. A number of instructional steps are required for mastery of an objective. Teaching outlines will be more detailed and extensive, as a single objective can require many hours of instruction and may interrelate to instruction for other objectives.

The Standards

The standards are designed so that any member of the fire service can achieve the level required by various means; these include participation in state and local training programs, self-study, attendance at colleges offering suitable courses, and by combinations of these means.

The standards are the first step; there must also be a controlled testing procedure by which personnel can be officially certified when they have demonstrated their competency. The Board stresses that such testing procedures are essential to a meaningful program of professionalism and, accordingly, is prepared, in conformance with the directions of the Joint Council of National Fire Service Organizations, to review the validity and quality of testing procedures established by state and local authorities, and to accredit such procedures.

The Board strongly recommends that certification procedures be established on a statewide basis in every state where no such system exists at present, and that every fire department participate in the program.

The establishment of standards and testing procedures will not, in themselves, ensure that all personnel will achieve the required levels of competency. It follows that training programs should be developed to prepare members of the fire service to acquire the skills and knowledge necessary to achieve the terminal performance objectives of the standards.

Throughout the standards, levels of numerical ascending sequence have been used to denote increasing degrees of responsibility: e.g., Fire Officer I, II, III, the lowest or basic level being I. A similar sequence will be used in each standard; the total number of levels varying in accordance with the number of steps involved in the individual standard.

(The foregoing is not part of the standard.)

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NFPA 1021
Standard for
Fire Officer Professional Qualifications
1987 Edition

This edition of NFPA 1021, *Standard for Fire Officer Professional Qualifications*, was prepared by the Technical Committee on Fire Service Professional Standards Development for Fire Service Officer Qualifications, and acted on by the National Fire Protection Association, Inc. at its Annual Meeting held May 18-21, 1987 in Cincinnati, Ohio. It was issued by the Standards Council on June 10, 1987, with an effective date of June 30, 1987, and supersedes all previous editions.

The 1987 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 1021

On December 14, 1972 the National Professional Qualifications Board for the Fire Service directed the chairman of the Technical Committees to develop minimum standards for each of the following areas: fire fighter, fire instructor, fire investigator and inspector, and fire officer.

In compliance with this direction the Fire Service Professional Development Committee for Fire Officer Qualifications met in 1973, 1974, and 1975. Information related to Fire Officer Qualifications was collected, reviewed, and discussed. The Committee identified six officer levels and established a set of objectives for each.

The intent of the Committee was to develop performance standards in a clear and concise manner so that they can be used to determine without doubt that any person so measured does truly possess the skills to be a fire officer. The Committee contends that these performance objectives can be used by any fire department in any city, town, or private organization throughout the North American continent. To this end, the committee has recommended basic disciplinary areas of study for the fire officer that will lead to advancement into other areas of the fire services.

This standard was revised by the Committee in 1987. The current edition was approved by the National Professional Qualifications Board in December 1986 and was submitted to the NFPA membership for adoption at the Annual Meeting in Cincinnati, Ohio May 20, 1987.

Committee on Fire Service Professional Standards
Development for Fire Service Officer Qualifications

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(Rep. ISFSI)

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Rep. Int'l. Assns. of Black Professional Fire
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Michael D. McGibeny, Daytona Beach Fire
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(Alternate to H. Diezel)

*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.

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NFPA 1021

Standard for

Fire Officer Professional Qualifications

1987 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 8 and Appendix B.

Chapter 1 Administration

1-1 Scope. This standard identifies the professional levels of competence required for fire department officers.

1-2 Purpose. The purpose of this standard is to specify, in terms of performance objectives, the minimum requirements of professional competence required for service as a fire officer.

The intent of the standard is to list progressive levels of knowledge required at the various levels of officer responsibility. The authority having jurisdiction has the option to combine or group the levels to meet local needs.

It is not the intent of this standard to restrict any jurisdiction from exceeding these minimum requirements.

This standard shall cover the requirements for the six levels of progression, i.e., Fire Officer I, Fire Officer II, Fire Officer III, Fire Officer IV, Fire Officer V, and Fire Officer VI.

1-3 General.

1-3.1 All of the standards for any level of fire officers shall be performed in accordance with recognized practices and procedures or as defined by an accepted authority.

1-3.2 It is not required for the objectives to be mastered in the order they appear. The local or state training program shall establish the instructional priority and the program content to prepare individuals to meet the performance objectives of this standard.

1-3.3 The Fire Fighter III shall meet all the objectives for Fire Officer I before being certified at the Fire Officer I level; and the objectives for each succeeding level in the progression shall be met before being certified at the next higher level.

1-4 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 pro-

cedures, 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."

Demonstrate. To show by actual use. This may be supplemented by, or when actual use is not feasible, replaced by simulation, explanation, illustration, or a combination of these.

Describe. To explain verbally or in writing using standard terms recognized by the fire service.

Fire Department. The organization that provides fire rescue, fire suppression, and fire prevention services to governmental or nongovernmental agencies.

Fire Officer I. The fire officer, at the first level of command, who has demonstrated the knowledge and the ability to perform the objectives specified in this standard for that level.

Fire Officer II. The fire officer, at the second level of command, who has demonstrated the knowledge and the ability to perform the objectives specified in this standard for that level.

Fire Officer III. The fire officer, at the third level of command, who has demonstrated the knowledge and the ability to perform the objectives specified in this standard for that level.

Fire Officer IV. The fire officer, at the fourth level of command, who has demonstrated the knowledge and the ability to perform the objectives specified in this standard for that level.

Fire Officer V. The fire officer, at the fifth level of command, who has demonstrated the knowledge and the ability to perform the objectives specified in this standard for that level.

Fire Officer VI. The fire officer, at the sixth level of command, who has demonstrated the knowledge and the

ability to perform the objectives specified in this standard for that level.

Identify. To physically select, indicate, or explain verbally or in writing, using standard terms recognized by the fire service.

Labeled. Equipment or materials to which has been attached a label, symbol or other identifying mark of an organization acceptable to the "authority having jurisdiction" and concerned with product evaluation, that maintains periodic inspection of production of labeled equipment or materials and by whose labeling the manufacturer indicates compliance with appropriate standards or performance in a specified manner.

Listed. Equipment or materials included in a list published by an organization acceptable to the "authority having jurisdiction" and concerned with product evaluation, that maintains periodic inspection of production of listed equipment or materials and whose listing states either that the equipment or material meets appropriate standards or has been tested and found suitable for use in a specified manner.

NOTE: The means for identifying listed equipment may vary for each organization concerned with product evaluation, some of which do not recognize equipment as listed unless it is also labeled. The "authority having jurisdiction" should utilize the system employed by the listing organization to identify a listed product.

Objective. A goal that is achieved through the attainment of a skill, knowledge, or both, which can be observed or measured.

Qualification. Having satisfactorily completed the requirements of the objectives.

Shall. Indicates a mandatory requirement.

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

Understanding. The process of gaining or developing the meaning of various types of materials or knowledge.

Unit. The area of responsibility for first level supervisors. May be an engine company, truck company, or other functional or administrative group.

With Competence. Possessing knowledge, skills, and judgment needed to perform indicated objectives satisfactorily.

Chapter 2 Fire Officer I

2-1 General.

2-1.1 The Fire Officer I shall meet all the objectives for Fire Fighter III in accordance with NFPA 1001, *Fire Fighter Professional Qualifications*.

2-1.2 The Fire Officer I shall meet all of the objectives for Instructor I in accordance with NFPA 1041, *Fire Service Instructor Professional Qualifications*.

2-2* Leadership.

2-2.1 The Fire Officer I shall describe the advantages, disadvantages, and effects of various recognized styles of leadership.

2-2.2 The Fire Officer I, given a summary of the functions of a leader, shall:

- (a) describe the officer's responsibility in promoting cooperation
- (b) describe how group cooperation may be obtained.

2-2.3 The Fire Officer I shall identify the three types of verbal orders and demonstrate their use in each of the following situations:

- (a) during emergency situations
- (b) in the station
- (c) during training sessions.

2-2.4 The Fire Officer I, given a list of policies which may be used by a department, shall:

- (a) describe how the various policies affect the officer
- (b) describe the officer's role in interpreting the policies
- (c) describe why accuracy, clarity, and impartiality are important in interpreting policy
- (d) describe how to implement the policies in the leadership role.

2-2.5 The Fire Officer I, given the personnel rules of the department, shall describe how to deal fairly, firmly, and equally with subordinates.

2-2.6* The Fire Officer I shall have the ability to recognize the symptoms of employee-related problems in the areas of substance abuse, situational stress, and behavioral change, and indicate the appropriate action according to the policies and procedures established by the authority having jurisdiction.

2-3* Community Relations.

2-3.1 The Fire Officer I shall describe how each of the following factors affects the behavior of groups within the community in relation to the fire department:

- (a) economic conditions
- (b) religion
- (c) race, ethnic, and age factors
- (d) community organizations
- (e) family structure.

2-3.2 The Fire Officer I shall explain procedures for handling citizen complaints, inquiries, and concerns.

2-4* Fire Prevention.

2-4.1 The Fire Officer I shall explain the procedures for conducting fire inspections including evaluation of

gathered information and report preparation and proper procedure for conducting fire and exit drills in accordance with regulations within the authority having jurisdiction for the following occupancies:

- (a) assembly
- (b) educational
- (c) health care
- (d) detention and correctional
- (e) residential
- (f) mercantile
- (g) business
- (h) industrial
- (i) storage
- (j) unusual structures
- (k) mixed occupancies.

2-4.2 The Fire Officer I shall identify the leading cause of fire as established by the authority having jurisdiction.

2-4.3 The Fire Officer I shall identify the leading causes of fire spread as established by the authority having jurisdiction.

2-4.4 The Fire Officer I shall describe the components and procedures for the development and implementation of a public fire prevention education program.

2-5* Fire Suppression.

2-5.1 The Fire Officer I shall identify the components of the fire suppression organization in the authority having jurisdiction.

2-5.2 The Fire Officer I shall define the authority and responsibility of each component of the fire suppression organization in the authority having jurisdiction.

2-5.3 The Fire Officer I shall describe the lines of authority within the department.

2-5.4 The Fire Officer I shall describe the duties and responsibilities of each rank in both line and staff functions.

2-5.5 The Fire Officer I shall describe the chain of command of the fireground organization in the authority having jurisdiction.

2-6* Fire Protection.

2-6.1 The Fire Officer I shall identify the public and private national organizations that support the fire protection services, and describe the functions of each.

2-6.2 The Fire Officer I shall identify the public and private state organizations that support the fire protection services, and describe the functions of each.

2-6.3 The Fire Officer I shall identify the public and private local organizations that support the fire protection services, and describe the functions of each.

2-6.4 The Fire Officer I shall demonstrate the pro-

cedures for the inspection of stationary fire pumps according to the authority having jurisdiction.

2-6.5 The Fire Officer I shall demonstrate the procedures for the inspection of standpipe systems according to the authority having jurisdiction.

2-6.6 The Fire Officer I shall identify the special extinguishing systems within the authority having jurisdiction and demonstrate the procedures for the inspection of the systems.

2-6.7 The Fire Officer I shall identify and describe the operating principles of special fixed extinguishing systems, fire detection systems, and special communications systems as defined by the NFPA.

2-7* Fire Hazards and Causes.

2-7.1 The Fire Officer I shall describe the fire hazard characteristics of the following materials:

- (a) class A materials
- (b) class B materials
- (c) class C materials
- (d) class D materials.

2-7.2 The Fire Officer I shall identify the leading causes of fire as established by NFPA.

2-7.3 The Fire Officer I shall identify the leading causes of fire spread as established by NFPA.

2-7.4 The Fire Officer I shall identify the common and special hazards that might be encountered in the following occupancies:

- (a) assembly
- (b) educational
- (c) health care
- (d) detention and correctional
- (e) residential
- (f) mercantile
- (g) business
- (h) industrial
- (i) storage
- (j) unusual structures
- (k) mixed occupancies.

2-7.5 The Fire Officer I, given a fire inspection report of facilities and areas where flammable liquids are (1) stored, (2) handled, and (3) transported, shall for each given situation:

- (a) evaluate the reports and identify the hazards that exist
- (b) list recommendations to correct the hazards identified.

2-7.6 The Fire Officer I, given a fire inspection report of facilities and areas where flammable gases are (1) stored, (2) handled, and (3) transported, shall for each situation given:

- (a) evaluate the reports and identify the hazards that exist

(b) list recommendations to correct the hazards identified.

2-7.7 The Fire Officer I, given a fire inspection report of facilities and areas where hazardous materials are (1) stored, (2) handled, and (3) transported, shall for each situation given:

(a) evaluate the reports and identify the hazards that exist

(b) list recommendations to correct the hazards identified.

2-7.8 The Fire Officer I shall identify and explain the local, national, and international symbols used to designate hazardous materials, and identify the precautions that fire fighters are expected to observe and follow.

2-7.9 The Fire Officer I shall demonstrate knowledge of the color coding required for the various compressed gas cylinders as defined by the American Gas Association.

2-8* Building Construction.

2-8.1 The Fire Officer I shall identify and define symbols and maps used by the authority having jurisdiction.

2-8.2 The Fire Officer I, given fire inspection reports for each of the following occupancies, shall evaluate the reports and identify the construction features that might contribute to the spread of fire, heat, and smoke throughout the building or from one building to another:

- (a) public assembly
- (b) educational
 - (1) residential
 - (2) nonresidential
- (c) institutional
- (d) residential
- (e) stores and offices
- (f) basic industry
- (g) manufacturing
- (h) storage
- (i) special properties.

2-8.3 The Fire Officer I shall demonstrate knowledge of the characteristics of basic building materials and their behavior under fire conditions.

2-9* Codes and Ordinances.

2-9.1 The Fire Officer I shall be able to identify and describe the fire prevention codes, building codes, and ordinances applicable to firesafety in the jurisdiction having authority.

2-9.2 The Fire Officer I shall identify and describe recognized fire prevention codes and building codes.

2-10* Strategy and Tactics.

2-10.1 The Fire Officer I shall identify and describe the factors of size-up that must be considered to determine procedures for control of an emergency situation.

2-10.2 The Fire Officer I, given an emergency incident

requiring rescue and a list of available resources, shall demonstrate the utilization and coordination of personnel and equipment to complete the rescue operation.

2-10.3 The Fire Officer I, given a fire problem that would require the application of recognized principles of overhaul, shall describe or demonstrate the overhaul procedures necessary.

2-10.4 The Fire Officer I, given a structural fire condition requiring salvage operations, shall describe the salvage operation procedures and techniques necessary.

2-10.5 The Fire Officer I, given an emergency incident, shall describe how basic organizational principles would be applied.

2-10.6 The Fire Officer I, given an interior fire situation, shall:

- (a) describe how fire may extend within the building
- (b) describe how to control the spread of fire within the building.

2-10.7 The Fire Officer I, given an exterior fire situation, shall:

- (a) evaluate the situation
- (b) describe how to control the spread of fire to keep it from extending to adjacent buildings.

2-10.8 The Fire Officer I shall describe ventilation procedures.

2-10.9 The Fire Officer I, given equipment and personnel, shall demonstrate the attack procedures required to control, confine, and extinguish a fire in each of the following simulated situations:

- (a) structures
- (b) flammable liquids
- (c) flammable gases
- (d) hazardous materials.

2-10.10 The Fire Officer I, given an emergency incident requiring multiple company operations, shall analyze the situation and determine the resources required for control and demonstrate the assignment and placement of the resources.

2-10.11 The Fire Officer I, given a target hazard and all pertinent information, shall develop a prefire plan that will include the utilization of personnel, equipment, and extinguishing agents.

2-11* Chemistry.

2-11.1 The Fire Officer I shall define the following terms and demonstrate how each relates to emergency situations:

- (a) vapor pressure
- (b) vapor density
- (c) ignition temperature
- (d) flash point
- (e) flammable limits

- (f) specific gravity
- (g) boiling point
- (h) reactivity
- (i) alkalines
- (j) acids
- (k) oxidizers.

2-11.2 The Fire Officer I shall explain the following as defined by an accepted authority: atom, molecule, ions, atomic and molecular weights, chemical changes, chemical equilibrium, and acids and bases.

2-12* Safety Practices.

2-12.1 The Fire Officer I shall identify the most common causes of personal injury to the fire fighter.

2-12.2 Given specific hazards, the Fire Officer I shall develop an accident prevention program applicable to the officer's duty assignment.

2-12.3 Given accident and injury reports, the Fire Officer I shall evaluate the reports and describe appropriate prevention measures.

2-12.4 The Fire Officer I, given rules, regulations, directives, policies and laws regarding safety practices:

- (a) shall demonstrate procedures required to enforce the safety regulations
- (b) shall demonstrate how to maintain complete and accurate records.

2-13* Fire Investigation.

2-13.1 The Fire Officer I, given photographs, diagrams, and/or sketches, shall:

- (a) determine the point of origin
- (b) describe the procedure used by the authority having jurisdiction to determine loss to structure and contents.

2-13.2 The Fire Officer I, given photographs, sketches and/or diagrams where an incendiary fire is suspected, shall:

- (a) describe how personnel would be directed to identify and preserve evidence
- (b) describe how personnel would properly collect, remove, and preserve evidence
- (c) describe the procedures for preliminary interviewing of witnesses and identification of suspects at the fire scene.

2-13.3 The Fire Officer I shall identify the factors to be considered upon arrival on the fire scene that may indicate an incendiary fire.

2-13.4 The Fire Officer I, given an incendiary fire:

- (a) shall describe the procedures used in identifying incendiary fires
- (b) shall describe the procedures used in locating evidence to indicate arson intent
- (c) shall demonstrate the methods of securing and con-

trolling the fire scene until appropriate investigative personnel arrive.

2-13.5 The Fire Officer I, given a summary of the methods most generally used by persons setting fires, shall describe how the methods used by arsonists can be detected.

2-13.6 The Fire Officer I, given a summary of the motives for illegally setting fires, shall describe how the motives can be used by an investigator to determine a likely suspect.

2-13.7 The Fire Officer I shall identify which local, regional, and/or state agency may assist in fire investigations.

2-13.8 The Fire Officer I, given a summary of the record system maintained on fire investigations, shall describe how the record system is used and maintained.

2-14* Report Writing.

2-14.1 The Fire Officer I shall identify the types of report forms used by the authority having jurisdiction at that level of responsibility.

2-14.2 The Fire Officer I, given the report forms and all the pertinent information, shall complete the reports used by the authority having jurisdiction at that level of responsibility.

2-14.3 The Fire Officer I, given a recordkeeping system for the officer's area of responsibility, shall demonstrate:

- (a) how to maintain the system
- (b) how to transmit reports to superior officers.

2-14.4 The Fire Officer I shall demonstrate the ability to complete a narrative report detailing both an emergency and a non-emergency incident.

Chapter 3 Fire Officer II

3-1* Psychology (General). The Fire Officer II shall demonstrate knowledge of the emotional and behavioral characteristics of the individual or working group as they apply to the responsibility of subordinates and supervisors.

3-2* Human Relations and Management.

3-2.1 The Fire Officer II shall describe how each of the following affects the group behavior within the organization:

- (a) understanding people
- (b) motivating the worker
- (c) handling disputes
- (d) introducing changes
- (e) gaining cooperation
- (f) supervisory cooperation
- (g) job attitude

- (h) company policy
- (i) emotional status
- (j) handling complaints
- (k) handling the problem worker.

3-2.2 The Fire Officer II shall be able to identify his/her own and co-workers' "work style preference" in the workplace.

3-2.3 The Fire Officer II shall list positive and negative style modifications he/she can use to enhance the working relationship with co-workers.

3-3* Communications Skills. The Fire Officer II shall demonstrate knowledge of written and verbal communications skills.

3-4* Technical Math. The Fire Officer II, given specific problems and all pertinent information, shall demonstrate the use of the following: whole numbers, fractions and decimals, percentages, averages and estimations, algebraic equations, powers and roots, ratios and proportions, linear surface, and volume measurements.

3-5* Hazardous Materials.

3-5.1 The Fire Officer II shall explain the characteristics of flammable liquids, flammable gases, and flammable solids.

3-5.2 The Fire Officer II, given an emergency incident and all pertinent information involving each of the following materials, shall analyze each simulated situation, determine the resources required for control, and demonstrate the assignment and placement of the resources:

- (a) flammable liquids
- (b) flammable gases
- (c) poisons
- (d) explosives
- (e) radioactive materials
- (f) flammable solids
- (g) reactives
- (h) corrosives.

3-5.3 The Fire Officer II shall identify national, state, and local information resources for handling of hazardous materials under fire or emergency situations.

3-6* Technical Report Writing.

3-6.1 The Fire Officer II shall identify the capability of electronic data processing equipment used by the authority having jurisdiction.

3-6.2 The Fire Officer II shall demonstrate the ability to interpret the output from electronic data processing equipment used by the authority having jurisdiction.

3-6.3 The Fire Officer II, given a recordkeeping system for the officer's area of responsibility, shall demonstrate:

- (a) how to maintain the system

(b) how to evaluate the system

(c) how to identify necessary changes in the system.

3-6.4 The Fire Officer II, given a personnel record, shall interpret the record and prepare a report in clear, concise language for transmittal to a superior officer.

3-6.5 The Fire Officer II, given an equipment maintenance record, shall interpret the record and prepare a report in clear, concise language for transmittal to a superior officer.

3-6.6 The Fire Officer II, given a fire department building's maintenance record, shall interpret the record and prepare a report in clear, concise language for transmittal to a superior officer.

3-6.7 The Fire Officer II, given an accident record, shall interpret the record and prepare a report in clear, concise language for transmittal to a superior officer.

3-7 Unit Administration.

3-7.1 The Fire Officer II shall describe the budgetary process of the authority having jurisdiction and its effect on the unit operation.

3-7.2 The Fire Officer II shall explain the job requirements of subordinate positions and demonstrate the ability to plan, assign, coordinate activities, and establish priorities at the unit level.

Chapter 4 Fire Officer III

4-1* Communications Skills. The Fire Officer III shall demonstrate an advanced knowledge of written and verbal communications skills.

4-1.1 The Fire Officer III shall meet all the objectives for Instructor II in accordance with NFPA 1041, *Standard for Fire Service Instructor Professional Qualifications*.

4-1.2 The Fire Officer III shall demonstrate an advanced writing ability.

4-1.3 The Fire Officer III shall demonstrate verbal communications and active listening skills.

4-2* Fire Protection Systems and Alarm Systems.

4-2.1 The Fire Officer III shall identify fixed fire suppression systems and demonstrate the use of each.

4-2.2 The Fire Officer III shall identify signaling and detection systems and demonstrate the use of each system.

4-2.3 The Fire Officer III, given a list of occupancies within the jurisdiction that contain private fire protection equipment, shall:

- (a) determine if the sprinkler system installation is appropriate for the area being protected

(b) determine if the automatic signaling systems are appropriate for the area being protected

(c) determine if the protection systems outside the occupancy are adequate for the area being protected.

4-2.4 The Fire Officer III, given water system reference materials, shall:

(a) describe the water supply facilities as they apply to fire department operations

(b) identify the procedure for mapping auxiliary water supplies to supplement the normal system

(c) be able to interpret available sewer and drainage maps.

4-2.5 The Fire Officer III shall demonstrate knowledge of the functions and operating procedures of a public fire alarm system.

4-2.6 The Fire Officer III shall demonstrate knowledge of how to coordinate fire department water system activities with other agencies.

4-3* Water Supply Systems Analysis and Fire Protection Hydraulics.

4-3.1 The Fire Officer III, given plans for a planned housing development, shall estimate the required fire flow and recommend hydrant distribution for fire fighting operations.

4-3.2 The Fire Officer III, given plans for a shopping center, shall estimate the required fire flow and recommend a hydrant distribution system for fire fighting operations.

4-3.3 The Fire Officer III, given plans for an industrial complex, shall estimate the required fire flow and recommend hydrant distribution for fire fighting operations.

4-4* Fire Service Administration.

4-4.1 The Fire Officer III, given the organizational charts or description, shall describe the responsibilities of the state and local government fire service agencies in the jurisdiction having authority.

4-4.2 The Fire Officer III shall demonstrate knowledge of current national trends and developments related to fire service organization, financing, and labor relations.

4-4.3 The Fire Officer III shall demonstrate knowledge of how to evaluate the fire department records system of the authority having jurisdiction.

4-4.4 The Fire Officer III, given the personnel rules of the department, shall evaluate the rules and prepare specific recommendations for changes, if indicated.

4-4.5 The Fire Officer III shall describe the labor relations agreement as used by the authority having jurisdiction.

4-4.6 The Fire Officer III shall identify the following as they relate to the organization in the jurisdiction having authority:

(a) disciplinary procedures

(b) discharge procedures

(c) transfer procedures

(d) promotional system

(e) compensation system

(f) sick leave procedures

(g) vacation selection procedures

(h) acting pay procedures

(i) benefits.

4-4.7 The Fire Officer III, given a prescribed quantity of personnel and equipment for a given area to be protected, shall develop a model plan for the utilization of those resources.

4-4.8 The Fire Officer III, given a grievance, shall write a concise and impartial report indicating who, what, where, and how the grievance arose.

4-4.9 The Fire Officer III, given a labor problem, shall:

(a) demonstrate the ability to determine the factual information

(b) demonstrate the ability to resolve the problem.

4-4-10 The Fire Officer III shall be able to interpret and enforce the applicable fire codes and regulations.

4-5* General Physics. The Fire Officer III shall explain, describe, or illustrate the following as defined by an accepted authority: forces and motion; energy and momentum; law of gravitation; properties of solids and liquids; pressure in gases and liquids; temperature-heat, and expansion; thermal properties of matter; basic electricity; magnetism in instruments, generators, and motors; sound; nature and behavior of light; radioactivity; and the metric system.

4-6* Public Speaking. The Fire Officer III, given a topic, shall prepare a written speech, develop appropriate visual aids, and deliver the speech.

4-7* Personnel Management.

4-7.1 The Fire Officer III, given a personnel situation, shall identify the types of corrective action required and describe how each is used as a tool of supervision.

4-7.2 The Fire Officer III shall identify and define three types of commonly used personnel interviews.

4-7.3 The Fire Officer III shall identify and define two types of approaches to counseling.

4-7.4 The Fire Officer III, given a situation, shall determine which type of interview would be most valuable.

4-7.5 The Fire Officer III, given records or forms used in evaluating personnel, a summary of the methods of evaluation, and a summary of the common errors in evaluating, shall:

(a) describe the objectives of an employee evaluation program

(b) describe how the common errors in evaluating can be avoided

(c) describe the procedures for conducting an evaluation program

(d) describe how to plan an evaluation conference

(e) describe how to conduct an evaluation conference.

4-7.6 The Fire Officer III shall demonstrate knowledge of supervisory practices, the ability to evaluate the effectiveness of supervision at various levels, and the ability to interpret the evaluation for correcting deficiencies.

4-7.7 The Fire Officer III shall demonstrate knowledge of equal employment opportunity in the fire service.

4-7.8 The Fire Officer III shall demonstrate knowledge of the method for selecting, employing, and promoting personnel as provided by codes, ordinances, and rules in accordance with acceptable modern administrative principles.

4-7.9 The Fire Officer III shall demonstrate knowledge of how to make personnel assignments to best utilize personnel.

4-7.10 The Fire Officer III shall demonstrate knowledge of how to objectively evaluate and counsel personnel to encourage their development to full capacity.

4-7.11 The Fire Officer III shall demonstrate knowledge of how to supervise and evaluate planned promotional programs procedures.

4-8* Sociology.

4-8.1 The Fire Officer III shall demonstrate knowledge of the social services required to meet the needs of the community.

4-8.2 The Fire Officer III shall identify and describe the fire protection organization's role in providing social services.

4-8.3 The Fire Officer III, given a situation, shall identify and describe the sociological effect within the fire protection organization.

4-9* Major Emergency Planning.

4-9.1 The Fire Officer III shall identify the authority having jurisdiction, and all the agencies available in controlling a major disaster.

4-9.2 The Fire Officer III shall describe the responsibilities, authority, and utilization of all support agencies in the jurisdiction having authority.

4-9.3 The Fire Officer III, given all the pertinent information and available resources, shall prepare a plan to cope with a large-scale emergency situation.

4-9.4 The Fire Officer III, given a disaster situation and all pertinent information, shall describe/illustrate the application of the major emergency operations plan.

4-9.5 The Fire Officer III, given a disaster situation

that would require extensive supervision of personnel, shall describe how basic operational principles would be applied to the disaster situation.

4-9.6 The Fire Officer III, given a disaster situation, shall:

(a) describe how a major disaster plan is activated

(b) demonstrate knowledge of the disaster plans

(c) identify the outside assistance available to the fire department and the methods of summoning the assistance

(d) describe the operation of the mutual aid plan for the region.

4-9.7 The Fire Officer III shall describe the emergency procedures to be followed by fire officers and other members of the department during civil disturbances.

4-9.8 The Fire Officer III, given problems, shall demonstrate knowledge of how to determine objectives and formulate plans, organize for emergency operations, and direct and control the emergency operations.

4-9.9 The Fire Officer III shall demonstrate the ability to utilize alternative methods of communications in major emergency operations.

4-10* Public Relations.

4-10.1 The Fire Officer III shall demonstrate the ability to prepare fire prevention- and public information-type displays and visual aids for special events and programs.

4-10.2 The Fire Officer III shall demonstrate the ability to prepare speeches on such subjects as the protection of life and property and home safety.

4-10.3 The Fire Officer III shall demonstrate the ability to deliver lectures on various fire service subjects to community organizations.

4-10.4 The Fire Officer III shall demonstrate the ability to communicate effectively with the news media.

Chapter 5 Fire Officer IV

5-1* Safety Practices.

5-1.1 The Fire Officer IV, given safety records and reports, and a summary of federal, state, and local codes and ordinances regulating safety practices, shall demonstrate knowledge of how to develop, plan, initiate, administer, and evaluate safety programs.

5-1.2 The Fire Officer IV shall have a knowledge of the cost of injuries and the cost of insurance programs to provide protection for injured employees.

5-2* Industrial Fire Protection.

5-2.1 The Fire Officer IV, given industrial processes, shall identify the hazards involved and describe the appropriate private fire protection measures applicable for processes involving each of the following materials:

- (a) flammable liquids
- (b) flammable gases
- (c) poisons
- (d) explosives
- (e) radioactive materials
- (f) flammable solids
- (g) reactives
- (h) corrosives
- (i) dust-producing materials.

5-2.2 The Fire Officer IV, given an industrial occupancy and all pertinent information, shall demonstrate knowledge of how to organize and train a fire brigade.

5-2.3 The Fire Officer IV, given the organization of an industrial fire brigade and a situation within the industrial occupancy, shall demonstrate the ability to coordinate the activities of the fire brigade and the fire department.

5-3* Organization and Management

5-3.1 The Fire Officer IV shall demonstrate the ability to prepare reports, specifications, requisitions, and budgets from predetermined data.

5-3.2 The Fire Officer IV, given a summary of the functions of a fire officer, shall:

- (a) develop a system of planning jobs
- (b) describe the procedure for organizing work
- (c) describe how work is directed by delegating, initiating, and following up.

5-3.3 The Fire Officer IV, given an emergency incident where the delegation of authority would be useful, shall:

- (a) describe the principles of delegation of authority that would be useful
- (b) describe the principles of delegation of authority for each simulated situation.

5-3.4 The Fire Officer IV, given a summary of department procedures, training procedures, performance evaluation procedures, records and reports, and objectives and policies, shall:

- (a) demonstrate knowledge of how to analyze systematically the effectiveness of the procedures
- (b) demonstrate knowledge of how to conduct and administer tests or examinations for proficiency
- (c) demonstrate knowledge of how to make recommendations for improvements when procedures are not meeting the objectives
- (d) demonstrate knowledge of objectives, policy provisions, and procedures to accomplish the goals
- (e) demonstrate knowledge of proper use of evaluation forms and procedures
- (f) demonstrate the ability to evaluate results of tests to determine that objectives are being achieved.

5-3.5 The Fire Officer IV, given a summary of apparatus and equipment, shall demonstrate knowledge of

national apparatus standards and specifications as defined by an accepted authority.

5-3.6 The Fire Officer IV shall identify a system used to develop specific and accurate specifications for apparatus and major items of equipment based on local needs and conditions.

5-3.7 The Fire Officer IV shall demonstrate knowledge of how to evaluate equipment, plan and schedule maintenance and replacement, and budget funds for maintenance and replacement.

5-3.8 The Fire Officer IV shall demonstrate the ability to inspect, plan and schedule maintenance, budget for maintenance, and develop a replacement plan for all fire department-related buildings within the jurisdiction having authority.

5-3.9 The Fire Officer IV, given the table of organization, shall identify the system used for the assignment and utilization of personnel.

5-4* Public Finance—Budgeting.

5-4.1 The Fire Officer IV, given schedules and guidelines concerning budget preparation and pertinent information, shall:

- (a) demonstrate the ability to review the records for determination of the supplies necessary for existing and new programs
- (b) demonstrate the ability to determine the need for major repairs to buildings and equipment
- (c) demonstrate the ability to determine the need for new equipment
- (d) demonstrate the ability to prepare budget requests for supplies, maintenance, and capital equipment required.

5-4.2 The Fire Officer IV shall demonstrate the ability to determine the funds necessary to operate a unit of the fire department for a fiscal period, prepare a budget as prescribed by the departmental policy, and prepare the necessary justification.

5-4.3 The Fire Officer IV, given a summary of fiscal and financial policies, shall demonstrate knowledge of how to supervise a system of budget control based on the fiscal and financial policies.

5-4.4 The Fire Officer IV shall demonstrate the ability to prepare a program budget.

5-5* Fire Suppression and Detection Systems. The Fire Officer IV, given all pertinent information, shall identify the appropriate suppression system required in accordance with accepted design standards and local codes and ordinances.

5-6* Public Relations.

5-6.1 The Fire Officer IV shall describe how to prepare and submit a news release.

5-6.2 The Fire Officer IV, given a summary of various types of complaints, shall describe the proper steps used in handling the complaints.

5-6.3 The Fire Officer IV shall demonstrate knowledge of the functions of other bureaus, agencies, and divisions of government and the interdependence and need for cooperation between various elements of governments.

5-6.4 The Fire Officer IV shall demonstrate knowledge of how to represent the department and coordinate relations with outside agencies.

5-6.5 The Fire Officer IV shall demonstrate knowledge of how to formulate a department-wide public relations program.

Chapter 6 Fire Officer V

6-1* Political Science.

6-1.1 The Fire Officer V shall demonstrate knowledge of federal, state, and local legislation affecting fire protection in the authority having jurisdiction.

6-1.2 The Fire Officer V shall demonstrate knowledge of the law-making process of the federal government.

6-1.3 The Fire Officer V shall demonstrate knowledge of the law-making process in the state government of the jurisdiction having authority.

6-1.4 The Fire Officer V shall demonstrate knowledge of the law-making process in the jurisdiction having authority.

6-1.5 The Fire Officer V, given a situation requiring new legislation, shall demonstrate the ability to draft the proposed legislation.

6-1.6 The Fire Officer V shall explain the process of code development and administration.

6-2* Public Administration.

6-2.1 The Fire Officer V shall demonstrate knowledge of the job requirements of subordinate positions and the ability to plan, assign, coordinate activities, and establish priorities.

6-2.2 The Fire Officer V, given a summary of the job requirements for all positions within the department, shall establish a list of education and in-service training goals for each position.

6-2.3 The Fire Officer V shall demonstrate knowledge of supervision and administration of personnel, functions, and reports and the analytical ability to improve operational efficiencies.

6-2.4 The Fire Officer V shall demonstrate knowledge of how to establish policies related to the evaluation and development of personnel.

6-2.5 The Fire Officer V shall demonstrate knowledge of how to develop and administer an incentive program to stimulate individual and group initiative.

6-2.6 The Fire Officer V, given a summary of current or pending legislation of interest to the fire service, shall identify legislative intent and inadequacies in new or current laws.

6-2.7 The Fire Officer V shall explain the value of establishing employee assistance programs.

6-3* State and Local Government.

6-3.1 The Fire Officer V shall demonstrate knowledge of the authority of the branches of government in the jurisdiction having authority.

6-3.2 The Fire Officer V shall identify the cabinet posts and/or departments of government in the jurisdiction having authority.

6-3.3 The Fire Officer V shall demonstrate knowledge of the authority of the branches of government at the state level.

6-3.4 The Fire Officer V shall identify the cabinet posts and/or the department of government at the state level.

6-3.5 The Fire Officer V shall identify the state and local agencies involved in the field of fire protection and describe the function of each agency identified.

6-4* National Government. The Fire Officer V shall identify the federal agencies involved in the field of fire protection and describe the function of each agency identified.

6-5* Legal Aspects of Fire Protection.

6-5.1 The Fire Officer V shall demonstrate knowledge of the legal rights, liabilities, and responsibilities of the fire protection organization in the jurisdiction having authority.

6-5.2 The Fire Officer V shall demonstrate knowledge of the federal, state, and local laws affecting the rights, liabilities, and responsibilities of the fire protection organization.

Chapter 7 Fire Officer VI

7-1* Master Planning. The Fire Officer VI, given rules, codes, operating procedures, and objectives designed to provide fire protection for a geographical area, the current physical plant and facilities, and advanced planning projections for the area, shall:

(a) analyze trends in urbanization, building construction, population, etc., as they affect the area

(b) submit recommendations for long range plans designed to meet problems inherent in the projected changes in the area

(c) analyze methods and techniques designed to implement long-range programs

(d) document a need for change based on advanced planning projections

(e) demonstrate a consideration for the cost-benefit ratio in recommendations submitted.

7-2* Management Information Systems.

7-2.1 The Fire Officer VI, given a record system, shall:

(a) demonstrate knowledge of how to analyze the records and data

(b) demonstrate knowledge of how to interpret the records and data and determine validity

(c) demonstrate knowledge of how to evaluate the data for the purpose of recommending improvements.

7-2.2 The Fire Officer VI, given a summary of the goals and objectives of data processing services and systems within the jurisdiction and a summary of the components and operational principles of various types of data processing equipment, shall:

(a) identify the capabilities and limitations of electronic data processing equipment

(b) identify the components and functions of electronic data processing hardware

(c) identify and define the functions of data input, sorting, processing, fielding, retrieval, and control.

7-2.3 The Fire Officer VI shall demonstrate knowledge of how to direct the development, maintenance, and evaluation of the department record system to attain completeness and accuracy.

7-2.4 The Fire Officer VI shall demonstrate knowledge of the principles involved in the acquisition, implementation, and retrieval of information by data processing as it applies to the record and budgetary processes and response patterns in the fire service.

7-2.5 The Fire Officer VI shall demonstrate knowledge of data processing terminology, programming concepts, and hardware systems utilizing punched card, stored programs, or magnetic tape equipment.

7-3* Labor Relations.

7-3.1 The Fire Officer VI, given a summary of the types of grievances that may confront the officer, shall:

(a) describe the methods by which the officer can detect and analyze the cause of grievances

(b) describe the method by which the officer establishes an equitable grievance procedure

(c) describe the methods by which the officer adjusts and handles grievances.

7-3.2 The Fire Officer VI, given a summary of the laws, ordinances, and procedures established by the jurisdiction to govern employee selection and promotion, wages, benefits, and other conditions of employment, shall demonstrate knowledge of how to administer a labor relations program.

7-4* Public Administration.

7-4.1 The Fire Officer VI, given present physical and geographical layouts and advanced planning projections for the area, shall:

(a) evaluate alternatives and select the programs best suited to serve the area in the future

(b) establish time tables for administration of the programs

(c) describe the method for implementing the programs and evaluating the results.

7-4.2 The Fire Officer VI, given the pertinent information relative to establishing a fire prevention program, shall:

(a) establish the goals for a total fire protection program

(b) determine the budget requirement for implementation of the program

(c) justify the budget request.

7-4.3 The Fire Officer VI shall demonstrate the ability to interpret fire service legislation at the local, state, and federal level.

7-4.4 The Fire Officer VI shall demonstrate knowledge of how to determine the funds necessary to operate the department for a fiscal period, prepare a budget as prescribed by the jurisdictional policy, and justify the proposed expenditures to the legislative body.

7-4.5 The Fire Officer VI shall demonstrate knowledge of how to develop and administer a system of budget control based on fiscal and financial policies of the authority having jurisdiction.

7-4.6 The Fire Officer VI shall demonstrate knowledge of how to determine the need for training facilities and buildings, determine construction goals and schedules, and administer the construction program.

7-4.7 The Fire Officer VI shall demonstrate knowledge of the training requirements necessary to maintain a pool of personnel capable of assuming key positions as vacancies occur.

7-4.8 The Fire Officer VI shall demonstrate knowledge of how to establish and operate a planned and equitable promotional program.

7-4.9 The Fire Officer VI, given an organizational chart, shall determine the job requirements for all positions and establish the training requirements.

Chapter 8 Referenced Publications

8-1 The following documents or portions thereof are referenced within this document and shall be considered part of the requirements of this document. The edition indicated for each reference shall be the current edition as of the date of the NFPA issuance of this document. These references shall be listed separately to facilitate updating to the latest edition by the user.

8-1.1 NFPA Publications. National Fire Protection Association, Batterymarch Park, Quincy, MA 02269.

NFPA 1001-1987, *Standard for Fire Fighter Professional Qualifications*

NFPA 1041-1987, *Standard for Fire Service Instructor Professional Qualifications*.

Appendix A

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

A-2-2 Leadership. Intent: The Fire Officer I should understand the basic processes of management and how the officer applies the principles of leadership to fulfill the supervisory function.

A-2-2.6 The Fire Officer I should define stress and understand how to recognize behavior and attitudinal deficiencies; for example:

(a) the three types of stress (acute, delayed, cumulative)

(b) the signs and symptoms of acute, chronic, and delayed stress (physical, emotional, cognitive, behavioral)

(c) the cause of stress in emergency services personnel (environmental interaction with people, personality features, inadequate management practices)

(d) the adverse effects of stress on performance of emergency service personnel.

A-2-3 Community Relations. Intent: The Fire Officer I should have an understanding of the social forces within the community that affect the group behavior in relation to the fire service.

A-2-4 Fire Prevention. Intent: The Fire Officer I should understand the fundamental principles, methods, techniques, and procedures of fire prevention administration.

A-2-5 Fire Suppression. Intent: The Fire Officer I should understand the authority and responsibility of the fire suppression organization within the fire department.

A-2-6 Fire Protection. Intent: The Fire Officer I should have knowledge of the public and private fire protection organizations and an understanding of the fire protection systems.

A-2-7 Fire Hazards and Causes. Intent: The Fire Officer I should understand potential hazards, causes, and behavior of fire.

A-2-7.4 See NFPA 901, *Uniform Coding for Fire Protection*.

A-2-7.5 See NFPA 901, *Uniform Coding for Fire Protection*.

A-2-8 The Fire Officer I should have a basic knowledge of the various types of building materials and construction features that might contribute to the spread of fire, heat, and smoke and an understanding of fire protection symbols.

A-2-9 Codes and Ordinances. Intent: The Fire Officer I should have knowledge of codes and ordinances and understand their effect on the fire protection organization.

A-2-10 Strategy and Tactics. Intent: The Fire Officer I should have knowledge of how to utilize personnel and equipment for controlling, confining, and extinguishing fires.

A-2-11 Chemistry. Intent: The Fire Officer I should understand the principles of chemistry as they relate to fire protection. A transcript of a college-level chemistry course, or the results of a Clep test, or an equivalent method of testing is acceptable.

A-2-12 Safety Practices. Intent: The Fire Officer I should understand basic safety principles and how they apply to the fire protection organization.

A-2-13 Fire Investigation. Intent: The Fire Officer I, given a situation, should have a basic knowledge of fire cause determination.

A-2-14 The Fire Officer I should identify the various reports used by the local jurisdiction and should be able to complete the reports and explain how they are used by the organization.

A-3-1 Psychology (General). Intent: The Fire Officer II should understand basic principles of psychology as they relate to the fire service. A transcript of a college-level psychology course, or the results of a Clep test, or an equivalent method of testing is acceptable.

A-3-2 Human Relations and Management. Intent: The Fire Officer II should have an understanding of the basic factors of human relations.

A-3-3 Communications Skills. Intent: The Fire Officer II should have an understanding of written and verbal communications skills. A transcript of an appropriate communications course, or the results of a Clep test, or an equivalent is acceptable.

A-3-4 Technical Math. Intent: The Fire Officer II should have an understanding of basic mathematic principles for fire service application. A transcript of a college-level technical math course, or the results of a Clep test, or an equivalent method of testing is acceptable.

A-3-5 Hazardous Materials. Intent: The Fire Officer II should have an understanding of marking systems for hazardous materials and their relationship to the fire protection operations.

A-3-6 Technical Report Writing. Intent: The Fire Officer II should understand how to prepare accurate and concise reports.

A-4-1 Communications Skills. Intent: The Fire Officer III should have an understanding of advanced written and verbal communications skills. A transcript of an appropriate communications course, or results of a Clep test, or an equivalent is acceptable.

A-4-2 Fire Protection Systems and Alarm Systems. Intent: The Fire Officer III should have an understanding of the operational principles of the fire protection systems and alarm systems.

A-4-3 Water Supply Systems Analysis and Fire Protection Hydraulics. Intent: The Fire Officer III should demonstrate the capability to determine required fire flow and the ability to work with water utilities to develop a system adequate to meet projected community needs. The water system could be an extension of an existing system or recommendations of changes in the existing system.

A-4-4 Fire Service Administration. Intent: The Fire Officer III should have an understanding of the organization and management as related to the fire protection administration.

A-4-5 General Physics. Intent: The Fire Officer III should have a basic understanding of the principles of general physics. A transcript of a first semester college-level general physics course, or results of a Clep test, or an equivalent method of testing is acceptable.

A-4-6 Public Speaking. Intent: The Fire Officer III should demonstrate the ability to prepare and deliver platform speeches.

A-4-7 Personnel Management. Intent: The Fire Officer III should understand the processes of management and how the officer applies the leadership skills to fire protection administration.

A-4-8 Sociology. Intent: The Fire Officer III should have an understanding of the basic concepts of sociological theory as they relate to fire protection. A transcript of a college-level sociology course, or results of a Clep test, or an equivalent method of testing is acceptable.

A-4-9 Major Emergency Planning. Intent: The Fire Officer III should have an understanding of the command problems in large-scale emergency situations.

A-4-10 Public Relations. Intent: The Fire Officer III should have an understanding of how to present a sound public relations program for employees, community organizations, other agencies, and the general public.

A-5-1 Safety Practices II. Intent: The Fire Officer IV should have an understanding of how to develop and administer safety programs.

A-5-2 Industrial Fire Protection. Intent: The Fire Officer IV should have an understanding of how to develop and administer fire protection programs in industrial occupancies.

A-5-3 Organization and Management. Intent: The Fire Officer IV should have an understanding of organization and management principles in the fire protection organization.

A-5-4 Public Finance — Budgeting. Intent: The

Fire Officer IV should have an understanding of finance and budgeting procedures.

A-5-5 Fire Suppression and Detection Systems. Intent: The Fire Officer IV should have an understanding of the engineering principles of fire suppression and detection systems.

A-5-6 Public Relations. Intent: The Fire Officer IV should have an understanding of how to build and maintain sound public relations with employees, community organizations, other agencies, and the general public.

A-6-1 Political Science. Intent: The Fire Officer V should have an understanding of the political process in federal, state, and local governments.

A-6-2 Public Administration. Intent: The Fire Officer V should understand the principles of public administration as they apply to fire protection.

A-6-3 State and Local Government. Intent: The Fire Officer V should understand the organization of state and local government.

A-6-4 National Government. Intent: The Fire Officer V should understand the organization of the federal government.

A-6-5 Legal Aspects of Fire Protection. Intent: The Fire Officer V should understand the liabilities of the fire protection organization.

A-7-1 Master Planning. Intent: The Fire Officer VI should have knowledge of the capabilities and limitations of the fire protection organization and the ability to develop long range plans for fire protection.

A-7-2 Management Information Systems. Intent: The Fire Officer VI should understand how to analyze records, interpret data, and utilize the data for future planning.

A-7-3 Labor Relations. Intent: The Fire Officer VI should understand the labor-management relationships.

A-7-4 Public Administration II. Intent: The Fire Officer VI should have an understanding of how to plan, initiate, and carry out long range administrative programs.

Appendix B Referenced Publications

B-1 The following documents or portions thereof are referenced within this document for informational purposes only and thus are not considered part of the requirements of this document. The edition indicated for each reference should be the current edition as of the date of the NFPA issuance of this document. These references should be 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 901-1986, *Uniform Coding for Fire Protection*.

Appendix C Bibliography

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

An Introduction to Fire Dynamics, NFPA
Automatic Sprinkler Systems Handbook, NFPA
Automatic Sprinkler and Standpipe Systems, NFPA
Building Construction for the Fire Service, 2nd edition, Francis Brannigan
Building Construction Related to the Fire Service, Fire Service Publications, Stillwater, OK
Chief Officer, Fire Service Publications, Stillwater, OK
Conducting Fire Inspections, A Guidebook for Field Use, NFPA
Engine Company Fireground Operations, Harold Richman
Fire Command, Alan V. Brunacini
Fire Department Company Officer, Fire Service Publications, Stillwater, OK
Fire Department Safety Officers Guide, NFPA
Fire Fighter Safety, Fire Service Publications, Stillwater, OK
Fire Inspection and Code Enforcement, Fire Service Publications, Stillwater, OK
Fire Litigation Handbook, NFPA
Fire Protection Administration, Fire Service Publications, Stillwater, OK

Fire Protection Guide on Hazardous Materials, NFPA
Fire Protection Handbook, NFPA
Fire Protection Systems, Inspection, Test and Maintenance Manual, NFPA
Fire Service Instruction, Fire Service Publications, Stillwater, OK
Flammable and Combustible Liquids Code Handbook, NFPA
Industrial Fire Hazards Handbook, NFPA
Improving Leadership Effectiveness, F. E. Fiedler, Wiley & Son Pub., 1977
Life Safety Code Handbook, NFPA
Liquefied Petroleum Gases Handbook, NFPA
Management in the Fire Service, NFPA
Managing Fire Services, International City Management Association
Managing People: Fire Service Personnel Strategies, NFPA
NFPA Inspection Manual
National Electric Code Handbook, NFPA
Please Understand Me, Keirse, D. and Bates, M., Prometheus Nemesis Book Co., 4th ed., Del Mar, CA, 1984
Principles of Fire Protection Chemistry, NFPA
Private Fire Protection and Detection, Fire Service Publications, Stillwater, OK
"Self Profile" — The Personal Pattern Assessment, Personal Dynamics, Inc., 1980
Social Style Summary, Wilson Learning Corp., Eden Prairie, MN, 1975
Truck Company Fireground Operations, Harold Richman
Work Style Preference Inventory, The McFletcher Corp., Scottsdale, AZ, 1984

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