

Utah Fire Service Certification System

HAZARDOUS MATERIALS AWARENESS, OPERATIONS, & TECHNICIAN



CERTIFICATION STANDARD

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The Certification Council would like to recognize and extend a voice of appreciation to the following fire service professionals for their work on the Hazardous Materials certification standard. These individuals devoted many hours to reviewing the National Fire Protection Association (NFPA) 470 standard, certification test banks, and curriculum textbooks to develop the wording for the skills for each discipline within this standard.

Thank you.

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Table of Contents

Introduction	1
Hazardous Materials Certification Requirements	3
Entrance Requirements	3
Physical Fitness Requirements	3
Department Training Officers	4
Department Training	4
Written Objectives	5
Skill Objectives	6
Department Training Records	6
Department In-House Skills Examination	6
Certification Examinations	7
Written Examinations	7
Skills Spot Check Examinations	7
Hazardous Materials Certification	8
Prerequisites for Hazardous Materials Certification	8
Recertification for Hazardous Materials Technician Level	9
Hazardous Materials Certification Checklist	10
Section I. Hazardous Materials Awareness	11
Hazardous Materials Awareness Skill Objective	12
Hazardous Materials Awareness Training Record	13
Section II. Hazardous Materials Operations	14
Hazardous Materials Operations Skill Objectives	15
Reporting and Documentation	15
Decontamination	17
Personal Protective Equipment	19
Performing Defensive Control Actions	21
Hazardous Materials Operations Training Record	23
Section III. Hazardous Materials Technician	25
Hazardous Materials Technician Skill Objectives	26
Surveying the Hazardous Materials incident	26
Implementing the Planned Response	30
Using Protective Clothing	34
Performing Control Functions	36
Reports and Documentation	39
Hazardous Materials Technician Training Record	42
Appendix A. Samples	47
Sample Decontamination Corridor	48
Sample SCBA Inspection Checklist	49
Sample Maintenance Log	50
Appendix B. In-House Proctor Instructions	51
Appendix C. Certification Forms and Fees	53

INTRODUCTION

The Utah Fire and Rescue Academy (UFRA) has evolved into a dynamic organization that provides fire and emergency service–related training, professional accredited certification, and resource assistance. The Utah Fire Service Certification System (UFSCS) has been administered by UFRA since the system’s inception in the early 1980s. The governing body for the firefighter certification system in the state of Utah is the Utah Fire Service Certification Council (UFSCC). The members of the council represent various areas of the state as well as a variety of department types.

The entire system is based on international professional job performance standards from NFPA and NWCG. Fire service training must be utilized to its maximum potential. Any overlap, fragmentation, and lack of basic structure must be eliminated. Standardization is the natural complement and necessity. Through these national standards and certification, firefighters and fire departments have a tool to measure specific levels of skills, abilities, and knowledge. Testing takes place all over the state of Utah and is usually scheduled by fire department training officers for members of one or more local agencies to test at their own facilities using their own equipment.

The Utah Fire Service Certification System creates uniformity through certification. Certification allows a fire service professional to be a part of the National Registry (Pro Board and IFSAC), which verifies that a person has been trained at a national standard. Firefighters, hazardous materials responders, and rescue personnel can earn various certifications. Volunteer, part-time, and career firefighters must all meet the same standard to certify. Most fire departments in Utah have certified personnel even though there is no law requiring it.

“Certification from an accredited entity is a statement of success, an indisputable mark of performance belonging to individual fire service professionals. Each successful candidate for certification from an accredited entity knows that he or she has been measured against peers and meets rigorous national standards. Certification affords the individual a uniformity and portability of qualifications. In addition, the creditability of an organization is enhanced by having members certified to national consensus standards.”

—theproboard.org

IFSAC “provides accreditation to entities that certify the competency of and issue certificates to individuals who pass examinations based on National Fire Protection Association (NFPA) fire service professional qualifications and other standards approved by the Assembly.”

—ifsac.org

The following certification requirements are based on the objectives listed in NFPA 470, *Hazardous Materials/Weapons of Mass Destruction (WMD) Standard for Responders* (National Fire Protection Association, 2022), as verified and adopted by the Utah Fire Service Certification Council (UFSCC).

The following Utah Hazardous Materials state standard covers three levels of certification:

Hazardous Materials Awareness

The focus and purpose of Hazardous Materials Awareness certification is to give the frontline firefighter the ability to:

- Detect and identify the presence of hazardous materials
- Collect information from the Emergency Response Guidebook
- Take protective actions by isolating the area and denying entry
- Make proper notifications to local/state/national organizations

Hazardous Materials Operations

The focus and purpose of Hazardous Materials Operations certification is to give the frontline firefighter the ability to:

- Perform all competencies as developed at the Awareness level
- Collect information using SDS, CHEMTREC, local LEPC
- Perform LIMITED defensive actions
- Establish and manage a decontamination corridor (under direction from a qualified HM Technician)
- Don personal protective clothing to assist as needed at a hazardous materials incident

Hazardous Materials Technician

The focus and purpose of the Hazardous Materials Technician certification is to give the frontline firefighter the ability to:

- Demonstrate all competencies as developed at the Technician level
- Collect and interpret hazard and response information
- Determine extent of damage to containers
- Identify the response objectives for a hazardous materials incident
- Select PPE for a given action and decontamination procedures
- Don, work in, and doff Class 1 and Class 2/Level A and B suits
- Perform control functions as determined by the action plan
- Evaluate, debrief, critique, and document an incident

With successful completion of this standard—which is based on NFPA 470 (2022 edition)—a candidate will have satisfied all requirements for the Hazardous Materials Awareness, Operations, and Technician as listed in OSHA 29 CFR 1910.120(q)(6)(i) *Awareness*, OSHA 29 CFR 1910.120(q)(6)(ii) *Operations*, and OSHA 29 CFR 1910.120(q)(6)(iii) *Technician*.

HAZARDOUS MATERIALS CERTIFICATION REQUIREMENTS

Entrance Requirements

Certification at the Hazardous Materials: Awareness, Operations, and Technician levels is a unique process. Because of the method and manner in which NFPA has established to become certified, candidates must complete the prerequisites and/or requirements for any of the specialty areas as set forth in NFPA 470 (2022). In order to certify at the Hazardous Materials: Awareness, Operations, and Technician levels, candidates must fulfill the following requirements:

1. Complete entrance requirements.
2. Set up and maintain department records.
3. Train on the required written and practical objectives.
4. Pass a department in-house practical skills examination.
5. Meet any other training requirements/prerequisites as defined by the Certification Council.
6. Pass both written and practical skills examinations administered by the Certification Council.
7. Request Hazardous Materials certification for each specialty area completed.
8. Request recertification at the end of each 3-year certification period.

Physical Fitness Requirements

The UFSCC acknowledges the importance of and need for physical fitness requirements as listed in NFPA 1001, *Fire Fighter Professional Qualifications*. Many agencies and departments have existing policies, regulations, etc. already in place regarding these requirements. The handling of physical fitness requirements is a **LOCAL MATTER**, outside the authority and jurisdiction of the UFSCC. The Council will not check, test, evaluate, or determine how individual agencies meet these requirements. Some departments have found it necessary to waive any type of physical fitness requirements due to their own special needs. As a local decision, this is permitted. However, due to the amount of physical, mental, and emotional stress inherent in this profession, **the Utah Fire Service Certification Council strongly recommends careful evaluation before altering or doing away with any existing physical fitness requirements.**

Here are some of the entrance requirements outlined in NFPA 1001, chapter 1:

1. Meet the minimum educational requirements established by the authority having jurisdiction.
2. Utah Fire Service Certification Council Policy 11.3 requires that a candidate be at least 18 years of age to test and be certified.
3. Meet the medical requirements of NFPA 1582, *Standard on Comprehensive Occupational Medical Program for Fire Departments* (2022), as determined by the medical authority of the AHJ.
4. Hazardous materials responders are involved in activities that pose great physical and mental challenges, requiring them to perform challenging physical activities in a high-stress environment. Physical fitness requirements for entry-level personnel should be developed and validated by the authority having jurisdiction. Physical fitness requirements should be in compliance with applicable Equal Employment Opportunity regulations and other legal requirements.
5. Prior to beginning training, a minimum medical training requirement should be met.
6. People having the potential for encountering hazardous materials on an incident scene should be trained to recognize the hazard and to implement exposure and control methods.
7. Meet psychological support/education requirements established by the authority having jurisdiction.

Occupational Safety and Health Requirements

The requirements listed in NFPA 1500 (2018), chapter 7, are:

1. Meet the Protective Clothing and Protective Equipment requirements of NFPA 1500, Policy 7.13.1, A.7.13.1.
2. Meet OSHA 29 CFR 1910.134(g) on the use of respirators (under “Prohibiting conditions that may result in facepiece seal leakage”): “Respirators shall **not** be worn when conditions prevent a good face seal.”
3. Meet OSHA 1910.134 (g)(1)(i)(A) occupational safety and health regulatory requirements.

Department Training Officers

For a department to enroll in the certification process, it is necessary for the department to assign training officers. It is recommended that the department assign at least two personnel as training officers, to coordinate and provide certification training.

Department training officers shall be certified at the level they are teaching. In addition, the Certification Council strongly recommends that training officers and instructors be state certified at the Instructor I level.

Department training officers will be responsible for certification training. Their primary responsibility will be to teach, evaluate, and in-house test department personnel on the skill and evolution requirements for each level of certification training.

Departments who **do not** have certified personnel to act as training officers for certification training should contact the Utah Fire & Rescue Academy at (801) 863-7709 for assistance in setting up and monitoring certification training.

The final entrance requirement is to complete the **Intent to Participate** form provided in Appendix C and return it to the Certification Council. Remember, participation in the certification process is **VOLUNTARY**. Once you have enrolled, you can withdraw if desired.

If a department is already participating in the Utah Fire Service Certification System, it will not be necessary to file another Intent to Participate form.

DEPARTMENT TRAINING

Hazardous Materials training is a level of skill and knowledge that all firefighters should master. The training that is given to and received by the candidate should be of the highest quality and degree. All training received must meet the requirements of NFPA 470 (2022)—including the sections listed in the chapters—and cover the skills approved by the UFSCC contained in this Utah certification standard.

All training received must be documented and recorded in the Training Record. The skills and Training Record must be completed for each person. All department in-house testing must be conducted following the Policies and Procedures of the UFSCC.

To prepare the candidate to successfully pass the state certification examination, the course material should be based on NFPA 470 (2022); IFSTA, *Hazardous Materials for First Responders*, 6th edition (Awareness and Operations), and IFSTA, *Hazardous Materials Technician*, 3rd edition. See the written objectives chart on page 5. The state certification examination will be scheduled upon receiving an “Examination Request” from the department training officer or administrator and at the conclusion of the course.

Hazardous Materials Awareness

Hazardous Materials Awareness is a prerequisite for certification for Firefighter I, Hazardous Materials Operations, Fire Service Inspector I, and Fire Investigator. All training received must meet the requirements of NFPA 470 (2022), chapter 5. Training for Hazardous Materials Awareness can be obtained by completing one of the following training courses or methods in order to qualify to take the state certification examination.

1. A Hazardous Materials Awareness course sponsored by the Utah Fire & Rescue Academy, which meets the requirements of NFPA 470 (2022), chapter 5.
2. Department-based training: Departments can create their own Hazardous Materials Awareness course which meets the requirements of NFPA 470 (2022), chapter 5.

Hazardous Materials Operations

NFPA 1500 strongly suggests that all firefighters who respond to a potential hazardous materials spill be certified in Hazardous Materials Operations, as a minimum. The operations level is also a prerequisite for certification as Firefighter I. All training received must meet the requirements of NFPA 470 (2022), chapter 7 and sections of chapter 9. Training for Hazardous Materials Operations can be obtained by completing one of the following training courses or methods in order to qualify to take the state certification examination.

1. A Hazardous Materials Operations course sponsored by the Utah Fire & Rescue Academy, which meets the requirements of NFPA 470 (2022), chapter 7, 9.2 (PPE), and 9.6 (Product Control).
2. Department-based training: Departments can create their own Hazardous Materials Operations course which meets the requirements of NFPA 470 (2022), chapter 7, 9.2 (PPE), and 9.6 (Product Control).

Hazardous Materials Technician

A high level of skill and knowledge is required for Hazardous Materials Technician certification. All training received must meet the requirements of NFPA 470 (2022), chapter 11. Training for Hazardous Materials Technician can be obtained by completing the following in order to qualify to take the state certification examination.

Department-based training: Departments can create their own Hazardous Materials Technician course which meets the requirements as outlined in NFPA 470, chapter 11 (2022). (*Currently UFRA does not offer a Hazardous Materials Technician course.)

Written Objectives

Certification Level	NFPA 470 (2022) Chapter	IFSTA Textbook
Hazardous Materials Awareness	5	<i>Hazardous Materials for First Responders, 6th edition Chapter 1-3</i>
Hazardous Materials Operations (PPE and Product Control)	7 9.2 and 9.6	<i>Hazardous Materials for First Responders, 6th edition Chapters 4-11, 13, 15</i>
Hazardous Materials Technician	11	<i>Hazardous Materials Technician, 3rd edition</i>
All: Awareness, Operations, Technician		Emergency Response Guidebook (ERG)

Skill Objectives

Each candidate **must** be trained and evaluated in the performance of **all** skills as found in this Utah certification standard. Each of the skill objectives shall be completed swiftly, safely, and with competence as defined below:

- **Swiftly.** Each skill objective must be completed within the allotted time.
- **Safely.** Each skill objective must be completed safely. Conduct that could injure an individual or damage equipment is unacceptable. Equipment should be checked prior to skill testing or training to see that it is safe and functional.
- **With Competence.** Each skill objective must be performed in accordance with this Utah certification standard. This includes performing the proper steps in sequence. Competence will be measured in accordance with the UFSCS skill objectives.

Department Training Records

Each candidate shall have a current, accurate, and complete Training Record on file with the department which indicates that they have been trained on all skill objectives. **The Training Record must be completed in its entirety in order to test.** Training Records may be completed on a computer or by hand. Departments may set up their own Training Records, use the one provided in this standard, or use the fillable Training Record found online on UFRA's website. If a department chooses to set up their own Training Record it must meet the following requirements:

1. Indicate the certification level and its corresponding NFPA standard number and edition.
2. Include a signature line for the candidate, which attests that all skills have been trained on and a complete in-house comprehensive exam was administered and passed.
3. Include a signature line for the chief/training officer, which attests that the candidate has been trained on all skills and a complete in-house comprehensive exam was administered and passed.
4. Include a line to record the date the Training Record was completed.
5. List all the skills from this Utah certification standard for this level. Include columns indicating the training dates, training instructors, the date of exams, exam instructors, and whether the candidate passed each exam (see the Training Record examples in this standard).

Department In-House Skills Examination

At the completion of the department's skills training, the department is required to hold an in-house skills examination for the level being trained. This is a comprehensive in-house skills test conducted by the department training officers. This test is to ensure that skill mastery has been maintained from the beginning to the end of the training process, and to prepare candidates for the state examination. Training officers may utilize other personnel to assist in administering the exam; however, they must be certified at the level they are in-house testing.

Proctor instructions for the examination are in Appendix B in this standard. In-house testers shall follow the proctor instruction sheet to ensure uniformity and fairness during the exam. It is recommended that candidates be given two attempts at any skill. **If they fail on the second try, then they have failed the evaluation and are required to go through additional training by the department trainer.** No training, teaching, or coaching is allowed during the test. After the evaluation, using the test to teach and train is recommended.

If skill weaknesses are evident, the department should conduct additional training and hold a new

department in-house skills examination to ensure their personnel have fully mastered all required skills. Only those individuals who successfully pass the department's skills test will be allowed to participate in the Certification Council's skills spot check examination. Department Training Records must show that all candidates have successfully passed the in-house exam.

CERTIFICATION EXAMINATIONS

After completion of the training process, the chief/administrator can request testing for the candidate using the Examination Request form in Appendix C. The candidate will then have three attempts to pass the written examination. A separate request must be sent to the Certification Office for each attempt. Request forms must reach the Certification Office no later than 30 days prior to the examination date. The entire examination process must be completed within one year of the first written exam date.

Written Examinations

The written examination is a randomly generated test covering the written objectives of NFPA 470 (2022). Use of the Emergency Response Guidebook (ERG) is permitted during the exam.

Certification Level	# of Questions
Hazardous Materials Awareness	35
Hazardous Materials Operations	80
Hazardous Materials Technician	100

A minimum score of 70% is required to pass the certification exam. Candidates failing the first attempt of the written exam will be permitted to retest no sooner than 30 days from the date of the last exam. Three attempts are allowed to pass the exam. A candidate who fails the written examination three times has failed the certification process and must wait one year from the date of the last failed exam before reentering testing. Exam results are forwarded to the chief/administrator within 30 days following receipt of the completed exam.

SAMPLE WRITTEN EXAMINATION QUESTION:

Colorimetric tubes are designed to read one specific gas. When more than one substance is present, the results may be confusing. This principle is called:

- a. Zeroing
- b. Calibrating
- c. Fogging
- d. Interference**

Skills Spot Check Examinations

This is a two-step examination. The first step is a department records check and the second is the skills spot check examination. A Certification tester appointed by the Utah Fire Service Certification Council conducts the examination.

Training records are checked. If records are inadequate, corrective action must be taken before proceeding to the next step. The records must meet minimum requirements and are checked for the following:

1. Candidate has been trained in each skill for the level being evaluated.
2. A department training officer has signed off each skill.
3. Each candidate has passed a department in-house skills examination.

The skills spot check examination is graded on a 100% pass/fail basis. The test is graded in the following three areas:

- **Swiftly.** Each skill objective must be completed within the allotted time.
- **Safely.** Each skill objective must be completed safely. Conduct that could injure an individual or damage equipment is unacceptable. Equipment should be checked prior to skill testing or training to see that it is safe and functional.
- **With Competence.** Each skill objective must be performed in accordance with this Utah certification standard. This includes performing the proper steps in sequence. Competence will be measured in accordance with the UFSCS skill objectives.

Candidates are spot checked on the following skills:

Certification Level	# of Skills
Hazardous Materials Awareness	1
Hazardous Materials Operations	3
Hazardous Materials Technician	3

No prior notification of the skills being tested will be given. This is a 100% pass/fail test. Candidates are given two attempts (if necessary) to perform each skill. If they fail on the second try, then they have failed the examination. Candidates who fail the second attempt must wait **30 days** before the third and final attempt. Candidates taking third attempts will test on the skill they missed plus an additional skill from the section of the standard they failed. **No training, teaching, or coaching is allowed during this state test.**

Candidates who have failed the third attempt of the written examination or the skills examination have failed the certification process and must wait **one year** from the date of the failed third attempt to reenter state testing. The candidate will begin testing with a new **first attempt** of the written examination, following a request for examination. If a candidate wishes to enter a new course, the candidate may petition the Certification Office to reenter the certification examination process no sooner than 120 days after their **third attempt** failure. In the petition, candidates must explain the reason(s) behind their request to reenter the process.

HAZARDOUS MATERIALS CERTIFICATION

When all requirements for certification have been met, applicants are eligible to be certified. The chief/administrator may apply to the Utah Fire Service Certification Council for certification for those candidates who have successfully completed the certification training/testing process. Requests for state certification must be submitted to the Certification Office using the Certification/Recertification Request form provided in Appendix C. The names are then checked against the official state records to ensure that each individual listed has met all requirements and prerequisites.

Prerequisites for Hazardous Materials Certification

To qualify to train for a certain level, candidates must have completed the prerequisite(s).

Training Level	Trains on NFPA 470	Prerequisite(s)
Hazardous Materials Awareness	Chapter 5	
Hazardous Materials Operations	Chapter 7, 9	Awareness (Chapter 5)
Hazardous Materials Technician	Chapter 11	Awareness and Operations (Chapters 5 and 7)

Certifications are valid for a three-year period. Each certified hazardous materials responder may renew certification by having the chief/administrator of the participating agency submit a Certification/Recertification Request (provided in Appendix C of this standard).

Certified candidates should participate in at least 36 hours of structured class and skill training per year to maintain competency and stay current on their skills. This 36 hours is for all certified levels combined, not 36 hours for each individual level. **A total of 108 hours of training is required** for the previous three-year certification period.

Recertification for Hazardous Materials Technician Level

Because of the high level of skill required of a Hazardous Materials Technician, the Certification Council requires that candidates complete an in-house comprehensive examination—that allows them to demonstrate the technician-level skills contained in this standard—as part of their recertification process. An original copy of a candidate’s Technician Training Record for the previous three-year period must accompany each technician recertification request, verifying that the candidate is qualified in all technician-level skills.

For more information on Utah firefighter certification, contact the:

Utah Fire Service Certification Council
Utah Fire & Rescue Academy
3131 Mike Jense Parkway, Provo, UT 84601
801-863-7709
UFRAcertification@uvu.edu

HAZARDOUS MATERIALS CERTIFICATION CHECKLIST

ENTRANCE REQUIREMENTS

- ☐ Each candidate has met the requirements listed in NFPA 470 (2022).
 - Hazardous Materials Awareness: chapter 5
 - Hazardous Materials Operations: chapters 7, 9
 - Hazardous Materials Technician: chapter 11
- ☐ Each candidate has met requirements listed in NFPA 1001 (2019) or those established by the authority having jurisdiction.
- ☐ The department has filed an “Intent to Participate” form with the UFSCC.
- ☐ Each candidate has trained in the level’s written objectives.

DEPARTMENT TRAINING RECORDS

- ☐ Each candidate has a training record on file with the department that shows:
 1. A learning experience in each skill objective
 2. Dates of training
 3. Initials of instructors
- ☐ Each candidate has trained in the level’s written objectives.

DEPARTMENT IN-HOUSE SKILLS EXAMINATION

- ☐ Each candidate has successfully completed an in-house skills examination.
- ☐ Exam results are documented in department training records.

ADDITIONAL TRAINING/PREREQUISITE REQUIREMENTS

- ☐ Hazardous Materials Awareness: none
- ☐ Hazardous Materials Operations: Each candidate is state certified through the UFSCC at the Hazardous Materials First Responder Awareness level.
- ☐ Hazardous Materials Technician: Each candidate is state certified through the UFSCC at the Hazardous Materials First Responder Awareness and Operations levels.

CERTIFICATION EXAMINATIONS

- ☐ Each candidate has passed the UFSCC written examination.
- ☐ Each candidate has passed the UFSCC skills and/or evolution examination.
- ☐ A spot check examination was administered by an approved UFRA Certification tester.

CERTIFICATION

- ☐ The chief/administrator has requested certification for candidates using the Certification/Recertification Request.

SECTION I
HAZARDOUS MATERIALS AWARENESS

HAZARDOUS MATERIALS AWARENESS SKILL OBJECTIVE

SECTIONS: RECOGNITION AND IDENTIFICATION, INITIATION OF PROTECTIVE ACTIONS, NOTIFICATION

For the skill in this section, the AHJ must be able to provide a safe testing environment for the candidates and accept all liability for candidate safety.

1. Demonstrate initiating required notifications at a hazardous materials/WMD incident, given an incident.

REFERENCE: NFPA 470, 2022 edition, 5.2.1, 5.3.1, 5.4.1

CONDITION: Given a scenario involving a hazardous materials/WMD incident, a current edition of the Emergency Response Guide (ERG), and approved communications equipment.

COMPETENCE:

- Initiate a call to 911 or emergency dispatch.
- Identify yourself.
- Give location of incident.
- Explain the nature of the incident (semi-tanker rollover, container leaking, amount of product being released).
- Identify additional concerns: victims, injuries, involved in a fire, etc.
- Identify product involved/being released (see ERG, Safety Data Sheets [SDS], shipping papers).
- Identify the initial isolation distance required.
- Identify procedures for isolating and denying entry.
- Complete skill in allotted time.

TIME: 10 minutes

UTAH FIRE SERVICE CERTIFICATION SYSTEM

HAZARDOUS MATERIALS AWARENESS

NFPA 470, 2022 Edition
Chapter 5

HAZARDOUS MATERIALS AWARENESS TRAINING RECORD / IN-HOUSE COMPREHENSIVE FORM

Candidate Name:				Department:		
Candidate Signature:				Date of Completion:		
Chief/Training Officer:				Chief/Training Officer Signature:		
This form may be completed on a computer but must be printed out for the Certification Tester to verify on test day. The date of completion must be filled in and the signatures of the chief/training officer and the candidate must be original signatures. The signatures attest that all skills have been trained on and a complete in-house comprehensive exam was administered and passed. Falsification of signatures or any component of this document may result in the revocation, suspension, or denial of certification.						
SECTION	TRAINING RECORD		IN-HOUSE COMPREHENSIVE EXAM			SKILL
	DATE	INSTRUCTOR	DATE	INSTRUCTOR	PASS	
RECOGNITION & IDENTIFICATION INITIATION OF PROTECTIVE ACTIONS NOTIFICATION						1. Demonstrate initiating required notifications at a hazardous materials/WMD incident, given an incident.

SECTION II
HAZARDOUS MATERIALS OPERATIONS

HAZARDOUS MATERIALS OPERATIONS SKILL OBJECTIVES

For the skills in this section, the AHJ must be able to provide a safe testing environment for the candidates and accept all liability for candidate safety. The AHJ must have the capacity to provide a hazardous materials prop/simulator for testing purposes.

REPORTING AND DOCUMENTATION

1. Demonstrate procedures for establishing and transferring command at a hazardous materials/WMD incident, utilizing an incident management system.

REFERENCE: NFPA 470, 2022 edition, 7.2.1, 7.3.1

CONDITION: Given a Local Emergency Response Plan (LERP) provided by the authority having jurisdiction (AHJ), a scenario for a hazardous materials/WMD incident, and an Emergency Response Guide (ERG)

COMPETENCE:

- Give a brief size-up:
 - Unit on scene
 - Location
 - Nature of the incident (i.e., containers, location, nearby exposures, risks, etc.)
 - Current conditions (“This is what I see.”)
- Identify the material.
- Identify the isolation zones.
- Implement appropriate emergency operations.
- Implement a site safety and control plan.
- Designate a safety officer.
- Establish Incident Command and Accountability, and announce location.
- Name the incident.
- Complete skill in allotted time.

TIME: 7 minutes

2. Brief assigned personnel so that they are informed of specific tasks and standards as well as safety, operational, and special interest area considerations.

REFERENCE: NFPA 470, 2022 edition, 7.2.1, 7.3.1, 7.6.1

CONDITION: Given a scenario involving a hazardous materials/WMD incident, including a completed Incident Action Plan (IAP)/ICS Form 208 HM

COMPETENCE:

- Give status of incident.
- Identify hazards.
- Give tasks to be performed.
- Describe the site.
- Give the expected duration of the tasks.
- Explain PPE requirements.
- Explain monitoring requirements.

- Describe emergency radio traffic procedures.
- Describe evacuation signal procedures.
- Monitor progress of the incident.
- Complete skill in allotted time.

TIME: 7 minutes

3. Identify and complete the reporting and documentation requirements within the emergency response plan or IAP regarding PPE and brief assigned personnel so that the personnel are informed of specific tasks, standards, safety, operational, and special interest area considerations.

REFERENCE: NFPA 470, 2022 edition, 7.3.1, 7.4.1, 7.6.1, 9.2.1

CONDITION: Given a scenario and a blank ICS 208 HM document, evaluate, document, and report the progress of a hazardous materials incident. Following department SOPs and/or under the direction of a HazMat Technician.

SCENARIO: Fuel leaking from a saddle tank on a semi-truck

COMPETENCE:

- Status of incident
- Hazards identified
- Tasks to be performed
- Description of the site
- Expected duration of the tasks
- PPE requirements
- Monitoring requirements
- Describe emergency radio traffic procedures
- Describe evacuation signal procedures
- Entry Team: Fill out the ICS form 208 HM (box 17).
 - Identify type of PPE required by scenario.
 - Identify reference and why that PPE is to be worn.
 - Reinforce compliance.
- Decon Team: Fill out the ICS form 208 HM (box 18).
 - Identify type of PPE required by scenario.
 - Identify reference and why that PPE is to be worn.
 - Reinforce compliance.
- Verbalize if objectives are being met.
 - Are the conditions improving?
 - Is the PPE appropriate?
 - Is the isolation zone adequate?
- Communicate progress to incident commander through appropriate means.
- Complete skill in allotted time.

TIME: 15 minutes (time begins after scenario has been reviewed)

DECONTAMINATION

4. Demonstrate “emergency” decontamination of a victim or responder using water.

REFERENCE: NFPA 470, 2022 edition, 7.5.1

CONDITION: Given a water supply, wearing full PPE as defined by the Emergency Response Guide, hose/nozzles, a 2-member team, and a victim to be decontaminated (dressed in a splash suit, firefighter turnouts, or street clothing)
*PPE is to be donned before the skill begins.

COMPETENCE:

- Select appropriate site to minimize runoff contamination.
- Direct the victim on procedures (flush, strip, flush, cover).
- Rinse personnel starting from the head, working toward the feet.
- Direct the victim being decontaminated to remove contaminated clothing as much as possible.
- If absolutely necessary, decon team members: Touch outside of clothing being removed, to avoid cross contamination.
- Direct the victim to place contaminated articles in a designated area within the contamination zone.
- Rinse the victim head to toe again.
- Give the victim a covering (i.e., towel, blanket, gown, etc.).
- Direct the victim to exit the warm zone for further evaluation.
- Complete skill in allotted time.

TIME: 5 minutes

5. Demonstrate the setting up of a multiple-station decontamination corridor.

REFERENCE: NFPA 470, 2022 edition, 7.5.1,

CONDITION: Given equipment and diagram as determined by the incident, department SOGs or a qualified Hazardous Materials Technician, and a 2-member team for a single line decon corridor.
“Dry” *or* “Wet” as recommended by the AHJ

COMPETENCE:

- Select an appropriate site that is upwind of the incident and drains toward the “hot” zone.
- Clearly marked entry point.
- Designate a tool drop station.
- Confine decon solutions and runoff water.
- Establish a wash station (may have multiple).
- Establish a rinse station (may have multiple).
- Designate a PPE drop station(s).
- Address ambulatory and non-ambulatory responder decon capabilities.
- Clearly marked exit point.
- Complete skill in allotted time.

TIME: 15 minutes

6. Demonstrate decontamination of an emergency responder.

REFERENCE: NFPA 470, 2022 edition, 7.4.1, 7.5.1, 9.2.1,

CONDITION: Given a decon corridor, a water supply as necessary (can be simulated), hose/nozzles (pump sprayer, etc.), a 2 or 4 member team, a responder dressed in appropriate level of protection to be decontaminated, and a minimum of a splash suit and SCBA for the person conducting the decontamination 2-member team for a single line decon corridor or 4-member team for a double line decon corridor.

“Dry” or “Wet” as recommended by the AHJ

*For completion of this skill, the AHJ should select the appropriate set of competences for a “Non-Encapsulated Suit” or an “Encapsulated Suit.” It is NOT required that both sets of competences be completed, only those that are specific to the suit used in their jurisdiction.

COMPETENCE: **NON-ENCAPSULATED SUIT**

- Direct the responder to enter at entry point.
- Direct the responder to drop tools in designated area.
- Direct the responder to enter wash station.
- Wash the responder, starting with the head.
- Decon personnel: Control the runoff of the wash station.
- Direct the responder to drop SCBA in the designated area without removing the face piece.
- Remove contaminated PPE.
- Decon the team member to avoid cross contamination.
- Place contaminated articles in one designated area within the corridor.
- Direct the responder to remove the face piece.
- Direct the responder to remove inner gloves.
- Direct the responder to exit warm zone for further evaluation.
- Evaluate effectiveness of decon.
- Document appropriate decontamination and inspection of equipment per AHJ procedures.
- Complete skill in allotted time.

TIME: 15 minutes

COMPETENCE: **ENCAPSULATED SUIT**

- Direct the responder to enter at entry point.
- Direct the responder to drop tools in designated area.
- Direct the responder to enter wash station.
- Wash responder, starting with the head.
- Decon personnel: Control runoff of wash station.
- Remove contaminated PPE.
- Decon the team member to avoid cross contamination.
- Place contaminated articles in one designated area within the corridor.
- Direct the responder to drop SCBA in designated area without removing face piece.
- Direct the responder to remove face piece.
- Direct the responder to remove inner gloves.
- Direct the responder to exit warm zone for further evaluation.
- Evaluate effectiveness of decon.

- Document appropriate decontamination and inspection of equipment per AHJ procedures.
 - Complete skill in allotted time.
- TIME: 15 minutes

PERSONAL PROTECTIVE EQUIPMENT

7. Identify and describe the function of each component of a self-contained breathing apparatus (SCBA).

REFERENCE: NFPA 470, 2022 edition, 7.3.1, 7.4.1, 9.2.1,

CONDITION: Given a self-contained breathing apparatus (SCBA) used by the responder.

COMPETENCE:

- Identify and describe the backpack/harness.
- Identify and describe the air cylinder: the cylinder, the valve, and the pressure gauge.
- Identify and describe the regulator assembly: the high-pressure hose, the low-pressure alarm, the main line valve, and the emergency bypass valve.
- Identify and describe the face piece assembly: the low-pressure hose/mask mounted regulator, the exhalation valve, and the head harness.
- Determine SCBA's readiness for use.
- Complete skill in allotted time.

TIME: 10 minutes

8. Demonstrate donning a self-contained breathing apparatus (SCBA).

REFERENCE: NFPA 470, 2022 edition, 7.3.1, 7.4.1, 9.2.1

CONDITION: Given a self-contained breathing apparatus (SCBA) used by the responder.

*Steps may vary between SCBAs made by different manufacturers. However, all of the competences should be covered during the donning process.

COMPETENCE:

- Check SCBA cylinder pressure gauge for full level.
- Open cylinder valve fully and verbalize pressure.
- Check regulator and cylinder gauge. Gauges should accurately correlate with each other (gauges should not differ).
- Don backpack and fasten/tighten all straps.
- Don face piece and adjust head harness.
- Check seal and do a positive/negative pressure check.
- Attach supply hose to regulator or face piece.
- Determine readiness of SCBA.
- Complete skill in allotted time.

TIME: 2 minutes

9. Demonstrate doffing a self-contained breathing apparatus (SCBA).

REFERENCE: NFPA 470, 2022 edition, 7.4.1, 9.2.1

CONDITION: Wearing a self-contained breathing apparatus

COMPETENCE:

- Disconnect regulator from face piece or low-pressure hose from regulator.
- Doff SCBA, place on ground, and close cylinder valve.
- Relieve excess pressure from regulator and listen for low-pressure alarm.
- Fully extend all straps on SCBA backpack.
- Fully extend all straps on face piece.
- Verbalize the need to inspect entire SCBA and face piece for cleanliness and damage before returning it to service.
- Appropriately document in SCBA log that SCBA has been inspected and is ready for service.
- Complete skill in allotted time.

TIME: 2 minutes

10. Assist/Don emergency response personnel in donning chemical protective clothing and SCBA.

REFERENCE: NFPA 470, 2022 edition, 7.4.1, 9.2.1, 9.6.1

CONDITION: Don the appropriate PPE for a chemical spill as required by AHJ. Given a 2-member team: one person donning and one dressing. Candidates must Don and assist in order to pass the skill.

TIME: 8 minutes (encapsulating suit)
12 minutes (non-encapsulating suit)

COMPETENCE:

SKILLS FOR PERSON DONNING SUIT:

1. Determine location of product and ensure safe donning area (upwind, uphill, upstream)
2. Don level B suit.
3. Don boots.
4. Don SCBA.
5. Don face piece.
6. Check face seal.
7. Don inner gloves.
8. Don outer gloves.
9. Don head protection (as required by AHJ).
10. Safely and appropriately remove suit / PPE
11. Inspect suit / PPE for damage, wear, or any other abnormalities
12. Appropriately log per AHJ that PPE has been inspected and is ready for service
13. Complete skill in allotted time.

SKILLS FOR PERSON ASSISTING ANOTHER WITH DONNING SUIT:

1. Assist responder with donning suit.
2. Assist donning boots.
3. *Correctly tape suit to boots.
4. *Completely tape hood of PPE to SCBA face piece. Do not cover field of vision on face piece, and do not obstruct airway.
5. Assist donning SCBA.
6. *Tape front closure area and neck area.
7. Assist donning inner gloves.
8. Assist donning outer gloves.
9. *Correctly tape suit to outer glove.

10. Assist responder to go on air.
11. Fold all ends of tape (2" minimum).
12. Safely and appropriately remove suit / PPE
13. Inspect suit / PPE for damage, wear, or any other abnormalities
14. Appropriate log per AHJ that PPE has been inspected and is ready for service.
15. Complete skill in allotted time.

*Taping is not required for encapsulating suits unless gloves and/or boots are not integrated into the suit.

PERFORMING DEFENSIVE CONTROL ACTIONS

11. Demonstrate stopping product release by closing remote valves.

REFERENCE: NFPA 470, 2022 edition, 7.6.1, 9.6.1

CONDITION: Given a simulated diesel spill from a tank or a fixed facility, wearing full PPE as defined by the Emergency Response Guide, a remote valve, and a 2-member team

COMPETENCE:

- Confirm location of remote valve by a competent person on scene.
- Approach the valve location, staying out of the product.
- Open or close the valve.
- Evaluate whether shutting off the remote valve stopped the leak. Verbalize to command.
- Exit area maintaining team integrity.
- Safely and appropriately remove suit / PPE
- Inspect suit / PPE for damage, wear, or any other abnormalities
- Appropriately log per AHJ that PPE has been inspected and is ready for service.
- Complete skill in allotted time.

TIME: 8 minutes

12. Demonstrate the proper application of firefighting foam on a simulated hazardous materials spill.

REFERENCE: NFPA 470, 2022 edition, 7.4.1, 9.6.1

CONDITION: Given a simulated gasoline spill (36 square feet), wearing full PPE as defined by the Emergency Response Guide, an established foam application system (apparatus or foam extinguisher), and a 2-member team

COMPETENCE:

- Approach spill upwind/upgrade of product.
- Demonstrate proper application techniques.
- Select one of the three methods of foam application (roll on, bank, rain down).

- Do not direct stream directly into pool.
- Safely and appropriately remove suit / PPE
- Inspect suit / PPE for damage, wear, or any other abnormalities
- Appropriately log per AHJ that PPE has been inspected and is ready for service
- Complete skill in allotted time.

TIME: 10 minutes

13. Demonstrate construction of a dike to divert a spill.

REFERENCE: NFPA 470, 2022 edition, 7.4.1, 7.6.1, 9.6.1

CONDITION: Given a simulated moving diesel spill, wearing full PPE as defined by the Emergency Response Guide, sand/or dirt, shovels, plastic, a 3-member team

COMPETENCE:

- Construct a dike 6 feet long and a minimum of 6 inches high.
- Work ahead of spill, out of product.
- Two personnel are to build the dike and one is to stand by as the safety officer.
- Divert spill.
- Evaluate whether the dike is constructed appropriately and accomplishes the objective (must verbalize).
- Safely and appropriately remove suit/ PPE
- Inspect suit / PPE for damage, wear, or any other abnormalities.
- Appropriately log per AHJ that PPE has been inspected and is ready for service.
- Complete skill in allotted time.

TIME: 10 minutes

14. Demonstrate construction of a simple dam to control a spill.

REFERENCE: NFPA 470, 2022 edition, 7.4.1, 7.6.1, 9.6.1

CONDITION: Given a simulated diesel spill, wearing full PPE as defined by the Emergency Response Guide, sand/or dirt, shovels, plastic, a 3-member team

COMPETENCE:

- Construct a dam 6 feet long and a minimum of 8 inches high.
- Work ahead of spill, out of product.
- Two personnel are to build the dam and one is to stand by as the safety officer.
- Control spill.
- Safely and appropriately remove suit/ PPE
- Inspect suit/ PPE for damage, ear, or any other abnormalities
- Appropriately log per AHJ that PPE has been inspected and is ready for service
- Complete skill in allotted time.

TIME: 10 minutes

15. Demonstrate the use of an absorbent pad or other adsorbent material to control a spill of a hazardous material.

REFERENCE: NFPA 470, 2022 edition, 7.4.1, 7.6.1, 9.6.1

CONDITION: Given a simulated diesel spill, wearing full PPE as defined by the Emergency Response Guide, an absorbent pad or other absorbent material, shovels, a 3-member team

COMPETENCE:

- Control or adsorb spill by putting absorbent pad/adsorbent materials in place.
- Work ahead of spill, out of product.
- Two personnel are to put the materials in place and one is to stand by as the safety officer.
- Safely and appropriately remove suit / PPE
- Inspect suit/ PPE for damage, wear, or any other abnormalities
- Appropriately log per AHJ that PPE has been inspected and is ready for service
- Complete skill in allotted time.

TIME: 10 minutes

16. Demonstrate proper evidence preservation for suspected criminal or terrorist acts.

REFERENCE: NFPA 470, 2022 edition, 6.4.2, 7.2.1, 7.4.1, 7.6.1

CONDITION: Given a scenario, wearing full PPE as defined by the Emergency Response Guide, barrier tape, and road cones

COMPETENCE:

- Prevent individuals from altering or destroying physical evidence.
- Restrict responder movement, location, and activity around the evidence location.
- Secure and mark evidence location (barrier tape/road cones).
- Notify command immediately of findings, including location and time.
- Complete skill in allotted time.

TIME: 5 minutes

EVOLUTION

Decon. Evolution- Demonstrate necessary steps and skills to adequately perform emergency decontamination of an ambulatory victim, followed by proper set up of multiple station decontamination corridor. Finally demonstrate proper decontamination of an emergency responder wearing appropriate PPE.

REFERENCE: NFPA 470, 2022 edition, 7.4.1, 7.5.1, 9.2.1

CONDITION: Given a water supply, wearing full PPE as defined by the ERG, hose/nozzles, 2-member team. Victim to be decontaminated is to be dressed in splash suit, firefighter turnouts, or street clothes. After performing emergency decon. 2-member team will be given equipment and diagram as determined by incident, department SOGs or qualified Hazmat technician, will properly construct a single line decon corridor. 2-member team will then be given appropriate PPE (maybe FF turnouts), water supply as necessary, hose/nozzles (pump sprayer, etc). A responder dressed in appropriate level of protection to be decontaminated. Minimum splash suit and SCBA for person conducting decontamination. "Dry" or "Wet" (hybrid) as recommended by the AHJ.

*PPE is donned before skill begins

*For completion of this skill the AHJ should select the appropriate set of competences for a “non-Encapsulated suit” or “Encapsulated suit.” AHJ’s are NOT required to complete both competences, only the one that is specific to the suit used in their jurisdiction.

COMPETENCE:

- Select appropriate site to minimize runoff contamination.
- Responder directs victim on procedures (flush, strip, flush, cover).
- Rinse person starting from the head, working towards the feet.
- Victim being decontaminated removes contaminated clothing as much as possible.
- If absolutely necessary, decon team member’s touch outside of clothing being removed to avoid cross contamination.
- Victim places contaminated articles in one designated area within contamination zone.
- Victim is rinsed head to toe again.
- Victim is given covering (i.e., towel, blanket, gown, etc.)
- Victim directed to exit warm zone for further evaluation.
- Select appropriate site, up wind of incident, drainage towards “hot” zone
- Clearly mark entry point
- Tool drop
- Confinement of decon solutions and runoff water
- Wash station (maybe multiple)
- Rinse station (maybe multiple)
- PPE drop station(s)
- Ambulatory and non-ambulatory responder decon capabilities addressed
- Clearly marked exit point

NON-ENCAPSULATED SUIT

- Direct responder to enter entry point.
- Direct responder to drop tools in designated areas
- Direct responder to enter wash station
- Wash responder starting from the head
- Decon personnel control run-off of wash station
- Direct responder to drop SCBA in designated area without removing face piece
- Remove contaminated PPE
- Decon team member to avoid cross contamination
- Place contaminated articles in one designated area within corridor
- Direct responder to remove facepiece
- Direct responder to remove inner gloves
- Direct responder to exit warm zone for further evaluation
- Evaluate effectiveness of decon
- Complete Skill in allotted time.

ENCAPSULATED SUIT

- Direct responder to enter entry point.
- Direct responder to drop tools in designated areas
- Direct responder to enter wash station
- Wash responder starting from the head
- Decon personnel control run-off of wash station
- Direct responder to drop SCBA in designated area without removing face piece
- Remove contaminated PPE
- Decon team member to avoid cross contamination

- Place contaminated articles in one designated area within corridor
- Direct responder to remove facepiece
- Direct responder to remove inner gloves
- Direct responder to exit warm zone for further evaluation
- Evaluate effectiveness of decon
- Complete Skill in allotted time.

TIME: 30 minutes

UTAH FIRE SERVICE CERTIFICATION SYSTEM

HAZARDOUS MATERIALS OPERATIONS

NFPA 470, 2022 Edition
Chapter 7

HAZARDOUS MATERIALS OPERATIONS TRAINING RECORD / IN-HOUSE COMPREHENSIVE FORM

Candidate Name:				Department:			
Candidate Signature:				Date of Completion:			
Chief/Training Officer:				Chief/Training Officer Signature:			
This form may be completed on a computer but must be printed out for the Certification Tester to verify on test day. The date of completion must be filled in and the signatures of the chief/training officer and the candidate must be original signatures. The signatures attest that all skills have been trained on and a complete in-house comprehensive exam was administered and passed. Falsification of signatures or any component of this document may result in the revocation, suspension, or denial of certification.							
SECTION		TRAINING RECORD		IN-HOUSE COMPREHENSIVE EXAMS			SKILL
		DATE	INSTRUCTOR	DATE	INSTRUCTOR	PASS	
Reporting and Documentation	7.2.1, 7.3.1						1. Demonstrate procedures for establishing and transferring command at a hazardous materials/WMD incident, utilizing an incident management system.
	7.2.1, 7.3.1, 7.6.1						2. Brief assigned personnel so that they are informed of specific tasks and standards as well as safety, operational, and special interest area considerations.
	7.3.1, 7.4.1, 7.6.1, 9.2.1						3. Identify and complete the reporting and documentation requirements within the emergency response plan or IAP regarding PPE.
Decontamination	7.5.1						4. Demonstrate “emergency” decontamination of a victim or responder using water.
	7.5.1, 8.4.4.1						5. Demonstrate the setting up a multiple-station decontamination corridor.
	7.4.1, 7.5.1, 9.2.1, 8.4.4.1						6. Demonstrate decontamination of an emergency responder.
	7.3.1, 7.4.1, 9.2.1, 8.2.4.1						7. Identify and describe the function of each component of an SCBA.
PPE	7.3.1, 7.4.1, 9.2.1, 8.2.4.1						8. Demonstrate donning an SCBA.
	7.4.1, 9.2.1, 8.2.4.1						9. Demonstrate doffing an SCBA.
	7.4.1, 9.2.1, 9.6.1, 8.2.4.1						10. Assist/Don emergency response personnel in donning chemical protective clothing and an SCBA.

Defensive Control	7.6.1, 8.6.4.1, 9.6.1						11. Demonstrate stopping product release by closing remote valves.
	7.4.1, 9.6.1, 8.6.4.2						12. Demonstrate the proper application of firefighting foam on a simulated hazardous materials spill.
	7.4.1, 7.6.1, 8.6.3.1, 9.6.1						13. Demonstrate construction of a dike to divert a spill.
	7.4.1, 7.6.1, 8.6.3.1, 9.6.1						14. Demonstrate construction of a simple dam to control a spill.
	7.4.1, 7.6.1, 8.6.3.1, 9.6.1						15. Demonstrate the use of an absorbent pad or other adsorbent material to control a spill of a hazardous material.
	6.4.2, 7.2.1, 7.4.1, 7.6.1						16. Demonstrate proper evidence preservation for suspected criminal or terrorist acts.

SECTION III
HAZARDOUS MATERIALS TECHNICIAN

HAZARDOUS MATERIALS TECHNICIAN SKILL OBJECTIVES

SURVEYING THE HAZARDOUS MATERIALS INCIDENT

1. **Given three hazardous materials (solid, liquid, and gas) and the following monitoring equipment, test strips, and reagents, select the appropriate equipment and PPE. Demonstrate the correct techniques to identify or classify the materials. Document results using department reports, SOGs, or a UFRA Field Screening Form:**

A. Demonstrate the correct technique to identify and/or classify materials using a multi-gas meter (carbon monoxide, oxygen, or combustible gas indicator [CGI]).

REFERENCE: NFPA 470, 2022 edition, 11.2.1, 11.2.2

CONDITION: Given incident information; a calibrated carbon monoxide, oxygen, or CGI meter; an atmosphere with an unknown concentration of gas; and wearing appropriate PPE

COMPETENCE:

- Fresh air calibrate the instrument.
- Monitor the atmosphere.
 - High, medium, low (i.e., figure eight technique)
 - Allow for response time.
- Verbalize and document the results.
- Complete skill in allotted time.

TIME: 5 minutes (from ready time of meter)

B. Demonstrate the correct technique to identify and/or classify materials using colorimetric equipment/reagents (colorimetric tubes, test papers, pH paper, M8, M9, WMD detection, etc.).

REFERENCE: NFPA 470, 2022 edition, 11.2.1, 11.2.2, 11.4.3.1

CONDITION: Given a 2-member team; incident information; testing equipment; an unknown liquid, solid, or gas; and wearing appropriate PPE

COMPETENCE:

- Prepare equipment and/or testing area.
- Verbalize expiration date.
- Verbalize compatibility.
- Following manufacturer instructions, prepare equipment properly for sampling.
- Use testing agents according to manufacturer's directions.
- Verbalize and document the results.
- Complete skill in allotted time.

TIME: 15 minutes

C. Demonstrate the correct technique to identify and/or classify materials using a radiation detection instrument.

REFERENCE: NFPA 470, 2022 edition, 11.2.1, 11.2.2, 11.4.3.3

CONDITION: Given incident information, a calibrated radiation detection instrument, an environment, a suspected radioactive source, and wearing appropriate PPE

COMPETENCE:

- Verbalize background.
- Monitor environment.
- Monitor a sample of a suspected radioactive source.
- Verbalize and document the requirements.
- Complete skill in allotted time.

TIME: 5 minutes (from ready time of meter)

D. Demonstrate the correct technique to identify and/or classify materials using a passive dosimeter.

REFERENCE: NFPA 470, 2022 edition, 11.2.1, 11.2.2, 11.4.3.3

CONDITION: Given incident information, a dosimeter, an environment, a suspected radioactive source, and wearing appropriate PPE

COMPETENCE:

- Zero out the dosimeter.
- Appropriately don monitor.
- Monitor exposure.
- Verbalize the results.
- Calculate dose
- Verbalize and document results
- Complete skill in allotted time.

TIME: 5 minutes (from ready time of meter, if used)

E. Demonstrate the correct technique to identify and/or classify materials using photoionization detectors.

REFERENCE: NFPA 470, 2022 edition, 11.2.1, 11.2.2

CONDITION: Given incident information, a calibrated photoionization detector, an atmosphere with an unknown concentration of gas, and wearing appropriate PPE

COMPETENCE:

- Fresh air calibrate the instrument with a charcoal filter, or as per manufacturer recommendations.
- Monitor atmosphere.
 - High, medium, low (i.e., figure eight technique)
 - Allow for response time.
- Verbalize and document the results.
- Complete skill in allotted time.

TIME: 5 minutes (from ready time of meter)

F. Demonstrate the correct technique to identify and/or classify materials using a thermal detection device.

REFERENCE: NFPA 470, 2022 edition, 11.2.1, 11.2.2

CONDITION: Given incident information, a thermal imaging camera or an infrared thermometer, an unknown product, and wearing appropriate PPE

COMPETENCE:

- Prepare equipment for sampling.
- Operate the thermal detection device appropriately.
- Verbalize and document the results.
- Complete skill in allotted time.

TIME: 5 minutes (from ready time of meter, if used)

2. Demonstrate field maintenance and testing procedures for monitoring equipment.

REFERENCE: NFPA 470, 2022 edition, 11.2.2, 11.2.3

CONDITION: Given a multi-gas monitor, testing equipment, and an instruction manual

COMPETENCE:

- Identify instrument capabilities.
 - Identify specific gas concentrations.
- Identify two limiting factors:
 - Expiration dates
 - Response may be relative.
 - Sensor exposure history
 - Verbalize limitations.
 - Verbalize cross sensitivities that cause false readings.
- Follow manufacturer instructions for start-up and operation.
- Perform fresh air calibration.
- Verbalize Bump Test procedures and expected meter readings.
- Verbalize proper decon and storage.
- Complete skill in allotted time.

TIME: 15 minutes

3. A. Demonstrate methods for collecting samples of a gas.

REFERENCE: NFPA 470, 2022 edition, 11.2.2

CONDITION: Given air sampling equipment, an appropriate container, and proper PPE

COMPETENCE:

- Avoid contamination of sample.
- Safely collect the sample.
- Decontaminate equipment per manufacturer's instructions (verbalize).
- Complete required documentation.
- Complete skill in allotted time.

TIME: 5 minutes

B. Demonstrate methods for collecting samples of a liquid.

REFERENCE: NFPA 470, 2022 edition, 11.2.2

CONDITION: Given liquid sampling equipment, an appropriate container, and proper PPE

COMPETENCE:

- Avoid cross contamination of the sample.
- Safely collect and seal the sample into an approved container.
- Decontaminate the outer sample container (verbalize).
- Complete required documentation.
- Complete skill in allotted time.

TIME: 5 minutes

C. Demonstrate methods for collecting samples of a solid.

REFERENCE: NFPA 470, 2022 edition, 11.2.2

CONDITION: Given solid sampling equipment, an appropriate container, and proper PPE

COMPETENCE:

- Avoid cross contamination of the sample.
- Safely collect and seal the sample into an approved container.
- Decontaminate the outer sample container (verbalize).
- Complete required documentation.
- Complete skill in allotted time.

TIME: 5 minutes

IMPLEMENTING THE PLANNED RESPONSE

4. Demonstrate the setting up of a multiple-station decontamination corridor (per AHJ).

REFERENCE: NFPA 470, 2022 edition, 11.3.3, 11.4.5, 11.4.5.2 (see sample in Appendix A)

CONDITION: Given equipment and a diagram as determined by an incident, department SOGs, or a qualified Hazardous Materials Technician, and a 2-member team

COMPETENCE:

- Select an appropriate site that is upwind of the incident and drains toward the “hot” zone.
- Clearly mark the entry point.
- Designate a tool drop station.
- Confine decon solutions and runoff water.
- Establish a wash station (may be multiple).
- Establish a rinse station (may be multiple).
- PPE drop station(s).
- Address ambulatory and non-ambulatory responder decon capabilities.
- Clearly mark the exit point.
- Complete skill in allotted time.

TIME: 15 minutes

5. A. Demonstrate technical decontamination operations in support of entry operations (per AHJ).

REFERENCE: NFPA 470, 2022 edition, 11.3.3, 11.4.2, 11.4.5, 11.4.5.2

CONDITION: Given a decontamination corridor and equipment (properly set up), up to a 4-person decon team, a scenario for technical decontamination operations in support of entry operations, and wearing appropriate PPE (firefighter turnouts as a minimum)

COMPETENCE:

- Determine appropriate type of decon.
- Determine appropriate PPE for responders.
- Establish communication with person to be decontaminated.
- Use proper method to decontaminate person.
- Contain and prevent spread of contamination.
- Evaluate effectiveness of the decontamination process with wipe samples or meters.
- Properly remove PPE (if needed).
- Document decontamination according to department SOPs.
- Complete skill in allotted time.

TIME: 15 minutes

B. Demonstrate technical decontamination operations involving ambulatory victims (per AHJ).

REFERENCE: NFPA 470, 2022 edition, 11.3.3, 11.4.2, 11.4.5.2

CONDITION: Given a decon corridor and equipment (properly set up), up to a 4-person decon team, a scenario for a technical decontamination involving ambulatory victims,

and wearing appropriate PPE (firefighter turnouts as a minimum)

COMPETENCE:

- Determine appropriate type of decon.
- Determine appropriate PPE for responders.
- Establish communication with person to be decontaminated.
- Properly remove victim's clothing.
- Use proper method to decontaminate person.
- Contain and prevent spread of contamination.
- Determine effectiveness of decon process with wipe samples or meters.
- Complete skill in allotted time.

TIME: 15 minutes

C. Demonstrate technical decontamination operations involving non-ambulatory victims (per AHJ).

REFERENCE: NFPA 470, 2022 edition, 11.3.3, 11.4.2, 11.4.5.2

CONDITION: Given a decon corridor and equipment (properly set up), proper PPE (firefighter turnouts as a minimum), up to a 4-person decon team, and a scenario for a technical decontamination involving non-ambulatory victims

COMPETENCE:

- Determine appropriate type of decon.
- Determine appropriate PPE for responders.
- Establish communication with person to be decontaminated.
- Ensure victim's airway is open throughout the decon process.
- Assist the victim through the decon line using appropriate equipment (i.e., backboard).
- Properly remove victim's outer clothing.
- Use proper method to decontaminate person and appropriate equipment (i.e., backboard).
- Contain and prevent spread of contamination.
- Determine effectiveness of decon process with wipe samples or meters.
- Complete skill in allotted time.

TIME: 20 minutes

D. Demonstrate mass decontamination operations involving ambulatory victims (per AHJ).

REFERENCE: NFPA 470, 2022 edition, 11.3.3, 11.4.2, 11.4.4.2, 11.4.5.1, 11.4.5.2

CONDITION: Given proper PPE (firefighter turnouts as a minimum), a 2-4 member team, fire department apparatus or hoses and nozzles or a decon tent or a trailer, and a scenario for a mass decontamination involving ambulatory victims

COMPETENCE:

- Determine appropriate type of decon.
- Determine appropriate PPE for responders.
- Select site upwind, uphill, away from drains if possible.
- Establish communication with persons to be decontaminated.
- Direct victims to remove outer clothing.
- Direct victims to place personal items in bag.

- Collect bags with ID tags and set to the side.
- Use proper method to decontaminate victims.
- Minimize spread of contamination.
- Give victims temporary clothing (i.e., scrubs, blanket, gown, etc.).
- Send victims to medical area.
- Document decontamination according to department SOPs.
- Terminate the incident (verbalize).
- Complete skill in allotted time.

TIME: 20 minutes

E. Demonstrate mass decontamination operations involving non-ambulatory victims (per AHJ).

REFERENCE: NFPA 470, 2022 edition, 11.3.3, 11.4.2, 11.4.5.1, 11.4.5.2

CONDITION: Given proper PPE (firefighter turnouts as a minimum), up to a 6-person team, fire department apparatus or hoses and nozzles or a decon tent or a trailer, and a scenario for a mass decontamination involving non-ambulatory victims

COMPETENCE:

- Determine appropriate type of decon.
- Determine appropriate PPE for responders.
- Establish communication with persons to be decontaminated.
- Ensure victims' airway is open throughout the decon process.
- Assist the victims through the decon line using appropriate equipment (i.e., backboard, litter, etc.)
- Properly remove victims' outer clothing.
- Use proper method to decontaminate persons using appropriate equipment (i.e., backboard, litter, etc.).
- Contain and prevent spread of contamination.
- Determine effectiveness of decon with wipe samples or meters.
- Document decontamination according to department SOPs.
- Terminate the incident (verbalize).
- Complete skill in allotted time.

TIME: 20 minutes

F. Demonstrate gross or technical decontamination operations involving rescue of an incapacitated entry team-member (per AHJ).

REFERENCE: NFPA 470, 2022 edition, 11.4.4.1

CONDITION: Given up to a 4-person team, fire department apparatus or hoses and nozzles or a decon tent or a trailer, a scenario for a mass decontamination involving an entry team member, and wearing appropriate PPE (firefighter turnouts as a minimum)

SCENARIO: Rescue an incapacitated entry team member from the hot zone, given a hazardous materials/WMD incident.

COMPETENCE:

- Identify hazards and resources available for rescue.
- Select proper rescue options: tools and equipment.
- Conduct rescue by safely removing team member from the hot zone.

- Doff victim's (team member's) PPE appropriately.
- Use proper method to conduct emergency decontamination of the victim/team member.
- Minimize spread of contamination.
- Give victim/team member temporary clothing as appropriate (i.e., scrubs, blanket, gown, etc.).
- Move victim/team member to the care of EMS.
- Document decontamination and exposure according to department SOPs.
- Complete skill in allotted time.

TIME: 20 minutes

USING PROTECTIVE CLOTHING

6. Demonstrate assisting/donning, working in, and doffing chemical protective clothing for Level A/Class 1 personal protective equipment (PPE).

REFERENCE: NFPA 470, 2022 edition, 11.2.2, 11.3.2, 11.4.2

CONDITION: Given a 2-member team, a specific hot zone task, and wearing an appropriate PPE ensemble

COMPETENCE: SKILLS FOR PERSON DONNING LEVEL A/CLASS 1:

- Inspect equipment prior to donning.
- Adjust equipment as needed.
- Don suit.
- Don boots.
- Don SCBA.
- Don face piece.
- Check face seal.
- Don inner gloves.
- Don outer gloves.
- Don head protection (optional as per AHJ).
- Complete skill in allotted time.

SKILLS FOR PERSON ASSISTING IN DONNING OF SUIT:

- Assist donning suit.
- Assist donning boots.
- Assist donning SCBA.
- Assist donning inner gloves.
- Assist donning outer gloves.
- Assist responder to go on air.
- Zip suit up.
- Complete skill in allotted time.

TIME: 6 minutes

7. Assist emergency response personnel in donning chemical splash protective clothing and SCBA.

REFERENCE: NFPA 470, 2022 edition, 11.3.2, 11.4.2

CONDITION: Given a 2-member team, a specific hot zone task, and wearing an appropriate PPE ensemble

*Taping is not required for encapsulating splash suits unless gloves and/or boots are not integrated into the suit.

COMPETENCE: SKILLS FOR PERSON DONNING SPLASH SUIT:

- Don hooded splash suit.
- Don boots.
- Don SCBA.
- Don face piece.
- Check face seal.
- Don inner gloves.
- Don outer gloves.

- Don head protection (optional as per AHJ).
- Complete skill in allotted time.

SKILLS FOR PERSON ASSISTING IN DONNING OF SPLASH SUIT:

- Assist donning splash suit.
- Assist donning boots.
- *Correctly tape suit to boots.
- *Completely tape hood of PPE to SCBA face piece. Do not cover field of vision on face piece.
- Assist donning SCBA.
- *Tape front closure area and neck area.
- Assist donning inner gloves.
- Assist donning outer gloves.
- *Correctly tape suit to outer glove.
- Assist responder to go on air.
- Fold all ends of tape (2" minimum).
- Complete skill in allotted time.

TIME: 6 minutes (encapsulating suit)
12 minutes (non-encapsulating suit)

8. Demonstrate the ability to record the use, repair, and testing of chemical protective clothing according to manufacturer's specifications and recommendations.

REFERENCE: NFPA 470, 2022 edition, 11.3.2, 11.4.2

CONDITION: Given suit log as used by AHJ, pencil, decontaminated PPE, manufacturer's instructions, and suit testing equipment

COMPETENCE:

- Inspect PPE.
- Record findings on suit log (testing and use).
- Check for evidence of chemical penetration and degradation.
- Remove from service if PPE is damaged (must verbalize).
- Follow manufacturer's instructions.
- Complete skill in allotted time.

TIME: 10 minutes

PERFORMING CONTROL FUNCTIONS

9. Evolution. Demonstrate the appropriate method to contain a leak from a pressurized A cylinder (“A” Kit or “B” Kit)

REFERENCE: NFPA 470, 2022 edition, 11.2.3, 11.3.1, 11.3.4, 11.4.1, 11.4.3.1, 11.4.3.2, 11.4.3.3

CONDITION: Given a scenario (photo) with a leak in a pressurized container (chlorine or other appropriate pressurized container), an “A” Kit or “B” Kit, a 3-member team (one acting as safety officer downrange), and wearing appropriate PPE

SCENARIO: Given a pressurized container leaking (photo with known product)

COMPETENCE:

- Identify and verbalize any hazards through a pre-entry safety briefing (i.e., radioactive, combustible, etc.).
- Assess the condition and any stressors on the container and its closures.
- Determine operational strategy: offensive, defensive, non-intervention.
- Safely enter the hot zone as a team.
- Gain access to and isolate leaking container.
- Attempt to position container so location is in vapor space.
- Attempt to close any open valves.
- Attempt to mitigate the leak through a process of elimination from the following possibilities:
 - valve
 - valve inlet threads
 - valve stem
 - metal plugs
 - plug threads
 - gland
 - valve seat
 - blowout
 - hood assembly
 - side wall
- Mitigate leak per use of hood assembly.
- Monitor container to ensure leak is controlled.
- Communicate observations to appropriate supervisor.
- Verbalize reports and documentation needs.
- Exit area as a team.
- Follow safety procedures continually.
- Complete skill in allotted time.

TIME: 20 minutes

10. Evolution. Demonstrate the appropriate method for containing a leak from a 55-gallon drum.

REFERENCE: NFPA 470, 2022 edition, 11.2.3, 11.3.1, 11.3.4, 11.4.1, 11.4.3.1, 11.4.3.2, 11.4.3.3

CONDITION: Given a scenario (photo) with a leak from a 55-gallon drum, a drum repair kit, upright tools, an overpack, a 3-member team (one acting as safety officer downrange), and wearing appropriate PPE

SCENARIO: Given a leaking 55-gallon drum (photo of product/scenario)

COMPETENCE:

- Identify and verbalize any hazards through a pre-entry safety briefing (i.e., radioactive, combustible, etc.).
- Assess the condition and any stressors on the container and its closures.
- Determine operational strategy: offensive, defensive, non-intervention.
- Safely enter the hot zone as a team.
- Gain access to and isolate leaking container.
- Attempt to position container so location is in vapor space.
- Mitigate the leak from one of the following possible locations:
 - bung leak
 - chime leak
 - forklift puncture
 - nail puncture
- Ensure leak is controlled.
- Overpack using one of the three methods as appropriate:
 - rolling slide-in
 - slide-in
 - slip-over
- Put the overpack drum in an upright position and secure the lid.
- Mark/label overpack as appropriate (AHJ).
- Communicate observations to appropriate supervisor.
- Verbalize report and documentation.
- Exit area as a team.
- Follow safety procedures continually.
- Complete skill in allotted time.

TIME: 20 minutes

11. Demonstrate the ability to control a leak from a bulk container (such as MC-306/DOT-406).

REFERENCE: NFPA 470, 2022 edition, 11.4.3.1, 11.4.3.2

CONDITION: Given a bulk container, tools, equipment, and wearing appropriate PPE

COMPETENCE:

- Safely enter area as a team.
- Gain access to dome area.
- Safely and properly control a leak using shutoff devices, wedges, or a dome clamp.
- Exit area as a team.
- Complete skill in allotted time.

TIME: 10 minutes

12. Demonstrate the transfer of liquids from a leaking non-pressure container at a hazardous materials/WMD incident.

REFERENCE: NFPA 470, 2022 edition, 11.2.3, 11.4.3.1, 11.4.3.2, 11.4.3.3, 11.4.3.4

CONDITION: Given appropriate tools and equipment, a hazardous materials/WMD incident, an assignment in an IAP, results of the incident analysis, a leaking non-pressure container and a recovery container, policies and procedures for transferring liquids from leaking non-pressure containers, and wearing appropriate PPE

COMPETENCE:

- Select and use PPE.
- Identify a compatible recovery container and transfer equipment.
- Monitor for hazards.
- Ground and bond containers.
- Transfer liquid product from a leaking container to a recovery container.
- Suppress vapors.
- Decontaminate responders, tools, and equipment.
- Inspect and maintain tools and equipment.
- Complete reports and supporting documentation for product control operations.
- Complete skill in allotted time.

TIME: 20 minutes

REPORTS AND DOCUMENTATION

13. Demonstrate the proper completion of required reports (LERP or SOP).

REFERENCE: NFPA 470, 2022 edition, 11.3.4, 11.6.1, 11.4.1, 11.4.3.1, 11.4.3.2, 11.4.3.3

CONDITION: Given a scenario, incident records (personnel exposure records, debriefing records, critique records, activity log, exposure records), a NFIRS Hazardous Materials Module or NFIRS compliant report forms supplied by AHJ, a pencil or a computer

COMPETENCE:

- List date, incident location, and personnel involved.
- List correct information in appropriate locations on report forms.
- Use proper grammar and spelling in narrative portions of reports.
- Complete skill in allotted time.

TIME: 30 minutes

14. Develop a site safety and control plan (ICS 208 HM).

REFERENCE: NFPA 470, 2022 edition, 11.2.5, 11.3.1-11.3.4, 11.4.1, 11.4.3.1-11.4.3.3, 11.4.5.1

CONDITION: Given a scenario involving a hazardous materials/WMD incident, an ICS 208 HM Form, a Safety Briefing Checklist provided by the AHJ (if available), a pencil/pen or a computer, MSDS and two additional reference sources (electronic or print) provided by the AHJ to assist with ICS 208 HM

COMPETENCE:

- Complete all form elements.
- List correct information in appropriate locations on report forms.
- Use proper grammar and spelling in narrative portions of reports.
- Ensure that PPE selected is appropriate to the hazards.
- Select and document response objectives.
- Identify hazards and select decontamination method.
- Identify areas for potential harm.
- Set up control zones and safety guidelines.
- Complete skill in allotted time.

TIME: 30 minutes (to complete ICS 208 HM form)

Conduct a safety briefing using your completed ICS 208 HM.

- Communicate hazards.
- Identify control zones.
- Communicate response objectives.
- Communicate decon method.
- Identify areas of potential harm.
- Communicate expected and potential outcomes.
- Complete skill in allotted time.

TIME: 15 minutes (to conduct a safety briefing using the completed ICS 208 HM)

15. Assist in a debrief.

REFERENCE: NFPA 470, 2022 edition, 11.4.1, 11.6.1

CONDITION: Given a completed ICS 208 HM form, assist in the development and delivery of a debriefing.

COMPETENCE:

- Review health information.
 - Hazardous product
 - Signs and symptoms of exposure
 - Health exposure report forms
 - Follow up with the contact person.
- Review equipment and apparatus exposure.
- Verbalize problems requiring immediate action.
- Reinforce things that were done correctly.
- Complete skill in allotted time.

TIME: 10 minutes (time starts after the scenario has been reviewed)

16. Assist in a critique.

REFERENCE: NFPA 470, 2022 edition, 11.4.1, 11.6.1

CONDITION: Given a scenario and an Incident Critique Format provided by the AHJ, assist in the critique of a large-scale response.

COMPETENCE:

- Communicate operational observations at one of the following levels:
 - participant-level critique
 - section-level critique
 - group-level critique
- Complete documentation and reporting requirements (verbalize).
- Complete skill in allotted time.

TIME: 10 minutes (time starts after the scenario has been reviewed)

17. Predict the behavior of hazardous materials in an incident.

REFERENCE: NFPA 470, 2022 edition, 11.2.4, 11.2.5

CONDITION: Given incident information and an example of a damaged hazardous material container, evaluate reactivity issues and predict likely behavior of materials involved

COMPETENCE:

- Identify process and resources for evaluating mixtures.
- Identify reactivity issues and associated behavior of mixed materials.
- Identify methods for communicating results.
- Complete skill in allotted time.

TIME: 10 minutes

18. Evaluate incident progress.

REFERENCE: NFPA 470, 2022 edition, 11.5.1

CONDITION: Given a hazardous materials incident, a completed 208, an IAP, and a situation report, evaluate an incident's progress.

COMPETENCE:

- Compare predicted behavior to actual.
- Determine effectiveness of response plan.
- Communicate status of incident.
- Modify the response options and action based on your review.
- Complete skill in allotted time.

TIME: 15 minutes

UTAH FIRE SERVICE CERTIFICATION SYSTEM

HAZARDOUS MATERIALS TECHNICIAN

NFPA 470, 2022 Edition

Chapter 11

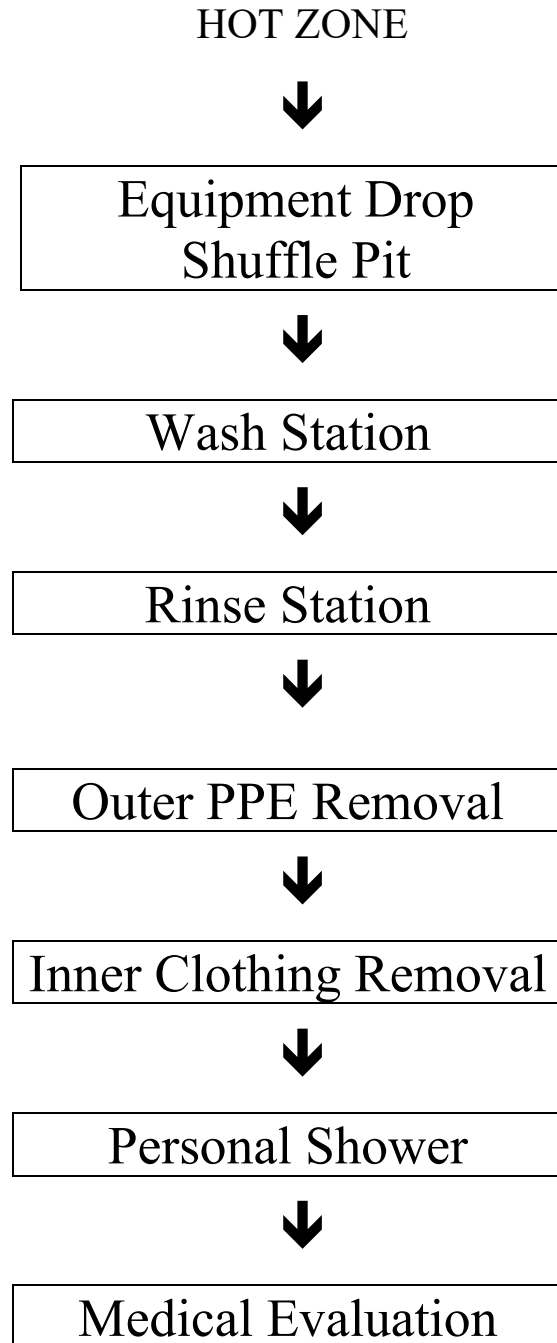
HAZARDOUS MATERIALS TECHNICIAN TRAINING RECORD / IN-HOUSE COMPREHENSIVE FORM

Candidate Name:				Department:			
Candidate Signature:				Date of Completion:			
Chief/Training Officer:				Chief/Training Officer Signature:			
This form may be completed on a computer but must be printed out for the Certification Tester to verify on test day. The date of completion must be filled in and the signatures of the chief/training officer and the candidate must be original signatures. The signatures attest that all skills have been trained on and a complete in-house comprehensive exam was administered and passed. Falsification of signatures or any component of this document may result in the revocation, suspension, or denial of certification.							
SECTION		TRAINING RECORD		IN-HOUSE COMPREHENSIVE EXAMS			SKILL
		DATE	INSTRUCTOR	DATE	INSTRUCTOR	PASS	
Surveying the Hazardous Materials Incident	11.2.1, 11.2.2						1. A. Demonstrate the correct technique to identify and/or classify materials using a multi-gas meter (carbon monoxide, oxygen, or CGI).
	11.2.1, 11.2.2, 11.4.3.1						B. Demonstrate the correct technique to identify and/or classify materials using colorimetric equipment/reagents (colorimetric tubes, test papers, pH paper, M8, M9, WMD detection, etc.).
	11.2.1, 11.2.2, 11.4.3.3						C. Demonstrate the correct technique to identify and/or classify materials using a radiation detection instrument.
	11.2.1, 11.2.2, 11.4.3.3						D. Demonstrate the correct technique to identify and/or classify materials using a passive dosimeter.
	11.2.1, 11.2.2						E. Demonstrate the correct technique to identify and/or classify materials using photoionization detectors.
	11.2.1, 11.2.2						F. Demonstrate the correct technique to identify and/or classify materials using a thermal detection device.
	11.2.2, 11.2.3						2. Demonstrate field maintenance and testing procedures for monitoring equipment.
	11.2.2						3. A. Demonstrate methods for collecting samples of a gas.
	11.2.2						B. Demonstrate methods for collecting samples of a liquid.
	11.2.2						C. Demonstrate methods for collecting samples of a solid.

Implementing the Planned Response	11.3.3, 11.4.5, 11.4.5.2					4. Demonstrate the setting up of a multiple-station decontamination corridor (per AHJ).
	11.3.3, 11.4.2, 11.4.5, 11.4.5.2					5. A. Demonstrate technical decontamination operations in support of entry operations (per AHJ).
	11.3.3, 11.4.2, 11.4.5.2					B. Demonstrate technical decontamination operations involving ambulatory victims (per AHJ).
	11.3.3, 11.4.2, 11.4.5.2					C. Demonstrate technical decontamination operations involving non-ambulatory victims (per AHJ).
	11.3.3, 11.4.2, 11.4.4.2, 11.4.5.1, 11.4.5.2					D. Demonstrate mass decontamination operations involving ambulatory victims (per AHJ).
	11.3.3, 11.4.2, 11.4.5.1, 11.4.5.2					E. Demonstrate mass decontamination operations involving non-ambulatory victims (per AHJ).
	11.4.4.1					F. Demonstrate gross or technical decontamination operations involving rescue of an incapacitated entry team-member (per AHJ).
Using Protective Clothing	11.2.2, 11.3.2, 11.4.2					6. Demonstrate assisting/donning, working in, and doffing chemical protective clothing for Level A/Class 1 PPE.
	11.3.2, 11.4.2					7. Assist emergency response personnel in donning chemical splash protective clothing and an SCBA.
	11.3.2, 11.4.2					8. Demonstrate the ability to record the use, repair, and testing of chemical protective clothing according to manufacturer's specifications and recommendations.
Performing Control Functions	11.2.3, 11.3.1, 11.3.4, 11.4.1, 11.4.3.1, 11.4.3.2, 11.4.3.3					9. Evolution (3-member team). Demonstrate the appropriate method to contain a leak from a pressurized A cylinder ("A" Kit or "B" Kit).
	11.2.3, 11.3.1, 11.3.4, 11.4.1, 11.4.3.1, 11.4.3.2, 11.4.3.3					10. Evolution (3-member team). Demonstrate the appropriate method for containing a leak from a 55-gallon drum.
	11.4.3.1, 11.4.3.2					11. Demonstrate the ability to control a leak from a bulk container (such as MC-306/DOT-406).
	11.2.3, 11.4.3.1, 11.4.3.2, 11.4.3.3, 11.4.3.4					12. Demonstrate the transfer of liquids from a leaking non-pressure container at a hazardous materials/WMD incident.
Reports and Documentation	11.3.4, 11.4.1, 11.4.3.1, 11.4.3.2, 11.4.3.3, 11.6.1					13. Demonstrate the proper completion of required reports (LERP or SOP).
	11.2.5, 11.3.1-11.3.4, 11.4.1, 11.4.3.1-11.4.3.3, 11.4.5.1					14. Develop a site safety and control plan (ICS 208 HM).
	11.4.1, 11.6.1					15. Assist in a debrief.
	11.4.1, 11.6.1					16. Assist in a critique.
	11.2.4, 11.2.5					17. Predict the behavior of hazardous materials in an incident.
	11.5.1					18. Evaluate incident progress.

APPENDIX A
SAMPLE DECONTAMINATION CORRIDOR & MAINTENANCE
LOGS

Sample Decontamination Corridor



This is a sample of a multiple-step decontamination corridor. Decontamination corridors will vary based on local jurisdictional SOPs/SOGs. However, all decontamination corridors will have these steps involved in the decontamination process.

Sample SCBA Inspection Checklist:

Inspection Procedures:

Cylinder	Pass	Fail
Check for damage		
Current hydrostatic test date		
Operational check of the cylinder		
Ensure cylinder is full		
Harness & Backpack	Pass	Fail
Inspect all straps for damage		
Inspect backpack for damage		
Inspect all hoses for damage		
Operational check of straps and buckles		
SCBA Functional Inspection	Pass	Fail
Operational check of face piece (mask must not show signs of excess heat exposure)		
Operational check of regulator and face piece		
Operational check of the emergency bypass valve		
Operational check of the low- pressure warning device		
Activates PASS device if part of SCBA unit		

Print Name

Signature

Date

Sample Maintenance Log:

Date	Inspected	Decontamination Needed	Decontamination Completed	Back in Service
06-10-25	Yes	Yes	Yes	06-11-25

APPENDIX B
IN-HOUSE PROCTOR INSTRUCTIONS

Proctor Instructions for In-House Comprehensive Examination

As the training officers for your department, you are authorized by the Certification Council to conduct an in-house skills examination (100%) for this level of certification. You must be certified to the level that you are testing. For example, if you're FF II you can test both FF I and II, Awareness and Operations. The in-house skills examination must be completed and signed off prior to the actual certification spot check exam (administered by a UFRA certification tester).

- **Prior to conducting the test, review each candidate's training record.**

It is important that before doing this in-house training skills test, the candidate has completed training in all areas for the level being tested.

- **Select and brief a safety officer.**

Select a safety officer to assist you during the test. This person is there to protect the candidates from injury during the testing process, is not taking the test, and is not assisting with the testing process. The safety officer must be qualified at the level being tested.

To better evaluate the skills being tested and determine the candidate's readiness for the State Spot Check exam, follow these in-house exam instructions:

1. This is a TEST and there should be NO COACHING or TRAINING during the testing process. If a candidate fails to perform a skill, that skill will count as a first attempt failure and they will be given a second attempt. If they fail a second attempt, they need to be retrained on that skill and tested again. Only **qualified** candidates that have passed with **100%** should be allowed to take the State Spot Check exam.
2. Before beginning the testing process, conduct a meeting with all candidates and review the testing process. Explain that this is a test and that the same process being used for the in-house exam will be used during the state exam.
3. Designate two separate areas for students testing: One area for those who are in the testing process and one area for those who have not yet begun the testing process. If separate areas are not available, make sure someone is in the room to ensure that students do not discuss the testing material. Make sure these areas have no training manuals or other reference materials for students to look at while awaiting testing.
4. To evaluate a candidate's performance, use the following as a guide:
 - a. The skill is completed in the allotted time.
 - b. Competence is shown by completing all performance criteria.
 - c. Safety is a priority while completing the skill.
5. At each test station, the tester will read the skill to be demonstrated, the condition to be met, and the time limit to complete each skill. This information is contained in the skill section of each standards packet. Do this with each student as they come to each testing station. Ask for any questions. As each skill is tested and completed, sign it off in the section provided on the candidate's training record.

By conducting the in-house skills examination in this manner, you will prepare your candidates to successfully pass the State Spot Check exam. This will also ensure that training records are current and that only those who are truly prepared take the Certification Examination.

APPENDIX - C

CERTIFICATION FORMS & FEES

Certification forms and fees are located on our website at UVU.edu/UFRA under Certification
https://www.uvu.edu/ufra/certification/certification_forms.html