### FIRE 208.4 Course Outline as of Fall 2017

## **CATALOG INFORMATION**

Dept and Nbr: FIRE 208.4 Title: FIREFIGHTER 1 CAPSTONE Full Title: Firefighter 1 Capstone Training Last Reviewed: 5/8/2023

| Units   |      | Course Hours per Week | ľ    | Nbr of Weeks | <b>Course Hours Total</b> |       |
|---------|------|-----------------------|------|--------------|---------------------------|-------|
| Maximum | 1.00 | Lecture Scheduled     | 0    | 6            | Lecture Scheduled         | 0     |
| Minimum | 1.00 | Lab Scheduled         | 8.75 | 2            | Lab Scheduled             | 52.50 |
|         |      | Contact DHR           | 0    |              | Contact DHR               | 0     |
|         |      | Contact Total         | 8.75 |              | Contact Total             | 52.50 |
|         |      | Non-contact DHR       | 0    |              | Non-contact DHR           | 0     |

Total Out of Class Hours: 0.00

Total Student Learning Hours: 52.50

| Title 5 Category: | AA Degree Applicable             |
|-------------------|----------------------------------|
| Grading:          | P/NP Only                        |
| Repeatability:    | 21 - Legally Mandated Repetition |
| Also Listed As:   |                                  |
| Formerly:         |                                  |

### **Catalog Description:**

This course prepares students to meet the State Fire Training (SFT) requirements for Firefighter I (FFI) including the capstone knowledge and skills necessary to pass FFI. Upon successful completion, students will receive a pass letter from SFT and a FFI pass certificate from the college.

### **Prerequisites/Corequisites:**

**Recommended Preparation:** Eligibility for ENGL 100 or ESL 100

### **Limits on Enrollment:**

### **Schedule of Classes Information:**

Description: This course prepares students to meet the State Fire Training (SFT) requirements for Firefighter I (FFI) including the capstone knowledge and skills necessary to pass FFI. Upon successful completion, students will receive a pass letter from SFT and a FFI pass certificate from the college. (P/NP Only) Prerequisites/Corequisites:

# **ARTICULATION, MAJOR, and CERTIFICATION INFORMATION:**

| AS Degree:<br>CSU GE: | Area<br>Transfer Area | Effective:<br>Effective: | Inactive:<br>Inactive: |
|-----------------------|-----------------------|--------------------------|------------------------|
| <b>IGETC:</b>         | Transfer Area         | Effective:               | Inactive:              |
| CSU Transfer          | Effective:            | Inactive:                |                        |
| UC Transfer:          | Effective:            | Inactive:                |                        |

CID:

### **Certificate/Major Applicable:**

Certificate Applicable Course

# **COURSE CONTENT**

### **Student Learning Outcomes:**

At the conclusion of this course, the student should be able to:

- 1. Identify the use of the appropriate firefighting tools, tactics and strategies for given firefighting situations
- 2. Demonstrate and apply the use of fire department equipment through its selection for given firefighting skills

### **Objectives:**

Upon completion of the course, students will be able to:

- 1. Identify the Firefighter I certification track, test evaluation methods participation and capstone task book requirements
- 2. Describe the mission of the fire service and the role of the firefighter and the Standard Operating Procedures (SOP's), rule and regulations used by fire departments
- 3. Demonstrate the ability to don, use and doff Personal Protective Equipment (PPE) and Self-Contained Breathing Apparatus (SCBA) in simulated emergency situations
- 4. Demonstrate the ability to inspect a SCBA and replace an SCBA air cylinder
- 5. Demonstrate the ability to respond and operate safely at an emergency scene following established procedures and wearing proper PPE
- 6. Demonstrate the ability to receive a phone call using established procedures, relay the appropriate information and initiate a response to a reported emergency
- 7. Demonstrate the ability to transmit and receive messages relaying accurate information using fire department radios
- 8. Demonstrate the ability to tie a knot appropriate for hoisting tools securely as directed
- 9. Demonstrate the ability to illuminate an area of an emergency scene using electrical and lighting equipment according to the manufactures and agency guidelines
- 10. Demonstrate the ability to clean and maintain a wide variety of fire department tools and equipment
- 11. Demonstrate the correct selection of a fire extinguisher for a given fire and the proper techniques for extinguishing a Class A, B or C fire

- 12. Demonstrate the ability to conduct a forward hose lay as a member of a team
- 13. Demonstrate the ability to deploy a portable tank and prepare for drafting operations
- 14. Demonstrate the ability to load, deploy and advance attack and supply hose
- 15. Demonstrate the ability to clean and maintain hose, mark defective hose, build hose rolls, replace burst hose sections and extend lines
- 16. Demonstrate the ability to secure (turn-off) all building utilities safely
- 17. Demonstrate the ability to lift, carry and raise an extension ladder single person
- 18. Demonstrate the ability to use forcible entry tools and equipment to force the opening of a door, window or wall
- 19. Demonstrate the ability to conduct a search and rescue of a civilian or firefighter with or without respiratory protection
- 20. Demonstrate the ability to activate an emergency call for assistance and exit a hazardous area
- 21. Demonstrate the ability to rescue a victim from an elevated location using a 24 foot ladder
- 22. Demonstrate the ability to conduct an interior fire attack as a member of a team, locating and controlling the fire
- 23. Demonstrate the ability to extinguish exterior fires in vehicles and in stacked and piled materials
- 24. Demonstrate the ability to operate a charged attack hose line from a ground ladder
- 25. Demonstrate the ability to deploy and operate a portable master stream
- 26. Demonstrate the ability to use horizontal and vertical ventilation techniques to ventilate a structure
- 27. Demonstrate the ability to correctly perform salvage operations in a room
- 28. Demonstrate the ability to remove water from the interior of a structure using correct salvage techniques
- 29. Demonstrate the ability to control the flow of water from a fire sprinkler system
- 30. Demonstrate the ability to overhaul a fire scene, extinguish hidden fires, and remove charred materials while protecting the area of origin
- 31. Demonstrate the ability to secure a fire scene by covering building openings
- 32. Demonstrate the ability to don a wildfire personal protective ensemble and deploy a fire shelter using the lying down method
- 33. Demonstrate the ability to assume a safe position to perform a retardant drop
- 34. Demonstrate the ability to inspect, maintain and sharpen hand tools
- 35. Demonstrate the ability to assemble, use and maintain a backpack pump
- 36. Demonstrate the ability to ignite and extinguish road flares and fusses
- 37. Demonstrate the ability to assemble ignite, extinguish and disassemble a drip torch
- 38. Demonstrate the ability to use the Incident Response Pocket Guide (IRPG)
- 39. Demonstrate the ability to conduct a two person, 500 foot progressive hose lay
- 40. Demonstrate the ability to construct a fire line using handtools
- 41. Demonstrate the ability to perform a mobile pumping operation
- 42. Demonstrate the ability to prepare and defend a structure in the Wildland Urban Interface (WUI)
- 43. Demonstrate the ability to perform wet or dry mop-up operations
- 44. Demonstrate the ability to perform wildland patrol operations
- 45. Demonstrate the ability to identify hazardous materials and the correct PPE to be used by the responder
- 46. Demonstrate the ability to implement a planned response to a hazardous materials incident
- 47. Demonstrate the ability to perform control, containment and confinement operations to control a hazardous materials incident
- 48. Demonstrate the ability to perform emergency decontamination on an individual and large number of persons

# **Topics and Scope:**

- I. Orientation and Administration
  - A. Review of training facilities
  - B. Review of course syllabus
    - 1. Objectives
    - 2. Requirements
    - 3. Methods of evaluation
    - 4. Participation requirements
- II. Firefighter I Certification Test Process
  - A. Written test
  - B. Skills test
- III. Capstone Task Book Process
- IV. Firefighter I Skills Practice and Testing
  - A. Mission of the fire service
    - 1. Role of the firefighter
    - 2. Use of SOP's and rule and regulations used by fire departments
  - B. Use of PPE & SCBAs
    - 1. Donning and doffing PPE
    - 2. Donning and doffing SCBA's
    - 3. Inspecting a SCBA
    - 4. Replacing a SCBA air cylinder
  - C. Responding to and operating at an emergency scene
    - 1. Use of PPE
    - 2. Department SOPs.
  - D. Receiving emergency phone calls
    - 1. Department procedures
    - 2. Relaying pertinent information
    - 3. Initiating a response
  - E. Radio use
    - 1. Transmitting messages
    - 2. Receiving messages
  - F. Knots
    - 1. Bowline
    - 2, Clove hitch
    - 3. Figure eight in a bight
    - 4. Half-hitch
    - 5. Becket/sheet bend
    - 6. Safety knots
  - G. Hoisting equipment
    - 1. Axes
    - 2. Pike poles
    - 3. Smoke ejectors
    - 4. Chain saws
    - 5. Hoselines
    - 6. Ground ladders
  - H. Scene lighting
    - 1. Use of generators
    - 2. Light assemblies
    - 3. Power cords
    - 4. Ground fault interrupters
  - I. Cleaning and maintain fire department tools and equipment
    - 1. Ladders

- 2. Ventilation equipment
  - a. Smoke ejectors
  - b. Chain saws
- 3. SCBA's
- 4. Rope
- 5. Salvage equipment
- 6. Hand tools
  - a. Axe
  - b. Pike pole
  - c. Halligan
- J. Fire extinguisher use
  - 1. Correct selection for the type of fire
  - 2. Effective operating distance
  - 3. Proper application
- K. Forward hose lay
- L. Portable tank operations
  - 1. Deploying portable tanks
  - 2. Use of hard suction for drafting operations
- M. Fire hose
  - 1. Use of attack lines
    - a. Loading
    - b. Deploying
    - c. Advancing
  - 2. Loading supply hose
  - 3. Maintenance
    - a. Cleaning hose
    - b. Inspecting hose
    - c. Identifying defective hose
  - 4. Building hose rolls
    - a. Straight rolls
    - b. Donut rolls
    - c. Twin rolls
    - d. Double donuts
  - 5. Replacing burst hose
  - 6. Extending hoselines
- N. Controlling building utilities
  - 1. Securing electrical power
  - 2. Securing gas connections
  - 3. Securing water supplies
- O. Deploying an extension ladder
  - 1. Lifting and carrying
  - 2. Footing and raising
  - 3. Checking for hazards and extending
  - 4. Adjusting climbing angle
  - 5. Lowering and stowing
- P. Conducting Forcible entry
  - 1. Selection of the point of entry
  - 2. Selection of the correct tool(s)
  - 3. Entering a window
  - 4. Entering a door
  - 5. Breaching a wall
- Q. Search and rescue

- 1. Primary search and rescue of a victim with no respiratory protection
- 2. Primary search and rescue of a firefighter with respiratory protection
- 3. Lower a rescued victim down a ladder
- 4. Making an emergency call and exiting a hazardous area
- R. Fire attack operations
  - 1. Interior fire attack as a member of a team
  - 2. Exterior fire attack as a member of a team
  - 3. Operating an attack line from a ladder
  - 4. Fire attack on a vehicle fire
  - 5. Deploying and operating a portable master stream
- S. Ventilation
  - 1. Horizontal ventilation
  - 2. Vertical ventilation
- T. Salvage and Overhaul
  - 1. Salvage of a room and contents
  - 2. Water removal techniques from a structure
  - 3. Controlling the flow of water from a fire sprinkler
  - 4. Separation and removal of charred material while protecting the area of origin
  - 5. Covering Building openings
  - 6. Overhauling a fire scene
- U. Wildland PPE, safety and tools
  - 1. Donning wildfire PPE
  - 2. Deploying a fire shelter using the lying down method
  - 3. Assuming a safe position for a retardant drop
  - 4. Inspecting, maintaining and sharpening hand tools
  - 5. Assembling, use and maintenance of backpack pumps
  - 6. Igniting and extinguishing road flares and fusses
  - 7. Assembling, igniting, extinguishing and disassembling a drip torch
  - 8. Using the IRPG.
- V. Wildland suppression
  - 1. Conducting a two person, 500 foot progressive hose lay
  - 2. Constructing a fire line using hand tools
  - 3. Performing mobile pumping operations
  - 4. Prepare and defend a structure in the WUI
  - 5. Performing wet or dry mop-up operations
  - 6. Performing wildand patrol operations
- W. Identifying and planning a hazardous materials response
  - 1. Identifying hazardous materials, their potential hazards and appropriate PPE
  - 2. Implementing a planned response to a hazardous materials incident
- X. Performing hazardous materials control, containment and confinement activities
- Y. Hazardous materials decontamination activities
  - 1. Performing emergency decontamination
  - 2. Performing mass decontamination

# Assignment:

- 1. Students are expected to spend a minimum of reading 2 hours of assigned materials prior to the first class session
- 2. Reviewing materials from the recommended text and handout materials
- 3. Practice and skills demonstration of core firefighting skills including SCBA's, ropes and knots, ladders, hose, fire streams, wildland firefighting and hazardous materials
- 4. Written exam

### Methods of Evaluation/Basis of Grade:

**Writing:** Assessment tools that demonstrate writing skills and/or require students to select, organize and explain ideas in writing.

None, This is a degree applicable course but assessment tools based on writing are not included because skill demonstrations are more appropriate for this course.

**Problem Solving:** Assessment tools, other than exams, that demonstrate competence in computational or non-computational problem solving skills.

None

**Skill Demonstrations:** All skill-based and physical demonstrations used for assessment purposes including skill performance exams.

Skills performance exams

**Exams:** All forms of formal testing, other than skill performance exams.

Written exam

**Other:** Includes any assessment tools that do not logically fit into the above categories.

None

#### **Representative Textbooks and Materials:**

IFSTA Essentials of Firefighting. 6th ed. Fire Service Publications. Pearson. 2013 Fundamentals of Firefighting Skills. 3rd ed. International Association of Fire Chiefs, Jones and Bartlett. 2013

Writing

0 - 0%

Problem solving

0 - 0%

**Skill Demonstrations** 

45 - 55%

Exams

45 - 55%

Other Category

0 - 0%