

FT R160: FIRE TACTICS AND STRATEGIES

Originator

michael_ketaily

College

Oxnard College

Discipline (CB01A)

FT - Fire Technology

Course Number (CB01B)

R160

Course Title (CB02)

Fire Tactics and Strategies

Banner/Short Title

Fire Tactics and Strategies

Credit Type

Credit

Start Term

Fall 2021

Catalog Course Description

This course introduces the student to the principles of fire control through utilization of fire fighters, equipment, and extinguishing agents on the fire ground and in the fire simulator room.

Taxonomy of Programs (TOP) Code (CB03)

2133.00 - *Fire Technology

Course Credit Status (CB04)

D (Credit - Degree Applicable)

Course Transfer Status (CB05) (select one only)

B (Transferable to CSU only)

Course Basic Skills Status (CB08)

N - The Course is Not a Basic Skills Course

SAM Priority Code (CB09)

C - Clearly Occupational

Course Cooperative Work Experience Education Status (CB10)

N - Is Not Part of a Cooperative Work Experience Education Program

Course Classification Status (CB11)

Y - Credit Course

Educational Assistance Class Instruction (Approved Special Class) (CB13)

N - The Course is Not an Approved Special Class

Course Prior to Transfer Level (CB21)

Y - Not Applicable

Course Noncredit Category (CB22)

Y - Credit Course

Funding Agency Category (CB23)

Y - Not Applicable (Funding Not Used)

Course Program Status (CB24)

1 - Program Applicable

General Education Status (CB25)

Y - Not Applicable

Support Course Status (CB26)

N - Course is not a support course

Field trips

May be required

Grading method

Letter Graded

Does this course require an instructional materials fee?

No

Repeatable for Credit

No

Units and Hours

Carnegie Unit Override

No

In-Class

Lecture

Minimum Contact/In-Class Lecture Hours

52.5

Maximum Contact/In-Class Lecture Hours

52.5

Activity

Laboratory

Total in-Class

Total in-Class

Total Minimum Contact/In-Class Hours

52.5

Total Maximum Contact/In-Class Hours

52.5

Outside-of-Class

Internship/Cooperative Work Experience

Paid**Unpaid****Total Outside-of-Class****Total Outside-of-Class****Minimum Outside-of-Class Hours**

105

Maximum Outside-of-Class Hours

105

Total Student Learning**Total Student Learning****Total Minimum Student Learning Hours**

157.5

Total Maximum Student Learning Hours

157.5

Minimum Units (CB07)

3

Maximum Units (CB06)

3

Prerequisites

FT R151 or Concurrent Enrollment

Entrance Skills**Entrance Skills**

Students must possess a basic understanding of the basic components of fire and know the different types of common fire department fire fighting apparatus.

Prerequisite Course Objectives

FT R151-Describe the components and development of the fire and emergency services.

FT R151-Recognize careers in fire and emergency services.

FT R151-Illustrate and explain the history and culture of the fire service.

FT R151-Analyze the basic components of fire as a chemical chain reaction, the major phases of fire, and examine the main factors that influence fire spread and fire behavior.

FT R151-List and describe the major organizations that provide emergency response service and illustrate how they interrelate.

FT R151-Identify fire protection and emergency-service careers in both the public and private sector.

FT R151-Discuss and describe the scope, purpose, and organizational structure of fire and emergency services.

FT R151-Describe the common types of fire and emergency service facilities, equipment, and apparatus.

FT R151-Compare and contrast effective management concepts for various emergency situations.

FT R151-Describe the importance of wellness and fitness as it relates to emergency services.

Requisite Justification**Requisite Type**

Concurrent

Requisite Description

Course in a sequence

Level of Scrutiny/Justification

Content review

Student Learning Outcomes (CSLOs)

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

- | | |
|---|---|
| 1 | The student will be able to describe fire company actions after arrival at an emergency scene. |
| 2 | The student will demonstrate the ability to place a first alarm assignment at a simulated structure fire. |

Course Objectives

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

- | | |
|---|--|
| 1 | Describe the concepts of fire behavior and heat transfer and implement actions that will minimize continued fire spread. |
| 2 | Apply fundamental principles of fire tactics and strategy to the complexities of fire ground conditions. |
| 3 | Formulate procedures for the effective development and application of pre-fire plans. |
| 4 | Effectively cope with fire emergency problems. |

Course Content**Lecture/Course Content**

1. Fire Chemistry Terms and Concepts
 - a. Heat Transfer
 - b. Principle Fire Characteristics
 - c. Fire Classifications
2. Extinguishing Agents
 - a. Extinguishing Equipment
 - b. Fire Apparatus
 - c. Manpower Requirement
3. Visual Perception
 - a. Preplanning
 - b. Size-up
4. Pre-Fire Planning
 - a. Concept
 - b. Phases
 - c. Methods
 - d. Format
5. Basic Divisions of Tactics
 - a. Size-up
 - i. Facts
 - ii. Probabilities
 - iii. Own Situation
 - iv. Decision
 - v. Plan of Operation
6. Rescue
 - a. Life Safety Problems of Fire
 - b. Determination of Life Hazard
 - c. Rescue Resources and Operations
7. Exposures
 - a. Principal Contributing Factors
 - b. Basic Construction Types
 - c. Exposure Protection Operations
8. Confinement
 - a. Fire Separations
 - b. Fire Loading
 - c. Built-in Protection
 - d. Operations
9. Ventilation
 - a. Relationship to Objectives
 - b. Equipment

- c. Roof Types
- d. Methods
- 10. Salvage
 - a. Relationship to Objectives
 - b. Equipment
 - c. Operation during Fire
 - d. Operation after Fire
- 11. Overhaul
 - a. Objectives
 - b. Methods of Operation
- 12. Post Fire Analysis
 - a. Objectives
 - b. Methods
 - c. Format
- 13. Command Procedures
 - a. Tactical Fire Ground Organization
 - b. Basic Positions
 - c. Command Responsibility
 - d. Water Supply Utilization
- 14. Fundamental Fire Problems
 - a. Structure Fires
 - b. Transportation
 - c. Flammable Liquids
 - d. Chemical and Other Hazards
 - e. Wildland Fire Control Fundamentals
 - f. Others

Laboratory or Activity Content

none

Methods of Evaluation

Which of these methods will students use to demonstrate proficiency in the subject matter of this course? (Check all that apply):

Problem solving exercises
Written expression

Methods of Evaluation may include, but are not limited to, the following typical classroom assessment techniques/required assignments (check as many as are deemed appropriate):

Group projects
Individual projects
Objective exams
Oral presentations
Performances
Problem-Solving Assignments
Problem-solving exams
Quizzes
Role playing
Reports/papers
Simulations

Instructional Methodology

Specify the methods of instruction that may be employed in this course

Audio-visual presentations
Computer-aided presentations
Collaborative group work
Class activities
Class discussions
Case studies
Distance Education
Group discussions
Instructor-guided use of technology

Internet research
Role-playing

Describe specific examples of the methods the instructor will use:

1. Instructor will direct interactive instructional activities asking students to research significant emergency incidents where a clearly defined strategy was developed.
2. Instructor will present information on the different types of tactical procedures are performed by fire crews at different emergency incidents.
3. Instructor will present information on different types of emergency vehicles including typing, purpose, safety, operation, staffing and maintenance.
4. Instructor will place students in the position of Incident Commander at various incidents using computer generated simulations.
5. Instructor will develop small group exercises in which the students will identify different type of occupancies and the specific hazards associated.
6. Instructor will lead guided and focused discussions significant, current emergency incidents.
7. Instructor will provide hands-on portable radio training for each student.
8. Instructor will demonstrate proper methods of deploying fire resources tactically after arrival onscene of an emergency.

Representative Course Assignments

Writing Assignments

1. Preparing visual aids can include graphs showing fire growth versus time, changing rates of temperature increase over time, and apparatus placement during fire attack.
2. Written procedures on emergency simulations.

Critical Thinking Assignments

1. Participate in small group discussions focusing on strategies/tactics developed for emergency incidents.
2. Participate in online discussions concerning recent significant incidents.
3. Participate in focus groups developing solutions for "table-top" emergency incidents.
4. Deliver solutions to "table-top" emergency incidents via Zoom to remainder of class.
5. The use of fire simulation software will place students in the position of Incident Commander and will be required to develop critical strategies and tactics.
6. Online discussions focusing on the proper placement of fire resources upon arrival at an emergency.

Reading Assignments

1. Weekly assignments in required text and handouts (e.g. California Fire Code, California Health and Safety Code, Title 19, and professional journals (e.g. Fire Service, NFPA Fire Journal, Fire Chief)

Other assignments (if applicable)

None

Outside Assignments

Representative Outside Assignments

1. Students will be assigned one chapter per week to read.
2. Students will complete one quiz each week on the assigned chapter.
3. Students will research an significant incident where appropriate strategy and tactics were successfully developed and implemented.
4. Students will develop and deliver a 15-20 presentation to the class on a significant incident that includes successful implementation of strategy and tactics.
5. Students will be assigned different emergency scenarios on a bi-weekly basis. Students will develop effective strategy and tactics to mitigate the incident.
6. Bi-weekly scenarios will require students to place fire companies upon arrival at an emergency incident.

District General Education**A. Natural Sciences****B. Social and Behavioral Sciences****C. Humanities****D. Language and Rationality****E. Health and Physical Education/Kinesiology****F. Ethnic Studies/Gender Studies****CSU GE-Breadth****Area A: English Language Communication and Critical Thinking****Area B: Scientific Inquiry and Quantitative Reasoning****Area C: Arts and Humanities****Area D: Social Sciences****Area E: Lifelong Learning and Self-Development****CSU Graduation Requirement in U.S. History, Constitution and American Ideals:****IGETC****Area 1: English Communication****Area 2A: Mathematical Concepts & Quantitative Reasoning****Area 3: Arts and Humanities****Area 4: Social and Behavioral Sciences****Area 5: Physical and Biological Sciences****Area 6: Languages Other than English (LOTE)****Textbooks and Lab Manuals****Resource Type**

Textbook

DescriptionSmith, James P. (2017). *Strategic and Tactical Considerations on the Fireground* (4th). Pearson. 0134442644**Resource Type**

Other Instructional Materials

Description

Handouts, ICS Incident Action Plan Forms.

Distance Education Addendum

Definitions

Distance Education Modalities

Hybrid (51%–99% online)
Hybrid (1%–50% online)
100% online

Faculty Certifications

Faculty assigned to teach Hybrid or Fully Online sections of this course will receive training in how to satisfy the Federal and state regulations governing regular effective/substantive contact for distance education. The training will include common elements in the district-supported learning management system (LMS), online teaching methods, regular effective/substantive contact, and best practices.

Yes

Faculty assigned to teach Hybrid or Fully Online sections of this course will meet with the EAC Alternate Media Specialist to ensure that the course content meets the required Federal and state accessibility standards for access by students with disabilities. Common areas for discussion include accessibility of PDF files, images, captioning of videos, Power Point presentations, math and scientific notation, and ensuring the use of style mark-up in Word documents.

Yes

Regular Effective/Substantive Contact

Hybrid (1%–50% online) Modality:

Method of Instruction	Document typical activities or assignments for each method of instruction
Asynchronous Dialog (e.g., discussion board)	Students will post a discussion board topic such as the LAFD multiple injury incident and they will respond to another classmate or two with the intent for dialogue.

Hybrid (51%–99% online) Modality:

Method of Instruction	Document typical activities or assignments for each method of instruction
Asynchronous Dialog (e.g., discussion board)	Students will post a discussion board topic such as the LAFD multiple injury incident and they will respond to another classmate or two with the intent for dialogue.
Synchronous Dialog (e.g., online chat)	Students will share their thoughts of the online lecture in an online chat with their classmates.

100% online Modality:

Method of Instruction	Document typical activities or assignments for each method of instruction
Asynchronous Dialog (e.g., discussion board)	Students will post a discussion board topic such as the LAFD multiple injury incident and they will respond to another classmate or two with the intent for dialogue.
Synchronous Dialog (e.g., online chat)	Students will share their thoughts of the online lecture in an online chat with their classmates.
Other DE (e.g., recorded lectures)	Students will meet online with Instructor via Zoom and it will be recorded.

Examinations

Hybrid (1%–50% online) Modality

Online
On campus

Hybrid (51%–99% online) Modality

Online
On campus

Primary Minimum Qualification

FIRE TECHNOLOGY

Review and Approval Dates

Department Chair

05/22/2020

Dean

05/22/2020

Technical Review

08/26/2020

Curriculum Committee

08/26/2020

Curriculum Committee

11/25/2020

CCCCO

MM/DD/YYYY

Control Number

CCC000331625

DOE/accreditation approval date

MM/DD/YYYY