Resistance Training: Science, Techniques and Programming

Course Overview

This workshop provides science and application of resistance training. Ideal for aspiring fitness professionals, coaches, and exercise enthusiasts, it combines evidence-based knowledge with practical training skills to enhance performance, safety, and results.

Topics Covered and Objectives

Resistance Training Science and Training Continuum (1 hour)

Understand the physiological principles behind resistance training, including muscle adaptation, progressive overload, and recovery. Explore the training continuum—from movement preparation, movement control, and load training—and how to apply it to different fitness goals.

Lower Body Movements (2.5 hours)

Master foundational lower body exercises such as squats, lunges, hip thrusts and deadlifts. Emphasis is placed on biomechanics, common compensations, and regression/progression.

Upper Body Movements (2.5 hours)

Learn key upper body exercises, including pushing and pulling movements. Focus on proper technique, joint mechanics, common compensations, and regression/progression strategies.

Workout Design and Programming (2 hours)

Gain practical skills in designing balanced and goal-oriented workout programs. Topics include exercise selection, training variables (sets, reps, intensity), and progression models

Who Will This Benefit?

- Fitness Professionals
- Intermediate to Advanced Resistance Training Exercisers

Pre-requisite

At least one year experience in resistance training. Independent exercisers who do not require supervision

Course Provider

Fitness Edutraining Asia (FEA)

CEC Points

ACE 0.8 (to be confirmed)

Course Duration

830am to 530pm (8 hours). One hour lunch break at 12pm

Learning Materials

Digital course slide handouts

Awards

Upon full attendance and completion of this workshop/course, you will be awarded a Certificate of Workshop/Course completion

Grading Criteria

Completion of course participation and assignment(s)

Recertification

N/A

Exam Fee

N/A

Dress Code

Fitness attire

What Do I Need to Bring?

Stationery and a spare change of clothes

Course Capacity

A minimum of 8 pax and a maximum of 24 pax

Language

English

Information displayed above is correct during time of publishing and may subject to change without prior notice

