

# MTEC 72C: PRODUCING MUSIC WITH LOGIC PRO

## Foothill College Course Outline of Record

Heading	Value
Effective Term:	Summer 2024
Units:	4
Hours:	3 lecture, 3 laboratory per week (72 total per quarter)
Advisory:	Not open to students with credit in MUS 66F.
Degree & Credit Status:	Degree-Applicable Credit Course
Foothill GE:	Non-GE
Transferable:	CSU
Grade Type:	Letter Grade (Request for Pass/No Pass)
Repeatability:	Not Repeatable

## Description

Producing music with Apple Logic Pro software. Understanding the Logic Pro interface, windows and editors, navigation, key commands, and screensets. MIDI editing, MIDI real-time control, audio recording and editing, and working with QuickTime video. Explore Logic Pro software instruments, including the ES2, EXS-24, Sculpture, UltraBeat, subtractive synthesizers, and vintage instruments. Study critical listening examples with interactive demos and tutorials. Elements of production design, music composition and song form, arrangement tools, and mixing techniques.

## Course Objectives

The student will be able to:

1. Understand the Logic Pro software interface, windows, and menus
2. Record and edit both MIDI and audio data
3. Understand the various software instruments in Logic Pro
4. Use sound design plug-ins in Logic Pro
5. Effectively mix a music project in Logic Pro

## Course Content

1. Logic Pro workflows
  - a. The arrange window
  - b. Creating screensets
  - c. The transport window and controlling playback
  - d. Saving files and going mobile
2. Recording with Logic Pro
  - a. Metronome settings
  - b. Multitrack recording
  - c. Amp design
  - d. Recording and comping overdubs
3. MIDI and virtual instruments
  - a. Logic synth instruments
  - b. Logic emulator instruments
  - c. EX24 sampler

- d. Hyper editor
  - e. Events list
4. Editing and arranging
    - a. Basic audio editing techniques
    - b. Merging regions
    - c. Repairing and morphing sound with the sample editor
    - d. Audio fades
  5. Mixing
    - a. Setting up the mixer
    - b. Using EQ and compression
    - c. Signal flow with aux and send tracks
    - d. Channel strips for audio processing

## Lab Content

1. MIDI
  - a. Implementation and drivers
  - b. Velocity and aftertouch
  - c. Multiple routing assignments
2. Virtual instruments
  - a. Layering
  - b. Volume matching
  - c. Panning
3. Audio
  - a. Tempo matching via Logic time stretching
  - b. Elastic audio
4. ReWire
  - a. ReWiring secondary applications via insert tracks and bus assignments
  - b. Plug-in applications using internal busses affecting external applications

## Special Facilities and/or Equipment

1. When taught on campus: 30 Macintosh computers and MIDI keyboards, video projector and screen, 30 Logic Pro software installs.
2. When taught via Foothill Global Access: on-going access to computer with email software and capabilities, email address, JavaScript-enabled internet browsing software.

## Method(s) of Evaluation

Methods of Evaluation may include but are not limited to the following:

Graded lab assignments in the operation of the Logic Pro sequencers  
 Tests and problem solving activities using MIDI sequences  
 Preparing advanced digital sequences to an industry standard from a set of specifications for application in a MIDI environment, and evaluated from those specifications  
 A graded final project that demonstrates acquired skill in creating and mixing a master audio file and producing MP3 copies to an industry standard

## Method(s) of Instruction

Methods of Instruction may include but are not limited to the following:

Lecture presentations and classroom discussion of the techniques for producing audio in Logic Pro

In-class viewing of Logic Pro projects followed by instructor-guided interpretation and analysis  
Presentations of major music and post-production projects followed by in-class discussion and evaluation  
Demonstration of techniques for recording, editing, and mixing audio in Logic Pro

## **Representative Text(s) and Other Materials**

Rey, Ryan. [Logic Pro 101](#). 2022.

## **Types and/or Examples of Required Reading, Writing, and Outside of Class Assignments**

1. Written critiques and analyses of audio production projects, including albums, soundtracks, television, video games, and internet multimedia
2. Written summaries documenting technical and artistic elements for corresponding submitted assignments and audio projects
3. Written proposals, session logs, learning outcomes, and reflections supporting submitted musical works and final master recordings

## **Discipline(s)**

Commercial Music