

DANCE AND MOVING LIGHTING SPRING 2006

DAN 450

Objective: To develop an understanding of dance lighting methods and techniques also intelligent lighting technology and its applications in theatre and other entertainment industries.

Assignments and Calendar:

Basics of Intelligent Lighting Technology

Week 1 - Jan 13

Motion

Stepper Motors

Week 2

Color

color wheels

color mixing/ different techniques

Week 3

Patterns

gobo wheels

prisms

color with gobos

dichroic glass (3-D gobos)

Week 4

Optics

zoom/ focus/ iris

frost

strobing and dimming mechanisms

Week 5

DMX protocol

general DMX specifications (5 pin, 3 pin, cable, lengths)

8 bit vs. 16 bit control

DMX termination (120 ohms and why)

DMX universes

Week 6

ETC Expression control

Taking a daisy chain on first DMX universe from existing dimmer system

Creating ETC Intelligent Lighting Personality Profile

Patching in multiple DMX universes

Programming cues and intelligent light control considerations

Using focus points

setup techniques for faster programming & “on the fly” operation

Differences between the Expression software model and the Obsession II software model.

Week 7

Wholehog control

Patching

Creating Palettes, menus, groups

writing cues, fine tuning

working with effects engines

considerations when using incandescent lights (desk channels) with Wholehog

Week 8

Synchronization Control Techniques

Making ETC Expression and Wholehog work together to control incandescent & intelligent systems

SMPTE Timecode

MIDI show control

Week 9

Programming in advance

WYSIWYG

LD Assistant

Expression/ Express off-line

Wholehog PC

Designing with Intelligent Lighting

Week 10 Designing for Theatre

Week 11 Designing for Dance

Week 12 Designing for Concerts

Week 13 Presentation of Designs

EVALUATION:

Throughout the course, we will be collecting information pertaining to the controls and uses of intelligent lights and will create a fundamental guide for using these systems and tools. Grading will be based on thorough research under each of the given areas, organization and presentation of research, and for unique uses of intelligent lights in the designs listed above.