



Department of Multimedia Arts
Bachelor of Arts in Multimedia Arts
Course Syllabus

Course Code: DIGIMAG
Course Name: Digital Imaging
Credit Units: 3
Course Prerequisite: None
Faculty: Carl Hattley

COURSE DESCRIPTION:

A great photograph begins when you recognize a great scene or subject. But recognizing a great opportunity isn't enough to capture it; you also have to be prepared. A large part of being prepared involves understanding your camera well enough to capture what you see. Getting you prepared to see and capture great photographs is what this course is all about.

To get better photographs, you need to understand both concepts and procedures; the "whys" and "hows" of photography. Concepts of photography are the underlying principles that apply regardless of the camera you are using. They include such things as how sharpness and exposure affect your images and the way they are perceived by viewers. Understanding concepts answers the "why" kinds of questions you have about photography.

Procedures are those things specific to one kind of camera, and explain step-by-step how you set your camera's controls to capture an image the way you want to. Understanding procedures gives you the answers to the "how" kinds of questions you have.

To get more effective, interesting, and creative photographs, you only need to understand how and when to use a few simple features on your camera such as focus, exposure controls, and flash. You can then marvel at how the infinite variety of combinations makes it possible to convey your own personal view of the world. You'll be ready to keep everything in a scene sharp for maximum detail or to blur it all for an impressionistic portrayal. You'll be able to get dramatic close-ups, freeze fast action, create wonderful panoramas, and capture the beauty and wonder of rainbows, sunsets, fireworks, and nighttime scenes.

As you explore your camera, be sure to have fun. There are no "rules" or "best" way to make a picture. Great photographs come from using what you know to experiment and try new approaches. Digital cameras make this especially easy because there are no film costs or delays. Every experiment is free and you see the results immediately so you can learn step by step.

Topics to be covered: Basic functions of the digital camera. Applying basic photography techniques to the digital camera. Framing and cropping; exposure; shutter speed, aperture, depth-of-field. Resolution, pixels, and the repurposing of images. Importing images from a camera to a computer. Digital manipulation of digital images. Preparing images for the Web or multimedia. Image formats and use.

In this class you will have lots of opportunity to exercise your creativity. You will learn how to evaluate images for communicative effectiveness and aesthetic appeal. You will digitize images, adjust and manipulate them in the computer, and output them for on-screen and printed use.

The semester projects will include the natural world as photographic set, table-top photographic sets, alternative camera image making, and the production of a final portfolio of images.

METHODOLOGY AND GOALS

This will be a project-structured course, with lectures, demonstrations, project assignments, critiques, discussions and a written presentation by each student. One goal of the course is for students to learn to make and discuss photographic work that has cultural, historical, formal and conceptual attributes. More general goals for students include understanding art making as a practice connected to other disciplines and activities, and experiencing that their work as a group is important to their individual success.

COURSE OBJECTIVES

Upon completion of the requirements of this course a student can expect to be able to:

Digitize images using a digital camera and on-screen image capturing techniques. Research career options in digital photography. Explore, critique, and evaluate basic composition and aesthetic elements of photographic images.

Explore photographic editing software. Edit and manipulate digital images using Adobe Photoshop image editing software. Convert and compress digital images into appropriate file formats and store or archive correctly.

Output digital still images to on-screen and printed presentations that appeal to multicultural audiences. Comply with industry ethics and standards related to the use of photographic materials.

EQUIPMENT

The school will provide one digital camera for every three to four students, in case the students do not owe one yet. But it is preferred and advantageous for the students to have his/her own camera. You may need at least a Compact Flash storage with at least a 512mb capacity. You will need a sturdy tripod, plenty of rechargeable batteries, an electronic flash and a CD or DVD burner with several CD-R or DVD-R.

Much of the printing can be done on our printers in class but some of the processing will be done through a service bureau.

ATTENDANCE REQUIREMENTS

Attendance is mandatory and essential to the course. An unexcused absence is one where you do not talk to me in class prior to your absence. For each class you miss, you will lower your grade by one point out of a total of 100 points. Lab activities are mandatory class sessions. If you are unprepared to work in the lab, you will be considered absent.

EXPECTATIONS

- **PUNCTUALITY:** If you are late more than three times your grade drops one letter grade each time after that.
-
- **ATTENDANCE:** If you are absent more than twice your grade drops one letter grade each time after that.
- **ABSENCES:** if you are sick or have excused absences and you miss more than five days of class you will have missed too much and may have to take the class over.
- **ON TIME SUBMISSION:** Hand in your assignments on time! If not, you lose 50% of your grade automatically.
- If you do have to be late or absent, it is your responsibility to find out what you missed in class.
- **CLASS DISCUSSION:** It is your responsibility to participate in class discussions, activities and assignments. I will be looking for evidence in discussion and in-class assignments of your understanding of the issues, concepts and perspectives addressed. To get a top grade you must demonstrate active participation in class activities. I expect you to support each other in group activities and contribute to a constructive and safe learning environment in the classroom.
- Bring a camera and related gears to class everyday.

CRITIQUES

Critiques of assignments are important to the progress of each individual in the class, as well as to the development of our classroom as a collaborative place. The critique fosters development of an ability to verbalize visual concepts. Learning to talk about the visual will both help you to articulate your thoughts and also learn to see actively. Participation in critiques will be heavily considered in grades for all assignments.

GUIDELINES FOR CRITIQUE OF PHOTOS

1. Use feedback as a communication tool. Give honest viewer response to the work so the photographer can measure the effectiveness of his or her efforts.
2. The feedback should be inspired by the work and never directed toward the photographer.
3. Use "I statements" or "In my opinion" statements when giving feedback.
4. Encourage artistic expression and creativity.
5. Feedback is just someone's opinion. It isn't necessarily right or wrong.
6. The photographer does not have to accept the feedback.
7. Avoid defending your photograph. Feedback is meant to be honest and helpful. Keep an open mind.
8. The photographer can solicit more feedback from the group if desired.

SUGGESTED QUESTIONS FOR CRITIQUE

1. Does it meet the requirements of the assignment?
2. Has he/she done it well?
3. How does this image rank among other images of its type?
4. How does the image make you feel?
5. How can it be improved?

STUDENT ASSESSMENT:

You will be evaluated on the following points:

Success of completed assignments

Visual and intellectual achievement

1. Formal and aesthetic: visual impact of images, composition, shows technical knowledge, attention to details of presentation;
2. Conceptual: concepts engaging, inventive, development of ideas over the length of the project, references one or more considerations of the project topic, a sense of personal vision

Technical accomplishment (knowledgeable use of camera and other photographic equipment, outstanding digital images, and well-made fine prints)

Class participation

Participate in class discussions, help others during lab activities, offer thoughtful comments during critique.

Work ethic

Consistent progress, helpfulness, initiative, ambitious work (type of project, quantity & quality of images)

Class participation/attendance will count as 15% of your grade. I will be looking for evidence in discussion and in-class assignments of your understanding of the issues, concepts and techniques addressed. You must demonstrate active individual and group participation in class activities and that you have read the assigned material. I expect you to contribute to a constructive and productive learning environment in the classroom. Evidence of participation includes good attendance, engaging in class discussions, listening to others, helping others, handing your assignments in on time, and showing an effort to learn and improve.

Assignments. You will be given various assignments and projects. Specific evaluation criteria will be explained with each assignment. A written exam will count as an assignment.

Midterm grade:		Pre-final grade:	
Attendance/CP:	15%	Attendance/CP:	10%
Photo Exercises	50%	Photo exercises:	35%
Midterm Exam:	35%	Portfolio	55%
(Midterm plate)		(Finals portfolio 70%)	
		(Finals Exhibit 30%)	
-----		-----	
100%		100%	

Grades will be allocated on the following basis:

97-100	4
93-96	3.5
89-92	3.0
85-88	2.5
80-84	2.0
75-79	1.5
70-74	1.0
Below 70	R

ITRG AVAILABLE EQUIPMENT

1. Camera Canon 350D
2. Lenses: 18 to 70mm
telephoto zoom lens 70 to 200mm or 100 to 300mm
14mm fish eye
3. Flash units 480 model with diffuser
4. Filters: polarizer filter & UV filter
5. batteries one extra for each camera
6. Compact flash cards at least 512mb two pieces for each camera
7. Tripod: one for each camera

CLASS REQUIREMENTS

The students will be required to accomplish all the assigned exercises, which will weigh heavily on the final grade. And finally, a compilation of the students' best works will be evaluated to complete the final grade.

1.) Requirements: Photo Exercises (8)

- Contact Print(s)
(No computer print-outs, large thumbnails minimum 24 shots, Hi-res, with complete technical data-image number, shutter and aperture; add name, id number, subject and section)
- Lighting and Scene Diagrams; Description of concept
- (3) 5R best photos from contact prints

2.) Requirements: Midterm Plate

- Contact Print(s)
(No computer print-outs, large thumbnails minimum 24 shots, Hi-res, with complete technical data-image number, shutter and aperture; add name, id number, subject and section)
- Lighting and Scene Diagrams; Description of concept
- (2) 8R prints of best photo

3.) Requirements: Finals Portfolio

- Photo exercises 1 to 9;
- Class exercises
- Finals exercise plate
- Minimum requirement – organized in clearbook

TOPICS/SCHEDULE

Every meeting starts with a short lecture on photography and equipment handling techniques. This includes techniques for dealing with different shooting situations using natural and artificial lighting techniques. After the lecture, students are required to shoot and practice the techniques they have learned during the lecture. During the midterms, the students are required to undergo practical exams and submit all pending exercises. Remaining photo exercises are geared towards portfolio completion and production.

Week 1:

Course Orientation

Discussion: Introduction to the course, class rules and regulations, expectations, and requirements.

Lecture: Basic history of digital photography/imaging

Assignment: Bring a DSLR camera (if none borrow from ITRG), bring a photograph that best represents your personality. Bring 2 to 3 other photos that you like (the photos may be from your own collection or from any other source)

Week 2:

The Digital Camera system and exposure

Discussion: Show and tell of photographs brought to class.

Lecture: Explain the digital process from capture to post-capture and printing. Show various hardware available for digital imaging and camera exposure system. Talk about relation of ISO, histogram and exposure and how the aperture and shutter speed affect exposure. Exposure basics (proper exposure, exposure compensation)

Project 1: Shoot around campus aiming to get proper exposure both in indoor and outdoor situations, use a tripod. Try to get proper exposure using in-camera light meter (practice also exposure bracketing, a black subject with a black background and a white subject on a white background. (see requirements section for required output) Submit the following week.

Week 3:

Aperture and DOF (depth-of-field)

Lecture: Explain the function of the aperture in relation to Depth of Field (DOF), extensive depth of field and shallow depth of field, Aperture priority, different applications of DOF and how the choice of lens affects DOF.

Project 2: Shoot around campus aiming to capture extensive and shallow depth of field. Use a variation of wide, normal and telephoto lenses to show different effects on DOF (see requirements section for required output) Submit the following week.

Week 4:

Shutter Speed (motion blur and stopping motion)

Lecture: Explain the function of the shutter in relation to freezing action and blurring motion. Shutter priority, different applications of motion blur and stopping motion, Pan and tilt motion blur.

Project 3: Shoot around campus aiming to capture the stopping of motion and showing motion blur of field. Use a variation of wide, normal and telephoto lenses to show different the different effects on motion-blur and stopping motion. Submit the following week.

Week 5:

Basic Composition

Lecture: Teach the students basic compositional techniques (framing, rule of thirds, foreground/background and others in order to add a third dimension to their skills covered in weeks 2 to 4.

Project 4: Shoot around campus aiming to capture and exhibit the different rules of composition – rule of thirds, foreground framing, leading lines, graphic composition. *From this point on, all photos should be sharp and properly exposed (unless intended otherwise) Submit the following week.*

Week 6:

Basic lighting techniques (natural)

Lecture: Explain to the students how light affects their photos, color of light (color temperature-white balance), quality of light, direction of light, light modifiers (filters, diffusion panels) and best times to shoot in daylight.

Project 5: Shoot around campus aiming to capture and exhibit the basic lighting techniques learned during week 6. Show effects of different lighting conditions (early morning, noon, dusk and evening.) Capture and show different directions of light (top light, sidelight, front lighting, backlighting. Show subjects with and without light modifiers. Submit the following week.

Week 7:
Midterms

On-location shoot: Capture the different subjects present on-location. Use all techniques learned from weeks 2 to 6. Submit contact prints on week 8.

Assignment: Plan for exhibit on week 12 to 14

Week 8:
Basic lighting (studio strobes and artificial)

Lecture: Show and explain to students the pros and cons of artificial, natural and studio lighting. Show proper care and handling of equipment. Teach various still and portrait techniques.

Project 6: Shoot in-studio, a still life (preferably a product or a reasonably sized object), and a person. Capture and show different light directions learned on week 6. Submit the following week. Bring props, makeup and a model (preferably not from class)

Week 9:
Advanced lighting (multiple studio strobes and lighting techniques)

Lecture: Using skills learned from week 8, explain and teach to students how to setup and use a multiple lighting setup using studio strobes. Teach various lighting techniques (Rembrandt, broad and narrow lighting, split lighting, butterfly lighting.) Explain other portraiture techniques.

Project 7: Shoot in-studio, a portrait of the model using various portraiture techniques. Show the different effects of lighting techniques using multiple strobes. Submit the following week.

Assignment: Bring various products/objects to shoot (metallic/shiny, glass/translucent, opaque objects) for project 8 shoot

Week 10:

Lighting for product shots (metallic, glass, opaque objects)

Lecture: Show and explain to students the different lighting techniques for metallic, glass and opaque objects. The use of light modifiers in solving light problems.

Project 8: Shoot in-studio, the metallic, glass and opaque objects. Show the different effects of light modifiers on different objects. Submit the following week.

Assignment: Bring props, model, clothes for fashion/glamour/portfolio shoot on week 11.

Week 11:

Lighting for fashion/glamour and portfolio applications

Lecture: Show and explain to students the various lighting techniques for fashion/glamour and portfolio applications.

Project 9: Shoot in-studio, using concept for fashion/glamour and portfolio applications. Use lighting techniques learned from week 10 and 11. Submit the following week.

Assignment: Prepare projects 1 to 8 for portfolio production. Bring on week 12.

Week 12:

Portfolio production

Hands-on: Prepare projects 1 to 9 or portfolio production and presentation (exhibit week 13)

Week 13:

Photo Exhibit

Exhibit: Showcase of student projects and portfolio at multi-purpose hall.

Week 14:

Course card distribution

REFERENCES/TEXTBOOK

Adobe Photoshop CS2 Classroom in a Book,

ISBN# 0-321-11562-7, Adobe Press

How to Do Everything with your Digital Camera

ISBN# 0-07-222555-6 McGraw-Hill/Osborne

Shooting Like a Pro! *ISBN# 0-07-222949-7 McGraw-Hill/Osborne*

Pro lighting – Fashion shots by Alex Larg and /Jane Wood

Lighting for glamour by Steve Bavister