**Course Title:**          **ART 177 Computer Photographic Imaging**

**Instructor**:          Roman Reyes

**Course Description**:          Introduction to the multiple elements of microcomputer-photographic imaging. Basic foundation in the use of the photographic manipulation of images using software programs.

**Prerequisites**:          Art 100 or permission of instructor.

**Text**:   None

**Learner Outcomes**:
1.      Describe the basic operational systems of imaging software as compared to traditional photographic processes.
2.      Describe the general characteristics of computer-image alteration fundamentals.
3.      Use various imaging properties of software to accomplish texture smoothing and scaling, as well as shading and tonal manipulation techniques to alter photographic images electronically.
4.      Edit graphics and textural information received from external sources through various mediums (hardware).
5.      Execute finished photographic images via hardcopy from an appropriate printer.
6.      prepare a professional portfolio.

**Course Outline**:
I.      Historical overview
        A.      Traditional photographic processes.
        B.      Computer-imaging techniques.
II.     Photographic image creation, editing, and manipulation.
        A.      Hardware
        B.      Software
        C.      Hardcopy
III.    Imaging properties and techniques
        A.      Texture modification
        B.      Image removal
        C.      Image addition
        D.      Image scaling
        E.      Image rotation
        F.      Image smoothing
        G.      Shading and tone manipulation
                1.      Digital mezzotints
                2.      Dithered patterns
                3.      Digital saturation
                4.      Digital luminance
IV.     Graphics and textural images modification
        A.      Image creation and manipulation
        B.      Editing image
        C.      Hardcopy
V.      Portfolio
        A.      Review/selection
        B.      Format
        C.      Assignments

**Topics Covered in the Course**:

      Overview of computer photographic imaging
      Terminology and definitions
      Pixel vs. shape-oriented programs (Paint vs. Draw programs)
      Pasting new images
      Touch up
      Auto Trace
      Halftones
      Blended images
      Posterization
      Gray Maps
      Solarization
      Shadows
      Hardware
      Software
      Peripherals
      Digitizers (video or scanned images)
      Printer procedures
      Variety of artistic output-Hardcopy, etc
      Professional presentation of artwork
      Portfolios

**Course Requirements**:
1.      Participate in all class activities
2.      Complete tutorials.
3.      Complete the outside projects.
4.      Turn in portfolio
5.      Take exam.

**Outside Project**:
Read an article on computer imaging and write a one page (double spaced) summary.

**Grading:**
Each student will be evaluated on the extent he/she:
1.      participates in all class activities, presentations;
2.      completes all reading and writing assignments;
3.      applies ideas presented in the course to activities in class;
4.      submits all assigned projects in a portfolio (individual projects will be graded on their creativity and use of artistic concepts); and,
5.      takes exams.  Total grade is determined as follows:
            Tutorials =  30%
            4-projects and items 1-5 from above =  70%

**Class Breaks**:

You are allowed to take one 15 minute break during the computer lab classes.
Please do not abuse the privilege.

**House Keeping**:

Please leave the work area as clean as you found it.  Also, PLEASE put your chairs under the counter or table as you leave.  IF YOU BRING FOOD OR DRINK INTO THE COMPUTER LAB, <u>KEEP IT ON THE TABLES IN THE CENTER OF THE ROOM</u>.  AT THE COMPLETION OF CLASS, CLEAN UP THE TABLE AND DISPOSE OF ALL TRASH.

**Notes**:

If you use the clip art books from the storage room, please return them to the shelves as well as return all magazines to the bookcase.

If the computer cases and screens get dirty ask for the appropriate cleaning supplies to tidy up.

**Art Lockers**:

You can use a locker in the art department to store your books and supplies during the semester.  To obtain the use of one of these lockers:  1.  Bring a lock.  2. Put the lock on an empty locker before you put supplies in it.
3.  Sign up for the locker in the Art Gallery.

These lockers are to be used for one semester at a time.  At the end of each semester, all lockers must be emptied and locks removed.  WARNING:  Do not keep valuables in the lockers, there have been break-ins and the **Art Department is not responsible for articles kept in your lockers.**


**PERIODICALS:**

Communication Art Magazine
Publish!
Macworld
MacUser
The Page
Print
MacWeek
Computer Graphics Review
Personal Publishing
Electronic Publishing and Printing


**Materials:**  1 box of HD/DS 3 1/2" Computer Disks or Zip Disk