Enchanted Mesa is not quite off the beaten track for economics teacher Phil Graves who often shares an outdoor run with his dog, Winston.
Where Are Courses Given?

Course locations are given at the end of each course description. Many campus parking lots offer SOt parking after 5 p.m. and on Saturdays. Some are free evenings and weekends. The Campus Map gives both building and parking lot. To skip parking altogether, take the RTD bus to campus.

Credit Programs

You can earn academic credit at every level, high school through graduate school. Credit programs include:

**Boulder Evening Credit Classes**
For university courses at convenient evening hours.

**Independent Study Programs**
Independent study by correspondence and individualized instruction lets you learn at home.

**Meeker '89**
Combine summer learning with a spectacular Rocky Mountain Location.

Professional Enhancement: Certificate Programs

To polish your skills or acquire new ones, enhance your current career or explore another field. Continuing Education offers a full spectrum of programs. Most classes offer Continuing Education Units (CEUs), the national standard for recording university-level noncredit course participation. Or earn an Achievement Certificate in:

- Commercial Design
- Computer Applications and Computer Graphics
- Management Development

Learning For Learning’s Sake: Noncredit Courses

The broad range of noncredit courses, offered at convenient evening and weekend hours, mean no tests, no grades, and no prerequisites. Yet noncredit courses, encompassing both personal and professional interests, are taught by highly qualified instructors. Enjoy non-competitive learning with others who share your interests.

Change Your Mind?

Please let us know. If you withdraw before a course begins, you may receive a full refund. Refer to each program description for refund policies after a course starts.

Other Questions?

Call us at 492-5148 or 1-800-332-5839 if you need help or additional information. You can reach us between 8:30 a.m. and 5:30 p.m. Monday through Thursdays or 5 p.m. on Fridays.
Boulder Evening Credit Classes ................................................................. 4
University-level courses for the working person. Most classes are offered during the early evening hours and carry full university credit.

Management Development Certificate Program ........................................... 10
For people who want to move into management positions or increase their management skills. Evening and weekend classes to accommodate busy schedules.

Certificate in Computer Applications .......................................................... 12
Designed to create the awareness and skills vital to success in our information age; use of computers and electronic information systems.

Computer Graphics .................................................................................. 20
How to use microcomputers for designing and drawing.

Certificate in Commercial Design .............................................................. 24
For the new or continuing student in the growing field of graphic design. Covers skills needed in illustration, art, advertising, publishing, and other areas.

Noncredit Courses ..................................................................................... 28
Noncredit courses to satisfy your curiosity, help you meet career or lifestyle goals, or expand your artistic skills.

Video Teleconferencing ........................................................................... 32
Special television linkups made possible by our state-of-the-art satellite receiving dish and teleconferencing system.

Real Estate Education Program ................................................................. 34
A statewide program in real estate administered by the University of Colorado and sponsored by the Colorado Real Estate Commission and the Colorado Association of Realtors.

Meeker '89 ................................................................................................. 35
The Meeker Getaway, graduate courses in botany, ecology, energy, fine arts and geology.

Independent Study Programs ..................................................................... 38
College correspondence courses, Individualized Instruction, Childhood Education series, and more.

Special Professional Programs .................................................................... 37
Specially developed training seminars for business and industry, government agencies, and service organizations.

Campus Map .............................................................................................. 38
Registration Information ........................................................................... 40
Noncredit/Certificate Registration Form .................................................. 41
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Boulder Evening Credit Classes

Tap the Tree of Knowledge

Boulder Evening Credit Classes

The Division of Continuing Education offers a special way for you to make the most of your time, whatever your working schedule. If there’s no time for classes during the day, you can still make the most of your evenings.

You can earn full undergraduate University credit in classes with top-notch instructors. You join a diverse group of people united by their interest in personal and professional development.

You can then get started working toward the degree of your choice. Please note that each school or college will apply only a certain number of credit hours — usually 12 — toward a degree. Once you reach the maximum, the next step is applying for admission as a degree student. If you are thinking about applying to CU, please purchase a current catalogue for admission requirements.

Eligibility: You need no previous college experience — just a high school diploma or a GED. Persons on University of Colorado financial stops or academic suspension from the College of Engineering and Applied Science, the College of Environmental Design, or the College of Business may not enroll.

Residency: Whether you are a resident or non-resident, you may take up to 3 semester hours per term or session for $60 per credit hour. Residency makes a difference only when you are signing up for 4 or more credit hours.

If you have lived in Colorado for the past 12 months, you may be eligible for in-state tuition rates although you may be asked to document where you’ve lived for the past year.

Under 21? If you’re not 22 years old by the first day of classes, you are assumed to have the same legal residence as your parents. If your parents aren’t Colorado residents, you may establish your own Colorado residency by petitioning the University for status as an emancipated minor.

If you believe your initial classification is incorrect, please feel free to discuss your status with the Classification Coordinator at 492-5148.

Tuition: Resident tuition is $60 per credit hour. Some courses requiring special equipment or materials may be slightly higher.

If you’re not a Colorado resident and want to register for 4 or more credit hours, you’ll be charged non-resident tuition. Please refer to Survival Tip on page 5 for more information.

Privileges: Total library services are yours once you enroll at no additional charge. As a Boulder Evening Credit student, you are also eligible for:

- Membership in the Recreation Center ($40 a semester)
- Wardenberg Student Health Services ($50 a semester)
- Hospitalization plan ($140 a semester)
- Photo IDs ($7 cash, checks with guarantee card, Visa, MasterCard)

Estimated Summer 1989 Student Fees

If you’d like to sign up for any of these additional student benefits, simply take your registration receipt to the appropriate office.

Counseling Services: Free academic counseling is available to you if you are considering enrolling in a course. For planning your degree program, deciding on a major, considering seeking a degree at all, exploring your options, or charting an academic course, feel free to call 492-5145 for an appointment.

Financial Aid: Degree students may qualify for all financial aid programs if eligible. Nondegree students taking courses for credit may qualify for a Stafford Loan (formerly GSL) if eligible. Applications are available in the Office of Financial Aid, Environmental Design Room 2, (492-5091) or in Room 165 of the UMC. The Colorado Commission on Higher Education also provides some tuition assistance to eligible students and these applications are also available from the Office of Financial Aid.

Veteran Benefits: As an eligible veteran or dependent, you may enroll in evening classes and apply credit toward a degree. If you have questions about your eligibility and benefits, contact the Veteran’s Affairs Office, Room 165, University Memorial Center, or call 492-7322.

To Enroll: Advance registration is necessary — by mail or in person at the Division of Continuing Education, 1221 University Avenue. See the instructions inside the front cover of this catalog.

To Drop: To drop a credit course and ensure that you receive any tuition refund due you, come to the Division of Continuing Education, 1221 University Avenue, and complete a drop voucher. If you don’t officially withdraw from a course, you may receive a grade of “F” for that class.

Pass/Fail Option: This option is not available for Boulder Evening credit courses.

Special Faculty-Staff Registration: Faculty and staff of the University of Colorado at Boulder may enroll in Boulder Evening Credit Courses at half the regular tuition on a space available basis. Please bring a current copy of your PAF showing at least half-time employment to registration beginning June 5.
Credit Classes Calendar- Dates You Should Know

<table>
<thead>
<tr>
<th>Date</th>
<th>Event</th>
</tr>
</thead>
<tbody>
<tr>
<td>Monday, May 1</td>
<td>First day of registration at the Division of Continuing Education,</td>
</tr>
<tr>
<td></td>
<td>1221 University Avenue, 9-6 Monday through Thursday; 9-5 Friday</td>
</tr>
<tr>
<td>Monday, June 3</td>
<td>Classes begin.</td>
</tr>
<tr>
<td></td>
<td>FACULTY/STAFF registration for Boulder Evening classes on space</td>
</tr>
<tr>
<td></td>
<td>available basis.</td>
</tr>
<tr>
<td>Friday June 16</td>
<td>LAST DAY TO REGISTER.</td>
</tr>
<tr>
<td></td>
<td>Withdrawals from classes after this date will appear as a &quot;W&quot; on</td>
</tr>
<tr>
<td></td>
<td>student's academic record.</td>
</tr>
<tr>
<td>Monday, June 19</td>
<td>Instructor's signature required to drop classes.*</td>
</tr>
<tr>
<td>Monday, July 3</td>
<td>Petition required to drop classes.</td>
</tr>
<tr>
<td>Tuesday, July 4</td>
<td>Holiday — No classes.</td>
</tr>
<tr>
<td>Tuesday, August 1</td>
<td>Classes end.</td>
</tr>
</tbody>
</table>

*This signature indicates you were doing passing work when you dropped the course.

Refund Schedule for Credit Classes

100% through June 16
60% June 19 through June 30
40% July 3 through July 17
NONE THEREAFTER

Important Note

Intensive credit classes that do not meet the full eight weeks will have different deadlines. Please call 492-5148 for specific information.

Survival Tips

Tuition charges for credit courses offered by the Division of Continuing Education are determined by program and by the residency status of the student.

Residents of Colorado are assessed tuition based on the price per semester hour and the number of semester hours for which they register. Tuition is based on the cost cited in the most recent program publication.

Non-Residents of Colorado are assessed tuition based on the price per semester hour and the number of semester hours for which they register. Non-residents may register for up to three (3) semester hours at the resident tuition rate cited in the most recent program publication. Non-residents registering for four (4) or more semester hours of credit courses offered by the Division of Continuing Education, regardless of program, are assessed non-resident tuition for all courses at the rate established by the Board of Regents for that term or session.

Important Exception: Tuition for INDEPENDENT STUDY VIA CORRESPONDENCE is assessed at the rate cited in the catalog of The Colorado Consortium for Independent Study in effect at the time of registration. This assessment is not affected by considerations of residency.

The Board of Regents reserves the right to change tuition without prior notice.

All tuition and refund determinations are subject to audit.
Press photography is another way for Cliff Grassmick to extend the skills he hones regularly at the Boulder Daily Camera.
Full Term Classes by Starting Date, Summer 1989

**Communication**

**Communication 1020-3 Introduction to Communication**

Presents an introduction to concepts and related skills that define communication in a variety of face-to-face contexts. Topics include models of communication, meaning, content/relationships, formal gathering, intimacy, and group programs. Optional for majors; open to nonmajors. When combined with COMM 1240, 2030 or 2150, satisfies first year social sciences requirement. Section 300: Mondays and Wednesdays, 6:30 p.m., Hellems 241. $180.

**Communication 2200-3 Interpersonal Communication**

Emphasizes personal aspects of communication. Choice making, choice attribution, risk taking, personal knowledge, creativity, and alternative kinds of interpersonal relationships are central topics. Increased self-awareness, understanding of interpersonal relationships, and improvement of interpersonal skills are dominant goals. When combined with COMM 1020, 1240 or 2150, satisfies first year social sciences requirement. Section 300: Tuesdays and Thursdays, 6:30 p.m., Hellems 241. $180.

**Economics**

**Economics 2010-3 Principles of Microeconomics**

The operation of the price system as a major organizer of the economy, Elementary theory, problems, and public policy of competition, monopoly, distribution of income, and international economic relations. When combined with ECON 2020, satisfies first year social sciences requirement. ECON 2010 and 2020 can be taken in either order. Section 300: Mondays and Wednesdays, 6:30 p.m., Education Center CR 2-06. $180.

**Economics 2020-3 Principles of Macroeconomics**

An overview of the economy examining the flow of income and GNP as well as the factors determining the level of employment, income, money, credit, and prices. When combined with ECON 2010, satisfies first year social sciences requirement. ECON 2020 can be taken in either order. Section 300: Tuesdays and Thursdays, 5:30-8 p.m., Engineering Center CR 2-06. $180.
Survival Tips

Important Information for Arts and Sciences Students
Students enrolling on the Boulder Campus for the first time in Summer 1988 and who have never attended college before should contact the Arts and Sciences Dean’s Office for a list of General Education Requirements. Continuing and transfer students who graduated from high school before 1988 should consult the current college list for General Education Requirements.

English

English 1191-3
Introduction to Creative Writing
An introduction to the techniques of fiction and poetry. Student work is scrutinized by the instructor and discussed in a workshop atmosphere by other students.
Section 300: Mondays and Wednesdays, 6:30-9 p.m., Hellemz 245. $180.

English 1200-3
Introduction to Fiction
Introduction to the novel, novella, and short story, including works from the nineteenth and twentieth centuries, as well as contemporary authors. Focus will be on reading, class discussions, and the development of basic critical approaches to fiction. Authors will include European, Latin American, and Russian writers in addition to American.
Section 300: Tuesdays and Thursdays, 5:30-8 p.m., Engineering Center CR 1-26. $180.

English 2051-3
Introductory Fiction Workshop
This course is a basic introduction to fiction writing techniques. Its workshop format makes it useful to both beginning and advanced writers. Students will write stories and discuss them in class. Instruction will also include topics such as getting and developing fresh story ideas, preparing manuscripts, and seeking publication. Students will read a variety of stories and theoretical works designed to help them develop their own sense of what makes good fiction. This course may be taken up to three times for credit.
Section 300: Tuesdays and Thursdays, 6:30-9 p.m., Hellemz 245. $180.

English 3152-3
Report Writing
Report Writing is a practical course which emphasizes on-the-job report writing. Topics will cover the writing process, writing to specific audiences, organizing content and preparing effective business letters, including resumes. Course requirements include weekly practical exercises with the emphasis on the student writing and evaluating sample reports as well as researching a final paper. The format of the class, a combination of lecture, discussion and evaluation, will sharpen the student’s ability to write with ease and clarity.
Section 300: Mondays and Wednesdays, 5:30-8 p.m., Engineering Center CR 1-26. $180.

English 3682-3
Twentieth-Century American Literature
Reading course in American novelists, poets, and dramatists of the 20th century. Primarily for non-majors.
Section 300: Mondays and Wednesdays, 5:30-8 p.m., Education 143. $180.

Film

Film Studies 3563-3
Producing the Feature Film
Designed to give the student a behind-the-scenes look at the way production in the entertainment industry is structured and how it works. The class will: 1) survey the production process from development to distribution; 2) focus on the crucial role that script plays in the production process; 3) "pitch a story" to studio executives. The class will also focus on: 1) various contract negotiations and the budget process; 2) job functions, qualifications, and opportunities in the entertainment industry; 3) relationships between producer, director, the writer, analysis of selected films for production value, story structure and budget considerations. Screenings may include Hannah and Her Sisters, Top Gun, Ruthless People, and other current films.
Section 100: July 5-August 1, Mondays, Tuesdays and Wednesdays, 5-9 p.m., Norlin Audiovisual Room. $188.

Geography

* Geography 1001-4
Environmental Systems: Climate and Vegetation
A general introduction to the atmospheric environment of the Earth; the elements and controls of climate and their implications to hydrology, vegetation, and soils. When combined with GEOG 1011, satisfies first year natural sciences requirement.
Section 300: Lecture: Mondays and Wednesdays, 7-9:30 p.m. Lab: Wednesdays, 5-7 p.m., Guggenheim 201. $240.
**Philosophy**

* **Philosophy 1000-3**
  **Introduction to Philosophy**
  An introduction to the fundamental questions of philosophy through a study of the ideas of several major philosophers. Short papers are required. When combined with PHIL 1100, 1300, 1600, 1400, 1700, 1750 or 1440, satisfies first year humanities requirement. When combined with PHIL 1200, 2200, or 2390, satisfies first year social sciences requirement. If PHIL 1000 is used for the humanities requirement, it cannot be used for the social sciences requirement.
  
  **Section 300:** Mondays and Wednesdays, 6:30-9:00 p.m., Hellem 229. $188.

* **Philosophy 1100-3**
  **Ethics**
  Introductory study of major philosophies on the nature of the good for humanity, principles of evaluation, and moral choice. When combined with PHIL 1000, satisfies first year humanities requirement.
  
  **Section 300:** Tuesdays and Thursdays, 6:30-9:00 p.m., Hellem 229. $180.

**Psychology**

* **Psychology 1001-3**
  **General Psychology**
  General one-semester survey of major topics in psychology, including sensory and perceptual processes, human development, personality, frustration and conflict, learning and memory, and the biological basis of behavior. When combined with PSYC 2303, 2456 or 2643, satisfies first year social sciences requirement. When combined with PSYC 2402 or 2502, satisfies first year natural sciences requirement. If PSYC 1001 is used for the social sciences requirement, it cannot be used for the natural sciences requirement.
  
  **Section 300:** Mondays and Wednesdays, 6:30-9:00 p.m., Biosciences E417. $180.

* **Psychology 4303-3**
  **Abnormal Psychology**
  This course is designed to familiarize the student with the major applied aspects of abnormal behavior. The focus is on the diagnosis and treatment of contemporary abnormal behaviors. The course will be presented in a case study methodology. Students will be expected to become familiar with contemporary research and practices in clinical/counseling psychology. This course does not presume previous field or course work in the clinical area. Not open for credit to those who have credit for PSYC 4313. Prerequisite, PSYC 1001.
  
  **Section 300:** Tuesdays and Thursdays, 6:30-8:30 p.m., Biosciences E432. $180.

* **Psychology 4456-3**
  **Psychology of Personality**
  The psychological study of the structure, organization and development of the person as a whole. Analysis of major theories, methods and research dealing with personality, including topics such as emotion, motivation, temperament, inner experience, identity and the self, personality change, and the influence of the sociocultural context. Prerequisite, 12 hours of psychology or consent of instructor.
  
  **Section 300:** Mondays and Wednesdays, 6-8:30 p.m., Biosciences E432. $180.
Ground Your Professional Growth Management Development

This Certificate Program has been designed to develop management skills for persons who aspire to management positions or who wish to increase their expertise in any area of management. There are no prerequisites for any course, and any person interested may enroll. You need not be working toward certification. Any course enrollment immediately registers you in the Certificate Program. In the competitive market, the people most likely to succeed are those with a thorough knowledge of a wide range of management areas. This program develops expertise in the basic and most useful areas of management. New courses are added regularly; several are offered more than once a year.

Course offerings cover task-related skills and important management concepts. Enrollees may select from the courses which best meet their needs. Each course is designed to consider a key aspect of the management process. Faculty are experts recruited from universities and from private businesses or consulting firms. They are chosen for their special expertise in the subject area and their proven teaching skills. Courses are not overly technical or purely theoretical; all subject matter is presented in a format which participants can relate directly to their professions.

Professional Development Program Certificates are awarded for attendance at any of the courses. This attendance certification is determined by the course instructor. Continuing Education Units are awarded for course attendance. One Continuing Education Unit (CEU) represents 10 hours of university or college-level course participation, and is a nationally recognized standard. The number of CEUs awarded in a course is listed with the course description, and follows this 10:1 ratio.

The completed Management Certificate of Achievement is awarded upon successful completion of courses equal to 10 CEUs or 100 hours of instruction. A complete transcript of program participation is maintained, and available without fee upon request.

The Management Development courses are conducted continuously and need not be completed with the herein described courses. A permanent record of participation is kept, and a transcript of courses taken is available free of charge at any time. Students may continue the certification process at their own pace, and may enroll in any number of courses depending on professional goals.

Course tuitions are listed at the end of each course description. Please note that refunds are given only before the start of a course, none after.

Locations are listed at the end of each course.

All questions concerning the program, including your current status toward earning the Achievement Certificate, may be answered by calling the Division of Continuing Education at 492-5148 (or call outside the Denver Metro dialing area, 1-800-332-5839).
Management Development Courses by Starting Date

<table>
<thead>
<tr>
<th>Date</th>
<th>Number</th>
<th>Section</th>
<th>Course</th>
<th>Faculty</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tuesday, June 6</td>
<td>MDCP 402</td>
<td>10B</td>
<td>Art of Persuasion</td>
<td>Don Marcotte</td>
</tr>
<tr>
<td>Thursday, June 8</td>
<td>MDCP 452</td>
<td>10B</td>
<td>Technical Writing</td>
<td>Mike Gannon</td>
</tr>
<tr>
<td>Saturday, June 10</td>
<td>MDCP 403</td>
<td>10B</td>
<td>Basic Skills for the New Supervisor</td>
<td>Charles Rice</td>
</tr>
<tr>
<td>Saturday, June 17</td>
<td>MDCP 407</td>
<td>10B</td>
<td>Understanding Individual Differences</td>
<td>Charles Rice</td>
</tr>
<tr>
<td>Tuesday, July 11</td>
<td>MDCP 416</td>
<td>10B</td>
<td>Effective Public Speaking and Presentation Techniques</td>
<td>Don Marcotte</td>
</tr>
<tr>
<td>Wednesday, July 12</td>
<td>MDCP 418</td>
<td>10B</td>
<td>Time Management</td>
<td>Dora Johnson</td>
</tr>
<tr>
<td>Saturday, July 15</td>
<td>MDCP 404</td>
<td>10B</td>
<td>Building Productive Work Teams</td>
<td>Charles Rice</td>
</tr>
</tbody>
</table>

Management Development

**MDCP 402**  
**The Art of Persuasion**

Although the exercise of persuasion can yield either positive or negative results, this course will focus on the positive aspects of persuasion. The participants will be introduced to persuasion techniques that will help them achieve positive goals in their everyday dealings with others in social and business situations. The course content is comprised of both lecture and student role plays.


Section 10B:  
Tuesdays, June 6-27,  
6:30-9 p.m. 4 sessions. 1 CEU.  
Business 354. $75.

**MDCP 403**  
**Basic Skills for the New Supervisor**

This workshop is designed for individuals new to management or developing skills to prepare for a management position. Information will be provided about:  
- Basic principles of supervision  
- Leadership skills and team building  
- Effective communication  
- Problem solving and handling conflict  
- Employee development and discipline  
- Motivation techniques


Section 10B:  
Saturdays, June 10 and 17,  
8 a.m.-1 p.m. 2 sessions. 1 CEU.  
Business 354. $75.

**MDCP 404**  
**Building Productive Work Teams**

This intensive workshop is aimed at making functional work teams more effective, productive, and creative. Specific concepts, procedures, and strategies will be presented in real time with real issues, problems and concerns that the participants share in a workshop/seminar setting. Proven principles and concepts from business management, the behavior sciences, and disciplined problem solving will form the foundation for this program.

The dominant thrust of this teambuild-
Let New Skills Take Root
Computer Applications

Personal computers and increasingly automated offices have dramatically changed the way we do business. Today, computer literacy is nearly as vital as the ability to read. Understanding how computers can work for you will give you timely skills for today's marketplace while preparing you to cope with tomorrow's world as well.

Becoming familiar with computers opens new avenues in your personal as well as your professional development. You can instantly access a world of information. There's a new level of creativity to be found with computerized graphics and computer-aided design. And adventures in connections with personal telecommunications and local area networks. You can get to know word processing, explore new ways to manage data or apply the computing power to financial questions — your own, or your organization's.

These user-friendly courses won't turn you into a programmer — although you'll have a chance to learn the basics. The goal is to help you become an up-to-the-minute computer user with practical skills to help you keep pace with the information age.

Here's your opportunity to learn this new technology in a supportive environment. Your turn to ask the questions you've been wondering about. Your chance to gain hands-on experience and hone the skills you need to gain computer confidence. Whether it's becoming comfortable with a PC or moving to the leading edge of information technology, you decide how far you want to take this program.

Chyle Getty aims to excel, whether he's practicing aerial jumps for the U.S. Freestyle Ski team, developing specialized computer systems with his Boulder-based company, or introducing students to database management.
Certificate in Computer Applications

Participating in the Certificate in Computer Applications program doesn’t require a special application or commitment. You may take courses at any time and a record of your participation is maintained and available to you at any time. You may earn a Certificate in Computer Applications in roughly three or four semesters, but you needn’t complete it in any given length of time. The requirements are straightforward:

A. Four core required courses:
   1. Computer Literacy*
   2. Concepts of Data Processing and Information Technology**
   3. Introduction to Computer Applications Systems
   4. Software Operations and Maintenance
   *Computer Literacy, the introductory course, is designed to be completed first, although you may take it at the same time as another course. If you have a substantial background with computers, you may omit it. Simply submit a written request to the Division of Continuing Education, if you plan on achieving the Certificate.
   **Offered Fall, 1989.

B. Two different courses in programming. Programming languages offered include BASIC, Pascal and C. Others are added to keep pace with industry standards.

C. Two elective application courses chosen from the full range of computer topics. Any course not listed above and not a specific programming language qualifies as an elective.


These courses will give you hands-on experience with important design systems and up-to-date graphics technology. Classroom labs are equipped with IBM/PC/AT microcomputers, with plotters and printers, or with fully configured Apple Macintosh SE and II systems, so you can make the best use of your course time.

For detailed descriptions of all computer graphics and desktop publishing courses, see page 20 in this catalogue.

All graphics courses fill elective requirements for the Certificate in Computer Applications.

Essential Information

Registration is limited by the number of computers available, so early registration is advised. Enrollment is on a first-come, first-served basis.

This symbol means you might need to share a computer with another student for a particular course. Most courses provide one computer per student.

Details on access to computers outside of regular class time and the how-tos of software checkout or hard disk access are given at class.

No courses are conducted Independence Day, July 4, but may be conducted July 3. Confirm your schedule in class.

Tuition and Refunds

Cost varies from class to class. Tuition is listed at the end of each course description. Full refunds are given on request before a course starts, none later.

Location

The classroom location is given at the end of each course description.

Questions?

If you have any questions about this program, please call the Division of Continuing Education at 492-5148, or outside the Denver Metro area, 1-800-332-5839.
## Computer Applications

### Computer Application Courses by Starting Date

<table>
<thead>
<tr>
<th>Date</th>
<th>Number</th>
<th>Section</th>
<th>Course</th>
<th>Faculty</th>
</tr>
</thead>
<tbody>
<tr>
<td>Monday, June 5</td>
<td>CCA 330</td>
<td>101</td>
<td>Beginning Using Lotus 1-2-3</td>
<td>Nancy VanWechel</td>
</tr>
<tr>
<td>Tuesday, June 6</td>
<td>CCA 320</td>
<td>100</td>
<td>Introduction to C Programming</td>
<td>Carol J. Meier</td>
</tr>
<tr>
<td>Tuesday, June 8</td>
<td>CCA 375</td>
<td>101</td>
<td>Beginning Microsoft Word on the Mac</td>
<td>Tom Swanson</td>
</tr>
<tr>
<td>Thursday, June 8</td>
<td>CCA 370</td>
<td>100</td>
<td>Database Management: Applying dBase III + IV</td>
<td>Clyde Getty</td>
</tr>
<tr>
<td>Thursday, June 8</td>
<td>CCA 300</td>
<td>100</td>
<td>BASIC Programming</td>
<td>Tom Swanson</td>
</tr>
<tr>
<td>Saturday, June 8</td>
<td>CCA 200</td>
<td>101</td>
<td>Using MS-DOS</td>
<td>Steve Purvis</td>
</tr>
<tr>
<td>Saturday, June 10</td>
<td>CCA 215</td>
<td>101</td>
<td>Introduction to HyperCard</td>
<td>Greg McArthur</td>
</tr>
<tr>
<td>Monday, June 12</td>
<td>CCA 105</td>
<td>101</td>
<td>Introduction to the Macintosh</td>
<td>Scott Dixon</td>
</tr>
<tr>
<td>Monday, June 12</td>
<td>CCA 120</td>
<td>100</td>
<td>Introduction to the IBM and Compatible</td>
<td>Valerie Parker</td>
</tr>
<tr>
<td>Tuesday, June 13</td>
<td>CCA 120</td>
<td>102</td>
<td>Introduction to the IBM and Compatible</td>
<td>Valerie Parker</td>
</tr>
<tr>
<td>Tuesday, June 13</td>
<td>CCA 380</td>
<td>101</td>
<td>Beginning WordPerfect Word Processing</td>
<td>Peggy Purvis</td>
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<tr>
<td>Tuesday, June 13</td>
<td>CCA 340</td>
<td>100</td>
<td>Computer Application Systems Overview</td>
<td>John A. Johnson</td>
</tr>
<tr>
<td>Wednesday, June 14</td>
<td>CCA 360</td>
<td>100</td>
<td>Introduction to UNIX</td>
<td>Carol J. Meier</td>
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<tr>
<td>Wednesday, June 14</td>
<td>CCA 375</td>
<td>100</td>
<td>Beginning Microsoft Word on the IBM PC</td>
<td>Yvonne Kristy</td>
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<tr>
<td>Wednesday, June 14</td>
<td>CCA 100</td>
<td>101</td>
<td>Computer Graphics Art I</td>
<td>Greg McArthur</td>
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<td>Thursday, June 15</td>
<td>CCA 350</td>
<td>100</td>
<td>Software Operations and Maintenance</td>
<td>Pat Fels</td>
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<tr>
<td>Saturday, June 17</td>
<td>CCA 330</td>
<td>102</td>
<td>Beginning Using Lotus 1-2-3</td>
<td>Nancy VanWechel</td>
</tr>
<tr>
<td>Monday, June 19</td>
<td>CCA 235</td>
<td>100</td>
<td>Introduction to SAS — Statistical Analysis System</td>
<td>Otis Pratt</td>
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<tr>
<td>Saturday, July 1</td>
<td>CCA 200</td>
<td>102</td>
<td>Using MS-DOS</td>
<td>Nancy VanWechel</td>
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<tr>
<td>Saturday, July 1</td>
<td>CCA 380</td>
<td>101</td>
<td>Beginning WordPerfect Word Processing</td>
<td>Peggy Purvis</td>
</tr>
<tr>
<td>Wednesday, July 5</td>
<td>CCA 376</td>
<td>100</td>
<td>Intermediate Microsoft Word on the IBM PC</td>
<td>Yvonne Kristy</td>
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<td>Saturday, July 8</td>
<td>CCA 330</td>
<td>103</td>
<td>Beginning Using Lotus 1-2-3</td>
<td>Nancy VanWechel</td>
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<tr>
<td>Monday, July 10</td>
<td>CCA 330</td>
<td>104</td>
<td>Beginning Using Lotus 1-2-3</td>
<td>Nancy VanWechel</td>
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<tr>
<td>Tuesday, July 11</td>
<td>CCA 120</td>
<td>103</td>
<td>Introduction to the IBM and Compatible</td>
<td>Valerie Parker</td>
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<tr>
<td>Tuesday, July 11</td>
<td>CCA 105</td>
<td>102</td>
<td>Introduction to the Macintosh</td>
<td>Scott Dixon</td>
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<tr>
<td>Tuesday, July 11</td>
<td>CCA 380</td>
<td>103</td>
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<td>Peggy Purvis</td>
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<tr>
<td>Wednesday, July 12</td>
<td>CCA 336</td>
<td>100</td>
<td>Excel Spreadsheet on the Macintosh</td>
<td>J. Burke Taft</td>
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<tr>
<td>Thursday, July 13</td>
<td>CCA 378</td>
<td>100</td>
<td>Beginning MicroCAD Level II</td>
<td>Steven A. Johnson</td>
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<tr>
<td>Thursday, July 13</td>
<td>CCA 372</td>
<td>100</td>
<td>Advanced dBase III + IV Applications</td>
<td>Clyde Getty</td>
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<tr>
<td>Wednesday, July 19</td>
<td>CCA 331</td>
<td>102</td>
<td>Introduction to Local Area Networks</td>
<td>Larry G. Lankford</td>
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<tr>
<td>Saturday, July 23</td>
<td>CCA 215</td>
<td>102</td>
<td>Introduction to HyperCard</td>
<td>Greg McArthur</td>
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<td>Sunday, July 22</td>
<td>CCA 200</td>
<td>103</td>
<td>Using MS-DOS</td>
<td>Nancy VanWechel</td>
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<td>Saturday, July 29</td>
<td>CCA 332</td>
<td>101</td>
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<tr>
<td>Tuesday, August 1</td>
<td>CCA 382</td>
<td>101</td>
<td>Intermediate WordPerfect</td>
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<td>Thursday, August 3</td>
<td>CCA 373</td>
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<td>dBase III + IV for Windows 3.1</td>
<td>Clyde Getty</td>
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<td>102</td>
<td>Intermediate WordPerfect</td>
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<td>Monday, August 7</td>
<td>CCA 332</td>
<td>102</td>
<td>Intermediate Lotus 1-2-3</td>
<td>Nancy VanWechel</td>
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<tr>
<td>Tuesday, August 8</td>
<td>CCA 203</td>
<td>100</td>
<td>Advanced DOS</td>
<td>Nancy VanWechel</td>
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<td>Wednesday, August 9</td>
<td>CAD 380</td>
<td>104</td>
<td>Beginning WordPerfect Word Processing</td>
<td>Peggy Purvis</td>
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<tr>
<td>Thursday, August 10</td>
<td>CAD 381</td>
<td>100</td>
<td>Beginning WordPerfect Word Processing</td>
<td>Steven A. Johnson</td>
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<tr>
<td>Saturday, August 12</td>
<td>CAD 204</td>
<td>100</td>
<td>Using OS/2</td>
<td>Steve Purvis</td>
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<td>Saturday, August 12</td>
<td>CAD 317</td>
<td>100</td>
<td>Advanced HyperCard</td>
<td>Greg McArthur</td>
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<td>Monday, August 14</td>
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<td>Intermediate C Programming</td>
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<td>CAD 334</td>
<td>103</td>
<td>Advanced Lotus 1-2-3</td>
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<tr>
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<td>CAD 384</td>
<td>100</td>
<td>Advanced WordPerfect</td>
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<tr>
<td>Monday, August 21</td>
<td>CAD 364</td>
<td>100</td>
<td>Intermediate Units</td>
<td>Carol J. Meier</td>
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</table>

### Computer Graphics Courses by Starting Date

<table>
<thead>
<tr>
<th>Date</th>
<th>Number</th>
<th>Section</th>
<th>Course</th>
<th>Faculty</th>
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<tbody>
<tr>
<td>Wednesday, May 17</td>
<td>CCG 256</td>
<td>101</td>
<td>Macintosh Computer Art</td>
<td>Barry Ratliff</td>
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<tr>
<td>Tuesday, June 6</td>
<td>CAD 311</td>
<td>101</td>
<td>Beginning Computer Aided Design</td>
<td>David Claffin</td>
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<tr>
<td>Wednesday, June 7</td>
<td>CAD 311</td>
<td>102</td>
<td>Beginning Computer Aided Design</td>
<td>Sharon Blender</td>
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<td>Thursday, June 8</td>
<td>CCG 371</td>
<td>102</td>
<td>Introduction to Aldus PageMaker on the Macintosh</td>
<td>Yvonne Kristy</td>
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<td>Thursday, June 8</td>
<td>CAD 322</td>
<td>101</td>
<td>Computer Aided Design: Level I</td>
<td>Dan Myers</td>
</tr>
<tr>
<td>Monday, June 12</td>
<td>CAD 320</td>
<td>100</td>
<td>AutoCAD Upgrades</td>
<td>Philip M. Kreisher</td>
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<tr>
<td>Monday, June 12</td>
<td>CCG 351</td>
<td>100</td>
<td>Computer Graphics Art I</td>
<td>Pat Lehman</td>
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<tr>
<td>Monday, June 17</td>
<td>CCG 371</td>
<td>102</td>
<td>Introduction to Aldus PageMaker on the Macintosh</td>
<td>Bruce Frehner</td>
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<td>102</td>
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<td>CAD 322</td>
<td>103</td>
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<td>Sharon Blender</td>
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<td>Wednesday, June 21</td>
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<td>104</td>
<td>Computer Aided Design: Level I</td>
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<tr>
<td>Thursday, July 8</td>
<td>CCG 372</td>
<td>100</td>
<td>Advanced Desktop Publishing on the Macintosh</td>
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<td>CCG 351</td>
<td>102</td>
<td>Computer Graphics Art I</td>
<td>Pat Lehman</td>
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<tr>
<td>Thursday, July 20</td>
<td>CAD 333</td>
<td>100</td>
<td>Computer Aided Design: Level II</td>
<td>Dan Myers</td>
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<tr>
<td>Saturday, July 22</td>
<td>CCG 377</td>
<td>102</td>
<td>Introduction to Desktop Publishing for the IBM PC</td>
<td>Bruce Frehner</td>
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<tr>
<td>Monday, July 24</td>
<td>CCG 361</td>
<td>100</td>
<td>Computer Graphics Art: Level II</td>
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<tr>
<td>Monday, July 24</td>
<td>CCG 356</td>
<td>102</td>
<td>Macintosh Computer Art</td>
<td>David Secunda</td>
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<tr>
<td>Tuesday, July 25</td>
<td>CAD 332</td>
<td>100</td>
<td>Computer Aided Design: Level I</td>
<td>Mark Parker</td>
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<tr>
<td>Saturday, July 29</td>
<td>CCG 373</td>
<td>100</td>
<td>QuarkXPress Desktop Publishing</td>
<td>Tim Meehan</td>
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<tr>
<td>Wednesday, August 2</td>
<td>CAD 333</td>
<td>103</td>
<td>Computer Aided Design: Level II</td>
<td>Sharon Blender</td>
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<tr>
<td>Saturday, August 5</td>
<td>CCG 386</td>
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<td>CAD 357</td>
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<td>Advanced Macintosh Computer Art</td>
<td>T.B.A.</td>
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<tr>
<td>Thursday, August 24</td>
<td>CAD 345</td>
<td>102</td>
<td>Computer Aided Design: Level III</td>
<td>Philip M. Kreisher</td>
</tr>
</tbody>
</table>

* - required certificate courses
Skill Level Guide

A Guide to Computer Applications
Recommended Courses' Skill Levels

All courses are marked with a skill level designation. It is recommended that you be at least at that skill level to take the course. This will optimize your learning. If you have questions about a course level, please call the Division of Continuing Education at 492-5148.

Beginner
No previous computer experience necessary - course assumes little or no computer knowledge.

Novice
Elementary computer knowledge: taken Computer Literacy or some introductory courses.

Intermediate
Computer Literacy background plus recent involvement in programming/software applications.

Specialized
Intermediate skills but seeking specific applications as in systems, documentation, or management.

Advanced
Current MIS involvement, comfortable with most popular software applications; basic programming skills.

Getting Started

CCA 100
Computer Literacy

This course focuses on exactly what computers are and how they work, as well as their various uses and limitations. Sessions include a description of software available for today's computers, understanding computer jargon, how computers influence our changing society, and active demonstrations of applied computer technology. Time will be made available for hands-on experience, learning some simple programming skills using different computer systems, and a wide variety of popular computer applications. Beginner

Bob Carlisle, M.A.
Section 100:
Wednesday, June 14, 6:30-8:30 p.m.
plus lab sessions. Please indicate lab section preference (00 or 10B) at registration:

Lab Section 10A:
Wednesdays, June 21-August 2, 6-8 p.m.
Lab Section 10B:
Wednesdays, June 21-August 2, 8:10 p.m.
8 sessions, 1.6 CEUs. University Computing Center 123. Note — locations change after the first class session; and some sections are divided within the allotted time for greater computer access; please contact Continuing Education if you are unable to attend the first class session. $90.

CCA 105
Introduction to the Macintosh

This hands-on class is designed to introduce you to the Macintosh system and its use as a productive tool. Topics include system management, graphics applications, and practical yet extensive business options. This comprehensive course provides a great overview of the friendly yet sophisticated Macintosh system, for the beginner or the user who wants full utility from the Macintosh. Some time will be dedicated at the end of the course to demonstrate advanced business and personal applications.

Scott Dixon, M.A.
Section 101:
Mondays, June 12-July 17
Section 102:
Tuesdays, July 11-August 8.
Both sections: 6:30-9:30 p.m. 5 sessions, 1.5 CEUs. Fine Arts CIB53. $80.

CCA 120
Introduction to the IBM and Compatible Personal Computers

This intensive course covers important computer vocabulary, architecture, and configurations of IBM microcomputer systems. Special emphasis is placed on the IBM PC, including hands-on familiarization, user commands, and DOS functions. Introduction to uses of BASIC as a programming language and simple software programs are included. This course is conducted on IBM and IBM compatible microcomputers and enrollment is strictly limited. This course is intended for those who have recently purchased, or will soon purchase the job, IBM-PC hardware and are new to computing. Course will also provide a fundamental overview of new Personal System 2 (PS/2) software features.

Valerie Parker, M.Ed.
Section 101:
Mondays, June 12-26, 6:30-9:30 p.m.
Section 102:
Tuesdays, June 13-27, 6:30-9:30 p.m.
Section 103:
Tuesdays, July 11-25, 6:30-9:30 p.m.
All sections: 3 sessions, 2.5 CEUs. Ramaley Biology NIB31. $140.

CCA 300
BASIC Programming

BASIC (Beginners All-purpose Symbolic Instruction Code) is perhaps the easiest language to learn for programming a computer. Most computers are capable of working with BASIC. Students will start at the very beginning and work up to using searching and sorting methods, developing useful data structures, and applying general programming skills. Hands-on experience will be emphasized. The text, BASIC: Fundamentals and Styles, by Quasney and Maniotes, is available at the University Book Center; UMC 10.

Tom Swanson, M.A.
Section 100:
Thursdays, June 8-August 10, 6:30-9 p.m.
10 sessions, 2.5 CEUs. Ramaley Biology NIB31. $140.

CCA 320
Introduction to C Programming

This course will teach programmers the fundamentals of C programming. We will cover data types, control structures, functions and parameter passing, program structure, separate compilation, the preprocessor, arrays, strings, pointers and structures. Hands-on exercises will be supplemented by lectures, discussions, and demonstrations. Some programming experience is required as C is not a beginner's language. Fluency in almost any language is adequate, although ALGOL, Pascal, or a similar language is preferable. This seminar is designed for those who wish to cover large amounts of information in a condensed, fast-paced format. Especially helpful for programmers, software engineers, or anyone developing applications with portability in mind. Recommended text is The C Programming Language, by Kernighan and Ritchie, available at the University Book Center; UMC 10.

Intermediate

Carrie J. Meier, M.S.
Section 100:
Tuesdays, June 6-July 25.
Ramaley Biology NIB23, 6:30-9:30 p.m.
7 sessions, 2.1 CEUs. $195.
Computer Applications

Applications

Systems

Applications Systems Overview

CCA 340

Computer Application Systems Overview

A comprehensive review of current computer information systems, including hardware, software, applications for business development and information management on an industry-wide scale, the office automation marketplace, and your practical, professional involvement in computer applications.

Intermediate

Liz Anthony, B.S.

Section 101:

Tuesdays, June 13-August 8, 7-9:30 p.m.

8 sessions, 2 CEUs.

University Computing Center 123. $145.

CCA 350

Software Operations and Maintenance

This class will discuss the aspects of systems that need to be developed in order to effectively support efficient computer operations. Topics include: systems analysis, configuration options, software selection, data conversion, support contracts, software design, training, installation, file maintenance, document management, error identification, and logging systems. Course includes lab time. Students will come away with effective tools to monitor and organize computer systems.

Pat Fels, M.A.

Section 101:

Tuesdays, June 15-August 8, 6:30-9 p.m. 8 sessions, 2 CEUs.

University Computing Center 123. $135.

CCA 200

Using MS-DOS

This course is designed to give students a working knowledge of DOS commands to aid in file management and organization for the beginner to intermediate user. The 3 major areas of study in this one-day session are: review of simple DOS file management commands, fixed disk commands and simple batch files. Discussion will also include edlin, autotexec.bat, config.sys, backups, menu screens, virtual disks and formatting rules. Please bring a double-sided/double-density 5 1/4 inch diskette to class so that you can keep your example files.

Intermediate

Section 101:

Peggy Purvis.

Saturday, June 10.

University Computing Center 11A.

Section 102:

Nancy VanWechel.

Saturday, July 1.

University Computing Center 11A.

Section 103:

Peggy Purvis.

Saturday, July 22. Macky 3D.

All sections: 9 a.m.-5 p.m.

One all-day session, .7 CEUs. $70.

CCA 360

Introduction to UNIX

This course is designed to give students a comfortable working knowledge of the UNIX operating system. Topics include the file system structure, editing, basic and common commands, conventions, and shell features no one should be without! Both Berkeley and AT&T UNIX will be presented. The format combines lecture, demonstration, hands-on exercises, discussion and fun! Intended for people with 0 to 6 months UNIX experience; whether just curious about UNIX, deciding whether to use it, or already beginning to use it.

Intermediate

Carol J. Meier, M.S. and Geoff Thompson, M.S.

Section 100:

Wednesdays, June 14-July 26, 6:30-9:30 p.m. 7 sessions, 2 CEUs.

Ramaley Biology N1B23. $195.
CCA 364
Intermediate UNIX
This course will pick up where Introduction to UNIX leaves off. We will continue with more advanced shell features and many more amazing commands. Several sessions will be spent on shell programming with plenty of examples. Both Bourne and C shells will be discussed. About half of the course will be hands-on. If you've ever wanted to write a shell script but weren't sure how to start, or didn't know if an appropriate command already existed, you will find this a valuable course!
Specialized Carol J. Meier, M.S. and Geoff Thompson, M.S.
Section 100:
Monday-Friday, August 21-25, 8:30 a.m.-12:30 p.m.
5 sessions, 2.1 CEUs.
Ramaley Biology N1B23. $195.

CCA 331
Introduction to Local Area Networks (LANs)
This class is intended to give a thorough understanding of the value and practical possibilities of Local Area Networks. An in-depth survey of the characteristics of the major LANs available today and LAN methods and standards will be included. The class is targeted at those who are considering installing a LAN or those who simply need to develop a familiarity with this rapidly growing method of interconnecting Personal Computers. Course includes lab sessions.
Intermediate Larry G. Lankford, M.S.
Section 100:
Wednesdays, July 19-August 16, 6:30-9 p.m. 5 sessions, 1.3 CEUs.
University Computing Center 123. $125.

CCA 225
Introduction to HyperCard
HyperCard has added a new dimension to Macintosh computing. New ways to employ HyperCard are being discovered regularly in this innovative application. This one-day course starts with an overview of HyperCard, then proceeds to assist you in developing a custom "stack." Topics include making cards, using Hypertalk, HyperCard tools, creating fields and buttons, and linkages (card-to-card, card-to-stack, stack-to-stack). The course is of special interest to any Macintosh user. Please bring to class a Macintosh-compatible 3.5 inch diskette.
Intermediate Greg McArthur, Ph.D.
Section 100:
Saturday, June 10
Saturday, July 22
Both Sections: 9 a.m.-4 p.m.
One all-day session, 7 CEUs.
Fine Arts C1B53. $55.

CCA 227
Advanced HyperCard
Developing custom information handling and creating powerful, time-saving data management short-cuts are key topics in this advanced one-day course. Also included are stackware development, scripting in HyperCard, and addressing specialized data base needs. Please bring to class a Macintosh-compatible 3.5 inch diskette.
Intermediate Greg McArthur, Ph.D.
Section 100:
Saturday, August 12, 9 a.m.-4 p.m.
One all-day session, 7 CEUs.
Fine Arts C1B53. $60.

CCA 370
Database Management: Applying dBase III+/IV
With today's wealth of available information, there is an overwhelming need to organize and retrieve data for decision making. dBase IV is a powerful and productive data management system specifically intended for this use. Participants in this class learn the concept of a database, the many different ways of organizing, accessing, and reporting information, and the way to develop applications for specific needs. Topics include special applications of dBase III+ and previous versions as they relate to Ver. IV. Bring to class two double-sided,double-density 5 1/4 inch diskettes, available at all computer supply stores.
Intermediate Clyde Getty, B.S.
Section 100:
Thursdays, June 8-July 6, 6:30-9:30 p.m. 5 sessions, 1.5 CEUs.
University Computing Center 114. $140.

CCA 372
Advanced dBase III+/IV Applications
This course is designed around the more advanced features of the powerful dBase III+ and dBase IV software. Participants must have some programming background, as well as familiarity with programming in dBase, or have taken Database Management: Applying dBase IV (CCA 370). Topics include multiple files, using functions, total system design, and, time permitting, automatic command file generation and other advanced features. Bring to class a double-sided,double-density 5 1/4 inch diskette.
Intermediate Clyde Getty, B.S.
Section 100:
Thursdays, July 13-27, 6:30-9:30 p.m.
3 sessions, 9 CEUs.
University Computing Center 114. $90.
CCA 373

**dbase III+/IV for Programming**

This course gives the opportunity to use the powerful dBase III+ and dBase IV software for special custom applications. Emphasis is on dBase IV, but dBase III+ users will be accommodated. Course is recommended for the experienced dBase user. Some programming experience is recommended, as well as familiarity with dBase commands. Topics include upgrades for dBase III+ to dBase IV programming. Bring to class a double-sided/double-density 5 1/2 inch diskette. Specialized Clyde Getty, B.S.

Section 100: Thursdays, August 3-17, 6:30-9:30 p.m. 3 sessions, .9 CEUs. University Computing Center 114. $90.

CCA 330

**Beginning Using Lotus 1-2-3**

This introductory course covers spreadsheet, database, graphics, and printing applications. It is designed to maximize the use of your time by knowing how to use Lotus well. Practical guidelines are established concerning moving within the spreadsheet, principles of designing and copying spreadsheets, graphics generation and simple database construction. Concepts introduced and used in the class are: ranges, painting, pointing, and relative and absolute referencing. The first day covers spreadsheet generation while giving the student a basic knowledge of the 1-2-3 commands and an introduction to various modeling techniques and practices. The second day covers a review of spreadsheet skills and techniques, databases, graphics, and printing. During the course, students are asked to generate and complete exercises in all functions. As a result of the course, the student will have a thorough understanding of the power of 1-2-3 and be able to build and print spreadsheets. Manuals are provided. Bring to class a double-sided/double-density 5 1/2 inch diskette. Class size is strictly limited. 

Novice Nancy VanWechel, B.S., M.B.A.

Section 101: Saturday, July 29, 9 a.m.-4:30 p.m. One all-day session.

University Computing Center 142.

Section 102: Mondays, August 7 and 14, 6:30-10 p.m. 2 sessions. University Computing Center 114.

Both Sections: .7 CEUs. $70.

CCA 334

**Advanced Lotus 1-2-3**

Three major data functions important to the experienced Lotus 1-2-3 user in practical applications will be covered in this one day advanced seminar:

- Data matrices
- Data regression
- Data tables

Various "at" (@) functions will also be covered in detail, as well as looping between macros. A review section will focus on principles and practices of combining files, data and file import/export, and combine options.

Intermediate Nancy VanWechel, M.B.A.

Section 101:

Saturday, August 19, 9 a.m.-4:30 p.m.

One all-day session. .7 CEUs.

University Computing Center 114. $70.

CCA 332

**Intermediate Lotus 1-2-3**

This course is intended for those who have a working knowledge of spreadsheet (and/or completed Beginning Using Lotus 1-2-3, CCA 330) and want to master more advanced applications and techniques. This one-day, hands-on course focuses on file and database manipulation, multiple file design and use, special version 2.0 macro techniques, as well as other file and data handling concepts. Other special updates include: ranges, data parse; and advanced file, worksheet and database commands. Each student generates and completes exercises of all functions. Manuals are provided. Bring to class a DOS formatted 5 1/2 inch double-sided/double-density diskette. Class size is strictly limited. 

Intermediate Nancy VanWechel, M.B.A.

Section 101: Saturday, July 29, 9 a.m.-4:30 p.m. One all-day session.

University Computing Center 142.

Section 102: Mondays, August 7 and 14, 6:30-10 p.m. 2 sessions. University Computing Center 114.

Both Sections: .7 CEUs. $70.

CCA 336

**Excel Spreadsheet on the Macintosh**

This course introduces you to Excel as a productivity tool for the Macintosh. Some time will be spent reviewing the use of the Macintosh system. Basics of spreadsheet design will be covered, including creating, editing, formatting and printing a worksheet. Use of formulas and functions, the database, charting and graphing and macros will also be covered. We will also cover "using Excel with other software." Emphasis will be placed on the special unique features that make Excel both powerful and easy to use. Please bring to class a Macintosh-compatible 3.5 inch double-sided/double-density diskette.

Novice J. Burke Taft, M.Ed.

Section 100: Wednesdays, July 12-August 2, 6:30-9:30 p.m. 4 sessions, 1.2 CEUs. Fine Arts CIB33. $105.

CCA 235

**Introduction to SAS — Statistical Analysis System**

Knowledge of SAS can be a very valuable business or research tool. This course is an introduction to SAS, including SAS language and such topics as processing data into SAS data sets, manipulating data, SAS procedures for analyzing data, and SAS procedures for rearranging, displaying and summarizing data.

Intermediate Otis Pratt, M.S.

Section 100: Mondays, June 19-July 24, 7:30 p.m. 5 sessions, 1 CEU.

University Computing Center 123. $75.

CCA 236

**Introduction to SAS — Statistical Analysis System**

Knowledge of SAS can be a very valuable business or research tool. This course is an introduction to SAS, including SAS language and such topics as processing data into SAS data sets, manipulating data, SAS procedures for analyzing data, and SAS procedures for rearranging, displaying and summarizing data.

Intermediate Otis Pratt, M.S.

Section 100: Mondays, June 19-July 24, 7:30 p.m. 5 sessions, 1 CEU.

University Computing Center 123. $75.
CCA 376
Beginning Microsoft Word on the IBM PC
This class will teach the fundamentals of word processing through learning the very powerful word processing package, Microsoft Word. We will cover the basics of word processing such as editing and filing documents, cursor movement, deleting, simple formatting, using the help system, special effects, and printing; everything you would need to know to create a simple document or letter. Typing skills are very helpful. Bring one double-sided/double-density 5¼ inch diskette to class.

Yvonne Kristy, M.S.W.
Section 100:
Wednesdays, June 14-28, 6:30-9:30 p.m.
3 sessions, 9 CEUs.
University Computing Center 114. $90.

CCA 378
Beginning Microsoft Word on the Macintosh
Microsoft Word is the leading word processing software package for the Apple Macintosh computer. The full power of flexible, efficient word processing is brought out in this course. Skills covered include: producing practical business documents, the basics of word processing, popular Word features, editing, and text/graphic interfaces. Please bring to class a Macintosh-compatible 3.5 inch diskette. Novice
Steven A. Johnson, B.S.
Section 101:
 Mondays, June 6-27
Section 102:
Thursdays, July 13-August 3
Both Sections: 6:30-9:30 p.m.
4 sessions, 1.2 CEUs.
Fine Arts CIB33. $95.

CCA 381
Advanced Microsoft Word on the Macintosh
This class is primarily for those who have completed the Beginning Microsoft Word course, or who already have the important basic familiarity with the program. The course will cover most of the advanced features of Word, with special emphasis on time-saving skills, formatting, style sheets, producing professional-looking text, and laser printer management. Please bring to class a Macintosh-compatible 3.5 inch diskette.

Intermediate
Steven A. Johnson, B.S.
Section 100:
Thursdays, August 10 and 17,
6:30-9:30 p.m. 2 sessions.
6 CEUs. Fine Arts CIB33. $70.

CCA 380
Beginning WordPerfect Word Processing
This introductory class is designed for the beginner to learn to use the WordPerfect software as a word processor to prepare simple documents. No previous word processing experience is required for this course as some generic word processing techniques will be discussed, but previous DOS experience and adequate typing skills are recommended. Each student will create and save files, retrieve and make changes, reset margins and tabs, copy and cut blocks, check spelling, use the thesaurus and print documents. Please bring a 5¼ inch formatted floppy diskette to class so that you may keep your example work. Text available is Learning WordPerfect 5.0 by Annette J. Thomason, available at the University Book Center.

Novice
Section 101:
Peggy Purvis
Tuesdays, June 13-27, 6:30-9:30 p.m.
University Computing Center 114.
3 sessions.
Section 102:
Peggy Purvis
Saturdays, July 1 and 8, 9:30 a.m.-3 p.m.
University Computing Center 142.
2 sessions.
Section 103:
Peggy Purvis
Tuesdays, July 11-25, 6:30-9:30 p.m.
University Computing Center 114.
3 sessions.
Section 104:
Peggy Purvis
Wednesdays, August 9-23, 6:30-9:30 p.m.
University Computing Center 114.
3 sessions.
All Sections: 9 CEUs. $90.

CCA 382
Intermediate WordPerfect
This class is intended for those who have a beginning knowledge of WordPerfect or have completed the Beginning WordPerfect course and want to investigate the more complicated features. During this session we will cover each option of the formatting menus (headers, footers, page layouts, page numbers and print styles), the Font key, the printer control screen, typing in columns, search and replace, automatic outlining and paragraph numbering, file management, setting defaults and colors, letter merge, drawing lines, typing equations and using dual documents. Please bring a 5¼ inch formatted floppy diskette to class so that you may keep your example work.

Intermediate
Peggy Purvis
Section 101:
Tuesdays, August 14-15, 6:30-9:30 p.m. 3 sessions.
Section 102:
Saturdays, August 5 and 12, 9:30 a.m.-3 p.m. 2 sessions.
University Computing Center 114. $90.
Computer Applications - con't.

CCA 384
Advanced WordPerfect
This is designed for the experienced WordPerfect user or for those who have completed the Beginning and Intermediate WordPerfect courses who are interested in the following advanced topics: automating repetitious tasks with macros, sorting and selecting like a database, footnotes, tables of contents and indexes, fonts and graphics, and style sheets. Example documents will be provided but please bring a 5½ inch formatted floppy diskette to class if you choose to keep your class work.

Intermediate

Peggy Purvis.
Section 100: Saturday, August 19, 9 a.m.-4 p.m.
One all-day session, .7 CEUs.
University Computing Center 114. $70.

Computer Aided Design

CAD 311
Beginning Computer Aided Design
Once associated with extensive programming knowledge and large, expensive computer systems, Computer Aided Design (CAD) is now an affordable tool for anyone interested in drafting and design. This intensive, two-session course covers the basics of systems start-up and a review of potential microcomputer-based applications. Topics include:

Overview of CAD Applications in Engineering, Design, Drafting, and Architecture
Overview of AutoCAD Software
Highlights of Upcoming CAD Level I and II courses
The Impact and Future of CAD
Hardware and Peripherals
Managing CAD system issues
A technical background is not required, but some familiarity with microcomputers is helpful. This course is highly recommended for those who have no CAD background, but maintain a desire to learn more about this rapidly expanding field.

Who Should Attend: Especially helpful for those who wish to enroll in, or learn more about, upcoming courses in computer graphics or Computer Aided Design. Also for those who interface with CAD personnel, and need basic information, and have no CAD background.

Novice

Section 301:
David Claflin, M.Arch.
Tuesdays, June 6 and 13.
Section 102:
Sharon Blender, M.S.
Wednesdays, June 7 and 14.
Both Sections: 6:30-9:30 p.m.
2 sessions, .6 CEUs.
University Computing Center 142. $60.

Who Should Attend: Anyone involved, or who plans to be involved, in technical drawing or drafting. Especially helpful for architects, engineers, or designers who plan on upgrading their work, or need the skills of computerizing drawing/text manipulation. Also for those who want to get involved in the dynamic CAD field. There is virtually no limit to the kinds of drawing applications you can prepare using the skills covered in this course.

Novice

Section 101:
Dan Myers, M.S.
Thursdays, June 8-July 13,
6:30-9:30 p.m. 6 sessions.
Section 102:
David Claflin, M.Arch.
June 20-August 1, 6:30-9:30 p.m.
6 sessions.
Section 103:
Sharon Blender M.S.
Wednesdays, June 21-July 26,
6:30-9:30 p.m. 6 sessions.
Section 104:
Philip M. Kreiker, M.S.E.E.
Wednesday-Thursday-Friday, June 21, 22, 23, 9 a.m.-4 p.m.
Three all-day sessions.
All Sections: 1.8 CEUs.
University Computing Center 142. $225.

Software Applications - con’t.

CAD 322
Computer Aided Design: Level I
Using AutoCAD software and the IBM Personal Computer AT, this intensive beginning course will cover the capabilities of microcomputer-based Computer Aided Design (CAD) in general and introduces AutoCAD in particular. Drawing set-up, creating and editing points, lines, circles, arcs, solids, traces and text, work with blocks, hatching, colors and layers will help students create, edit, and plot their individual drawings. Specific topics include:

Loading AutoCAD
disk management
file naming conventions
main menu options
Drawing Editors
x, y, z coordinate system, continuously updated
root menus, flip screens, and help functions
New Drawing Set-Up
special commands of LIMITS, GRID, AXIS, and SCALING
Text Specifications and Editing Commands
fonts and text style specifications
GROWTH, OVERPROPORTION,
MIRROR Command
dynamic dragging
FILLETs, and curve contours
Display Commands
ZOOM, PAN, FILL, REGENAUTO, SNAP, BLOCK, ARRAY Commands
Producing Hardcopy
scale the annotation, not the drawing
preparing the plotter
pen number and speed assignments
changing specifications
Laying out
creating new, and changing specified, layers
specifying layer colors
specifying line types and new<br>LINETYPES: LTSCALE
utility commands
Putting it all together
Required text is Applying AutoCAD, by Terry T. Wohlers, available at the University Book Center, UMC 10.

Who Should Attend: Anyone involved, or who plans to be involved, in technical drawing or drafting. Especially helpful for architects, engineers, or designers who plan on upgrading their work, or need the skills of computerizing drawing/text manipulation. Also for those who want to get involved in the dynamic CAD field. There is virtually no limit to the kinds of drawing applications you can prepare using the skills covered in this course.

Novice

Section 101:
David Claflin, M.Arch.
Tuesdays, June 6 and 13.
Section 102:
Sharon Blender, M.S.
Wednesdays, June 7 and 14.
Both Sections: 6:30-9:30 p.m.
2 sessions, .6 CEUs.
University Computing Center 142. $60.

Who Should Attend: Anyone involved, or who plans to be involved, in technical drawing or drafting. Especially helpful for architects, engineers, or designers who plan on upgrading their work, or need the skills of computerizing drawing/text manipulation. Also for those who want to get involved in the dynamic CAD field. There is virtually no limit to the kinds of drawing applications you can prepare using the skills covered in this course.

Novice

Section 101:
Dan Myers, M.S.
Thursdays, June 8-July 13,
6:30-9:30 p.m. 6 sessions.
Section 102:
David Claflin, M.Arch.
June 20-August 1, 6:30-9:30 p.m.
6 sessions.
Section 103:
Sharon Blender M.S.
Wednesdays, June 21-July 26,
6:30-9:30 p.m. 6 sessions.
Section 104:
Philip M. Kreiker, M.S.E.E.
Wednesday-Thursday-Friday, June 21, 22, 23, 9 a.m.-4 p.m.
Three all-day sessions.
All Sections: 1.8 CEUs.
University Computing Center 142. $225.
CAD 333
Computer Aided Design: Level II

This course is for those seeking advanced drafting capabilities and expert instruction in furthering their CAD knowledge and skills. Semiautomatic dimensioning, object snap, all dimensioning commands, isopanar snap-grids, 3-D, and free-hand sketching are all important components of this level II course. Course outline includes:

• Semiautomatic DImensioning
• linear and angular dimensions
• dimensioning variables
• Object Snap and Aperture Commands
• Calculating specific characteristics of an entity or drawing
• 3-D drawings and prototype drawings
• Highly useful, but less frequently used commands
• compatibility with other software
• Isometric Drawing Aids
• ISOPLANE command
• control E to switch planes
• STATUS Utility
• purpose and components overview
• SKETCHing
• Attributes
• ATTDEF, CHANGE, ATTEDIT, ATTTEXT
• wireframe construction and viewpoint selection
• advanced file management

Recommended prerequisites are Computer Aided Design: Level I, as previously listed or hands-on AutoCAD experience that equals the CAD: Level I course outline.

Who Should Attend: All those who want to extend their knowledge and skills in CAD beyond basic levels. Especially helpful for engineers, architects, and designers those seeking to advance computer applications in their fields. The drafting and structure skills covered in this course are also easily transferred to a wide variety of other fields.

Intermediate Section 101:
Dan Myers, M.S.
Thursdays, July 20-August 17, 6:30-9:30 p.m. 5 sessions.

Section 102:
Philip M. Kreiker, M.S.E.E.
Thursday and Friday, July 27 and 28, 8 a.m.-4 p.m. 2 all-day sessions.

Section 103:
Sharon Blender, M.S.
Wednesday, August 2-30, 6:30-9:30 p.m. 5 sessions.

All Sections: 1.5 CEUs.
University Computing Center 142. $185.

CAD 345
Computer Aided Design: Level III Customizing AutoCAD

This course is for professionals who are customizing a microcomputer-based CAD system to quickly accomplish routine tasks and easily make prescribed drafting modifications, specifically based on AutoCAD systems. In this class the keyboard is used mostly for editing text, while peripherals are used extensively. Generating slide shows and presentation-quality handcopy are further aspects of this course. Emphasis is on tailoring your system, or a proposed system, for individualized applications. Course outline includes:

• Custom Libraries and Menus
• creating sets of shapes, symbols, and/or drawings, text
• MENU command
• Creating and Modifying Text Fonts
• compiling shape/font styles
• macros and custom menus
• Adding Commands to AutoCAD
• AutoLISP interface for Artificial Intelligence functions
• Creating SCRIPT files
• SCRIPT and RSCRIPT commands
• DELAY and RESUME commands
• Presentation-Quality Materials
• creative presentations and future options
• system variables

Recommended prerequisites are Computer Aided Design Level II or very extensive AutoCAD use.

Who Should Attend: Lead drafters, persons, lead engineers, those with specific or unique applications for CAD. Very helpful for nearly any advanced user seeking to get the greatest benefit from their AutoCAD based system.

Specialized
Philip M. Kreiker, M.S.E.E.

Section 100:
Thursday and Friday, August 24 and 25, 8 a.m.-4 p.m. Two all-day sessions, 1.5 CEUs.

University Computing Center 142. $195.

CAD 320
AutoCAD Upgrades

AutoCAD upgrades advance so quickly, users are often working without the latest version. This course will expose experienced users of AutoCAD to the new functionality of Release 10. All the new commands, and enhancements of old commands, will be covered. The first day of this two-day course emphasizes 2-D applications; the second day focuses on 3-D applications.

Topics include:

Day 1
• linetype load
• binary DXF file
• viewports
• redrawall/regen
• CTI prop
• new dimensioning variables
• Pedit

Day 2
• UCS/DUCS
• UCS Icon
• Invisible 3-D face edges
• Plan View and UCS
• Oview, 3-D lines
• 3-D Poly, 3-D Mesh, Rule Surf, Tab Surf, Rev Surf, and Edge Surf commands for creating polygon meshes
• Plot Extensizns

Intermediate
Philip M. Kreiker, M.S.E.E.

Section 100:
Monday and Tuesday, June 12 and 13, 9 a.m.-4 p.m. Two all-day sessions, 1.3 CEUs.

University Computing Center 142. $150.
Computer Graphics Art

CCG 351
Computer Graphics Art I
This course is designed to prepare for the drawing board of the future, the computer. Computer Graphics Art I is for anyone involved in graphic art or design who wants to develop a hands-on, practical understanding of computer graphics. A comprehensive overview of the latest technical advances in the field of computer graphics will be coupled with in-class computer applications, emphasizing the use of the computer as a creative tool. Topics include:

• True 3-Dimensional object rotation
• Creative use of Paint, Airbrush, and drawing tools
• Effective use of font manipulation
• Instant layout capabilities
• Collage, combine, rotate, reposition, and distort pictures

In-class projects include using the computer to design projects for portfolio development and we’ll see some great slides and videos of outstanding new computer art. This course is recommended for those desiring computer graphic professional advancement, those involved in graphic presentations or design, eager to develop new skills, or explore microcomputer-based graphic capabilities. The course also counts as an elective credit for the Certificate in Commercial Design. Please bring one double-sided/double-density 5 ¼ inch diskette to the first class, available at all computer stores.

Pat Lehman, M.F.A.
Section 101: Monday, June 12-July 17, 6:30-9:30 p.m. 5 sessions.
Section 102: Saturdays, July 15 and 22, 9 a.m.-5 p.m. Two all-day sessions.
Both Sections: 1.5 CEUs
University Computing Center 142. $125.

CCG 361
Computer Graphics Art: Level II
For those familiar with computer functions based on Computer Graphics Art I, this course advances to expanded professional graphics applications skills. Hands-on-time will be spent solving design problems of the computer artist. The course is primarily directed to the artist or designer seeking to include computer graphics into their career, but is helpful for anyone wishing to develop expertise in this dynamic field. Graphic artists, designers, art directors, illustrators and anyone else involved in the visual communication media will benefit. Topics to be covered include:

• Object design and change in 3-D
• Making your own fill pattern
• Combining picture files
• Using grid as a tool
• Advanced illustration techniques
• Storyboard and layout techniques
• Production steps from start to finish

Hardcopy options are covered extensively. Slides and videos presenting video-paint systems used in TV production will be seen and animation and TV production skills will be covered, as well as interview preparation oriented toward successful interactions with prospective clients or employers. Course also counts as elective credit in Certificate of Commercial Design. Please bring a double-sided/double-density or high density 5 ¼ inch diskette to the first class.

Pat Lehman, M.F.A.
Section 101: Monday, July 24-August 21, 6:30-9:30 p.m. 5 sessions. 1.5 CEUs
University Computing Center 142. $135.

CCG 356
Macintosh Computer Art
The Macintosh is fun, easy to use, versatile, and capable of producing professional quality graphics as well as fine art. Discover how to use the Macintosh as a creative tool. In this hands-on course, designed for those with little or no Macintosh graphics expertise, you’ll use software programs such as SuperPaint and Adobe Illustrator, and learn how to produce inexpensive, camera-ready computer generated images. Plus you’ll explore MacVision, for image processing, usable with a video camera, VCR, or television. Topics include scanner technology and graphics, laser printing, color separations, logotypes, and more. Most work is done on the Macintosh SE, with opportunities to work on the Macintosh II. Please bring to class a Macintosh-compatible 3.5 inch diskette to class.

Pat Lehman, M.F.A.
Section 101: Mondays, July 24-August 21.
Both Sections: 6:30-9:30 p.m. 5 sessions. 1.5 CEUs
Fine Arts C1853. $125.

CCG 357
Advanced Macintosh Computer Art
An introductory course in computer graphics for the Macintosh or a working knowledge of “Adobe Illustrator” and “SuperPaint” is a prerequisite for this course. Participants will have hands-on experience using both of these software packages as well as “Aldus Freehand.” Class members will explore advanced techniques in the production of finished laser printed artwork. You will learn to import and manipulate digitized images from diverse sources: video, flatbed scanned, and computer generated produced original images of professional quality. Each person will have their individual Macintosh SE and have access to a Mac II with color capabilities. Please bring a 3.5 inch Macintosh-compatible disk to the first class.

Barry Ratliff, M.F.A.
Section 101: Mondays, July 24-August 21, 6:30-9:30 p.m. 5 sessions. 1.5 CEUs
University Computing Center 142. $135.

Section 102: Fridays, August 19 and 26, 9 a.m.-4 p.m. Two all-day sessions. 1.5 CEUs
Fine Arts C1853. $125.
Desktop Publishing

CCG 371
Introduction to Aldus PageMaker on the Macintosh
If you are involved, or interested in, the areas of communication, graphic design, advertising, printing, publications, documentation, or writing of any kind, then desktop publishing will have an effect on your future. Now is the time to start developing your skills with PageMaker. Easy enough for the novice, yet comprehensive enough for the skilled designer, PageMaker streamlines design, layout, and production of any material, while putting the standard Macintosh interface to excellent utility. Hands-on time will be spent:

- getting to know PageMaker
- using the electronic drawing board
- creating formats and master pages
- placing text and graphics
- editing your documents
- creating your own masterpiece

Laser printing of finished products done in class. Please bring to class a Macintosh-compatible 3.5 inch diskette. Novice

Section 101: Vik Mann, B.A.
Thursdays, June 8 and July 6, 6:30-9:30 p.m.
5 sessions.
Section 102: Juliana Packer, B.F.A.
Saturdays, June 17 and 24, 9 a.m.-5 p.m.
2 all-day sessions.
Both Sections: 1.5 CEUs.
Fine Arts C1B53. $135.

CCG 372
Advanced Desktop Publishing on the Macintosh
Take yourself beyond the basics with advanced desktop publishing. This course will help you develop and refine your desktop skills. If you are involved in desktop publishing and have the basics of Aldus PageMaker behind you, then this is the class to take.

Topics include:
- formats for importing line art
- scanned photos and graphics
- time-saving touches
- PC file conversion
- graphics software review
- advanced graphic design concepts
- high-quality text output

Output of finished projects done in class. Please bring to class a Macintosh-compatible 3.5 inch diskette. Intermediate

Juliana Packer, B.F.A.
Section 100:
Saturdays, July 8 and 15, 9 a.m.-5 p.m.
2 all-day sessions, 1.5 CEUs.
Fine Arts C1B53. $120.

CCG 373
Quark XPress Desktop Publishing
Quark’s XPress is a highly capable, technically advanced, professional-level software system that combines the convenience of desktop publishing with the precision and accuracy of fine typesetting, all on the Apple Macintosh computer. XPress appears complex because of its advanced features, but can be learned very effectively in this two-day course. Focus is on learning to use the program productively, employing desktop publishing convenience with special XPress features. Also covered are the basics of PostScript, graphics, creative text handling, and advanced features. Course teaches a good working knowledge of how XPress compares to and interacts with other products like Adobe Illustrator, MacPaint, Aldus Freehand and PageMaker. Novice

Tim Meehan
Section 100:
Saturdays, July 29 and August 5.
9 a.m.-4:30 p.m.
2 sessions, 1.3 CEUs.
Fine Arts C1B53. $135.

CCG 377
Introduction to Desktop Publishing for the IBM PC
Desktop Publishing has dramatically improved the quality of inexpensive, publishable material. This intensive workshop gives the basics of page layouts, creative formats, and type and style. All work is done on a computer screen, for instant and dramatic results. Whether you publish a club newsletter, a restaurant menu, or a critical financial statement, this course can be of great value. Topics include justifying text for style, building art into the page construction, and scanner technology in graphics and text. This hands-on course employs PageMaker software extensively, with interactive demonstrations of other software, like Ventura Publisher. Laser printing of finished projects done in class. Bring a 3¼-inch double-sided/double-density or high-density diskette to class. Novice

Bruce Frehner, M.A.
Section 101:
Saturdays, June 17 and 24.
9 a.m.-4:30 p.m.
2 all-day sessions, 1.4 CEUs.
University Computing Center 114. $135.

CCG 386
Advanced Desktop Publishing for the IBM PC
Develop your skills and potential in printed media communications in this advanced seminar/workshop, designed for those with the basics behind them and remarkable publications ahead. Emphasis is on time-saving techniques and typography that enhance your message. Topics include useful illustration/text merging, font design for total impact, personal and “off-the-shelf” clip art libraries, maintaining high standards of technical quality, a product overview from software to high-quality printers, using scanner technology in graphics and text for creative impact, and the over-all polished look of your work. Bring a 3¼-inch double-sided/double-density or high-density diskette to class. Intermediate

Bruce Frehner, M.A.
Section 100:
Saturdays, August 5 and 12,
9 a.m.-4:30 p.m.
2 all-day sessions, 1.4 CEUs.
University Computing Center 114. $135.

Computer Applications
Enliven Your Creativity
Commercial Design

Are you interested in the growing field of commercial design? Are you already involved in some aspect of illustration, art or publishing, and are you ready to expand your expertise? Whether you are a new or continuing student in the field, this series of weekend workshops leading to a Certificate in Commercial Design may be what you need for your professional development.

The Certificate in Commercial Design is a sequential program of short-intensive courses presented in a compact format of workshops to accommodate the busy schedule that professionals share, and the needs of those interested in entering the field. Courses cover both the basics and the advanced developments in commercial art today. Careers in book design, advertising, cartooning, broadcasting, and a wide number of other areas will be explored during the program. Many of the courses pay particular attention to entry-level job opportunities, the construction and maintenance of professional portfolios, and the basics of job-hunting and preparing for interviews. Instructors are all “state-of-the-art,” active professionals in touch with the latest changes in the commercial design field.

The Certificate requirements are threefold:

1. Successful completion of the four required courses:
   - The Commercial Artist: Design, Layout and Paste-up
   - Commercial Art II
   - Professional Illustration Techniques
   - The Artist Goes to Market

2. Successful completion of four elective courses. These optional courses consist of several that are offered on a regular basis and many others that are periodically introduced to accommodate updates and changing trends in commercial design.

3. Successful completion and professional review of your own fully developed portfolio, scheduled by appointment.

You need not formally apply for any program nor must you be seeking a certificate to enroll. Conversely, you need not stop participation in the courses once you have achieved certification. Many people take only a few courses to update certain skills and many others take several courses beyond requirements to advance their professional skills.

Continuing Education Units and performance certificates are awarded for each class. A Continuing Education Unit is the national standard for colleges and universities to record 10 hours of university-level noncredit course participation. CEUs are awarded for completion of each course generating a permanent record for you. A transcript copy is available upon request, without fee.

The course of study is scheduled so that participants may complete all requirements within three semesters. The four required courses are offered at least once a year, as well as several elective courses.

Course tuitions are listed at the end of each course description. Tuition varies depending on materials used, length of time, and other course-related expenses. Please remember that in all certificate courses there are no refunds once the course has started; full refunds are granted if requested before that time. Course enrollments are limited and advance registration is required. Please note that refunds are given only before the course starts, none later.

Bring to class a pencil, ruler, fineline pen, exacto knife, note paper, tracing paper, and bristol board (15” x 20” approx.). All other materials and a workbook are provided. While portfolios need not be brought to class, it is of great benefit if, during the course attendees have some access to their portfolios or work examples.
Commercial Design Courses by Starting Date, Summer 1989

<table>
<thead>
<tr>
<th>Date</th>
<th>Number</th>
<th>Section</th>
<th>Course</th>
</tr>
</thead>
<tbody>
<tr>
<td>Saturday, June 24</td>
<td>CCD 285</td>
<td>100</td>
<td>The Mental Picture: Professional Cartooning... Eric Teitelbaum</td>
</tr>
<tr>
<td>Monday, June 26</td>
<td>CCD 240</td>
<td>100</td>
<td>Felt Tip Marker Rendering Techniques... Eric Teitelbaum</td>
</tr>
<tr>
<td>Saturday, July 8</td>
<td>CCD 210</td>
<td>100</td>
<td>Commercial Artist I... Roy Walden</td>
</tr>
<tr>
<td>Monday, July 10</td>
<td>CCD 310</td>
<td>100</td>
<td>Commercial Artist II... Roy Walden</td>
</tr>
<tr>
<td>Saturday, July 15</td>
<td>CCD 350</td>
<td>100</td>
<td>Air Brush Illustration Techniques... Van Valencia</td>
</tr>
<tr>
<td>Saturday, August 12</td>
<td>CCD 220</td>
<td>100</td>
<td>Professional Hand Lettering and Calligraphy... Jill O'Hara</td>
</tr>
</tbody>
</table>

* = required certificate courses

### Commercial Design

#### Commercial Art

**CCD 240**
**Felt-Tip Marker Rendering Techniques**

Before a concept can be commissioned by the client, an art director or media buyer it must be effectively communicated by the artist in "final rough" stages. This all-important phase of graphic communication and presentation calls for versatility in felt marker rendering techniques. This in-depth two day workshop program will cover the how-to's of using the felt marker in a variety of visual applications including mock-ups for brochure design, advertising layouts for the small business client, poster and album cover design, book illustration and film/TV.

Topics include:
- understanding the importance of felt marker comp techniques as they relate to professional commercial design,
- appropriate materials in completing a variety of b&w assignments,
- knowledge of b&w application to effectively solve felt marker problems in color.
- both editorial and advertising finished assignments to given high-level graphic problems.

Workshop and drawing activities will include selecting and evaluating materials, gradation of tone, mass and illusion, negative space, mixing color and mixing mediums.

Eric Teitelbaum
Section 100:
Monday and Tuesday, June 26 and 27, 9 a.m.-5 p.m. 2 all-day sessions. 1.4 CEUs. Geology 114. $85.

CCD 210
**The Commercial Artist I: Design, Layout, Paste-up**

This course introduces important commercial art techniques to the beginner, stressing the "how-to's" of entering the commercial art/graphic design profession. It covers rough compositions, layout, type selection, camera-ready art production, obtaining the best materials for your best work, and basic illustration processes used by the artist in advertising agencies, book, magazine, and newspaper publishing departments, and in graphic design firms. Emphasis is placed on developing finished commercial art work, portfolio presentation, and client interviews.

Roy Walden
Section 100:
Saturday and Sunday, July 8 and 9, 9 a.m.-5 p.m. Two all-day sessions. 1.4 CEUs. Geology 114. $115.

CCD 310
**Commercial Art II**

This course builds advanced skills in layout, design, paste-up, logo development, and corporate identity. Intensive workshop activities will focus on developing entire professional-level identity packages, including corporate collateral pieces. Discussions also cover understanding current printing processes and details for making valuable camera-ready art. It is recommended that Commercial Artist I be completed before enrollment in this course, or that students demonstrate more advanced commercial art skills.

Roy Walden
Section 100:
Monday, Tuesday, Wednesday, July 30-August 1, 9 a.m.-5 p.m. 2 all-day sessions. 3 sessions, 1.4 CEUs. Geology 114. $115.

#### Calligraphy

**CCD 220**
**Professional Hand Lettering and Calligraphy**

Hand lettering/calligraphy is an important tool for the commercial artist advancing in the marketplace — cards, invitations, logos, trademark, and creative lettering assignments for corporate and editorial needs. This program includes commercial lettering principles — proportion, letter and word spacing, divisions of calligraphy style — editorial and advertising signage, point of purchase display, and sign painting. Also included is developing typography design for logos and trademarks relevant to the marketplace. Program includes workshop activities, lecture, and demonstration.

Jill Thayer O'Hara
Section 100:
Saturday and Sunday, August 12 and 13, 9 a.m.-5 p.m. 2 all-day sessions. 1.4 CEUs. Geology 114. $115.

#### Illustration

**CCD 90**
**Air Brush Illustration Techniques**

Air brush is one of the most widely used and popular illustration media in commercial art today, especially in editorial and advertising formats. This intensive two-day program will treat the subject of air brush in its entirety, exploring the intricacies of color, texture, decoration, frisket papers, acrylic dyes, inks, mixed media, prisma, and an array of appropriate paper surfaces — hot/cold press, bristol boards, etc. Other current-day techniques will be covered.

Van Valencia
Section 100:
Saturday and Sunday, July 29 and 30, 9 a.m.-5 p.m. Two all-day sessions, 1.4 CEUs. Geology 114. $115.

**CCD 285**
**The Mental Picture: Professional Cartooning**

Cartoon illustration skills can be a strong addition to any commercial artist’s portfolio. This introductory course features a professional cartoonist sharing his skills and experience in the field. Topics include techniques, procedures, tools, and materials and their application to illustrating the verbal caption in magazine, book, and advertising illustration.

Eric Teitelbaum
Section 100:
Saturday and Sunday, June 24 and 25, 9 a.m.-5 p.m. Two all-day sessions, 1.4 CEUs. Geology 114. $115.

### Special Fun Summer Course For Young People...

**CCD 100**
**Cartooning for Teens: An Art Workshop for Young People**

Cartooning and humorous illustration have long held a wide fascination for children everywhere. This three-day workshop program will explore the world of cartooning and provide students with an in-depth experience in the techniques for creating a wide range of cartoon animals, people, and caricatures. Drawing activities will center on art, posters, comic book cartoons and other special applications. Art lessons will be integrated with special music/dancing activities creating a fun-filled, three-day learning experience. Tuition includes drawing materials.

Eric Teitelbaum
Section 100:
Monday, Tuesday, Wednesday, July 26-28, 9 a.m.-12:30 p.m. 3 sessions. Geology 114. $50.
Branch Out in New Directions
Noncredit Courses

What a wonderful way to fill your leisure time. Learning for learning's sake. A large variety of topics are introduced by instructors who really enjoy sharing their special interests.

Our non-credit courses meet evenings and weekends to accommodate your working schedule. If your reason behind taking a class is to learn a language like French, Italian, Japanese or Spanish we have the program for you. Perhaps you would like to learn to draw or watercolor, ballroom dance or jitterbug, or even take an astronomy course. Are you thinking of starting your own business? We offer a multitude of business courses where you can acquire the latest information.

By researching the Boulder adult community, we feel we offer you the highest quality courses in areas of professional and personal interest. Most classes have limited enrollment — early registration assures your place in class. We carefully choose courses to meet the interests expressed by most adults. Since we've been doing this for 75 years, we feel we have a good thing going.

Cost varies from class to class. Tuition is listed at the end of each course description. Full refunds are given on request before a course starts, none later.

Location: The classroom location is given at the end of each course description.

To register call 492-5148 or 1-800-332-5839.

Understanding the creative uses and symbolic meaning of gemstones provide the center of Jaqui Thier Cooper's teaching and her work as a designer.
## Noncredit Courses

by Starting Date, Summer 1989

<table>
<thead>
<tr>
<th>Date</th>
<th>Number</th>
<th>Section</th>
<th>Course</th>
<th>Faculty</th>
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<tbody>
<tr>
<td>Monday, June 5</td>
<td>NCFA 024</td>
<td>100</td>
<td>Introduction to Ceramics</td>
<td>David Wright</td>
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<tr>
<td></td>
<td>NCFL 101</td>
<td>100</td>
<td>Beginning German</td>
<td>Ed Maier-Heym</td>
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<td>NCFL 202</td>
<td>100</td>
<td>Intermediate Conversational Spanish</td>
<td>Elizabeth Medina</td>
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<td></td>
<td>NCFA 001</td>
<td>100</td>
<td>Basic Photography</td>
<td>Lynn Lickstag</td>
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<tr>
<td>Tuesday, June 6</td>
<td>NCFA 020</td>
<td>100</td>
<td>Introduction to Drawing</td>
<td>Rachael Amos</td>
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<td>NC D 100</td>
<td>100</td>
<td>Beginning Ballroom Dancing</td>
<td>Carl &amp; Suzanne</td>
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<td>NCFL 103</td>
<td>100</td>
<td>Beginning Conversational Spanish</td>
<td>Elizabeth Medina</td>
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<td></td>
<td>NC B 008</td>
<td>100</td>
<td>Accounting for Non-Accountants</td>
<td>Fred Moore</td>
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<td></td>
<td>NC L 023</td>
<td>100</td>
<td>Sport Nutrition</td>
<td>Peggy Phillips</td>
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<td>NC D 103</td>
<td>100</td>
<td>Beginning Jitterbug Dancing</td>
<td>Carl &amp; Suzanne</td>
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<td>Wednesday, June 7</td>
<td>NCFL 201</td>
<td>100</td>
<td>Intermediate German</td>
<td>Daphne Guericke</td>
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<td></td>
<td>NC D 101</td>
<td>100</td>
<td>Beginning Western Dancing</td>
<td>Carl &amp; Suzanne</td>
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<td></td>
<td>NC W 002</td>
<td>100</td>
<td>Journal Keeping</td>
<td>Barbara Steiner</td>
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<td>NC D 200</td>
<td>100</td>
<td>Intermediate Ballroom Dancing</td>
<td>Carl and Suzanne</td>
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<tr>
<td></td>
<td>NC W 001</td>
<td>100</td>
<td>Creativity and Right Brain Activities for Writers</td>
<td>Barbara Steiner</td>
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<tr>
<td>Thursday, June 8</td>
<td>NCFA 021</td>
<td>100</td>
<td>Introduction to Watercolor</td>
<td>Rachael Amos</td>
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<tr>
<td></td>
<td>NCFA 023</td>
<td>100</td>
<td>Beginning Basketry</td>
<td>Margaret Craven</td>
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<tr>
<td>Saturday, June 10</td>
<td>NCFA 022</td>
<td>100</td>
<td>Landscape Painting (Plein Air Oil Painting)</td>
<td>Martha Wooley</td>
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<tr>
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<td>NC L 014</td>
<td>100</td>
<td>Psychology of Intimate Relationships</td>
<td>Neil Rosenthal</td>
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<tr>
<td>Monday, June 12</td>
<td>NCFL 100</td>
<td>100</td>
<td>Beginning Conversational French</td>
<td>Nadia Turk</td>
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<tr>
<td>Wednesday, June 14</td>
<td>NC SO 005</td>
<td>100</td>
<td>Xeriscape Landscaping: Low Water Low Maintenance Landscapes for Colorado</td>
<td>Andrew Mead</td>
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<tr>
<td>Thursday, June 15</td>
<td>NCFA 002</td>
<td>100</td>
<td>Creative Photography Workshop</td>
<td>Don Oberbeck</td>
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<tr>
<td></td>
<td>NC 1002</td>
<td>100</td>
<td>Investment Strategies</td>
<td>Mary Wright</td>
</tr>
<tr>
<td>Monday, July 10</td>
<td>NC B 007</td>
<td>100</td>
<td>Writing Business Plans</td>
<td>Donald Kaniecki</td>
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<tr>
<td>Tuesday, July 11</td>
<td>NC L 002</td>
<td>100</td>
<td>Eating As If Your Life Depended On It</td>
<td>Peggy Phillips</td>
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<tr>
<td>Thursday, July 13</td>
<td>NC 1001</td>
<td>100</td>
<td>Investing for Income</td>
<td>Arnold Hart</td>
</tr>
<tr>
<td>Saturday, July 15</td>
<td>NC W 012</td>
<td>100</td>
<td>The Children's Book: Illustrating and Getting Published</td>
<td>Sandy Fuller</td>
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<tr>
<td></td>
<td>NC L 025</td>
<td>100</td>
<td>Stock Market Profits</td>
<td>Arnold Hart</td>
</tr>
<tr>
<td>Thursday, July 20</td>
<td>NC 1004</td>
<td>100</td>
<td>Preparing for the Law School Admission Test (LSAT)</td>
<td>Kollie Einoff</td>
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<tr>
<td>Friday, July 28</td>
<td>NC T 490</td>
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## Business

**NCB 008 Accounting for Non-Accountants**

An introductory course in accounting for those who have had little or no previous training in this area. Emphasizes the recording, reporting, and analysis of accounting information from source of information and journalizing, through posting to ledgers, preparation of financial statements and the use of those statements to provide information for business decision-making. The objective is to help the student understand not only the accounting process, but the purpose and uses to which the results may be applied.

Fred Moore, M.B.E., Public Accountant. Section 100:

- Tuesdays, June 6-July 25
- 7:9 p.m. (no class July 4)
- 7 sessions. Deane Phys G116. $53.

**NCB 007 Writing Business Plans**

The course will cover how to make financial, marketing, and operational plans to give you control over your business and set you on a course for maximum profits. We will cover sales and cost projections, cash flow, marketing research and facilities management. This course is designed for people writing a formal business plan for lender/investors as well as those who just want to know where they are headed.

Donald A. Kaniecki, C.P.A., M.B.A., has worked with people starting successful businesses for over 8 years.

Section 100:

- Mondays, July 10-31
- 6:00-8:30 p.m. 4 sessions
- Business 554. $37.
Dance

NCD 100
Beginning Ballroom Dancing
An introduction to the basics of Foxtrot, tango, polka, and waltz. The instruction will include the necessary turns and animations to provide every participant confidence on the dance floor.
Carl and Suzanne Gerleit, both former instructors for Fred Astaire Studios, have been teaching professionally for the past 30 years.
Section 100:
Tuesdays, June 6-27, 6:30-7:45 p.m.

NCD 200
Intermediate Ballroom Dancing
An intermediate level class which will review the basic steps offered in the beginning course and add more eye-catching turns and moves.
Carl and Suzanne Gerleit, both former instructors for Fred Astaire Studios, have been teaching professionally for the past 10 years.
Section 100:
Wednesdays, June 7-28, 6:30-7:45 p.m.

NCD 103
Beginning Jitterbug Dancing
An introduction to the basic steps in back-beat jitterbug. The instruction will include the necessary turns and animations to provide every participant confidence on the dance floor.
Carl and Suzanne Gerleit, both former instructors for Fred Astaire Studios, have been teaching professionally for the past 10 years.
Section 100:
Tuesdays, June 6-27, 8:00-9:15 p.m.

NCD 101
Beginning Western Dancing
Introduction to the basic steps in Texas 2-Step, Traveling Country Swing, Country Waltz, and various line dances (e.g., Cotton-eyed Joe and 10 Count Shuffle). Dancing is easy and fun. Sign up with or without a partner.
Carl and Suzanne Gerleit, both former instructors for Fred Astaire Studios, have been teaching professionally for the past 10 years.
Section 100:
Wednesdays, June 7-28, 8:00-9:15 p.m.

Fine Arts

NCFA 001
Basic Photography
This introductory course is designed for those who have a camera but don't really feel that they know how to use it. Through slides, lectures and question/answer sessions, students will learn about the mechanical functions of 35mm SLR cameras. We will discuss types of lenses and films, accessories, proper exposure (including night time and firework), and good composition and portraiture techniques. No labwork is involved. There will be one field trip. After this course, you should be able to use your camera confidently and take pictures of consistently good quality. Numerous handouts; optional text is Henry Horensten's Black and White Photography.
Section 100:
Mondays, June 5-July 31, 7:9 p.m. (no class July 3).
5 sessions. Environmental Design 122. $60.

NCFA 002
Creative Photography Workshop
An exploratory course for those with some experience to learn about the amazing new films like Tiera and Ektar, filters for special effects, telephoto and wide angle lens use, electronic flash close up macro shots, professional tricks for fast, easy camera operation, and how to see photographic composition. An introduction to basic darkroom skills will include black and white print making, color enlargements from negatives and Cibachrome printing from color slides. Students will have 3 extra weeks in the darkrooms for practice, and will receive feedback on photographs produced. The course will include six 2-hour classroom periods; two 3-hour darkroom classes; and the 3 weeks darkroom time. The cost of the darkroom chemistry is included in the tuition, but students must supply their own camera, film and paper. Please bring your camera to the first class.
Don Oberbeck, professional photographer for 20 years, is owner of the Boulder Photo Center.
Section 100:
Thursdays, June 15-July 20, 7-9:30 p.m.
6 sessions at Retchum 235, 6 sessions at Boulder Photo Center to be arranged between June 22 and August 3. $95.

NCFA 006
Storytelling for Everyone
Storytelling is experiencing a revival in the U.S. This course covers different kinds of stories, local history, fiction, myths, fairy tales and folktales. Learn how to become a better storyteller, which stories are good for you, techniques for preparation and performance.
Kay Nogash, M.A. in Theatre, professional storyteller representing this five state area, she was the 1986 winner of the National Storytelling Festival in Jonesboro, Tenn.
Section 100:
Wednesdays, June 7-July 5, 5-7:30 p.m. 5 sessions.
Hale 6. $47.

NCFA 020
Introduction to Drawing
This course is for beginners with little or no drawing background. You will learn to be more creative, communicate meaning, and see more sensitively. You will also get what people want from a drawing class — to make more realistic looking images. Various media (charcoal, conte' crayon, ink and pencil) will be used. Materials list will be provided at the first class. (Estimated cost $15.)
Rachel Amos, M.F.A. University of Colorado at Boulder, has taught drawing at various colleges in Denver and Boulder.
Section 100:
Tuesdays, June 6-August 8, 7-9 p.m. (no class July 4).
9 sessions. Fine Arts C153. $60.
NCFA 021
Introduction to Watercolor
This course is for beginners with little or no background in watercolor. Watercolor is not landscape; you can be expressive or exactly realistic. Learn the nature of the medium and begin making your images with it. Materials list will be provided at the first session. (Estimated cost $25.)
Rachael Amos, M.F.A., University of Colorado at Boulder, has taught watercolor in Denver and Germany.
Section 100:
Thursdays, June 8-August 3, 6:30-9 p.m. 9 sessions.
Fine Arts C153. $60.

NCFA 022
Landscape Painting (Plein Air Oil Painting)
This course is designed for students with little or no background in oil painting. An outdoor painting course, the focus will be to teach the artists to express themselves, to interpret aspects of nature, and to see the local landscape. You can express the most interesting ways to translate the image into a fully resolved painting. Materials list will be provided at the first session. Weather permitting, classes will be held at a location decided at the first class. Marsha Wooley, B.A.; M.F.A., University of Pennsylvania, artist and instructor. Section 100:
Saturdays, June 10-July 29, 8:30-11:30 a.m. (no class July 1), 8 sessions.
Fine Arts C103. $90.

NCFA 023
Beginning Basketry
In this course, the beginner will learn different techniques for making simple but beautiful baskets out of round and flat reed. Have fun learning to make a handmade basket with a wrapped handle out of round reed, and an appalachian-style basket out of flat reed. Bring to class a dishpan or bucket,awl or ice pick, scissors or side cutters, towel, a few clothes pins (pinch type) and pencil. Tuition includes reed material.
Margaret Craven, local artist, and instructor with 20 years hard textile experience.
Section 100:
Thursdays, June 8-29, 6:30-9 p.m. 4 sessions.
Fine Arts C175. $42.

NCFA 024
Introduction to Ceramics
This course is designed to introduce students to working with functional pottery in clay. A variety of handbuilding techniques will be covered, including pinch, coil, and slab. An introduction to the wheel is also included. The class is an intensive, four-week, fun investigation in using clay. Additional studio time out of class will be made available. Clay is included in the tuition fee and a material list will be provided at first class.
David Wright, B.F.A., Instructor at University of Colorado at Boulder, Artist.
Section 100:
Mondays and Wednesdays, June 5-28, 6:30-9:30 p.m. 8 sessions.
Fine Arts CB30 (Basement). $97.

Foreign Languages

NCFL 100
Beginning Conversational French
This course is for anyone interested in learning the French language and culture. We will be studying essential verbs and vocabulary and enough grammar to comprehend and use basic French in different situations. Conversational French will be stressed. With support of other class members, you start asking questions in the first class.
Section 100:
Mondays and Wednesdays, June 12-July 19, 6:30-9:30 p.m., (no class July 3 and 5). 10 sessions.
Education 138. $75.

NCFL 102
Beginning Conversational Italian
This course is designed for students with minimal or no knowledge of Italian. It is a course for anyone interested in speaking the language and learning more about the culture. Listening, speaking, and vocabulary building will be emphasized, but also essential verb tenses and grammar will be introduced in order to use dialogues for different types of speaking situations. Games, songs, dialogues, pictures and small group activities in the classroom will make learning a more enjoyable experience. Required text is Buongiorno Italia by Cremona, available at the University Bookstore.
Luigina Cerri, M.A., has taught both Italian and French in several schools, including CU-Boulder.
Section 100:
Tuesdays and Thursdays, June 6-July 11, 7-9 p.m., (no class July 4). 10 sessions.
Hellems 211. $75.

NCFL 201
Intermediate German
For students who have taken an introductory course or who otherwise gained some background in spoken German. Emphasis is on improving conversation skills, but reading and writing will also be part of the course. Course features a variety of methods to stimulate and facilitate learning, and to enjoy the language in the process. Test for the course will be available at the first class session.
Daphne Guericide, M.A., German, Instructor at CU-Boulder.
Section 100:
Tuesdays and Thursdays, June 6-July 11, 7-9 p.m., (no class July 4). 10 sessions.
Education 136. $75.
Foreign Languages - Con’t.

NCFL 103
Beginning Conversational Spanish
Spanish for travelers. Basic but lively conversational Spanish for travel to Spanish-speaking countries. Course includes short field trips during class time to emphasize practical vocabulary. Elizabeth Medina, Ph.D., Advisor. Regis College.
Section 100: Tuesdays and Thursdays, June 6-29, 7:30-9 p.m. 8 sessions, Education 134. $60.

NCFL 202
Intermediate Conversational Spanish
Designed to increase vocabulary and conversational ability for travelers. Cultural and social aspects will be introduced. Prerequisite, beginning Spanish or equivalent. Elizabeth Medina, Ph.D., Advisor. Regis College.
Section 100: Mondays and Wednesdays, June 5-28, 7:30-9 p.m. 8 sessions, Education 134. $60.

Investments

NC 1001
Investing for Income
This seminar covers guarantees, safety, risk, and tax implications, CDs, money market funds, banks, savings and loans, U.S. Government securities, zero coupon bonds, municipal bonds, income-producing limited partnerships, high income stocks, Blue chip stocks, utility stocks, mutual funds, corporate bonds, GNMA, annuities, and single premium whole life policies. Arnold Hart, B.A. Cornell, M.A. Syracuse and Sr. Vice President of Investments at Prudential-Bache.
Section 100: Thursdays, July 13, 6:30-8:30 p.m. 1 session. Duane Physics G131. $15.

NC 1002
Investment Strategies
Learn how to select and manage investments to suit your own objectives. Topics include: money growth, safety, liquidity, diversification, interest and dividends, guarantees, minimizing taxes, professional management, money market funds, CDs, zero coupon bonds, GNMA, corporate and municipal bonds, unit trusts, tax-free investments, stocks, utilities, limited partnerships, mutual funds, options, precious metals, commodities.
Mary Wright, B.A. University of Colorado, Account Executive at Prudential-Bache.
Section 100: Thursdays, June 15-July 6, 6:30-9 p.m. 4 sessions. Duane Physics G131. $38.

NC 1004
Stock Market Profits
This course covers insights, tools, and strategies for success in the stock market: how to be a consistent winner; how to be in phase with the market; how and when to sell; how to handle psychological pressures and emotion; how to do effective fundamental analysis; how to apply technical analysis and charting; how to develop an overview that leads to profit.
Arnold Hart, B.A. Cornell, M.A. Syracuse and Sr. Vice President of Investments at Prudential-Bache.
Section 100: Tuesdays, July 11-25, 7-9:30 p.m. 3 sessions. Education 134. $28.

NC 1025
Handwriting Analysis: An Introduction
You are what you write. Handwriting reflects your real personality — how you approach life’s events, how you set goals and pursue their achievement, how you problem solve, your fears and how you cope with them. Explore the uses of handwriting analysis in today’s world. Learn the introductory principles of scientific handwriting analysis as you make application to your own writing. Understand how you can utilize this new information in your business, in your job, in your family and with friends. Carol Ford, B.S. nursing, certified Graphoanalyst, has private practice in handwriting analysis and document examination.
Section 100: Saturdays, July 15, 9 a.m.-5 p.m. 1 session. Geology 134. $30.
Sports Nutrition

Physical performance depends on the proper mix of fuels — carbohydrates, proteins and fats, adequate fluid intake and optimal vitamin and mineral replacement. Come learn how to fine-tune your body.

Section 100: Tuesdays, June 6-13, 6:30-9:30 p.m. 2 sessions. Education 138. $24.

Psychology of Intimate Relationships

Why intimate relationships are so hard to find and maintain; how and why people keep choosing similar partners and repeat similar patterns in their relationships; the stages of intimacy; the function of power struggles, arguments, conflicts and affairs; how your childhood influences your intimate adult relationships; reflections on love and loving; falling out of love; how expectations affect our relationships; how to evaluate a potential partner; and how to stay healthy and filled in a relationship.
Neil Rosenthal, Psychotherapist/ Marriage Therapist.
Section 100: Wednesday, June 14, 6:30-9:30 p.m. 1 session. Geology 134. $12.

Preparing for the Law School Admission Test (LSAT)

For persons planning to take the Law School Admission Test (LSAT), this course offers diagnostic exam, intensive review, preparation, and sample testing in all areas of the new LSAT format, including application of issues and facts, reading comprehension, writing sample, logical reasoning, analytical reasoning. Emphasis is on taking verisimilar exams with full explanations and interpretations. The course fee includes extensive materials covering all aspects of the exam.
Kollie Elinoff
Section 100: Friday, July 28, 6-10 p.m., Saturday and Sunday, July 29-30, 9 a.m.-5 p.m. 3 sessions. Guggenheim 205. $145.

Creating and Right Brain Activities for Writers

Creativity lagging? Learn how to tap into your right brain for increased productivity, innovative ideas, direction, and techniques to help you become a more successful writer. You can develop insight into writing problems, nurture ideas, eliminate writer’s block. Your writing can become more effective, more enjoyable.
Barbara Steiner, Professional Writer.
Section 100: Wednesdays, June 7-July 19, 6:30-8 p.m. 7 sessions. Hellems 81. $39.

Xeriscape Landscaping: Low Water, Low Maintenance Landscapes for Colorado

Xeriscape landscaping deals with choosing the right plants for the right places in your yard. Careful plant selection and good planting techniques can lead to a lush beautiful home with low water needs. Plant lists and handouts will be provided.
Andrew Mead, B.S. University of Colorado at Boulder. Landscape manager and designer at Fruehauf’s Nursery.
Section 100: Wednesday, June 14, 6:30-9:30 p.m. 1 session. Geology 134. $12.
Experience the Best from Around the Country: Video Teleconferencing

State-Of-The-Art Information

Video teleconferencing is the newest, most economical way for professionals to stay current in fields and activities where the pace of change outruns any individual's ability to keep up. CU-Boulder teleconferencing is "live" — national teams of presenters and panels are put together representing the cutting edge of a field. These "how to" specialists can speak to the future authoritatively. They have practical, here-and-now answers to the questions that Colorado professionals and their counterparts across the country can ask satellite presenters directly throughout the teleconference day.

Diverse Topics

Live teleconferences cover a global range of topics, current among professionals, including: business management, marketing, global trade, small business skills, new industrial and information technologies, government policies and requirements, advances in engineering, personnel supervision, productivity, the health care industry, physical fitness, new directions in teaching and student affairs, and professional development skills.

Training & Development

A typical video teleconference starts with an on-site team of experts who set the stage for the topic. Live-via-satellite presentations are reinforced by detailed agendas, workbooks, tests, and worksheets in a take-home packet. Throughout the day there are live question/answer sessions interspersed with presentations and demonstrations. The on-site team wraps up the day with a local and regional perspective on the subject — and answers remaining questions.

Colorado professionals rate teleconferencing to be as good or better than traditional conferencing, pointing to the convenience and quality of teleconferences and to the currency and credibility of information via satellite. Teleconferencing puts a premium on real-world expertise that is replicable in many settings.

Save Time and Money

Teleconference fees are all-inclusive, covering materials, parking, and catered meals. Instead of the time and cost of traveling hundreds of miles to hear the experts, the same information can be obtained in a day spent dialoguing — not traveling.
Video Teleconferencing

Practical Applications and Dynamic Communication

The visual medium lends itself to animated graphics, charts, fieldwork sequences, demonstrations, on-site interviews and case studies. Professional audiences can translate information into practical workplace applications on the spot. Its visual quality and "liveness" attract experts who like the dynamism of networking live with audiences around the country.

Everyone Has a Front Row Seat

Ideas are demonstrated in a visual laboratory in which everyone has a front row seat. The dynamic intensity of live national teleconferencing sets it apart from traditional face-to-face meetings in its scale, the power of the medium to focus attention, the efficient use of time, and its convenience.

State-Of-The-Art Equipment

Staff of the Division of Continuing Education and of the Events/Conference Center at The University of Colorado at Boulder have developed and equipped a customized facility acknowledged to be one of the most outstanding of its kind. The flexibility of six ample meeting rooms and an 11,000-seat arena allows diverse audiences to be accommodated simultaneously. Located on the campus near the corner of Colorado Avenue at Regent, one block west of 28th Street, the facility offers easy access and ample parking.

The large-screen General Electric Talaria projection system is capable of receiving programming from virtually all of the present generation of business-oriented and educational satellites. In addition, a portable antenna that can receive presentations via the newer Ku-band can travel to workplace sites.

Professionally Staffed

Through its charter membership in the 270-campus National University Teleconference Network founded in 1982, the Division of Continuing Education receives continuous announcements of teleconference opportunities. The Division has published nationally in the teleconference field and has conducted training and consulting projects with agencies on planning and managing their own teleconferencing, using campus or other facilities. Cooperative presentation of teleconferences is frequent, enabling businesses, organizations, and associations to use their training and development resources more effectively.

Place & Time, Parking, Fees

Most teleconferences are presented during daytime hours at the Events/Conference Center on the Boulder campus. There is ample parking. The fees for teleconferences vary, but include materials, parking, refreshments, and usually lunch. Group rates are available on a program-by-program basis.

Parking is available in Lot 436, just north of the Events Center. Parking permits and maps are sent to those who register in advance. There is easy access to the Events Center, which is situated one block off 28th Street near the corner of Colorado and Regent.

Teleconferences Scope and Volume Increasing Rapidly

The live teleconference industry is in a growth phase. We make it our number one task to keep up with what is available for professionals and to present it as part of our regular schedule, or by request from an organization or association. Why should you care? Because with their increasing availability, there is likely to be teleconferencing that can make a difference to your professional growth. This is one of today's most rapid means of obtaining new "must know" information.

Teleconferences run the gamut from wide-ranging business management subjects. Our live videoconferences in recent months have included glass safety glazing standards for building code professionals; hazardous waste management requirements; a series for law enforcement agents; customer service strategies for specialty retailers; an eight-part series for business managers; and more. All national teleconference presenters take questions from audiences such as ours, and we always arrange a local workshop in conjunction with teleconferences.

Teleconferences are often presented cooperatively. Our partners have included chambers of commerce; the Boulder County Sheriff's Department; the Colorado Chapter of the International Conference of Building Officials; the Colorado Institute for Artificial Intelligence; several campus-based departments, and a number of professional associations.

We present teleconferences from numerous national sources: the Internal Revenue Service, Executive Communications, Satellite Conference Network, the Federal Bureau of Investigation, the American Management Association, and a 270-campus consortium, the National University Teleconference Network. We expect to add new dimensions to our heavily business-oriented schedule through new programming from the Federal Emergency Management Agency, PBS's adult learning service, and a cultural series with the Smithsonian Resident Associate Program in Washington, D.C.

Keeping Up With Teleconferences To Come

Because teleconferences are "live," they are frequently scheduled only a few weeks in advance. We are continually adding events to our schedule. To be kept up-to-date, please write Division of Continuing Education, University of Colorado at Boulder, Campus Box 178, Boulder, Colorado 80309-0178. Visit us at 1221 University Avenue; or call: 303-492-6596 or 492-6148; in Colorado, outside the Denver/Boulder area, call toll free: 1-800-332-5839. For information on in-house programming, please contact Becky Duning, Manager, Teleconferences, (303) 492-6596.

Our Newest Capability Is Audioconferencing

We are equipped to link up to 20 or more sites for formal or informal audioconferenced meetings that can link locations across the country—or the world. Audioconference services are available on an ad hoc or regular basis to the public. Please inquire regarding charges and booking time on our bridging system.

Video Teleconferencing

Volume Increasing Rapidly
Make a New Career Blossom
Real Estate Education Program

Looking for a career in real estate, advancement in your current real estate related profession, or do you simply want to learn more about the real estate industry?

This real estate program offers seminars and courses that include Principles, Law, Appraisal, Closings, Finance, Property Management, Tax Factors, and other current subjects. All of the required Colorado real estate licensing courses are available through the program. These college level courses are open to all persons and can provide you with valuable information related to this important field.

For additional information about courses offered and cities served in Colorado by this statewide program, call 492-8666 for a detailed real estate brochure.

Colorado Sales License
The Colorado Sales License Law requires that a candidate successfully complete the following courses of real estate education and receive a passing score of 70% on the state exam given by the Real Estate Commission:

1. NCRE 7 — Practice and Law, 48 hours, $225 plus textbooks.
2. NCRE 18 — Colorado Contracts and Law, 24 hours, $110 plus textbooks.

Colorado Broker License
The Colorado Broker License Law requires that a candidate complete the following 48 classroom hours of real estate education in addition to meeting the requirements of a sales license:

1. NCRE 26 — Finance and Advanced Law, 24 hours, $110.
2. NCRE 28 — Closings and Trust Accounts, 24 hours, $110.
3. Score 75% on the state exam.
4. Two years’ experience as a real estate sales licensee OR completion of four elective 24-hour courses.
5. If you are applying for your broker’s license you will also be required to prove to the Real Estate Commission that you have completed a Colorado Contracts course required for licensing.

NCRE 07 Practice and Law
Designed to meet the educational requirements for the Colorado real estate sales examination, the course offers a comprehensive study of the real estate field for those who intend to enter the profession as well as others who desire a basic knowledge of real estate markets, real property interests, deeds, land descriptions, property transfers, contracts, finance, and appraisal. Course begins with an examination of fundamental concepts and vocabulary, including Colorado license law and the law of agency.

Section 401
Night Course, 14 sessions. (48 hours)
Tuesday and Thursday
June 6 to July 25, 6:30 p.m. to 9:55 p.m.
Location: University of Colorado at Boulder Business Building, Room 125.
Tuition: $225 plus textbooks.

Section 411
Daytime Course, 6 sessions. (48 hours)
Wednesday, Thursday, Friday
Tuesday, Wednesday, July 19, 20, 21, 24, 25, 26, 8:30 a.m. to 5:30 p.m.
Location: Jefferson Real Estate Board, 950 Wadsworth Blvd., Lakewood.
Tuition: $225 plus textbooks.

NCRE 18 Colorado Contracts and Law
A practical course covering Colorado license law and analyzing the standard listing contract, the sales contract, the extension agreement, and counter-proposal. Special emphasis will be placed on understanding each clause and on properly completing each type of contract.

Section 401
Night Course, 7 sessions.
Tuesday and Thursday.
July 27-August 17, 6:30 p.m. to 9:55 p.m.
Location: Engineering Building, CR 1-46, Boulder Campus.
Tuition: $110.

NCRE 28 Real Estate Closings and Trust Accounts
The course offers an in-depth study of the closing statement, including an examination of the contract and a review of the other relevant documents. Primary emphasis will be on the gathering of data, the organization into debit and credit items, and the actual completion of various kinds of closing statements. Maintaining brokerage trust accounts will also be thoroughly covered.

Section 401
Daytime Course, 3 sessions.
Wednesday, Thursday, Friday
June 21, 22, 23, 8:30 a.m. - 5:30 p.m.
Location: Holiday Inn
800 28th Street, Boulder.
Tuition: $110.

For Course Information call 492-8666 and ask for the Summer Real Estate Brochure.
For a real getaway, enroll in one of a selection of University of Colorado courses taught exclusively in Meeker, Colorado during the summer of '89. The offering is a cooperative effort by the town of Meeker and the Division of Continuing Education to join the resources of the western Colorado community with courses that take advantage of the natural environment and the scenic beauty of the region. The courses will be taught by CU faculty in residence in Meeker.

The two-term schedule, June 19 to July 7 and July 10 to July 28, is conveniently arranged to allow students to take a five-week term on the Boulder campus if they wish to. Note the special Independent Study in Geologic Mapping available July 31 through August 18.

Classes will be conducted in the modern facilities of the Meeker public schools and in the field. Transportation to field locations will be provided.

The Meeker region is partly agricultural, partly protected wilderness, and totally suited to the study of geology, western slope flora, wilderness ecology, freshwater ecology, and environmental and energy issues. The landscape, from river valley to mountain formations, also invites an artistic enjoyment of the region.

Classes, field work, and independent projects will occupy your time and your intellect. But don’t overlook the opportunities for recreation and refreshment of your senses.

You (and your family) can also enjoy Meeker’s recreational programs — organized sports and lessons, parks, playing fields, tennis courts, golf course, and swimming pool. And fishing in nearby lakes and streams. Full service guest ranches offer a variety of trail rides and outfitted camping experiences.

Tuition: $180 per course (resident or nonresident).
Credit: Each course is offered for 3 semester hours of credit. If the course number is 4000/5000, it may be taken for either undergraduate or graduate credit. 5000- and 6000-level courses are for graduate credit only.

For registration and course information, visit 1229 University Avenue or call, 482-8409.
Independent Study Programs

**Plant a Seed for Your Own Growth**

**Independent Study**

Independent Study Puts You Ahead of the Crowd.

People who take continuing education courses are people with goals and the motivation to achieve them. Whether you are trying to accelerate your degree or to gain career skills, independent study can let you put your motivation to work without waiting for a semester to begin or for a course to be offered at a time when you can take it. Register anytime. Work at your own pace without interrupting family or employment activities.

**Guided Correspondence Study**

Independent study through correspondence allows you to begin courses at any time, not tied to the academic calendar. You work directly with an instructor by mail and by telephone. Written assignments are returned to you with grades and comments. Some courses make use of multimedia materials. Many of the courses include self-checking test questions with each unit so that you judge your own progress. Courses may be taken pass/fail or for no credit.

More than 70 college credit courses, approved by the University, are offered in 17 academic areas: accounting, anthropology, business, economics, education, engineering, English, fine arts, geography, geology, history, mathematics, philosophy, physical education, political science, psychology, sociology.

**Individualized Instruction**

Individualized Instruction provides an opportunity to earn college credit for course work by meeting with a faculty member in a non-classroom setting. It may be used when you cannot enroll in the course on campus. You may not earn credit for work completed before registering. Registration requires the approval of the faculty member, the department, or school and the appropriate dean.

**Professional Certification Opportunities**

Noncredit courses are offered so that you can meet Colorado Real Estate licensing requirements or earn certificates in Childhood Education. All courses carry Continuing Education Units (CEUs).

All course work is by correspondence, graded and commented upon by faculty members who have both academic and professional qualifications.

**Real Estate Education**

In cooperation with the Colorado Real Estate Commission and the Colorado Association of Real Estate Boards, CU provides independent study courses to meet licensing requirements for real estate salespeople and brokers.

**Childhood Education**

Courses were developed to meet standards established by Colorado law for Preschool Teachers and Preschool Administrators. Certificates are awarded to those who complete a specified series of courses. Courses are open to all who are interested in the growth, development, and education of young children. These courses are especially helpful to childcare center personnel, nurses, social workers, day care home workers, and parents of young children.

**High School Credit Opportunities**

The University of Colorado offers guided independent learning courses for high school students who want to enrich their high school programs.

**High School Correspondence**

These correspondence courses provide special opportunities for students to meet college entrance requirements, to accelerate graduation, or to meet high school graduation requirements. High School credit is granted by the student's high school, not by the University of Colorado.

It works like this: using printed study guides, texts, kits, and audio materials, you and your supervisor (usually a counselor) stay in touch with faculty who work for the Independent Study Programs at CU by mail and by telephone. Graded assignments are returned to you with comments so you can see how you are progressing. Start the course anytime. Work at your own pace. Ask your guidance counselor or advisor about high school independent learning courses.

**Concurrent Registration in College Credit Courses**

Qualified high school seniors can get a head start at CU through concurrent registration in college credit courses by correspondence.

If approved by your school, courses can be used for high school graduation or accepted for college credit (nondegree student) at the University of Colorado.

FOR A COURSE CATALOG CALL OR WRITE:
Independent Study Programs
Division of Continuing Education
University of Colorado at Boulder
Campus Box 178
Boulder, Colorado 80309-0178
303-492-8756
1-800-332-5839 (Toll Free in Colorado)
NCSS 067
Practice in Lotus Commands for
Developing Your Marketing Plan on a Personal Computer

This optional three-hour workshop is offered for those enrolling in NCSS 057 Developing Your Marketing Plan on a Personal Computer. It will enable participants who are unfamiliar with basic Lotus commands to practice the commands that will be used in the Marketing Plan workshop to develop spreadsheet "what-if" models on Lotus 1-2-3.

Peggy Purvis
Section 100: Tuesday, July 25, 1:45 p.m.-4:45 p.m.
One day session, .2 CEUs
University Computing Center, $45

NCSS 057
Developing Your Marketing Plan on a Personal Computer

This hands-on computer seminar will show you how to use nine marketing computer models. These computer models should enable you to avoid the six most common mistakes in marketing. Prior computer experience is not required, but you should have some marketing background. The models are templates that overlay Lotus 1-2-3, Symphony, or other compatible software. The instructor, who is the author of the models, will explain each one and provide problems to be solved. You will receive a manual written by the instructor, along with a diskette containing the case histories used for the models. A second diskette contains all the models and is the one you will use in your own business. This program qualifies for the Management Development Certificate Program. Course fee includes the specially prepared manual and two diskettes that together have a retail value of $195.

William M. Luther, President
Luther Management
Section 100:
Wednesday, July 26 and Thursday, July 27, 9:00 a.m.-4:00 p.m.
Two all-day sessions, 1.2 CEUs
Computing Center, $250.

NCSS 063
How To Target Your Advertising

Many small advertisers do not properly target their advertising. Try these questions on yourself: Do you clearly identify your most likely prospects? Do you send these prospects the right advertising message? Are you certain about how to choose the best media to reach your prospects? If you are unsure about the answers to these questions, it is likely that your advertising is often ineffective and wasteful. It simply does not produce desired results. This workshop will give you the techniques you need to target your advertising properly. These are the very same disciplines used by the most sophisticated advertisers, but simplified so that they can be used by any business, no matter how small. You will see how to isolate your most likely prospects and how to develop the most meaningful advertising message. You will gain more confidence about your decisions regarding how to reach these prospects through the proper choice of media. This workshop should be especially meaningful for health care, educational institutions, professional organizations, small businesses, and those in accounting, legal, and other specialized professional services. A specially prepared package of easy-to-use take-home materials will be supplied. These materials will make it possible for you to put the workshop techniques to work in your own business immediately, with more certainty that you know how to target your advertising.

Raymond F. Marcus, Marketing and Merchandising Consultant.
Section 100:
Friday, June 23, 9 a.m.-4 p.m.
One all-day session, .6 CEUs
Computing Center, $75.
Continuing Education
1221 University Ave.

Free

50¢

Free - Free parking after 5 pm, and Saturdays

50¢ - 50¢ parking after 5 pm, and Saturdays (bring 2 quarters)

During any special event, Continuing Education students shall present their registration receipt to obtain parking at no extra charge (Parking Regulation III-D-6a.)
Registration Instructions for Credit, Noncredit, and Certificate Courses

Advance Registration is Necessary and Can Be Accomplished:

In person:
Monday through Thursday, 8:30 a.m.-5:30 p.m.; Friday, 8:30 a.m.-5 p.m.,
1221 University Avenue, Boulder. Short-term metered parking nearby.

By mail:
To enroll for courses, please fill out the appropriate forms (page 41 for Noncredit/Certificate - on page 43 for credit) completely, and send them to:
Division of Continuing Education
Campus Box 178
University of Colorado at Boulder
Boulder, Colorado 80309-0178
You may register for up to three credit hours by mail. For additional credit hours, visit our office. No limit on Noncredit or Certificate courses. Use the postage-paid envelope located at the center of the catalogue.

By phone:
If you are enrolling for Noncredit or Certificate courses, you may register by phone with payment made by MasterCard or VISA credit cards. Call 492-5148. Longmont or outside Denver Metro area, call 1-800-332-5839.

Please:
Most courses have limited enrollment, so register as soon as possible to insure your place in class. Courses may be closed or cancelled, depending upon enrollment. Please register at least five days before the starting date of any Noncredit/Certificate course.

Please call 492-5148 with any questions on your registration procedure. From Longmont or outside Denver metro area, call 1-800-332-5839.

No courses conducted July 4, Independence Day.

Compliance with Colorado House Bill 1021 requires that course enrollees verify their Selective Service registration status. Your mail-in registration form contains this information. In-person registrants will be given this form at our office. Phone-in registrants may give information over the phone.

Disabled individuals who would like to register, please call our registration staff at 492-5148 and we will make special arrangements to assist you.

All listed textbooks and supplies are available at the University Book Center, UMC basement, on campus.

Refund Information is listed with the specific program information. In all cases, if a course is cancelled or rescheduled at an inconvenient time, full refund is given. Credit course cash and credit card tuition refunds are processed within two weeks of completing a Drop Voucher in the Division Registration Office, 1221 University Avenue. Noncredit/Certificate course drops may be phoned in. If payment was made by check, the refund will take 4-6 weeks. That time can be cut considerably by presenting a copy of both front and back of your cancelled check when dropping.

Weather-related closing policy: Students may expect classes to be held when scheduled even in inclement weather, the only exception being when the Chancellor closes the campus because of extreme weather conditions. Local radio stations will announce the campus closing frequently during the day. Call 492-5500 for campus closing information.

The University of Colorado is an affirmative action/equal opportunity institution.
Registration for Certificate and Noncredit Courses

PLEASE PRINT

S.S. No. # __________________________

Birthdate __________________________

Mr. ______________________________________

Ms. ______________________________________

Sex Male Female

Mailing Address __________________________ Home Telephone __________________________

City __________________________ State ______ Zip ______

Business Name __________________________ Office Telephone __________________________

City __________________________ State ______ Zip ______

SELECTIVE SERVICE REGISTRATION CERTIFICATION

Information on Selective Service registration must be provided in order to comply with Colorado law. Male students born after December 31, 1959, must complete this form in order to be permitted to register.

__ I certify that I am registered with the Selective Service.

I am not required to register with the Selective Service because:

__ I am a female.

__ I am in the U.S. Armed Forces on active duty. (NOTE: Members of the Reserves and National Guard must register with Selective Service.)

__ I have not yet reached my 18th birthday. (NOTE: You must file this notice every term, if you are male, until you turn 18 and have registered with the Selective Service.)

__ I am age 26, or older, as of the date of the first day of classes for the term for which I am registering.

__ I am a non-immigrant alien lawfully admitted in the United States.

I affirm under penalty of perjury that the information presented on this form is true and complete.

(NOTE: A person may file, but shall not be required to file, a statement indicating his position as a Conscientious Objector. The filing of a Conscientious Objector statement does not exempt one from completing this form.)

Student Signature __________________________ Date __________________________

Course No. __________________________ Course Title and (if applicable) Section Number __________________________ Tuition __________________________

Tuition Payment by Mail

Total Enclosed ______

Please send a check, payable to University of Colorado, to: Division of Continuing Education Campus Box 178 University of Colorado at Boulder Boulder, CO 80309-0178

If using MasterCard, VISA enclose the following information:

Charge: VISA ☐ MasterCard ☐ (check one)

Expiration Date ____________ / ____________ / ____________

Note that credit card enrollments can be made by phone (see Registration Information).
Save Time
and Money —
Use the
Postage-Paid
Envelope
in the Center
of this
Catalogue
to Mail Your
Registration Form.
### ALL APPLICANTS

1. **Do you have a high school diploma or a G.E.D. Certificate?**
   - No [ ]
   - Yes [ ]

2. **Have you ever enrolled for credit course(s) at any campus of the University of Colorado?**
   - No [ ]
   - Yes [ ]

3. **Are you currently on suspension from any Campus/School of CU?**
   - No [ ]
   - Yes [ ]

4. **Do you owe a debt to any University of Colorado campus?**
   - No [ ]
   - Yes [ ]

5. **Do you have a college degree?**
   - No [ ]
   - Yes [ ]

6. **Have you been convicted of a felony? (other than traffic violation)**
   - No [ ]
   - Yes [ ]

7. **Have you any serious health conditions/limitations which should be brought to the attention of the University?**
   - No [ ]
   - Yes [ ]

### COMPLETE THIS SECTION IF YOU HAVE NOT ATTENDED ANY UNIVERSITY OF COLORADO CAMPUS WITHIN THE LAST 12 MONTHS AND ARE CLAIMING IN-STATE TUITION CLASSIFICATION

Students already classified as nonresidents must submit a separate “Petition for In-State Tuition” in order to change their tuition classification.

**FAILURE TO ANSWER EACH QUESTION MAY RESULT IN YOUR BEING CLASSIFIED AS A NONRESIDENT.**

- **You**
- **Your Parent/Guardian (if you are under 22)**

<table>
<thead>
<tr>
<th>Dates of continuous physical presence in Colorado (mo/yr)</th>
<th>to</th>
<th>to</th>
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</thead>
<tbody>
<tr>
<td>Dates of employment in Colorado (mo/yr)</td>
<td>to</td>
<td>to</td>
</tr>
<tr>
<td>Dates of extended absences from Colorado of more than two months (mo/yr)</td>
<td>to</td>
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</tr>
<tr>
<td>Date of marriage, if applicable (mo/yr)</td>
<td></td>
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</tr>
<tr>
<td>Date current Colorado Driver’s License was issued (mo/yr)</td>
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</tr>
<tr>
<td>Have you had a previous Colorado Driver’s License?</td>
<td>Yes</td>
<td>No</td>
</tr>
<tr>
<td>List exact years of Colorado Motor Vehicle Registration (mo/yr)</td>
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<tr>
<td>Date of Colorado Voter Registration (mo/yr)</td>
<td></td>
<td></td>
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<tr>
<td>Date of purchase of any Colorado residential property (mo/yr)</td>
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</tr>
<tr>
<td>Dates of military service, if applicable, (mo/yr)</td>
<td></td>
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</tr>
</tbody>
</table>

I hereby certify that to the best of my knowledge the information furnished on this application is true and complete without evasion or misrepresentation. I understand that if found to be otherwise it is sufficient cause for dismissal.

Student’s Signature: ____________________________
Save Time and Money — Use the Postage-Paid Envelope in the Center of this Catalogue to Mail Your Registration Form.

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I affirm under penalty of perjury that the information presented on this form is true and complete.

(Note: A person may file, but shall not be required to file, a statement indicating his position as a Conscientious Objector. The filing of a Conscientious Objector statement does not exempt one from completing this form.)

Student Signature _____________________________ Date ______________

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Division of Continuing Education Campus Box 178
University of Colorado at Boulder
Boulder, CO 80309-0178

If using MasterCard, VISA enclose the following information:

Charge: VISA □ MasterCard □ (check one)

__________________________ / __________________ / __________________ / ____________

Expiration Date ____________ / ____________

Please print your name as it appears on the charge card.
Let Yourself Grow

Minds, like gardens, need to be fed, nurtured and cultivated. Our tree of knowledge is alive with hundreds of possibilities, its delicious fruit ripening within your reach right now.

Tempting prospects abound. Opening up to your hidden creative talents in art, music or creative writing. Expanding your professional horizons with vital skills. Enriching your understanding by feeding a long-suppressed desire to cultivate another field of learning. The pleasure of mastery, whether it’s another language or a new technology may yield rich and unexpected harvests.

Let something new take root in your life. Branch out by calling 492-5148 or 1-800-332-3539.

Information offered at Fort Collins, Colorado Branched Solutions Program.