Regional Occupational Program (ROP)

Palomar College, under contract with the San Diego County Office of Education, offers vocational and technical training through the Regional Occupational Program.

Courses provided through ROP are available to college and high school students, out-of-school youths, and adults residing in San Diego County. Courses can be used for basic job skills, upgrading of existing skills, or changing occupations. Units earned may be used for high school or college credit. ROP courses taken for college credit may be applied toward Palomar College Certificates/Degrees.

Contact the ROP Office for further information.
(760) 744-1150, ext. 2293
Office: AA-136

Automotive Technology (R AT)

Associate in Arts Degrees -
AA Degree requirements are listed in Section 6 (green pages).
• Auto Collision Repair

Certificate of Achievement -
Certificate of Achievement requirements are listed in Section 6 (green pages).
• Auto Collision Repair

PROGRAM OF STUDY

Auto Collision Repair

This program will prepare students for an entry level position in the automotive collision repair industry.

A.A. DEGREE MAJOR OR CERTIFICATE OF ACHIEVEMENT

Program Requirements		
R AT 50	Auto Body Repair I	4
R AT 51	Auto Body Repair II	4
R AT 55	Auto Refinishing I	4
R AT 56	Auto Refinishing II	4
IT 108 / WELD 108	Technical Mathematics	3
Elective Courses (Select 6 units)		
AT 100	Auto Maintenance and Minor Repair	3
AT 105	Automotive Electricity	3
AT 105L	Automotive Electricity Computer Training Lab	1
AT 150	Chassis Restoration and Assembly	3
AT 155	Body Restoration and Assembly	3
AT/R AT 97	Auto Body Repair/Auto Refinishing Topics	0.5 - 4
WELD 100	Welding I	3
CE 100	Cooperative Education	1 - 4
Total units		**25**

Auto Collision Repair A.A. Degree or Certificate of Achievement is also listed under Automotive Technology.

COURSE OFFERINGS

Courses taken for college credit may be applied toward a certificate or an Associate in Arts degree.

Courses numbered under 100 are not intended for transfer credit.

R AT 50 Auto Body Repair I (4)
8 hours lecture/laboratory
Note: *Graded only; may be taken 3 times*
Automotive body work with emphasis on repair. Includes welding; working with small damage points; restoring contour of body panels and sections; and realigning bumpers, fenders, doors, and hoods.

R AT 51 Auto Body Repair II (4)
8 hours lecture/laboratory
Recommended preparation: *R AT 50*
Note: Graded only; may be taken 3 times
Automotive body work with emphasis on increasing diagnostic, estimating and repair skills and updating techniques and related technologies. Introduction to collision industry standards including I-CAR and ASE.

R AT 55 Auto Refinishing I (4)
8 hours lecture/laboratory
Note: *Graded only; may be taken 3 times*
Introduction to auto refinishing. Preparation of auto surfaces for refinishing: taping, cleaning, and sanding. Refinishing auto surfaces: sanding, application of primers and paint.

R AT 56 Auto Refinishing II (4)
8 hours lecture/laboratory
Recommended preparation: *R AT 55*
Note: *Graded only; may be taken 3 times*
Skills development in automotive refinishing techniques including base-coat clear-coat application. Color matching concepts. Identification, prevention and correction of painting problems. Update on new products, techniques, and trends.

R AT 97 Auto Body Repair/Auto Refinishing Topics (.5 - 4)
Units awarded in topics courses are dependent upon the number of hours required of the student. Any combination of lecture, laboratory, or lecture/laboratory may be scheduled by the department. Refer to Class Schedule.
Note: *Graded only; may be taken 4 times*
Topics in auto body repair and auto refinishing. See Class Schedule for specific topic offered. Course title will designate subject covered.

Computer Science and Information Systems (R CSIS)

Certificate of Proficiency -
Certificate of Proficiency requirements are listed in Section 6 (green pages).
• Software Applications Specialist

PROGRAMS OF STUDY

Software Applications Specialist

Prepares students for employment in positions that require competence in software applications common to business and industry.

In order to earn a certificate, students must achieve a minimum grade of 'C' in each of the certificate program courses.

CERTIFICATE OF PROFICIENCY

Program Requirement		**Units**
R CSIS 109	QuickBook Overview	1
R CSIS 120/ CSIT 120	Computer Applications	3
R CSIS 121	Microcomputer Applications – Advanced	3
R CSIS 110/ CSWB 110 or R CSIS 138	Web Site Development with XHTML / Website Design with FrontPage	2
R CSIS 170 or CSIT 130	Windows / Windows Vista	1
R CSIS 186	Contemporary Job Search	1
TOTAL UNITS		**11**

COURSE OFFERINGS

Courses taken for college credit may be applied toward a certificate or an Associate in Arts degree.

R CSIS 109 QuickBooks Overview (1)
2 hours lecture/laboratory
Note: *Graded only; may be taken 3 times*
Transfer acceptability: *CSU*
Overview and application of QuickBooks to set up and manage bookkeeping/accounting records for small businesses.

R CSIS 110 Web Site Development with XHTML (3)
2 hours lecture - 3 hours laboratory
Note: *Cross listed as CSWB 110; graded only, may be taken 3 times*
Transfer acceptability: *CSU*
A foundation course for Internet/Intranet technologies. Skills required to develop and publish web sites utilizing XHTML, including using HTML tables, frames, web page forms, and basic CSS (Cascading Style Sheets).

R CSIS 116 Introduction to Computers (2)
1 hour lecture-2 hours lecture/laboratory
Note: *Graded only*
Transfer acceptability: *CSU*
Introduction to basic computer operations and the Windows operating system for students with little or no background in computer science. Includes terminology and techniques as well as keyboarding and mouse functions. Also includes: window management; creating and managing files and folders; performing basic system maintenance using Windows accessory programs; word processing; and accessing the Internet.

R CSIS 120 Computer Applications (3)
2 hours lecture - 3 hours laboratory
Note: *Cross listed as CSIT 120; graded only; may be taken 4 times; maximum of 4 completions in any combination of CSIT/R CSIS 120, CSIT 121*
Transfer acceptability: *CSU*
Hands-on experience with microcomputers and microcomputer applications featuring the use of Windows, word processing, spreadsheet, database, and presentation graphics software.

R CSIS 121 Advanced Computer Applications (3)
1 hour lecture- 4 hours lecture/laboratory
Prerequisite: *A minimum grade of 'C' in R CSIS 120/CSIT 120*
Note: *Graded only; may be taken 2 times*
Transfer acceptability: *CSU*
This course builds upon fundamental knowledge of Windows operating system and Microsoft Office Suite (Word, Excel, Access and PowerPoint) to progress into advanced functions of each element as well as integration of various elements.

R CSIS 125 Presenting with PowerPoint (1)
2 hours lecture/laboratory
Recommended preparation: *R CSIS 170 or CSIT 130*
Note: *Graded only*
Transfer acceptability: *CSU*
Comprehensive study and application of PowerPoint multimedia capabilities to create effective audience-focused presentations, live and web-based. Preparation of documents in various formats to include: animated slideshows, speaker notes, audience handouts, outlines and web sites.

R CSIS 127 Word Processing Software – Basic (1)
2 hours lecture/laboratory
Recommended preparation: *A keyboarding speed of 20 net words a minute*
Note: *Graded only; may be taken 4 times*
Transfer acceptability: *CSU*
Study of word processing skills using Microsoft Office. Course includes file creation, modification, and formatting, saving and printing files, graphics, report generation elements, and integration of Word documents within the Office suite. Hands-on labs using state of the art software are an integral part of this course, as well as guided instruction.

R CSIS 130 Microsoft Publisher (1)
2 hours lecture/laboratory
Recommended preparation: *R CSIS 127 and R CSIS 170 or CSIT 130, or BUS 170 or OIS 136.1*
Note: *Cross listed as BUS 186; graded only, may be taken 4 times.*
Transfer acceptability: *CSU*
Hands-on applications of Microsoft Publisher, a comprehensive software package that combines text, graphics, illustrations, and photographs to produce typeset quality documents for local printer output or commercial printing. Includes: newsletters; brochures; flyers; web pages; business cards; letterheads and envelopes; advertising and marketing materials; greeting cards; PDF and web file formats; and printing options.

R CSIS 138 Website Design with FrontPage (2)
4 hours lecture/laboratory
Recommended preparation: *R CSIS 110/CSWB 110*
Note: *Graded only*
Transfer acceptability: *CSU*
Comprehensive study of web site development and maintenance using Microsoft FrontPage. Includes creation of web pages, application of design elements; comparison of search engines, familiarity with source code, and use of interactive forms to create client databases. Also includes uploading, testing and modification of web site.

R CSIS 150 Computer Spreadsheets (3)
6 hours lecture/laboratory
Note: *Graded only*
Transfer acceptability: *CSU*
In-depth study of the varied applications of spreadsheets using Microsoft Excel. Create, modify, format and maintain multiple page worksheets; enter numeric and text data for manipulation; and create and copy formulas. Includes integration of Excel spreadsheets within Microsoft Office Suite. Hands-on experience in networked lab.

R CSIS 170 Windows (1)
2 hours lecture/laboratory
Note: *Graded only*
Transfer acceptability: *CSU*
Fundamentals of Windows Graphical User Interface. Students will develop proficiency in: changing desktop settings; file/folder management at both desktop and Explorer levels; and basic system maintenance.

R CSIS 175 Excel (1)
2 hours lecture/laboratory
Note: *Graded only; may be taken 2 times*
Transfer acceptability: *CSU*
Study of spreadsheets using Microsoft Excel. Course includes creating spreadsheets, formatting data, manipulating data, creation and application of formulas, charting data, and printing considerations. Preparation for the Excel MOS certification exam.

R CSIS 180 Access (1)
2 hours lecture/laboratory
Note: *Graded only; may be taken 2 times*
Transfer acceptability: *CSU*
Study of Access database program within the Microsoft Office Suite. This class introduces and reinforces the creation, modification and maintenance of Access databases. Students will create the database structure, enter data in tables, execute queries, generate reports and forms, modify properties and layout at the design level and maintain the database. Preparation for the Access MOUS certification exam.

R CSIS 186 Contemporary Job Search Techniques (1)
2 hours lecture/laboratory
Note: *Graded only*
Use the Internet, current software and research tools to organize and implement a job search. Includes: online resources; preparation and posting of application materials, including resume and cover letters; interview strategies and mock interviews; industry speakers, and hard copy and online portfolios.

To satisfy a prerequisite, the student must have earned a letter grade of A, B, C or CR in the prerequisite course, unless otherwise stated.