

## SYLLABUS Fall Semester

**COURSE:** ACR 1100 THEORY, ACR 1111 AUTO REPAIR LAB, METALLURGY AND COLLISION NON-STRUCTURAL PARTS REPAIR  
12 semester credit hours (5 credit lecture, 7 credit lab)

**COURSE PRE-REQUISITE:** None

**INSTRUCTOR:**

**REQUIRED TEXT:** ICAR Training Alliance

### **COURSE DESCRIPTION:**

This is the first semester of a one-year program; it is a study of non-structural parts repair and replacement related to moderate collision damage. These ICAR Courses will fulfill many of the course requirements for shop **Non-Structural Technician Role**. Theory and Lab experiences include non-structural damage analysis, repair and replacement procedures, and methods used to repair collision-damaged non-structural automotive components. The **proper and safe** use of tools, equipment, and materials required to complete repairs will be stressed. The ICAR comprehensive welding curriculum covering welds made on non-structural and structural steel, plastic, and non-ferrous materials will be completed. Basic metal straightening methods, panel removal and placement, alignment, and cosmetic repairs of body panels will also be covered.

### **Inter-Industry Conference on Auto Collision Repair (ICAR)**

ICAR LIVE enhanced delivery courses including **WKRO1 Hazardous Materials, Personal Safety, and Refinish Safety, FCRO1 Fundamentals of Collision Repair, WCSO1 Welding and Cutting Steel 1, TLSO1 Tools and Equipment, DAM 01 Damage Analysis and Estimating, DAMO2 Damage Analysis 2, DAMO3 Damage Analysis 3, PLA 03, Plastics and composite welding and repair, CPSO1 Corrosion Protection 1, SPSO1 Structural Parts Steel 1, MEAO1 Measurement** will be completed. Other courses may be covered as deemed necessary. Hands on Lab experience is practiced in conjunction with the ICAR Live enhanced delivery classroom work.

2.

Skills USA competition for State and National Competition will be included and emphasized for leadership and collision repair skill development.

### **OBJECTIVES:**

ICAR has developed the accepted curriculum for all approved

collision repair programs nation wide and in Canada and New Zealand. SLCC is an active participating member of the **ICAR Training Alliance** that implements **ICAR curriculum** to provide instruction to students. **ICAR'S Personal Development Program, PDP, will be introduced and the professional options explained.** Our participation in this program enables students to earn **ICAR Gold Class Points and upon graduation can be used toward a declared role.** In order to earn **ICAR and College credit you must complete the PDP program and pass the written test for the unit.** Classroom lecture-theory will be held in class collectively.

Lab work and classroom instruction will be done in conjunction with classroom activities. Lab work experience will stress personal safety, accurate damage analysis, measurement of the damaged vehicle and restoration of the vehicle back to manufactures specifications. **Precise performance of non-structural parts repair and replacement relative to maintaining original panel size, shape and state through out the entire cutting, removal of damaged parts, welding, straightening and repair of the vehicle will be stressed.** Competency will be acquired and demonstrated by the student before moving on to another project; **IF YOU START A PROJECT FINISH IT, DON'T LET ANYONE 'HELP' YOU! -- they will mess it up; you will be held responsible for the damage done by your know-it-all HELPER who doesn't work and loves to talk.** Please ask the instructor for instruction and assistance, and then follow instructions

3.

#### **CLASS FORMAT:**

The instructor will conduct a lecture or theory class daily. The lecture may be a lab demonstration, guest speaker, instructional video presentation, a field trip or other activity as deemed appropriate by all concerned. **The ICAR Live enhanced delivery program will be the primary emphasis and focus of the class.**

A four-hour lab is conducted daily. The experience gained in the lab is similar to shop experiences required for employment in a collision repair facility on a daily basis. Bench work or dead throw-away projects are used until student competence is demonstrated at a level to justify working on live customer collision damaged cars.

The instructor will screen, select, and assign work to the students based on their knowledge of the subject, skills, and abilities. A RO repair order will be completed daily to track attendance, hours worked, work tracked, and your grade. All vehicles will be approved by the instructor. We do not rebuild total lost vehicles. We do not do full restorations. This includes student and audits. Any

vehicle left for more than a week without being worked on will be removed from the lab and towed at the student's expense.

We will start bringing in live work mid-way through the semester.

1. Vehicles must be licensed and insured.
2. Cost of materials plus a 30% markup.
3. Work order and schedule for all projects.
4. An estimate will be performed in our CCC one estimating program on all vehicles.
5. Limited number of vehicles are to be parked in the compound or lab. Cars parked in the parking lot longer than a week will be towed at the owner's expense.

Students may work in teams of two or three and will rotate members during the semester. You **will not** necessarily work on your own car. **Do not promise work to people and expect to have it done. Do not bring in projects assuming we will work on a spur-of-the-moment basis. All projects must be approved by the instructor and an RO repair order written with an estimate of cost and shop fee paid for the repair. The customer will sign the repair order and approval must be completed prior to beginning any repairs. A cash deposit may be required, and a shop fee assessed depending on the work requested. We have a Parts Department that schedules and tracks all work.**

**DO NOT CONTRACT WITH OTHER STUDENTS OR PERSONS TO HAVE THEIR WORK DONE HERE, WE ARE HERE TO LEARN HOW TO REPAIR COLLISION-DAMAGED CARS. WE ARE NOT A COMMERCIAL PRODUCTION SHOP WHERE WE RUN CARS THROUGH AT A FRANTIC PACE WORKING 8 TO 10 HOURS A DAY WITH NO QUALITY STANDARD. ON THE OTHER HAND, THIS IS NOT A REST HOME WHERE YOU CAN HANG OUT WITH NO TOOLS AND LOOK COOL. If you wish to hang out in any other shop, please register for that class and withdraw from the Collision Repair class. WE DO NOT REBUILD TOTAL LOSS VEHICLES THAT HAVE BEEN PURCHASED FROM INSURANCE OR SALVAGE YARDS OR AUCTIONS.**

**GRADING SYSTEM:**

**4.**

**Grading and evaluation of performance will be based on work completed not on work attempted or time spent talking, helping, or watching others. You cannot learn how to fly a plane or drive a car by watching them fly or drive by - - you will have to **demonstrate** your knowledge and ability through **positive performance and production**. Do not begin a project until you have finished the last one and don't start a project unless you plan on completing it. You will be graded on your skill, quality of work, production, and the amount of time required to do the job.**

**YOU WILL BE REQUIRED TO HAVE THE BASIC INSTRUCTOR APPROVED HAND TOOLS BY THE END OF THE SECOND WEEK OF THE SEMESTER. IF YOU DO NOT/CAN NOT PLAN ON GETTING YOUR TOOLS BY THE DEADLINE PLEASE**

WITHDRAW NOW. CHEAP IMPORTED BASIC HAND TOOLS ARE NOT ACCEPTABLE, please purchase the approved tools.

Daily attendance is mandatory with all of your tools and the physical and mental attitude to do a good safe job in the lab. Excessive absence will result withdrawal from the program and/or a grade reduction. Excessive absents 5 and or 5 tardies will result in a grade adjustment. You are expected to have your basic hand tools here ready to use, if you don't have them, go get them and return to school This is expected of STUDENTS and AUDITS. Don't expect your instructor or classmates to furnish tools, you will also need them to get and hold a job. THE COLLEGE CANNOT BE HELD LIABLE FOR TOOLS LOST OR STOLEN. PLEASE TAKE THE NECESSARY PRECAUTIONS TO SECURE YOUR TOOLS.

This is necessary because the class is designed to function like a collision repair shop where you get paid for what you do -- obviously if you are not at work, you won't get paid -- if you are not in class, you will not earn grades. Lab grades will be based on the amount and quality of the work you complete in the Semester. All students can earn an "A" in the theory class by scoring in the 90% - 100% range on test scores and assignments.

#### General Grading System

- A (90 -100%)
- B (80 - 89%)
- C (70 - 79%)
- D (60 - 69%)
- E (0 - 59%)

5.

COURSE CONTENT:

Upon completion of the semester, the student will be able to safely demonstrate proper care and use of all shop equipment. Throughout the repair process, care in parts and panel control through the proper application of heat, stress relieving and measurement will be demonstrated. A thorough understanding of the straightening, shrinking, welding, and upsetting process on sheet metal parts will be mastered prior to progressing onto live work. Everyone cannot work on a separate project, so we may have to work on or at least observe some of the repairs. A satisfactory performance rating would earn a "C" grade in the lab part of the course. The student is expected to exceed these requirements for a higher grade. Please keep accurate records of your performance throughout the semester.

Housekeeping is important for many reasons -- if you use a tool or piece of equipment, you are expected to return it to its proper place by the end of the class period, don't just throw it in the back room and expect your instructor to put it away for you.

**Your work area will be swept and organized before the roll call at the end of the day.** If you have any questions regarding tools or equipment location, ask for help. Your help and support are asked and needed to show a positive image of our facilities. Night classes and industry seminars may be conducted 2-3 times per week, you will be invited to attend many of these but not all of them.

## **6. SAFETY:**

YOU WILL NEED TO WEAR WORK SHIRT LONG PANTS AND LEATHER WORK SHOES OR BOOTS. SAFETY GLASSES AND WORK GLOVES. Also, other safety equipment will be listed on the tool list.

## **7. AUDITS:**

**THIS IS NOT YOUR HOBBY SHOP SAME RULES APPLY TO YOU...**

EMERGENCY EVACUATION PROCEDURE:

In case of an emergency situation, elevators should **NOT BE**

**USED** and all class members are to meet on the grass between the buildings. We will then verify that all students are accounted for and unharmed. Please inform your instructor if you require any assistance or accommodation during an evacuation. Your instructor will identify several students in the class that are willing to provide assistance.

If you have a disability, please notify your instructor and fill out an Evacuation Information Form. **If you have a disability, needing accommodations, please contact the disability resource center located in the College Center, Room 244, phone 801 957-4659.**