

Course Objectives/Course Outline
Spokane Community College

Course Title: Heavy Duty Equipment Hydraulic Application

Prefix and Course Number: HEQ 242

Course Learning Outcomes:

By the end of this course, a student should be able to:

- perform basic repairs on a range of hydraulic equipment
- disassemble and diagnose malfunctions for a variety of hydraulic system components
- repair and test hydraulic system components
- disassemble and diagnose malfunctions for a variety of hydraulic system controls
- repair and test hydraulic system controls
- disassemble and diagnose malfunctions for a variety of tubing, hoses, and accessories
- repair and test tubing, hoses, and accessories

Course Outline

I. Basic Hydraulic Systems Applications

- A. Disassembly
- B. Parts Inspection
- C. Diagnosis
- D. Repair Techniques
- E. Reassembly

II. Hydraulic System Components

- A. Disassembly
- B. Parts Inspection
- C. Diagnosis
- D. Repair Techniques
- E. Reassembly

III. Hydraulic System Controls

- A. Disassembly
- B. Parts Inspection
- C. Diagnosis
 - 1. pressure testing equipment
 - 2. flow testing equipment
- D. Repair Techniques
- E. Reassembly

IV. Tubing, Hoses, and Accessories

- A. Disassembly
- B. Parts Inspection
- C. Diagnosis
- D. Repair Techniques
- E. Reassembly