

I. COURSE DESCRIPTION:

This course begins to build defect recognition skills using the knowledge gained in carpentry, electrical, heating and plumbing, etc. Students will cover inspection methodology through practical demonstrations and exercises to develop an appreciation for systematic inspections in reducing errors and omissions.

II. LEARNING OUTCOMES AND ELEMENTS OF THE PERFORMANCE:

Upon successful completion of this course, the student will demonstrate the ability to:

1. *Apply knowledge of residential home construction, related trades and building codes to recognizing deficiencies within readily accessible components of the following systems:*

1.1 *Roof System*

Potential Elements of the Performance:

- ***Inspect:***
 1. accessible roof coverings
 2. accessible *roof drainage systems*
 3. accessible flashings
 4. accessible skylights, chimneys, and roof penetrations
- ***Describe*** the roof coverings.
- ***Report*** on the method(s) used to inspect the roof(s).

1.2 *Exterior*

Potential Elements of the Performance:

- ***Inspect:***
 1. exterior wall covering, flashing and trim
 2. all exterior doors
 3. attached or *adjacent* decks, balconies, steps, porches, and their associated railings
 4. eaves, soffits, and fascias where accessible from the ground level
 5. vegetation, grading, and surface drainage on the property when any of these are likely to adversely affect the building
 6. walkways, patios, and driveways leading to dwelling entrances
 7. landscaping structure attached or adjacent to the building when likely to adversely affect the building
 8. attached garage or carport
 9. garage doors and garage door operators for attached garages
- ***Describe*** the exterior wall covering(s).
- ***Report*** the method(s) used to inspect the exterior wall elevations.

1.3 **Structural System**

Potential Elements of the Performance:

- **Inspect:**
 1. *structural components* including visible foundation and framing
 2. by *probing* a sample of structural components where deterioration is suspected or where clear indications of possible deterioration exist
- **Describe:**
 1. foundation, and *report* the methods used to *inspect* the *under-floor crawl space*
 2. floor structure
 3. wall structure
 4. ceiling structure
 5. roof structure, and *report* the methods used to *inspect* the attic
- **Report** on limitation of structural components not visible or accessible.

1.4 **Insulation**

Potential Elements of the Performance:

- **Inspect** insulation and vapour barriers in unfinished spaces.
- **Describe** insulation and vapour barriers in unfinished spaces.
- **Report** absence of insulation in unfinished spaces within the building envelope.

1.5 **Plumbing System**

Potential Elements of the Performance:

- **Inspect:**
 1. interior water supply and distribution *systems* including all fixtures and faucets
 2. drain, waste and vent *systems* including all fixtures
 3. water heating equipment
 4. vent systems, flues, and chimneys
 5. fuel storage and fuel distribution *systems*
 6. drainage sumps, sump pumps, and related piping
 - **Describe:**
 1. water supply, distribution, drain, waste, and vent piping materials
 2. water heating equipment including the energy source
 3. location of main water and main fuel shut-off valves
2. **Review and examine a variety of case studies to refine defect recognition knowledge and skills, and reporting techniques.**
- Potential Elements of the Performance:
- A review of instructor selected case studies
3. **Complete a home inspection portfolio (ongoing)**

III. TOPICS:

1. Structural system inspection.
2. Exterior inspection.
3. Roof inspection.
4. Insulation inspection.
5. Plumbing system inspection.
6. Defect recognition and reporting
7. Portfolio

IV. REQUIRED RESOURCES / TEXTS / MATERIALS:

- The Complete Book of Home Inspection, 4th Edition, Norman Becker, McGraw-Hill 2011
- Inspecting a House, Rex Cauldwell, Taunton Press 2001
(all the above to be available through the college bookstore in late fall)
- Laptop computer and storage device / CD / DVD, HMI112 portfolio, camera
- Process of inspection and list of deficiencies to be distributed by instructor

V. EVALUATION PROCESS / GRADING SYSTEM:

Quizzes, tests, assignments	- 30 %
Lab work / practical assignments	- 40 %
Portfolio / DVD	- 20 %
Attendance	- 10 %

The following semester grades will be assigned to students:

Grade	<u>Definition</u>	<i>Grade Point Equivalent</i>
A+	90 – 100%	
A	80 – 89%	4.00
B	70 - 79%	3.00
C	60 - 69%	2.00
D	50 – 59%	1.00
F (Fail)	49% and below	0.00

CR (Credit)	Credit for diploma requirements has been awarded.
S	Satisfactory achievement in field /clinical placement or non-graded subject area.
U	Unsatisfactory achievement in field/clinical placement or non-graded subject area.
X	A temporary grade limited to situations with extenuating circumstances giving a student additional time to complete the requirements for a course.

NR	Grade not reported to Registrar's office.
W	Student has withdrawn from the course without academic penalty.

VI. SPECIAL NOTES:Attendance:

Sault College is committed to student success. There is a direct correlation between academic performance and class attendance; therefore, for the benefit of all its constituents, all students are encouraged to attend all of their scheduled learning and evaluation sessions. This implies arriving on time and remaining for the duration of the scheduled session.

VII. COURSE OUTLINE ADDENDUM:

The provisions contained in the addendum located on the portal form part of this course outline.