

MINNESOTA WEST COMMUNITY & TECHNICAL COLLEGE

COURSE OUTLINE

DEPT. AGRI

COURSE NUMBER: 1102

NUMBER OF CREDITS: 3

Lecture: 2 Lab: 1 OJT: 0

Course Title:

Principles of Agronomy

Catalog Description:

Principles of Agronomy explores the principles and practices of plant and related sciences as applied to increasing productivity and improvement of field crops. Emphasis is on crop selection and improvement through the breeding of crop varieties, seeds and seedlings, crop growth and development, crop production hazards, and the harvest and storage of field crops.

Prerequisites or Necessary Entry Skills/Knowledge:

None

FULFILLS MN TRANSFER CURRICULUM AREA(S)

- ☐ Goal 1: Communication: By meeting the following competencies:
- ☐ Goal 2: Critical Thinking: By meeting the following competencies:
- ☐ Goal 3: Natural Sciences: By meeting the following competencies:
- ☐ Goal 4: Mathematics/Logical Reasoning: By meeting the following competencies:
- ☐ Goal 5: History and the Social and Behavioral Sciences: By meeting the following competencies:
- ☐ Goal 6: The Humanities and Fine Arts: By meeting the following competencies:
- ☐ Goal 7: Human Diversity: By meeting the following competencies:
- ☐ Goal 8: Global Perspective: By meeting the following competencies:
- ☐ Goal 9: Ethical and Civic Responsibility: By meeting the following competencies:
- ☐ Goal 10: People and the Environment: By meeting the following competencies:

Topics to be Covered

Plant Science and Human Welfare

Origin and Classification of Field Crops

Adaptation and Distribution of Field Crops

Varietal Selection and Improvement

Crop Propagation

Crop Nutrition

Maturation, Harvest, and Storage

Crop Pests

Student Learning Outcomes

Identify plant anatomy and functions.

Classify and identify field crop plants and seeds.

Explain the impact of food, fuel, and fiber crops to humankind and their distribution.
Describe plant physiology systems and how they relate to plant growth and environment.
Explain plant breeding systems and genetic improvement.
Describe crop production systems.
Collect and Identify crop pests and control methods.
Analyze crop nutrition and its relationship with soil fertility.
Describe proper harvest timing and storage techniques.

Is this course part of a transfer pathway: Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>

Revised Date: 6/2021