
GREEN CERTIFICATE PROGRAM

A. PROGRAM RATIONALE AND PHILOSOPHY

RATIONALE

The Green Certificate Program was developed by Alberta Agriculture and Irrigation (AGI) as a means of developing human resources for Alberta's agriculture sector.

AGI continues to be the primary administrator of the Green Certificate Program and continues to be responsible for determining the performance outcomes for each agricultural specialization. However, through a partnership among Alberta Education, AGI, and representatives from each of the specializations, each of the Green Certificate specializations has been restructured and is now available as Alberta Education approved courses.

Prior to the restructuring, students were able to access Green Certificate training by enrolling in work experience courses.

The new Green Certificate courses enable Alberta senior high school students to earn senior high school credits by enrolling in combinations of courses relating to one of the following specializations:

- Beekeeper Production Technician
- Cow–Calf Beef Production Technician
- Dairy Production Technician
- Equine Technician
- Feedlot Beef Production Technician
- Field Crop Production Technician
- Greenhouse Technician
- Irrigated Field Crop Production Technician

- Poultry Production Technician (Broiler Chicken, Broiler Hatching Egg, Table Egg, and Turkey)
- Sheep Production Technician
- Swine Production Technician

Like the Registered Apprenticeship Program, each of the Green Certificate specializations provides students with access to the first level of an agricultural apprenticeship. Learners can progress in each specialization through two levels—technician level and supervisor level—and, if their career interests expand to management roles in agriculture, to a generic third level of the Green Certificate, the Farm Manager Program.

Each of the first two levels in each specialization requires approximately 400 hours of on-the-job learning.

The courses constituting this program of studies address the Level 1: Technician component only. Most senior high school students enrolling in and attaining a Green Certificate do so at the technician level. A small number of students may progress to the Level 2: Supervisor program in their selected specialization while still in school. To access Level 2 programs, students may enroll in Work Experience 15–25–35 courses.

Students completing a Level 1 Green Certificate in any of the specializations are awarded the Green Certificate Technician credential, and their Alberta Education transcript will identify the specific courses completed.

PHILOSOPHY

The Green Certificate Program provides students with opportunities to enter a variety of agriculture-related, structured learning pathways as a part of their senior high school program and to earn a credential leading to a career in agribusiness.

Students learn on the job, under the direction of experienced farm personnel and under the supervision and administration of AGI and Alberta Education.

The notion of “learner as worker and worker as learner” is becoming increasingly accepted. There is considerable research that supports viewing the workplace as an extension of the school and the school as an extension of the workplace.

Similarly, experiential/applied learning is being increasingly seen as a vehicle for enhancing more formal learning systems, by making other senior high school courses more relevant and meaningful to the learner.

The Green Certificate Program is based on the above research and on the belief that programs delivered off campus contribute to effective learning and the development of closer linkages among the school, the student, and the local community.

Within the philosophy of the Green Certificate Program, students enrolled in each specialization will

- demonstrate general and specific outcomes that enable them to earn a Level 1: Technician credential within their selected specialization
- develop competencies in a selected agricultural specialization
- develop appropriate employability skills
- recognize and develop a positive attitude toward safety and safe workplace practices
- analyze career opportunities in the agricultural industry

B. PROGRAM ORGANIZATION AND DELIVERY

PROGRAM ORGANIZATION

The Green Certificate Program currently consists of the 11 specializations listed below. AGI is, however, currently considering the addition of new specializations.

- Beekeeper Production Technician
- Cow–Calf Beef Production Technician
- Dairy Production Technician
- Equine Technician
- Feedlot Beef Production Technician
- Field Crop Production Technician
- Greenhouse Technician
- Irrigated Field Crop Production Technician
- Poultry Production Technician (Broiler Chicken, Broiler Hatching Egg, Table Egg, and Turkey)
- Sheep Production Technician
- Swine Production Technician

The required outcomes for each specialization are structured as three courses for a total of 16 credits. The first course in each specialization is offered for 6 credits and the other two courses are offered for 5 credits each.

For each specialization, local, seasonal, and other factors will determine the order of delivering the three courses.

PROGRAM DELIVERY

Each course in each specialization of the Green Certificate Program is designed to be delivered off campus. Green Certificate courses must, therefore, be delivered in accordance with the guidelines in the *Off-campus Education Handbook*, which requires that each potential workplace be inspected and approved annually by a person designated by the school authority.

In addition, a certificated teacher must be assigned the responsibility for ensuring that

- the selected work placement provides a safe and caring learning environment
- effective learning is taking place
- the curriculum is being followed and that appropriate opportunities exist for the student to develop the competencies specified by the general and specific outcomes
- student progress is monitored and supervised
- student performance is appropriately assessed, in partnership with the employer and the local AGI representative
- the off-campus education formal work agreement is signed by all parties and outlines employment expectations, hours of work, and additional health and safety parameters, where required
- the student completes the prerequisite course, AGR3000: Agriculture Safety, prior to enrollment in the first course of any Green Certificate specialization

C. STUDENT SELECTION, PLACEMENT AND ASSESSMENT

STUDENT SELECTION

In deciding to enroll in the Green Certificate Program, students should be able to indicate their understanding of what it means to enroll in an agricultural apprenticeship program.

Most students choosing to enroll in the Green Certificate Program self-select. That is, they request permission of their school to enroll in a specialization, having been encouraged to do so by a parent, relative, or other party knowledgeable about the program.

Students who are interested in exploring career options in agriculture but who are not ready to commit to enrolling in the Green Certificate Program should be encouraged to consider enrolling in one or a combination of the following courses:

- Career Internship 10
- Work Experience 15, 25, or 35
- courses selected from the Agriculture strand of the Career and Technology Studies program

In approving a student's request to enroll in Green Certificate courses, the teacher should consider the student's

- current and planned school programs
- interests, career goals, and maturity
- previous knowledge and experience in the agriculture industry
- understanding of the commitment required to ensure successful completion of the program

STUDENT PLACEMENT

Students self-selecting to enroll in the Green Certificate Program have usually selected a specialization and identified a placement.

In situations where students have not identified an employer willing to accept them in a Green Certificate Program specialization, the local AGI coordinator may be contacted to assist in securing an appropriate placement. In addition, an AGI coordinator will provide an in-school introduction for new students entering the program or for those interested in learning more about the program.

STUDENT ASSESSMENT

Assessment of student progress and performance in a Green Certificate course must be ongoing and be conducted through consultation among

- the certificated teacher assigned by the school to supervise the student
- the student's workplace trainer
- assessors designated by AGI

At the completion of each Green Certificate course, AGI assessors at a provincial assessment centre will formally evaluate the student's knowledge and skills to determine if the student has met the general and specific outcomes specified for the course.

Teachers are encouraged to participate in these end-of-course assessment processes.

D. SCOPE AND SEQUENCE

Local, seasonal, and other factors will determine the order of course delivery in each specialization. Students completing all three courses in a specialization, to the standards specified, will earn the technician level Green Certificate for that specialization, which is issued by Alberta Agriculture and Irrigation.

Prerequisite

AGR3000: Agriculture Safety, a 1-credit course from the Agriculture (AGR) occupational area within the Career and Technology Studies program, **must** be completed prior to enrollment in the first course of any Green Certificate specialization.

Note

To earn the technician level Green Certificate in Field Crop Production, students must complete the following courses to the standards specified:

Field Crop Operations and Care 33
Field Crop Processes and Practices 33 OR Irrigated Field Crop Processes and Practices 33
Field Crop Support Systems 33 OR Irrigated Field Crop Support Systems 33

To earn the technician level Green Certificate in Irrigated Field Crop Production, students must complete the following courses to the standards specified:

Irrigated Field Crop Operations and Care 33
Irrigated Field Crop Processes and Practices 33 OR Field Crop Processes and Practices 33
Irrigated Field Crop Support Systems 33 OR Field Crop Support Systems 33

To earn the technician level Green Certificate in one of the four Poultry Production Technician streams, students must select one stream and complete the following courses to the standards specified:

Poultry Operations and Care 33
Poultry Processes and Practices 33
<i>Choose one of the following streams:</i> <ul style="list-style-type: none">• Broiler Chicken Production Husbandry and Systems 33• Broiler Hatching Egg Production Husbandry and Systems 33• Table Egg Production Husbandry and Systems 33• Turkey Production Husbandry and Systems 33

Students **must** complete Poultry Operations and Care 33 **AND** Poultry Processes and Practices 33 prior to enrolling in Broiler Chicken Production Husbandry and Systems 33; Broiler Hatching Egg Production Husbandry and Systems 33; Table Egg Production Husbandry and Systems 33; **OR** Turkey Production Husbandry and Systems 33.

Once students have completed one stream, students may complete any of the other three streams. Students only need to complete Poultry Operations and Care 33 **AND** Poultry Processes and Practices 33 once.

Students do not need to repeat Poultry Operations and Care 33 **AND** Poultry Processes and Practices 33 if they choose to complete any of the other three streams.

Specialization	Courses		
Beekeeper Production Technician	Bee Operations and Care 33 (6 credits)	Bee Production and Practices 33 (5 credits)	Bee Husbandry and Systems 33 (5 credits)
Cow–Calf Beef Production Technician	Cow–Calf Operations and Care 33 (6 credits)	Cow–Calf Processes and Practices 33 (5 credits)	Cow–Calf Husbandry and Systems 33 (5 credits)
Dairy Production Technician	Dairy Operations and Care 33 (6 credits)	Dairy Processes and Practices 33 (5 credits)	Dairy Husbandry and Systems 33 (5 credits)
Equine Technician	Equine Operations and Care 33 (6 credits)	Equine Processes and Practices 33 (5 credits)	Equine Husbandry and Systems 33 (5 credits)
Feedlot Beef Production Technician	Feedlot Operations and Care 33 (6 credits)	Feedlot Processes and Practices 33 (5 credits)	Feedlot Husbandry and Systems 33 (5 credits)
Field Crop Production Technician	Field Crop Operations and Care 33 (6 credits)	Field Crop Processes and Practices 33* (5 credits)	Field Crop Support Systems 33** (5 credits)
Greenhouse Technician	Greenhouse Operations and Care 33 (6 credits)	Greenhouse Processes and Practices 33 (5 credits)	Greenhouse Support Systems 33 (5 credits)
Irrigated Field Crop Production Technician	Irrigated Field Crop Operations and Care 33 (6 credits)	Irrigated Field Crop Processes and Practices 33* (5 credits)	Irrigated Field Crop Support Systems 33** (5 credits)
Poultry Production Technician: Broiler Chicken	Poultry Operations and Care 33 (6 credits)	Poultry Processes and Practices 33 (5 credits)	Broiler Chicken Production Husbandry and Systems 33 (5 credits)
Poultry Production Technician: Broiler Hatching Egg			Broiler Hatching Egg Production Husbandry and Systems 33 (5 credits)
Poultry Production Technician: Table Egg			Table Egg Production Husbandry and Systems 33 (5 credits)
Poultry Production Technician: Turkey			Turkey Production Husbandry and Systems 33 (5 credits)
Sheep Production Technician	Sheep Operations and Care 33 (6 credits)	Sheep Processes and Practices 33 (5 credits)	Sheep Husbandry and Care 33 (5 credits)
Swine Production Technician	Swine Operations and Care 33 (6 credits)	Swine Processes and Practices 33 (5 credits)	Swine Husbandry and Systems 33 (5 credits)

*Students may earn credits in either **Field Crop Processes and Practices 33** OR **Irrigated Field Crop Processes and Practices 33**.

Students may earn credits in either **Field Crop Support Systems 33 OR **Irrigated Field Crop Support Systems 33**.