

# Botanist

ANZSCO: 234515

Group A

## About this document

- The following Information Sheet is for your reference only and should be used as a guide to assist with your Skills Assessment application to VETASSESS. This information is subject to change.
- Please note that a Skills Assessment of the qualification involves assessment of both the qualification level and content. Qualifications are assessed according to the guidelines published by the Australian Government Department of Education.
- The employment assessment involves determining the skill level and relevance of the tasks undertaken.
- Integrity checks may be conducted to verify the qualification and employment claims made in an application.

## Job description

Studies the anatomy, physiology, biochemistry and ecology of plants.

## Occupations considered suitable under this ANZSCO code:

- Plant Pathologist
- Plant Physiologist
- Plant Taxonomist

## Botanist is a VETASSESS Group A occupation

This occupation requires a qualification assessed as comparable to the educational level of an Australian Qualifications Framework (AQF) Bachelor degree or higher, in a field highly relevant to the nominated occupation.

GROUP A	Criteria for a positive Skills Assessment				
	Comparable Bachelor degree AQF level	With highly relevant major field of study	Relevant employment duration		
1		+		+	
Pre-qualification methodology does not apply to Group A occupations					

The information below describes the available pathways for a Skills Assessment under **Group A**. Please note that in order to achieve a suitable Skills Assessment Outcome, a suitable assessment for both qualifications and employment is required.

### Pathway 1

This pathway requires a qualification assessed as comparable to the education level of an Australian Qualifications Framework (AQF) Bachelor degree or higher degree and in a field highly relevant to the nominated occupation.

Bachelor degree or higher degree includes AQF Master Degree or AQF Doctoral Degree.

In addition, it is essential for applicants to meet the following employment criteria:

- at least **one** year of post-qualification employment at an appropriate skill level, undertaken in the last five years,
- working 20 hours or more per week, and
- highly relevant to the nominated occupation.

## Qualification

Botany is the scientific study of plants, related microbial organisms, plant habitats and ecosystem relations.

Subjects in this field include:

- Organisation and Function of Cells and Organisms
- Plant Anatomy and Structure
- Plant Morphology and Physiology
- Plant Molecular Biology
- Plant Genetics
- Plant Nutrition
- Ecosystems
- Phytochemistry
- Cytology
- Plant Taxonomy and Systematics
- Palaeobotany
- Biophysics and Molecular Biology
- Plant Ecology
- Field and Environmental Botany
- Plant Biotechnology
- Microbial Organisms
- Plant Histology
- Plant Morphology
- Plant Physiology
- Herbology

- Planning and undertaking experiments to study, measure and understand plants
- Designing and conducting experiments, making observations and measurements, researching information, analysing data, preparing or supervising the preparation of laboratory reports and scientific papers, presenting findings at scientific meetings and conferences, and supervising the work of staff
- Investigating the chemical structure and function of living cells and their isolated components, organs and tissues in plants
- Investigating the effects of environmental factors, such as rainfall, temperature, sunlight, soil, topography and disease, on plant growth

## Employment Criteria

Highly relevant tasks include, but are not limited to:

- Grows plants under controlled conditions to determine optimum environmental factors, assess the significance of environmental and genetic variables, and examine patterns of plant evolution
- Studies the nature and occurrence of plant chromosomes, cells and tissues
- Makes field and laboratory studies of plant groups to compile and revise natural classifications
- May prepare handbooks for identification of plants
- May supervise and coordinate the work of technical officers and technicians
- May search for, identify and classify new species of plants
- May work with other scientists to develop drugs, medicines and other products from plants

Additional tasks may include: