

Biology 4218A – Plant Pathology Course Outline

1. Course Information

Course Information

Biology 4218A Plant Pathology – Fall Term 2025

Tues-Thurs 11:30-12:30 (lectures)

Thurs 13:30-16:30 (lab)

List of Prerequisites

The prerequisite for this class is Biology 3218F/G.

Unless you have either the requisites for this course or written special permission from your Dean's Designate (Department/Program Counsellors and Science Academic Advisors) to enroll in it, you may be removed from this course and it will be deleted from your record. This decision may not be appealed. You will receive no adjustment to your fees in the event that you are dropped from a course for failing to have the necessary prerequisites.

2. Instructor Information

Instructors	Email	Office	Phone	Office Hours
Prof. Mark Bernards (Course Coordinator)	bernards@uwo.ca	NCB402	x86477	By Appointment
TA: Anka Colo	acolo@uwo.ca	N/A	N/A	N/A

If you are contacting your instructor, please use your Western (@uwo.ca) email address and include "Bio4218A" in the subject line. Office hours may be held on Zoom or in-person. Please email the instructor to arrange an appointment or inquire in class.

3. Course Syllabus, Schedule, Delivery Mode

Course description and list of topics

Biology 4218A is a lab course on plant pathology. The general areas of study are listed below, check the OWL Brightspace site for specific dates and reading lists.

Lecture topics and dates are on the OWL Brightspace site.

Lectures and labs are held in-person only. Lectures are Tues and Thurs 11:30-12:30 in NCB 295. Labs are weekly throughout the semester (Thurs 13:30-16:30) in BGS 2065.

Learning objectives

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

- Explain what is meant by phytopathology through theoretical (lecture) and practical (laboratory) learning experiences.
- Demonstrate the ability to identify disease symptoms and signs (both biotic and abiotic) in living plant material.
- Identify and describe organisms that cause plant diseases from the following groups: Virus, Bacteria, Protozoa, Fungi, Nematodes, Plants.
- Understand how the infection process works, disease develops and spreads.
- Understand Koch's Postulates and the Disease Triangle.
- Understand the mechanisms of plant defense and immunity against disease-causing pathogens and pests.
- Demonstrate a knowledge of the methods used to control pathogens, including cultural, breeding, regulatory and chemical.
- From the Laboratory portion of the course students should be able to define, describe and identify example pathogens, recognize their symptoms and signs and their pathogenesis.

Key sessional dates

Classes begin: September 5, 2024

Labs begin: September 11, 2025

Fall Reading Week: November 6 – 10, 2025

Classes end: December 6, 2025

4. Course Materials

Texts/materials

Agrios' Plant Pathology (6th edition, 2024) is the text for this course. Available for purchase as an eBook from the UWO Bookstore. A hardcopy is also on reserve at Taylor Library.

The text is also available through the publisher's website:

<https://www.sciencedirect.com/book/9780128224298/agrios-plant-pathology>

Additional readings/texts will be suggested throughout the course.

All course material will be posted to OWL: <https://westernu.brightspace.com/>

Students are responsible for checking the course OWL site (<https://westernu.brightspace.com/>) regularly for news and updates. This is the primary method by which information will be disseminated to all students in the class.

If students need assistance with the course OWL Brightspace site, they can seek support on the [OWL Brightspace Help](#) page. Alternatively, they can contact the Western Technology Services Helpdesk. They can be contacted by phone at 519-661-3800 or ext. 83800.

5. Methods of Evaluation

Grading Scheme and Assessment Dates

The overall course grade will be calculated as listed below:

Assignment (1)	10%
Laboratories (10)	30%
Lab exam	20%
Final Exam	40%

This is a lab course – you must pass the lab component to receive credit for the course.

General information about missed coursework

Students must familiarize themselves with the *University Policy on Academic Consideration – Undergraduate Students in First Entry Programs* posted on the Academic Calendar: https://www.uwo.ca/univsec/pdf/academic_policies/appeals/academic_consideration_Sep24.pdf,

This policy does not apply to requests for Academic Consideration submitted for **attempted or completed work**, whether online or in person.

The policy also does not apply to students experiencing longer-term impacts on their academic responsibilities. These students should consult [Accessible Education](#).

For procedures on how to submit Academic Consideration requests, please see the information posted on the Office of the Registrar's webpage:

https://registrar.uwo.ca/academics/academic_considerations/

All requests for Academic Consideration must be made within 48 hours after the assessment date or submission deadline.

All Academic Consideration requests must include supporting documentation; however, recognizing that formal documentation may not be available in some extenuating circumstances, the policy allows students to make one Academic Consideration request

without supporting documentation in this course. However, the following assessments are excluded from this, and therefore always require formal supporting documentation:

- Examinations scheduled during official examination periods (Defined by policy)
- Practical laboratory and performance tests (Defined by policy)

When a student *mistakenly* submits their one allowed Academic Consideration request **without supporting documentation** for the assessments listed above or those in the **Coursework with Assessment Flexibility** section below, the request cannot be recalled and reapplied. This privilege is forfeited.

When a student misses the Final Exam and their Academic Consideration has been granted, they will be allowed to write the Special Examination (the name given by the University to a makeup Final Exam). See the Academic Calendar for details (under [Special Examinations](#)), especially for those who miss multiple final exams within one examination period.

Essential Learning Requirements

Even when Academic Considerations are granted for missed coursework, the following are deemed essential to earn a passing grade.

- Minimum attendance and completion of 8 labs AND minimum grade of 50% on the laboratory component of the course (i.e. weekly lab quizzes and the lab exam)

Failure to meet these requirements will result in a grade of 45 for the course. Should a student fail to meet this requirement where Academic Considerations are granted will be given an opportunity to complete those labs after they recover. However, for logistical reasons, this may be with the next offering of the course, in which case the student will receive a grade of Incomplete (INC) and their maximum course load may be reduced during the term in which they complete their course requirements.

Coursework with Assessment Flexibility

Academic Consideration requests will be denied for the following assessments with built-in flexibility:

Flexible Completion

Quizzes. This course has 10 lab quizzes/evaluations, and the 8 with the highest marks are counted towards your final grade.

Deadline with a No-Late-Penalty Period

Assignment 1. Students are expected to submit Assignment 1 by the deadline (TBD).

Should extenuating circumstances arise, students do not need to request Academic Consideration and they are permitted to submit their assignment up to 1 week past the deadline without a late penalty. Should students submit their assessment beyond 1 week past the deadline, a late penalty of 10% per day will be applied for up to 3 days.

Assignments submitted more than 10 days after the deadline (when assignment grades will be returned to students) will be assigned a grade of 0. No Academic Considerations will be considered.

6. Additional Statements

Religious Accommodation

When conflicts with a religious holiday that requires an absence from the University or prohibits certain activities, students should request an accommodation for their absence in writing to the course instructor and/or the Academic Advising office of their Faculty of Registration. This notice should be made as early as possible but not later than two weeks prior to the writing or the examination (or one week prior to the writing of the test).

Please visit the Diversity Calendars posted on our university's EDID website for the recognized religious holidays:

<https://www.edi.uwo.ca>.

Accommodation Policies

Students with disabilities are encouraged to contact Accessible Education, which provides recommendations for accommodation based on medical documentation or psychological and cognitive testing. The policy on Academic Accommodation for Students with Disabilities can be found at:

[https://www.uwo.ca/univsec/pdf/academic_policies/appeals/Academic Accommodation_disabilities.pdf](https://www.uwo.ca/univsec/pdf/academic_policies/appeals/Academic_Accommodation_disabilities.pdf).

Academic Policies

The website for Registrar Services is <https://www.registrar.uwo.ca/>.

In accordance with policy,

https://www.uwo.ca/univsec/pdf/policies_procedures/section1/mapp113.pdf,

the centrally administered e-mail account provided to students will be considered the individual's official university e-mail address. It is the responsibility of the account holder to ensure that e-mail received from the University at their official university address is attended to in a timely manner.

No electronic devices will be permitted for exams.

Scholastic offences are taken seriously and students are directed to read the appropriate policy, specifically, the definition of what constitutes a Scholastic Offence, at the following Web site:

https://www.uwo.ca/univsec/pdf/academic_policies/appeals/scholastic_discipline_undergrad.pdf.

Support Services

Please visit the Science & Basic Medical Sciences Academic Advising webpage for information on adding/dropping courses, academic considerations for absences, appeals, exam conflicts, and many other academic-related matters: <https://www.uwo.ca/sci/counselling/>.

Students who are in emotional/mental distress should refer to Mental Health@Western (<https://uwo.ca/health/>) for a complete list of options about how to obtain help.

Western is committed to reducing incidents of gender-based and sexual violence and providing compassionate support to anyone who has gone through these traumatic events. If you have

experienced sexual or gender-based violence (either recently or in the past), you will find information about support services for survivors, including emergency contacts at

https://www.uwo.ca/health/student_support/survivor_support/get-help.html.

To connect with a case manager or set up an appointment, please contact support@uwo.ca.