

COURSE SYLLABUS



COURSE TITLE: CSNT 230 Linux Systems

CLASS SECTION: 001

TERM: Fall 2024

COURSE CREDITS: 3

DELIVERY METHOD(S): Blended Learning

Camosun College respectfully acknowledges that our campuses are situated on the territories of the Ləkʷəŋən (Songhees and Kosapsum) and WSÁNEĆ peoples. We honour their knowledge and welcome to all students who seek education here.

INSTRUCTOR DETAILS

NAME: Ian Cameron
EMAIL: cameron@camosun.ca
OFFICE: TEC 211
HOURS:

As your course instructor, I endeavour to provide an inclusive learning environment. However, if you experience barriers to learning in this course, do not hesitate to discuss them with me. Camosun College is committed to identifying and removing institutional and social barriers that prevent access and impede success.

CALENDAR DESCRIPTION

Students will learn how to use the Linux command line editor, and will develop an understanding of the processes, programs and components of the Linux operating system. The students will use primarily the Linux command line interface to configure programs, files and directories, set file attributes and permissions, and manage users and groups.

PREREQUISITE(S): CSNT 131, CSNT 130, CSNT 132

CO-REQUISITE(S):

EQUIVALENCIES:

COURSE LEARNING OUTCOMES / OBJECTIVES

Upon successful completion of this course a student will be able to:

- gain a working knowledge of the Linux command line;
- install and configure a computer running Linux;
- configure basic networking using virtual machines; and
- prepare for either certification LPIC-1 (Exam 101-500) or CompTIA Linux+
- prepare for certification LPIC-2(Exam 102-500)

REQUIRED MATERIALS & RECOMMENDED PREPARATION / INFORMATION

Texts - No printed text

Materials: NDG Linux 1 & 2 – hosted on Cisco NetSpace (netacad.com) – access key purchase required for each course.

Access to Camosun D2L Course

COURSE SCHEDULE, TOPICS, AND ASSOCIATED PREPARATION / ACTIVITY / EVALUATION

The following schedule and course components are subject to change with reasonable advance notice, as deemed appropriate by the instructor.

WEEK or DATE RANGE	ACTIVITY or TOPIC	OTHER NOTES
1	<u>LINUX 1</u> <u>Module 1: Getting Started</u> Seminar - Introduction - Using the Shell - Configuring the Shell Labs - Labs 2, 3 Lab Assign #1 / NDG Exams Ch. 1 – 3 / No Lab Quiz	<u>Reading</u> Linux Chapter 1 Linux Chapter 2 Linux Chapter 3
2	<u>Module 2: Basic File Management</u> Seminar - File Globbing - File Manipulation - Finding Files Labs - Labs 4, 5, 6 Lab Assign #2 / NDG Exams Ch. 4 - 6 / Lab Quiz Week 2	<u>Reading</u> Linux Chapter 4 Linux Chapter 5 Linux Chapter 6
3	<u>Module 3: Working with Text</u> Seminar - Text Utilities - Regular Expressions Lab - Labs 7, 8 Lab Assign #3 / NDG Exams Ch 7 - 8 / Lab Quiz Week 3	<u>Reading</u> Linux Chapter 7 Linux Chapter 8

WEEK or DATE RANGE	ACTIVITY or TOPIC	OTHER NOTES
4	<p><u>Module 3: Working with Text cont.</u></p> <p>Seminar - The vi Editor - Standard Text Streams and Redirection</p> <p>Lab - Labs 9, 10</p> <p>Lab Assign #4 / NDG Exams Ch 9 - 10 / Lab Quiz Week 4</p>	<p><u>Reading</u></p> <p>Linux Chapter 9 Linux Chapter 10</p>
5	<p><u>Module 4: Advanced File Management</u></p> <p>Seminar - Managing Processes - Archive Commands</p> <p>Lab - Labs 11, 12</p> <p>Lab Assign #5 / NDG Exams Ch. 11 - 12 / Lab Quiz Week 5</p>	<p><u>Reading</u></p> <p>Linux Chapter 11 Linux Chapter 12</p>
6	<p><u>Module 4: Advanced File Management cont.</u></p> <p>Seminar - File Permissions - Filesystem Links</p> <p>Lab - Labs 13, 14</p> <p>Lab Assign #6 / NDG Exams Ch. 13 - 14 / Lab Quiz Week 6</p>	<p><u>Reading</u></p> <p>Linux Chapter 13 Linux Chapter 14</p>
7	<p><u>Mid Term Exam</u></p> <p>Seminar - Mid Term Review</p> <p>Lab - Mid Term Exam Ch. 1 – 14 - Practical Mid Term</p> <p>Lab Assign – Review / No NDG Exams / No Lab Quiz</p>	<p><u>Reading</u></p> <p>Review</p>
8	<p><u>Module 5: Booting the System</u></p> <p>Seminar - Hardware Configuration - The Boot Process</p> <p>Lab - Lab 15</p> <p>Lab Assign #8 / NDG Exams Ch. 15 - 16 / No Lab Quiz</p>	<p><u>Reading</u></p> <p>Linux Chapter 15 Linux Chapter 16</p>

WEEK or DATE RANGE	ACTIVITY or TOPIC	OTHER NOTES
9	<p><u>Module 5: Booting the System cont.</u></p> <p>Seminar - Bootloaders - Runlevels</p> <p>Labs - Lab 17,18</p> <p>Lab Assign #9 / NDG Exams Ch. 17-18 / Lab Quiz Week 9</p>	<p><u>Reading</u></p> <p>Linux Chapter 17 Linux Chapter 18</p>
10	<p><u>Module 6: Partitioning</u></p> <p>Seminar - Designing a Disk Partitioning Scheme - Creating Partitions</p> <p>Lab - None</p> <p>Lab Assign #10 / NDG Exams Ch. 19-20 / Lab Quiz Week 10</p>	<p><u>Reading</u></p> <p>Linux Chapter 19 Linux Chapter 20</p>
11	<p><u>Module 7: Administration of Filesystems</u></p> <p>Seminar - Mounting Filesystems - Maintaining Integrity - Fixing Filesystems</p> <p>Labs - Labs 21, 22, 23</p> <p>Lab Assign #11 / NDG Exams Ch. 21-23 / Lab Quiz Week 11</p>	<p><u>Reading</u></p> <p>Linux Chapter 21 Linux Chapter 22 Linux Chapter 23</p>
12	<p><u>Module 8: System Software</u></p> <p>Seminar - Package Management</p> <p>Labs - Lab 24</p> <p>Lab Assign #12 / NDG Exam Ch. 24 / Lab Quiz Week 12</p>	<p><u>Reading</u></p> <p>Linux Chapter 24</p>
13	<p><u>Module 8: System Software cont.</u></p> <p>Seminar - Managing Shared Libraries - Virtualization</p> <p>Labs - Lab 25</p> <p>Lab Assign #13 / NDG Exams Ch. 25-26 / Lab Quiz Week 13</p>	<p><u>Reading</u></p> <p>Linux Chapter 25 Linux Chapter 26</p>

WEEK or DATE RANGE	ACTIVITY or TOPIC	OTHER NOTES
14	<p>Review</p> <p>Seminar - Review - Final Exam Details</p> <p>Labs - None</p> <p>Lab Assignment - Review</p>	<p>Reading</p> <p>Review</p>
15	Linux 1 Final Exam – Theory and Practical - TBA	

Students registered with the Centre for Accessible Learning (CAL) who complete quizzes, tests, and exams with academic accommodations have booking procedures and deadlines with CAL where advanced notice is required. Deadlines can be reviewed on the [CAL exams page](http://camosun.ca/services/accessible-learning/exams.html). <http://camosun.ca/services/accessible-learning/exams.html>

EVALUATION OF LEARNING

DESCRIPTION	WEIGHTING
NDG Online Labs	5
NDG Online Chapter Exams	5
Lab Assignments	10
Lab Quiz	15
Chapters 1-14 Theory Linux 1 Exam (Mid Term)	10
Linux 1 Practical Exam (Mid Term)	15
Final Exams Linux 1 (theory)	20
Final Exams Linux 1 (practical)	20
TOTAL	100%

If you have a concern about a grade you have received for an evaluation, please come and see me as soon as possible. Refer to the [Grade Review and Appeals](http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.14.pdf) policy for more information. <http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.14.pdf>

COURSE GUIDELINES & EXPECTATIONS

The following criteria must be met:

- Students must obtain a minimum weighted average of 60% in theory evaluations (tests, examinations etc.) in any course that is a pre-requisite for subsequent courses.
- Students must obtain a minimum weighted average of 60% in lab evaluations (lab performance, reports, etc.) in any course that is a pre-requisite for subsequent courses.
- Students must obtain a minimum of 50% on the final examination for a course in order to receive a passing grade.
- Failure to meet any one of these criteria will result in a student receiving a failing grade for the course.
- All assignments (laboratory work, reports, etc.) must be submitted prior to a student writing a final examination. ALL assignments must be submitted in order to qualify to write a final exam.

- Late assignments will be awarded a mark of zero.

SCHOOL OR DEPARTMENTAL INFORMATION

STUDENT RESPONSIBILITY

Enrolment at Camosun assumes that the student will become a responsible member of the College community. As such, each student will display a positive work ethic, assist in the preservation of College property, and assume responsibility for their education by researching academic requirements and policies; demonstrating courtesy and respect toward others; and respecting expectations concerning attendance, assignments, deadlines, and appointments.

SUPPORTS AND SERVICES FOR STUDENTS

Camosun College offers a number of services to help you succeed in and out of the classroom. For a detailed overview of the supports and services visit camosun.ca/services.

Support Service	Website
Academic Advising	camosun.ca/services/academic-supports/academic-advising
Accessible Learning	camosun.ca/services/academic-supports/accessible-learning
Counselling	camosun.ca/services/health-and-wellness/counselling-centre
Career Services	camosun.ca/services/co-operative-education-and-career-services
Financial Aid and Awards	camosun.ca/registration-records/financial-aid-awards
Help Centres (Math/English/Science)	camosun.ca/services/academic-supports/help-centres
Indigenous Student Support	camosun.ca/programs-courses/iecc/indigenous-student-services
International Student Support	camosun.ca/international
Learning Skills	camosun.ca/services/academic-supports/help-centres/writing-centre-learning-skills
Library	camosun.ca/services/library
Office of Student Support	camosun.ca/services/office-student-support
Ombudsperson	camosun.ca/services/ombudsperson
Registration	camosun.ca/registration-records/registration
Technology Support	camosun.ca/services/its
Writing Centre	camosun.ca/services/academic-supports/help-centres/writing-centre-learning-skills

If you have a mental health concern, please contact Counselling to arrange an appointment as soon as possible. Counselling sessions are available at both campuses during business hours. If you need urgent support after-hours, please contact the Vancouver Island Crisis Line at 1-888-494-3888 or call 911.

COLLEGE-WIDE POLICIES, PROCEDURES, REQUIREMENTS, AND STANDARDS

Academic Integrity

Students are expected to comply with all College policy regarding academic integrity; which is about honest and ethical behaviour in your education journey. The following guide is designed to help you understand your responsibilities: <https://camosun.libguides.com/academicintegrity/welcome>
Please visit <https://camosun.ca/sites/default/files/2021-05/e-1.13.pdf> for Camosun's Academic Integrity policy and details for addressing and resolving matters of academic misconduct.

Academic Accommodations for Students with Disabilities

Camosun College is committed to achieving full accessibility for persons with disabilities. Part of this commitment includes arranging appropriate academic accommodations for students with disabilities to ensure they have an equitable opportunity to participate in all of their academic activities. If you are a student with a documented disability and think you may need accommodations, you are strongly encouraged to contact the Centre for Accessible Learning (CAL) and register as early as possible. Please visit the CAL website for more information about the process of registering with CAL, including important deadlines:
<https://camosun.ca/cal>

Academic Progress

Please visit <https://camosun.ca/sites/default/files/2023-02/e-1.1.pdf> for further details on how Camosun College monitors students' academic progress and what steps can be taken if a student is at risk of not meeting the College's academic progress standards.

Course Withdrawals Policy

Please visit <https://camosun.ca/sites/default/files/2021-05/e-2.2.pdf> for further details about course withdrawals. For deadline for fees, course drop dates, and tuition refund, please visit <https://camosun.ca/registration-records/tuition-fees#deadlines>.

Grading Policy

Please visit <https://camosun.ca/sites/default/files/2021-05/e-1.5.pdf> for further details about grading.

Grade Review and Appeals

Please visit <https://camosun.ca/sites/default/files/2021-05/e-1.14.pdf> for policy relating to requests for review and appeal of grades.

Medical / Compassionate Withdrawals

Students who are incapacitated and unable to complete or succeed in their studies by virtue of serious and demonstrated exceptional circumstances may be eligible for a medical/compassionate withdrawal (see [Medical/Compassionate Withdrawals policy](#)). Please visit <https://camosun.ca/services/forms#medical> to learn more about the process involved in a medical/compassionate withdrawal.

Sexual Violence

Camosun is committed to creating a campus culture of safety, respect, and consent. Camosun's Office of Student Support is responsible for offering support to students impacted by sexual violence. Regardless of when or where the sexual violence occurred, students can access support at Camosun. The Office of Student Support will make sure students have a safe and private place to talk and will help them understand what supports are available and their options for next steps. The Office of Student Support respects a student's right to choose what is right for them. For more information see Camosun's Sexualized Violence Policy: <https://camosun.ca/sites/default/files/2021-05/e-2.9.pdf> and camosun.ca/services/sexual-violence-support-and-education.

To contact the Office of Student Support: oss@camosun.ca or by phone: 250-370-3046 or 250-370-3841

Student Misconduct (Non-Academic)

Camosun College is committed to building the academic competency of all students, seeks to empower students to become agents of their own learning, and promotes academic belonging for everyone. Camosun also expects that all students to conduct themselves in a manner that contributes to a positive, supportive, and safe learning environment. Please review Camosun College's Student Misconduct Policy at <https://camosun.ca/sites/default/files/2021-05/e-2.5.pdf> to understand the College's expectations of academic integrity and student behavioural conduct.

Looking for other policies?

The full suite of College policies and directives can be found here: <https://camosun.ca/about/camosun-college-policies-and-directives>

Changes to this Syllabus: Every effort has been made to ensure that information in this syllabus is accurate at the time of publication. The College reserves the right to change courses if it becomes necessary so that course content remains relevant. In such cases, the instructor will give the students clear and timely notice of the changes.