Job Posting:167461 - Position: S25 Co-op Software Developer - GenAl Course Assistant 167461

Co-op Work Term Posted: 2025 - Summer

App Deadline 03/06/2025 09:00 AM

Application Method: Through UBC Science Co-op

Posting Goes Live: 02/27/2025 01:32 PM

Job Posting Status: Approved

ORGANIZATION INFORMATION

Organization UBC Faculty of Forestry Address Line 1 2651-2424 Main Mall

City Vancouver

Province / State BC
Country Canada

JOB POSTING INFORMATION

Placement Term 2025 - Summer

**b> Job Title ** S25 Co-op Software Developer - GenAl Course Assistant 167461

Position Type Co-op Position

Job Location Vancouver, BC

CountryCanadaDuration12 monthsWork ModeIn-PersonSalary CurrencyCAD

Salary 3200.0 per month for 40 Major List

Job Description

Job Title: Co-op Software Developer ? GenAl Course Assistant

Department: Dean's Office, Faculty of Forestry

Openings: 1

Salary: \$3200/month inclusive of stat benefits

Duration: 12 months, maximum 40 hours per week, from May 2025 to April 2026

Status: Work in-person Job Description:

In this approved TLEF project, the UBC Faculty of Forestry aims to develop a GenAl Course Assistant for large Forestry courses. Referencing verified learning materials, the GenAl Course Assistant will assist students in understanding basic course concepts and policies and provide tailored guidance on assessments to foster independent problem-solving. To support students with varying English proficiency, the tool will integrate resources such as the Faculty of Forestry's Multilingual Forestry Dictionary, offering verified explanations of forestry terminology in multiple languages. The tool will also feature domain-specific, interactive support and learning experiences such as a geomatics coding assistant and a tree walk guide.

By incorporating GenAI, we aim to reduce the workload on teaching teams, allowing them to focus on more complex student support while maintaining academic integrity. Ultimately, this project will foster an engaging and impactful learning environment for our diverse student body.

The Co-op Software Developer will support the software development, data preparation and verification with the supervision from the Forestry Teaching & Learning Support (TLS) unit and consultation with Central LT Incubator team.

Description of Duties:

- Communicates with teaching teams to collect and document project objectives and requirements;
- •Contributes to the development of extended functionality for an existing Next.js chatbot web application;
- •Works with project and teaching teams to identify and translate learning materials into formats consumable by a RAG API;
- •Assists in the development of API integrations for the Canvas LMS;
- •Assists in implementing best practice LLM prompt techniques to ensure query responses encourage critical thought without providing direct answers to student questions;
- •Assists in the oversight of end-user testing, provides technical support as needed and documents feedback;
- Performs analysis of testing and usage data and documents findings for further project iteration;
- •Creates technical documentation for internal processes and end-users;
- •Other duties as assigned.

Supervision Received:

The position will work under direct supervision with the Senior Manager, Educational Strategies, who works closely with the Associate Dean, Academic of the Faculty, to support the ongoing development

and operation of this TLEF project. The position will also work closely with the Web Specialist and other members in the Forestry TLS team and the representative from LT Incubator team.

Work involves both independent work and within a team environment. The employee will maintain regular contact with the Supervisor through weekly meetings and email and telephone, as necessary.

Job Requirements

Qualifications:

Education and Experience:

- Current UBC Vancouver student in at least 3rd year of an undergraduate program or graduate programs in Computer Science or Engineering:
- •Familiarity with version control systems such as git is an asset;
- •Familiarity with prompting techniques such as zero-shot, one-shot, and few-shot, chain of thought, and the differences between reasoning and non-reasoning models is an asset;
- Strong computer and quantitative skills;
- •Experience and knowledge of learning and web technologies;
- •Familiarity with online learning technologies such as Canvas LMS;
- •Familiarity with prompting techniques such as zero-shot, one-shot, and few-shot, chain of thought, and the differences between reasoning and non-reasoning models is an asset.

Skills and Abilities:

- Understanding of the Windows operating system;
- •Knowledge of HTML and CSS;
- Experience working with JavaScript and Node.js;
- •Experience developing data processing, analysis and visualization scripts using Python and libraries such as NumPy, pandas and matplotlib;
- •Familiarity with version control systems such as git;
- •Experience developing web applications using frameworks such as Next.js is an asset;
- •Experience working with relational database technologies such as PostgreSQL or MySQL is an asset;
- •Experience developing integrations via RESTful / GraphQL APIs is an asset;
- •Familiarity with Linux operating systems is an asset;
- •High level of accuracy and attention to detail;
- •Excellent customer service and problem-solving skills;
- •Responsible, professional, reliable;
- •An ability to display initiative and creativity with high productivity;
- •An ability to manage competing priorities;
- •An ability to work efficiently and independently;
- •An ability to establish and communicate boundaries on the scope of support provided;
- •An ability to adequately express ideas orally and in writing to Faculty and staff;
- •Self-motivated and quick to learn; exercises sound judgment to solve problems based on training provided.

Citizenship Requirement

APPLICATION INFORMATION

Application Procedure Through UBC Science Co-op

Cover Letter Required? Yes

Address Cover Letter to Michelle Zeng