Research Associate

Location: Vancouver, BC Company: ScopeSys Inc. Type: Full-time | On-site | Start Date: November 1, 2025

About ScopeSys

At ScopeSys, we build next-generation imaging platforms for single-particle microscopy, with a focus on therapeutic lipid nanoparticle (LNP) analytics. We are a Biotech start-up, currently based at UBC's Biomedical Engineering incubator space.

We're currently expanding our R&D capacity and are hiring a Research Associate to help develop/ validate surface chemistries for our imaging platform's consumables. We are looking for a recent graduate, with Bachelors of Science (BSc) or Masters (MS) in Chemistry, Biochemistry, Physics, Biomedical Engineering, or related fields.

Your Role

As a Research Associate for assay/consumable development, you'll take ownership of:

- Preparing and validating bioinert surface coatings for LNP applications (anti-fouling thin films).
- Running fluorescence-based assays to test surface reactivity, fouling resistance, and binding specificity.
- Test and optimize their stability during storage, with the goal of achieving long shelf life.
- Supporting design and execution of high-throughput, single-particle assays that underpin our microscopy and biophysics platforms.
- Working closely with R&D scientists to iterate and optimize surface-molecule interaction workflows for both research and customer-facing tools.

What You'll Do

- Fabricate and characterize thin films and/or polymer bushes (e.g., PEG) on glass substrates.
- Test antifouling properties of the coated surfaces against various nanoparticle formulations, using QCM-D, SPR and/or microscopy-based assays.
- Document procedures in a reproducible format (SOPs, batch logs, notebooks).
- Maintain lab organization: reagent preparation, cleanliness, inventory.
- Troubleshoot surface fouling, binding inconsistency, or signal variability of the coated substrates, for a series of nanoparticle formulations.
- Interface with the microscopy team to align surface prep with real-time imaging needs.

What You Bring

Must-Have:

- BSc or MSc in Chemistry, Biochemistry, Physics, Biomedical Engineering, or related.
- Strong hands-on experience in surface functionalization, wet chemistry, or polymer coatings.
- Familiarity with fluorescence microscopy or spectrometry.
- Working knowledge of NHS-amine coupling or protein/nucleic acid labeling techniques.
- Comfortable with fast-paced, iterative environments and minimal supervision.

Nice-to-Have:

- Experience with anti-fouling coatings, e.g., PEG, polyzwitterions, PLL-g-PEG.
- Prior work in biophysics, nanomedicine, biosensors, or academic-industry hybrid labs
- Familiarity with ImageJ/Fiji, MATLAB, or Python for data analysis.
- Familiarity with SPR or QCM-D surface characterization techniques
- Understanding of optical biosensing, CLiC microscopy, or surface-based single-molecule assays.

What We Offer

- Hands-on training in next-generation biointerface engineering.
- Opportunity to contribute to translational research, product development, and publications.
- Direct mentorship from cross-disciplinary scientists in surface chemistry, microscopy, and nanomedicine.
- Work in a startup-driven environment with the backing of academic innovation.
- Flexible time-off policy, competitive compensation, and potential for long-term growth within the company.

How to Apply

Send a brief email to admin@sccopesys.ca with:

- Subject line: Research Associate Your resume/CV
- A short paragraph or cover letter telling us why this role interests you and how your experience fits the role.
- Resume with education, project work experience and other relevant information.