

## Software Developer

### ABOUT US:

**Quester Tangent** has had the privilege of being at the forefront of the train technology industry for over 30 years. Based on Canada's beautiful Pacific Coast, our talented team takes pride in helping to make smarter and more connected trains through every stage of the lifecycle - from design to ongoing support. Our leading-edge solutions help enhance public transit systems across North America, making travel safer, more efficient, and comfortable for everyone.

When you join Quester Tangent you will be joining a closely-knit team that is passionate about the work we do and the positive impact it has on transit systems. Working on large, multi-year projects allows you to see the long-term difference you are making. If you would love to contribute to meaningful change in the world's transit networks, Quester Tangent would love for you to join our team.

### THE ROLE:

Reporting to the Software Engineering Manager and working closely under the guidance of assigned other leadership, the Software Developer is responsible for supporting the development of Quester Tangent's on-train and testing applications through a deep understanding of C++ and data-driven, event-based architectures.

This position involves working within a cross-disciplinary team to develop integrated solutions combining various hardware and software components. Developers at all levels contribute throughout the software product development lifecycle, with a focus on conformance, reliability, testability, and maintainability. Responsibilities are scaled according to the developer's skill level, ranging from designing and implementing software to leading project segments and mentoring junior developers.

### COMPENSATION:

The salary range for this role is \$65,000 - \$80,000, though actual compensation may vary based on factors such as experience and qualifications.

### KEY RESPONSIBILITIES:

- Design, implement, test, and debug C++ on-train application software in a Linux environment on ARM targets, involving both new developments and maintenance of existing code bases.
- Collaborate as part of a development team to support detailed design, implementation, and validation of code.
- Engage in coordination and collaboration with software development team members and internal stakeholders.
- Participate in design discussions, code reviews, and support teams in the field to aid personal career progression.
- Prepare requirements, design, and test documentation according to IEEE 1558 software standards.

### QUALIFICATIONS, SKILLS AND ABILITIES:

- Degree/Diploma in Software/Computer Engineering, Computer Science, or a related field.
- Strong experience in C++ programming and debugging (C++11+ preferred).
- Familiarity with version control systems (SVN, git, Perforce).
- Solid understanding of real-time, multi-threaded computing.
- Knowledge of design for test methodologies (white/black box testing).
- Understanding of software standards and best practices.
- Excellent communication skills (verbal and written).
- Strong organizational and multitasking abilities.
- Experience with Linux-based development (gdb, valgrind, tcpdump, SSH).
- Knowledge of IEEE software standards for rail equipment (a plus).
- Experience with Perforce Helix revision control.
- Ability to create automated unit/integration test scripts.
- Familiarity with SQLite or key-value databases.
- Understanding of networking and distributed systems.
- Experience with application networking software is an asset.
- Experience with scripting languages (e.g., Python, Bash).
- Familiarity with web technologies (Node.js, WebSockets, JavaScript, CSS, HTML, JSON).
- Ability to work directly with electronics.
- Experience with JIRA.
- Ability to innovate while ensuring maintainable, testable solutions.
- Strong interpersonal and customer-focused mindset.
- High attention to detail, especially with documentation and records.
- Comfortable working in a fast-paced, dynamic environment with shifting priorities.
- Proactive, solutions-oriented, and committed to continuous improvement.

### WHY JOIN QUESTER TANGENT?

- **Expertise and Innovation:** At Quester Tangent, your ideas shape our future. Our creative community tackles challenges together, celebrating each step forward.
- **Impactful Work:** As a passionate team, we're devoted to improving public transit and making a real difference in communities worldwide.
- **Growth and Development:** We invest in your development through mentorship and opportunities, helping you build expertise and advance your career.
- **Work-Life Balance:** We value your time outside of work and encourage you to disconnect and recharge after hours.
- **Inclusive Culture:** Your unique perspective makes us better. Here, differences are celebrated, and every voice shapes our success.
- **Perks and Benefits:** From quarterly "me days" to engaging company events, our strong compensation package supports your well-being.

*Quester Tangent Corporation is an equal opportunity employer and encourages applicants from diverse backgrounds, including women, Indigenous peoples, persons with disabilities, and members of visible*

*minorities. We are committed to providing accommodation throughout all stages of the recruitment process in accordance with the British Columbia Employment Standards Act (ESA). If you require accommodation during the hiring process, please inform the Human Resources representative. All information regarding accommodation requests will be handled with the utmost confidentiality.*