



Optomechanical Assembly Technician

Tornado Spectral Systems is revolutionizing the chemical analysis instrumentation business. Bolstered by its patented HTVS™ technology, Tornado's flagship HyperFlux™ PRO Plus Raman analyzer delivers unprecedented measurement precision critical for real-time manufacturing process control. Working at Tornado means that you will be surrounded by colleagues who are committed to ambitious goals and love being challenged by problems other companies cannot solve. ***If this sounds like the type of high-performance environment in which you thrive, we want to hear from you.***

Reporting to the Chief Technology Officer, the successful candidate will assemble and test optical devices such as laser-based spectrometer devices ("Raman analyzers") and fiber-coupled sensor heads ("Raman probes") for use by Tornado's customers in the pharmaceutical, bioprocessing, chemical, and petrochemical industries.

Key Accountabilities:

- ❖ Follow and improve upon Tornado's established best practices for optical/mechanical assembly and integration.
- ❖ Collaborate with Tornado colleagues in Manufacturing Operations and Quality Management departments to maintain superior product performance for the benefit of our customer base.
- ❖ Contribute to Tornado's culture of technological innovation and delivery of trustworthy real-time measurements for all of Tornado's analytical markets.

Duties and Responsibilities:

- ❖ Assemble, align, and test spectroscopic equipment (measurement sensors, calibration accessories, and other optical subsystems) at Tornado headquarters in Mississauga, following test protocols jointly developed by the R&D and Manufacturing Operations team.
- ❖ Maintain detailed records of component inspections and assembly test results for compliance with Tornado's ISO 9001 Quality Management System.
- ❖ Gain familiarity with all Tornado systems (hardware and software) in order to assist with product integration and shipment.



Requirements:

- ❖ Bachelor's degree in spectroscopy, optical engineering, analytic chemistry, experimental physics, mechanical engineering, or a related discipline.
 - Please note that this is an entry-level position. Candidates with Masters or Doctoral degrees in relevant fields are welcome to apply with the understanding that salary and duties for this position will not reflect advanced academic skill sets, and research activities are neither expected or supported.
- ❖ Substantial demonstrated hands-on experience with optical systems, spectroscopy, and/or laser optics, either in prior employment or academic laboratory work beyond classwork.
- ❖ Problem-solving mindset and keen attention to detail.
- ❖ Strong communication skills and ability to understand and convey technical concepts, analysis results, and other mission-critical information, both in written documents and verbal interactions, in a fashion that can be clearly understood by other Tornado team members in formal and informal settings.
- ❖ The nature of the job requires the candidate's on-site presence at Tornado's headquarters and laboratory space near Pearson Airport (Toronto's main international airport). Working from home is not supported unless Ontario institutes pandemic lock-down orders.
- ❖ Available to start full-time work in the first quarter of 2022, ideally by mid-February.
- ❖ Bonus skill sets (not required, but will strengthen your application):
 - Prior experience with concepts, terminology, and practice of ISO 9001 or other Quality Management System.
 - Working knowledge of SolidWorks or other 3D design software.
 - Familiarity with data analysis programming languages such as Matlab, Python, IDL, or R.

Success Indicators

- ❖ Acceleration of Tornado's product development and deployment timescales.
- ❖ Commercialization and launch of new Tornado spectroscopy products.
- ❖ Customer adoption of new products and successful utilization to solve real-world problems.

While we appreciate all candidates who express interest, only those selected for an interview will be contacted.

COVID-19 Considerations:

The company has instituted COVID-19 Health and Safety guidelines to meet federal and provincial standards to ensure a clean and healthy workplace.