

18-Month Follow-Up SUMMARY REPORT October 2024

Bachelor of Science in Physics

Dean: Dr. Ken Wilson

Under Ontario Tech University's Institutional Quality Assurance Process (IQAP) and the Ontario Quality Assurance Framework (QAF), all programs are subject to a comprehensive review at least/at minimum every eight years to ensure that they continue to meet provincial quality assurance requirements and to support their ongoing rigour and coherence. Program reviews involve several stages, including:

- 1. A comprehensive and analytical self-study brief developed by members of the program under review.
- 2. A site visit by academic experts who are external to and arm's length from the program. The visit involves discussions with senior academic administrators, faculty, staff, and students.
- 3. Submission of an external reviewers' report including recommendations on ways the program may be improved based on a review of the program's self-study brief, discussions during the site visit and supporting material.
- 4. Internal responses to the external review and recommendations prepared separately by the Program and Dean.
- 5. Development of an Implementation Plan prepared by the Dean including resource requirements and a timeline for acting on and monitoring the implementation of the recommendations.

All programs that undergo a review must provide a report eighteen months after the completion of the review to gather information on the progress that has been made implementing the agreed upon plans for improvement.

In 2020-2022, a review was scheduled for the Bachelor of Science in Physics, with a site visit on December 8-9, 2022. The program has submitted to the Provost's Office a report outlining the progress they have made relative to the implementation plan resulting from the review. A summary of this progress is provided on the following pages.

	Implementation Plan (corresponding reconfigure) from reviewers	Timeline	Status*	Comments from Dean on progress of implementation	
1.	(a) Invest in enough 1 st year lab equipment so they do not need to be offered on a rotating basis	Work on a plan to build up the required equipment (with priorities identified)	Meeting to discuss: Sept. 2023 (or earlier); Preliminary budget submission: Dec. 2023	In progress	Some replacement and augmentation of the 1 st year lab equipment has occurred. There is a need to develop a budgeting plan that factors in the pedagogical needs of the 1 st year program. This plan needs to be driven by the physics faculty/instructors to ensure that the right equipment is obtained with a view to future proofing the labs
	(b) Additional training for 1 st year lab TAs	Physics faculty to assess feasibility (and any costs), review options and develop a plan	Develop plan: Dec. 2023; (resources would need to be approved and allocated; implementation plan (Aug. 2024)	In progress	discussions for TA training for those that do first year labs and tutorials are underway. Not yet implemented but plan to be launched in September 2025

3.	Consider hiring a computational astrophysicist to replace retiring research faculty	Dean to consult with Physics faculty; seek approval to post for Fall 2023	Dean to meet with Physics faculty (May 2023) Seek hiring approval (by September 2023)	In progress	It is not clear if there is sufficient student enrollment demand to justify the expense of an additional hire at this time. An internal review of program/research strengths will be conducted during 2024/25 with a view to proposing a new TTT hire to support the program following the noted retirements
4.	Modify names of two 3 rd year courses	Modify names of these courses (slight variations on what was recommended)	Submit course change proposals (by December 2023)	cancelled	Not viewed by the faculty or the dean as a necessary change
5.	Support increases in physics co-op participation by:				
	(a) Holding a broader, university-level discussion about co-op resourcing	(a) Once the results of a recent external review of experiential learning/co-op are made available, determine how co-op resourcing may be impacted	(a) Determine budget implications (for Science co-op), based on university response to review recommendations and assess next steps (July 2023)	In progress	There is currently a restructuring underway in the university-level co-op and experiential learning office. It looks like additional resources will be made available to the faculty of science for supporting co-op and experiential learning. Physics will benefit from this change. We also added a co-op advisor to the science faculty council to improve communications

	(b) contact alumni about possible co-op positions;	(b) Develop an approach to increase Physics alumni engagement (including possible co-op positions)	(b) Alumni plan developed by July 2023	In progress	Will be done as part of a broader faculty of science outreach/communications/recruitment strategy in 2025
6.	Build a better relationship with the library	Engage the Science Librarian in some upper- year courses focused on research techniques	At least one upper year course with a librarian by April 2024	Continuous	The dean has met with the Science Librarian and is working on that relationship. In discussions with the faculty, some already invite the science librarian to their upper year classes for advice on how to best use library resources for their projects
7.	Initiate a conversation with the Education Faculty to see if a collaborative program can be revitalized	Initiate conversations with the Education Faculty	Initiate conversations with Education Faculty (November 2022)	In progress	Both the Dean of Education and the Dean of Science are new to OTU (Sept 1, 2024). This will be raised at an upcoming meeting.

*Process Status Legend:

Complete: Accomplished action item; no further steps required.

Continuous: Initial action item complete but requires ongoing monitoring and/or enhancement.

In Progress: Progress on the action item has been initiated but is not complete at this time. Outline all steps taken in the comment's column.

On Hold: Unable to complete due to other dependent factor(s).

Cancelled: Item no longer relevant or resources unavailable.

This summary report will be sent for approval to the appropriate standing committee of Academic Council (USC or GSC), and will subsequently be reported to Academic Council. It will then be posted on the Ontario Tech corporate website.

Next Scheduled Program Review: 2027-2029