Three Minute Thesis (3MT) presentations in BIOL 351/352 Labs: Challenges and opportunities

Santokh Singh

UBC Department of Botany, santokh.singh@botany.ubc.ca

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a place of mind

THE UNIVERSITY OF BRITISH COLUMBIA

The University of British Columbia's (UBC) Vision: "PLACE AND PROMISE"

"Expand <u>educational enrichment</u> <u>opportunities</u>, including **research**, a first year small class experience, international learning, community service learning, and co-op/ practicum/ internship opportunities".



Plant Physiology Courses - Background

- **BIOL 351 (FRST 311/APBI 351):** 4 credits (lecture and lab components); focuses on the processes contributing to the assimilation, transport and utilization of water, mineral nutrients and carbon by plants
- BIOL 352: 3 credits (lecture, tutorial and lab components); focuses on the processes involved in growth and development
- Biology Program requirement: Plant Physiology lab credits count towards Biology laboratory credit requirements
- Students: Third- and fourth-year students in the Biology program (Faculty of Science) and students from the Faculties of Forestry and Land & Food Systems

Enriched Educational Experience (EEE) in BIOL 351 and BIOL 352 Labs

1. Independent Research Projects:

Students design, implement and analyze independent, open-ended research projects

- Research project proposal
- Project experiments



- 2. Scientific communication:
- Written reports: students write journal-style research papers
- Oral presentations: ?
- I introduced a modified version of "Three Minute Thesis or 3MT"

Three Minute Thesis (3MT)



HOME ABOUT 3MT COMPETITIONS 3MT SHOWCASE CONTACT

An 80,000 word thesis would take 9 hours to present.

Their time limit... 3 minutes

Vatch >

(http://www.uq.edu.au/grad-school/three-minute-thesis)

- **"3MT**" is a graduate student research communication competition initially developed by The University of Queensland in 2008.
- Each student has **three minutes** to explain the breadth and significance of his/her graduate research using one static slide.
- Helps improve students' academic, presentation, and research communication skills.

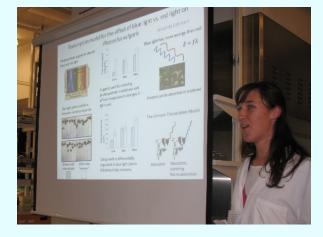
Three Minute Thesis (3MT) in BIOL351/352

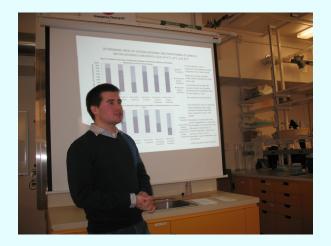
"3MT" as an Assessment Tool:

- Introduced "3MT" as an assessment tool for BIOL 351, BIOL352 and BIOL448.
- Each student gives a 3 min, single slide presentation on his/her research project.
- Assessment by students, TAs and Instructor

Criteria:

- Communication style
- Comprehension
- Engagement





3MT: Opportunities and Challenges

Challenges:

- Requires more time and practice
- Needs more feedback

Opportunities:

- To improve presentation and research communication skills
- To assess the significance of the research and how it relates to the society, and environment.

Students' comments:

"Just like 'the elevator speech' in business circles, the "3-minute presentation" is a highly effective way to teach communication/presentation skills - loved it"

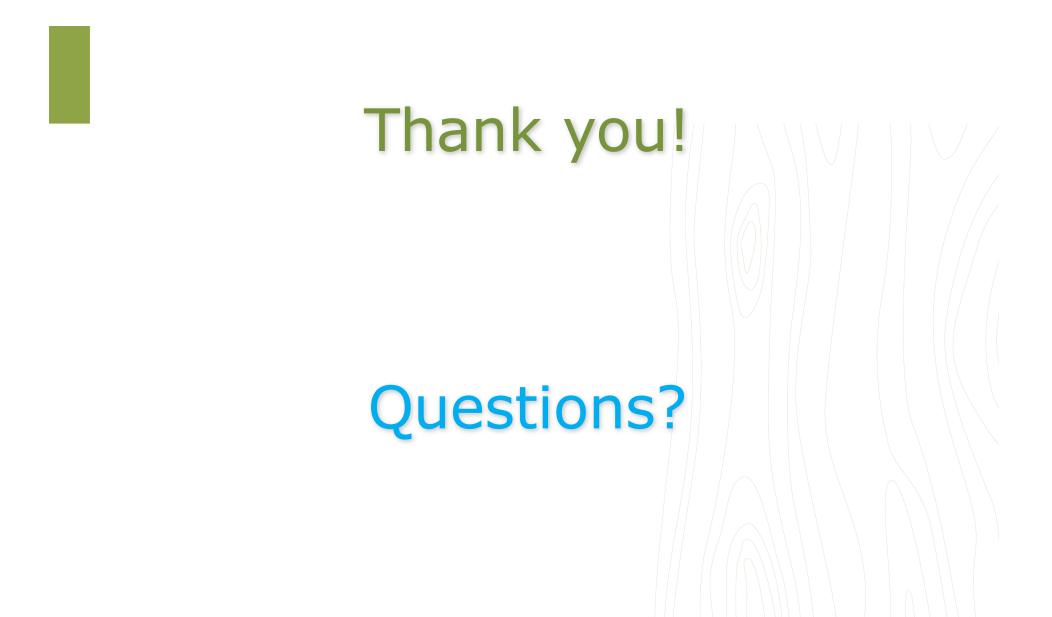
"Wow-it was a good exercise to have to make my results succinct and make it applicable to "real world". UBC Colleagues Carl Douglas Geoff Wasteneys Shawn Mansfield Robert Guy Funding UBC Botany Skylight (FOS) UBC Plant Ops TLEF

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