

Biology Seminar



Western
UNIVERSITY · CANADA

12:30 - 1:30 pm
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BGS 0165



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Acclimation of photosynthesis and leaf respiration to warming and elevated CO₂ – Results from experimental field studies in boreal and tropical regions

Photosynthesis and leaf respiration are key metabolic processes for plant growth and their carbon exchange with the atmosphere are the largest within the global carbon cycle. Most of our understanding on the acclimation of these two processes to climate change variables (temperature and elevated CO₂) is largely based on studies from highly controlled experiments on seedlings, and it is uncertain to what extent these responses would apply to trees growing in realistic field settings. Moreover, plant species from boreal and tropical forests have relatively been less studied compared to those from the temperate region. In this seminar, I will present new findings on acclimation responses of photosynthesis and leaf respiration to warming and elevated CO₂ from field experiments in tropical (Africa – Rwanda and Latin America - Colombia) and boreal (North America – Canada and USA) plant species.

