

SEMINAR NOTICE

*Department of Physics and Engineering Physics
University of Saskatchewan*

SPEAKER: Arash Tavassoli, PhD Candidate
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TOPIC: *Drift instabilities, anomalous transport, and heating in low-temperature plasmas.*

DATE: Tuesday September 13th

TIME: 3:30-4:30 p.m.

PLACE: *Physics 103*

Abstract:

Despite the importance of various nonlinear processes and anomalous transport in plasma propulsion, details of these phenomena remain mainly elusive. The picture gets even more complicated when one considers the role of the computational artifacts associated with several numerical methods used for nonlinear simulations. The primary motivation of our work is to investigate the nonlinear characteristics of drift instabilities and the role of numerical methods in our understanding of these characteristics. Our focus is on two types of drift instabilities, namely the unmagnetized Buneman-type instabilities and the electron cyclotron drift instability (ECDI).