

GRADUATE MODULE

Title of Module: Macrolagal (seaweeds) diversity and applications

Instructor: Dr. A.T. Critchley, (Adjunct) Department of Plant and Animal Sciences, NSAC

Timing: Fall Semester

Module Description

This module will briefly cover the basic characteristics separating green, red and brown seaweeds (macroalgae). A review of techniques of wild stock management, harvesting, and commercial production of seaweeds will be given, particularly in relation to an understanding of reproduction and vegetative propagation.

A major focus will be taken on recent advances in applications of seaweed biomass for commercial applications. We will cover agricultural animal feed and human applications. These topics will consider traditional and novel applications of hydrocolloids and also use of whole plant material as food, functional food and sources of materials for their bioactive properties.

Format:

The course will consist of a field visit and preparation of collected samples (3 hrs). Lectures and seminars; a total of 9 additional hours over 6 weeks.

Method of Evaluation:

Field trip :	20 Points
Class Participation:	20 Points
Final Exam:	30 Points
Term Paper:	30 Points

Prerequisites:

A senior level course in Botany, Marine Ecology, Plant Pathology or Microbiology or Biochemistry or Molecular Biology