# Grazing and the Manipulation of Plant Diversity. (C06-edwards073607-Oral)

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## Abstract:

An understanding of the mechanisms by which grazers affect plant diversity is important for any attempt to manipulate diversity, be it for production, conservation or weed control reasons. The grazing regime (e.g. intensity, animal species, husbandry and season) operating will affect species differentially through a variety of mechanisms including: herbage removal, and the ability of plants to tolerate or avoid this; selective grazing and the alteration of competitive interactions; alteration of recruitment through seed/flower consumption and the creation of vegetation gaps; damage by excretion and trampling; and nutrient pulses in excreta. In this paper, case studies of sheep and cattle grazed experiments in extensified mesotrophic grasslands and improved pastures will be used to illustrate how responses of different plant species to grazing regime can be described in terms of such mechanisms, and how alterations in plant species diversity can be related to species' traits through understanding these mechanisms.

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## **Presentation Information:**

Presentation Date: Monday, November 11, 2002 Presentation Time: 10:55 am

### **Keywords:**

Selective herbivory, spatial grazing, disturbance, biodiversity