

**Topic/Title (Norwegian)**

Kveke, åkertistel og åkerdylle- biologi og bekjemping

**Topic/Title (English)**

*Elymus repens*, *Cirsium arvense* and *Sonchus arvensis* – biology and management

**Picture**



Åkerdylle på vei til å visne ned i stubbåker. Foto: K.S. Tørresen

**Summary**

The perennial weed species *Elymus repens* (couch grass), *Cirsium arvense* (creeping thistle) and *Sonchus arvensis* (perennial sow-thistle) spread by seeds and rhizomes or creeping roots. They are particularly a problem in organic farming and with reduced tillage. If the herbicide glyphosate will be banned or restricted, couch grass control in particular will become problematic due to lack of alternative herbicides. These species have different biological characteristics (e.g. different seasonal restriction in sprouting ability/ dormancy) which affect how they react to various measures such as harrowing, mowing and root cutting. The thesis will be linked to the project SUSWECO that aims to develop sustainable methods in agriculture that reduce the need for intensive tillage and the use of the weed killer glyphosate for the control of perennial creeping weeds such as *E. repens*, *C. arvense* and *S. arvensis*. We investigate whether and how subsidiary crops can be combined with root cutting and the effect of alternative herbicides on weeds and subsidiary crops. New methods for sustainable control of perennial weeds require combining different forms of preventive and direct control measures. Current Master's theses can be, for example:

- Effect of various subsidiary crops on perennial weeds such as *E. repens*, *C. arvense* and *S. arvensis*
- Effect of various mechanical measures



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- Effect of alternative herbicides (pelargonic acid, acetic acid etc.) on weeds and subsidiary crop plants

**Subject area** (keywords)

Perennial weeds, cereals, cover crops, bioherbicides, mechanical treatments

**Language thesis** (Norwegian and/or English)

Norwegian or English

**Bachelor or Master thesis** Master

**Credits**

30 or 60 points

**Project period**

**2023-2026**

**Project/company**

SUSWECO – Sustainable weed control in cereals by combining subsidiary crops and minimal soil disturbances (2023-2026)

**Please contact**

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