

Agronomic evaluation of Italian ecotypes of *Lathyrus sativus* L. in a hilly area of southern Italy.

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Abstract

Lathyrus sativus L. (chickling vetch) has potential among grain legumes for its tolerance to dry conditions and its adaptability to unfavourable environments ⁽¹⁾. Furthermore the chemical composition of the seeds shows high crude protein content and low levels of cholesterol ⁽²⁾.

For these reasons this species could have considerable potential in the sustainable crop systems of the marginal areas of southern Italy. But increasing the amount of *Lathyrus sativus* cropping is subject to the

evaluation of the potential grain yield in the pedoclimatic condition of the hilly environments of south Italy.

The purpose of the present work is to evaluate the grain yields of 25 ecotypes of chickling vetch belonging to the collection assembled many years ago in south Italy by Iannelli ⁽³⁾. Of these ecotypes 17 have light coloured seed and 8 have dark coloured seed.

The trial was carried out in a two year period in a hilly area of southern Italy (700 m a.s.l.). The experimental design was randomised blocks with 3 replications. The biological cycle, grain yields and yield components were determined for all the ecotypes.

The results showed differences between the ecotypes with grain yields ranging from 0.7 t.ha⁻¹ to 2 t.ha⁻¹. High grain yields were generally related to high 1000 seed weight.

References

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