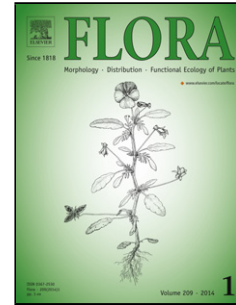


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Are there systematic differences in germination between rare and common species? A case study from central European mountains

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Highlights

- Rare species preferred germination after cold stratification.
- Common species preferred germination during cold stratification.
- Rare species had higher proportions of germinated seeds than those of their common congeners.
- Rare species were apparently well adapted to local conditions in the mountains.
- Germination characteristics did not explain species rarity.

Abstract

Understanding the factors responsible for species rarity is key for designing effective management strategies aimed at long-term conservation of species. Most such studies investigate plant size, competitive vigour or habitat requirements, but studies that explore more complex characteristics of species directly related to different stages of the plant life cycle are much less common. Germination is the most critical stage in the life cycle of many plants and is the primary source of variation in the regeneration niche. However, only a few authors have studied differences in germination requirements between common and rare congeners, and none have studied these requirements for large sets of species.

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