



PEA MUTANT BUDFIX2 as reference line for field assessment of quantity symbiotic nitrogen fixation

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Asymbiotic and symbiotic lines of legumes are convenient tools for the field determining the contribution of symbiotic fixation. To obtain an isogenic reference line for a commercial pea (*Pisum sativum* L.) a mutagenesis program was initiated with cv. Bohatýr.

Further evaluation under controlled conditions and in field trials identified the nonfixing line Budfix2 as a suitable reference line for field estimates of symbiotic nitrogen fixation. This line was shown to be physiologically equivalent to the original cultivar when grown under asymbiotic conditions, when the symbiotic fault was compensated for by exogenous mineral nitrogen.