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[1]王绍东,李远明,刘伟,等.聚丙烯酰胺凝胶电泳快速检测大豆过敏原蛋白Gly m Bd 30 K缺失方法[J].大豆科学,2011,30(04):638-642.[doi:10.11861/j.issn.1000-9841.2011.04.0638]

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## 聚丙烯酰胺凝胶电泳快速检测大豆过敏原蛋白Gly m Bd 30 K缺失方法

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摘要: 通过对现有SDS-PAGE电泳技术的样本前处理和制胶技术的改良,开发出了一种能够同时清晰鉴别7S球蛋白组分亚基( $\alpha'$ ,  $\alpha$ ,  $\beta$ -Subunit)和Gly m Bd 30 K谱带的SDS-PAGE电泳快速检测新技术。利用该方法对PI603570A×O329F<sub>6</sub>杂交组合F<sub>2</sub>群体的116个样本进行了7S球蛋白组分亚基( $\alpha'$ ,  $\alpha$ ,  $\beta$ -Subunit)和Gly m Bd 30K)缺失的筛选,并通过回交转育技术,将7S球蛋白组分亚基的缺失性状成功导入到黑龙江主栽品种中去。新方法可以有效地加快筛选进程,降低筛选成本,对过敏原蛋白缺失大豆种质创新具有重要意义。

Abstract: In this research, through the improvement of the sample pretreatment and confection of the gel, a fast detection method was developed for simultaneous determination of  $\alpha'$ ,  $\alpha$ ,  $\beta$ -Subunit and Gly m Bd 30 K lacking individual using sodium dodecyl sulfate polyacrylamide gel electrophoresis (SDS-PAGE) in soybean seeds. We have screened F<sub>2</sub> (PI603570A×O329F<sub>6</sub>) population (N=116) in 7S globuline lacking by this method. Moreover, we have introduced the lacking character into the major soybean varieties in Heilongjiang province through the backcross breeding. The results indicated that the method was better in velocity and less costs of the screening. It is significant for the development of soybean germplasm in the allergen proteins lacking.

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