含降血脂機能性多胜?汕鈰穑]番茄之育成

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摘 要

本研究運用mutagenesis技術，變更番茄ammonium transporter (Amt1)基因之DNA序列，使其所轉譯之胺基酸序列與VVYP相近者變更為VVYP，藉由番茄大量表現富含降血脂機能性多胜?向VYP之蛋白。首先將已構築完成於pGEM-T載體上的Amt1 cDNA，進行DNA序列改造，使其所轉譯胺基酸序列可分別含有一個、兩個及三個LVVYPW胜?戍　C。改造後之Amt1基因構築於植物表現載體pBI121上，藉由農桿菌將基因轉殖入番茄與菸草植株。隨後再利用genomic PCR與RT-PCR (reverse transcription-PCR)，鑑定番茄及菸草轉基因株系確實攜帶改造之Amt1基因並可表現mRNA。亦分析其蛋白質表現量情形，以推估內含之活性胜?向VYP含量，以做為未來動物老鼠餵食試驗之憑據。

關鍵詞 : 番茄、overlapping PCR、胜?式B血脂、基因轉殖

目錄

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