Plant DNA digests
Plasmid DNA digests

Plant DNA digests

CSS451 Plant DNA digests
CSS451 digests
Plant  Plasmid
Southern Analysis
Optimizing DNA digest concentrations

2  4  8  12  16  20  24 ug
Estimating Yield of Dig-labeled Probe

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name: pBIML2
frame vector (FV): PS20 A-G
donor vector (DV): Cry v/PBI121
adopted enzyme sites: BamHI
length info: Pnos 1-306
NPT II 342-1136
nos-T 1161-1413
P-patatin
Cry V 2200bp
GUS 1811bp
nos-T 320bp (from GUS end)
Frame length 7883bp (other than RB-LB)

MAP

PROCEDURE

RE TEST
Plasmid DNA Southern Analysis

Bt-cry5
2244 bp
name: **PBI121(Cry V)**
source info: Cry V gene (in pBS) from ICI Seed inserted into PBI121
length info:  
- **Pnos** 1-306
- **NPT II** 342-1136
- **nos-T** 1161-1413
- **CaMV35S** 2090-2962 (HindIII-BamHI)
- **Cry V** 2200bp
- **GUS** 1811bp
- **nos-T** 320bp (from GUS end)
**Frame length** 7883bp (other than RB-LB)
Southern Analysis

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Integration

A

Copy number

B

2.0kb
1.9kb

21kb

5.1kb
4.9kb
Northern Analysis

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4.0kb
Southern Analysis

Non-specific Binding of probe because wrong buffer was used.

Non-binding Of Probe because of poor Hybridization.
Southern Analysis:
Light-exposed film
Southern Analysis:
Light-exposed film
name: pBIML6a
frame vector (FV): pBILM5
donor vector (DV): PVY/PBI121
adopted enzyme sites: PvuII and EcoRI
length info: Pnos 1-306
NPT II 342-1136
CaMV35S 800bp
Cry V 2200bp
PVY 1200bp
Frame length 7883bp (other than RB-LB)
RAPD Analysis of *Bt-cry5/PVYcp* transgenic potatoes
Southern Analysis of *Bt-cry5/PVYcp* transgenic potatoes: Integration
Southern Analysis of *Bt-cry5/PVYcp* transgenic potatoes: Copy Number
Northern Analysis of \textit{Bt-cry5/PVYcp} transgenic potatoes: Leaf tissue
Northern Analysis of *Bt-cry5/PVYcp* transgenic potatoes: Tuber tissue
Western Analysis of *Bt-cry5* Potatoes
Progeny analysis of crosses between \textit{PVYcp} and \textit{Bt}-transgenic potatoes: PCR results

\begin{tabular}{cccccccccc}
1 & 2 & 3 & 4 & 5 & 6 & 7 & 8 & 9 & 10 & 11 & 12 & 13 & 14 & 15 & 16 \\
\end{tabular}

\begin{itemize}
\item 500 bp
\item 456 bp
\item 256 bp
\end{itemize}

\begin{itemize}
\item PVY
\item Cry1a
\item NPTII
\end{itemize}
Progeny analysis of crosses between *PVYcp* and *Bt*-transgenic potatoes: Southern Analysis results
Fingerprint Analysis of Potato Varieties