

Title (en)

PLANTS WITH REDUCED SUSCEPTIBILITY TO PLANT-PARASITIC NEMATODES.

Title (de)

PFLANZEN MIT VERMINDERTER EMPFINDLICHKEIT FÜR PFLANZENPARASITÄRE NEMATODEN.

Title (fr)

PLANTES PRESENTANT UNE SUSCEPTIBILITE REDUITE A DES ATTAQUES DE PARASITES TELS QUE DES NEMATODES.

Publication

EP 0666922 A1 19950816 (EN)

Application

EP 93924590 A 19931102

Priority

- EP 93924590 A 19931102
- EP 9303091 W 19931102
- EP 92203378 A 19921102

Abstract (en)

[origin: WO9410320A1] The present invention provides recombinant DNA containing a plant expressible gene which comprises in sequence: a promoter that drives expression of a downstream gene specifically in an initial feeding cell and/or a nematode feeding structure, a gene encoding a product that is inhibitory to an endogenous gene encoding a protein or polypeptide selected from the group consisting of ATP synthase, adenine nucleotide translocator, tricarboxylate translocator, dicarboxylate translocator, 2-oxo-glutarate translocator, cytochrome C, pyruvate kinase, glyceraldehyde-3P-dehydrogenase, NADPH-cytochrome p450 reductase, fatty acid synthase complex, glycerol-3P-acyltransferase, hydroxymethyl-glutaryl CoA reductase, aminocyl transferase, a transcription initiation factor, and a transcription elongation factor, a transcription terminator and a polyadenylation signal sequence, and wherein the said gene is expressed in said initial feeding cell or nematode feeding structure upon infection by the said nematode. The invention further provides plasmids, bacterial cells, recombinant plant genomes, as well as plant cells, plants and parts thereof, still harbouring recombinant genomes. The invention further provides plants with reduced susceptibility against plant parasitic nematodes, as well as methods for obtaining same. Growing plants according to the invention in the field reduces yield losses due to nematode attack and/or reduces nematode populations in the soil.

IPC 1-7

C12N 15/82; **A01H 5/00**

IPC 8 full level

A01H 5/00 (2006.01); **A01H 5/06** (2006.01); **C07K 14/415** (2006.01); **C12N 9/02** (2006.01); **C12N 9/10** (2006.01); **C12N 9/14** (2006.01); **C12N 15/82** (2006.01)

CPC (source: EP)

C07K 14/415 (2013.01); **C12N 9/0008** (2013.01); **C12N 9/0042** (2013.01); **C12N 9/1029** (2013.01); **C12N 9/14** (2013.01); **C12N 15/8285** (2013.01); **C12Y 102/01009** (2013.01); **C12Y 106/02004** (2013.01); **Y02A 40/146** (2017.12)

Citation (search report)

See references of WO 9410320A1

Designated contracting state (EPC)

AT BE CH DE DK ES FR GB GR IE IT LI LU MC NL PT SE

DOCDB simple family (publication)

WO 9410320 A1 19940511; AU 5420594 A 19940524; CA 2148451 A1 19940511; EP 0666922 A1 19950816

DOCDB simple family (application)

EP 9303091 W 19931102; AU 5420594 A 19931102; CA 2148451 A 19931102; EP 93924590 A 19931102