METHOD TO IMPROVE THE ROOTING OF CUTTINGS

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HINTERGRUND

The vegetative propagation of various ornamental plants is dependent on appropriate rooting of cuttings. For some species rooting of cuttings is difficult to achieve, some even fail producing roots and for others a time and labor consuming process is required. Despite intensive control of environmental factors and modern techniques in the propagation of cuttings, still significant losses occur as a result of insufficient rooted cuttings that are of great economic value.

PROBLEMSTELLUNG

The rooting process requires a continuous development with no breaks. Among critical factors, nutrient application is the main crucial factor.

LÖSUNG

The present invention provides a new method for improving rooting of cuttings by stimulating the formation of adventitious roots. The stimulation is achieved by applying a specific compound in a low concentration. Depending on the plant species, a single application of one substance or a combination of two substances is sufficient.

ENTWICKLUNGSSTAND

Funktionsnachweis

PATENTSITUATION

DE anhängig

CATEGORIES

//Grüne
Biotechnologie //Agrartechnologie
The approach is straightforward.
Well-known compounds are used.
The approach is easy because
- the compounds need to be applied only once.
- the solution which is applied contains only one compound.
- it can be combined with the application of other compounds i.e. N-containing compounds
The approach is cost-efficient.
There is no need for complex expensive nutrient Solutions.

Figure 1: Comparison of rooting of cuttings after application of different biostimulators
ANWENDUNGSBEREICHE

- Propagation of cuttings

SERVICE

ESA PVA is - in the name of the Leibniz Institute of Plant Genetics and Crop Plant Research (IPK) - seeking partners who would be interested in developing the technology for routine propagation of various plant species. Scientific assistance for an industrial partner can be assured in a proper way within the frame of further development for the market and market entry.