Name: 35S::PPase (AVP1)

Accessions: Oth6

Gene ID:

Map position:

Gene function: vacuolar H⁺-pyrophosphatase

Gene effect: Transgenic plants probably increase cell expansion or multiplication in internodes.

Phenotypes: MT-*Avp1* presents long internodes and increased plant height. There is no obvious alterations in leaf size of form. The plants are resistant to kanamycin, which is the selectable maker in the vector used.

Comments:

Description of accessions available: MT-Avp1 is a BC6Fn. The first transgenic plants with this construct were produced in cv Moneymaker by Dr. Roberto Gaxiola.

Figures:



MT-Avp1 (left) showing its increased plant size.

Bibliography

Park S, Li J, Pittman JK, Berkowitz GA, Yang H, Undurraga S, Morris J, Hirschi KD, Gaxiola RA (2005) Up-regulation of a H⁺-pyrophosphatase (H⁺-PPase) as a strategy to engineer drought-resistant crop plants. Proc. Natl. Acad. Sci. U.S.A., 102:18830–18835.