

Supplemental Figure 1

Aoki et al. (2005)



Supplemental Figure 1. Estimation of sink-source status of tracer-applied-leaf by introducing radiolabelled nucleotide.

[α - ^{33}P]UTP (Wako Pure Chemical Industries Ltd., Osaka, Japan) was diluted with introduction buffer, and 38 kBq was applied to cut insect-stylet. After 4 h, images of rice plant were obtained by using Fujix BAS 2000 system (Fuji Photo Film Co. Ltd., Tokyo, Japan). Exposure time was approximately 24 h.

Right and left panels demonstrate photograph and autoradiogram, respectively.

Strong signal observed in tracer-applied leaf (yellow arrows) indicates the introduced UTP that did not move to distant organs. Most of the radioactivity translocated to younger distant leaves (blue arrows). In contrast, radioactivity was hardly detected in roots (red arrows). This result demonstrated that tracer-applied leaf functioned as a source leaf for younger leaves, and shoot-ward bulk flow was predominant over root-ward flow.