



Figure S3. Isolation of new *vict* mutant alleles that reveal key residues for the DFPM-induced root arrest.

(A) Nineteen *dfn* (DFPM-insensitive to root growth) mutants were isolated from the activation tagging mutant population. Seven-day-old Col-0 seedlings grown in a normal plate medium were transferred to a new plate containing 10 μ M DFPM. Each primary root of the seedlings was monitored to observe any root growth defect after six days. The data represent the mean values \pm SD ($n=3$, each with 12 seedlings). (B) Several *dfn* mutations were positioned in the TNL gene *VICTR* by a map-based cloning approach. Initial mapping showed that the *dfn* locus displayed a linkage to the *ciw9* marker on chromosome V. The additional markers between *ciw9* and MBK-5 were used to narrow down the candidate to the 50 Kb region. The numbers under the linkage map indicate the number of recombinants. (C) Entire *VICTR* genes of 19 *dfn* mutants were sequenced and compared with that of the wild-type Col-0 and other Arabidopsis accession Leo-1 and Bay-0 plants. Among the *dfn* mutants analyzed, 12 *dfn* mutants contain mutations in the *VICTR* gene that were recognized as new *vict* mutant alleles. New *vict* mutant alleles were classified into two different groups based on their nucleotide changes. Six *dfn* mutants of the first group carry a single point mutation, valine(1040) to leucine in the *VICTR* C-terminus region. The other six *dfn* mutants belonging to the second group contained two nucleotide substitutions, asparagine(1042) to lysine and the group 1 mutation, Val1040Leu.