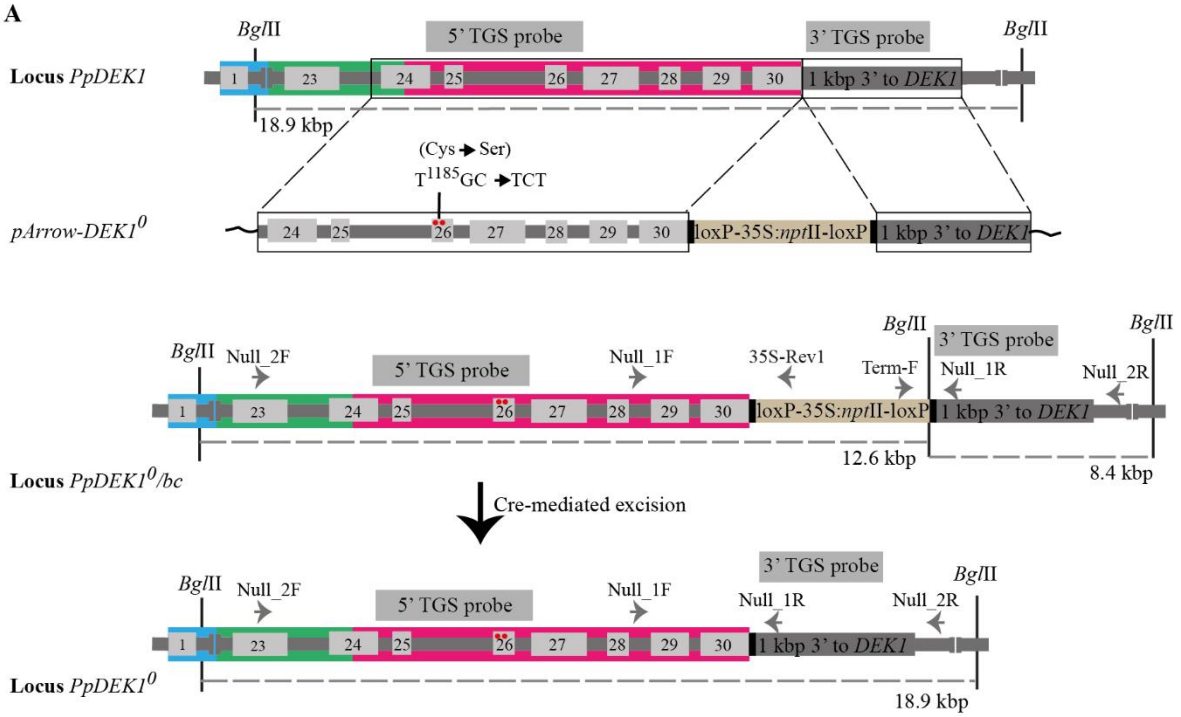
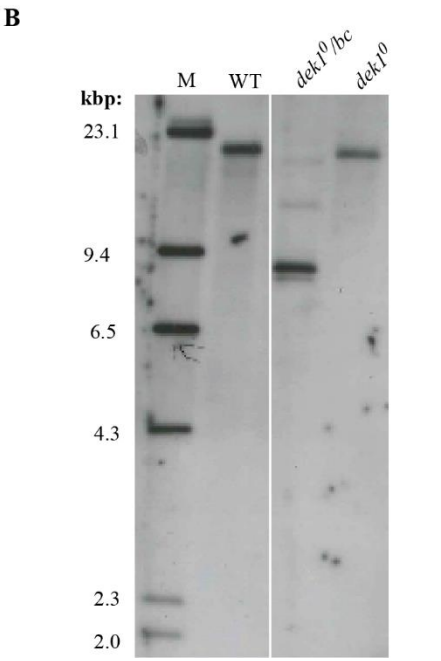
Supplemental Figure S7





Supplemental Figure S7. Vector construction, targeted insertion and molecular characterization of the *Physcomitrella patens dek1⁰* mutant line. A, Schematic representation of gene targeting using the *pArrow-DEK1⁰* vector. Blue, green and red highlights represent DEK1 MEM, Linker and calpain sequences, respectively (for the DEK1 protein domains, see Figure 1A). The numbers in the grey boxes correspond to the exons of the *P. patens DEK1* gene. The 5' and 3' targeting sequences (TGS) are boxed. The two red dots in exon 26 indicate the position of the site-directed mutations from GC to CT in the codon starting at nucleotide 1185 relative to the *DEK1* start codon, and corresponds to the active site amino acid cysteine (Cys). Annealing sites for primers used for genotyping are shown with arrows (primer sequences can be found in Supplemental Table S3). The hybridization sites of the Southern blotting probes are shown above the schematics. The restriction enzyme used for Southern blotting and its restriction sites are indicated, and the corresponding expected band sizes are also shown. B, Southern Blotting analysis. Southern blotting was performed to confirm insertion of the *nptII* resistant cassette into WT. Restriction fragments were generated using *Bgl*II and the blot hybridized with a mixture of 5' and 3' TGS probes (A) displayed the expected hybridization signals. M = marker; WT = wild type, Positive control: WT.