

Supplementary Fig. S5. Scheme desiccation effects in *Klebsormidium* cell. In hydrated cell, callose is abundant in the longitudinal cell walls between individual cells and the centre of the cross cell walls. The parietal chloroplast is shaped as incompletely closed tube (left). During desiccation, additional incorporation of callose into the cross cell walls allows regulated reduction of the cell diameter. The margins of the tube-like chloroplast become closely attached to prevent strong deformation (right).