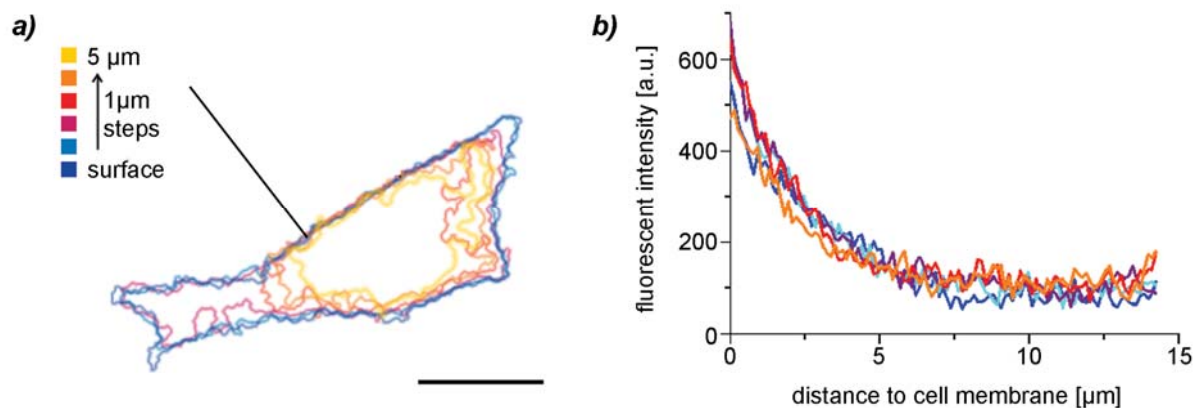
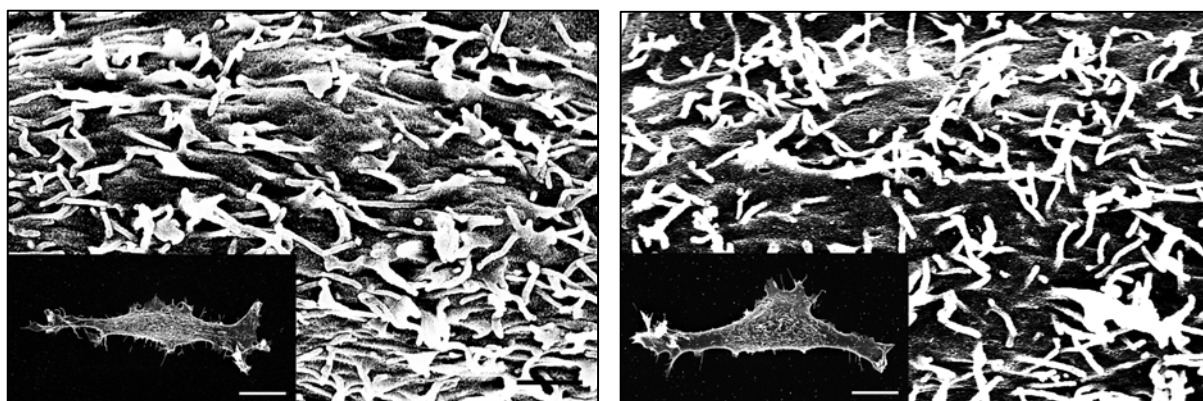


Supplemental information:



Supplemental Fig. 1: The decrease in fluorescent intensity of stained hyaluronan is not caused by a curvature of the cell's plasma membrane. The height profile (a) corresponding to the cell in Fig. 1a illustrates that the fluorescent intensity profiles (b) are observed on a straight "cell wall" with no curvature in any direction. The different profiles (b) are calculated at the different heights defined in (a).



Supplemental Fig. 2: The plasma membrane of RCJ-P cells is covered with small protrusions. These microvilli are especially evident on critically point dried cells visualized in SEM microscopy. Treatment of cells with hyaluronidase to remove the PCC (left image) does not change the microvilli surface concentration. Scale bars of inset images and width of enlarged membrane sections correspond to 10 μm. Cells were allowed to adhere for 6 h before they were fixed with 1% glutaraldehyde and washed with 1% BSA solution in PBS. Afterwards they were incubated in ethanol water mixtures for 20 min each, where the ethanol concentration was increased from 50 to 100% in 10% steps.