



Figure S4: Organization of the perijunctional F-actin belt in IP₃R1-GFP and Nter-GFP cells. (A) Polarized MDCK cells expressing IP₃R1-GFP were fixed, permeabilized and double stained for myosin IIA and F-actin. Representative images of myosin IIA and F-actin distribution in individual confocal x-y sections captured at the cell apex are shown. (B) Polarized MDCK cells expressing IP₃R1-GFP or Nter-GFP were fixed, permeabilized and double-stained for claudin-2 and F-actin. Single confocal x-y sections captured at the TJ level and intensity profiles of rhodamine-phalloidin and claudin-2 fluorescence obtained along the x axis at the TJ level are presented. Arrows denote positions of the x-z projections. Scale bar, 10 μm. (C) Schematic illustrating the differences between polarized Nter-GFP and IP₃R1-GFP cells. Red lines illustrate F-actin organization. Arrows represent the centripetal force imposed by myosin IIA on the perijunctional actin belt which contributes to cell compaction.