SUPPLEMENTAL FIGURE 1

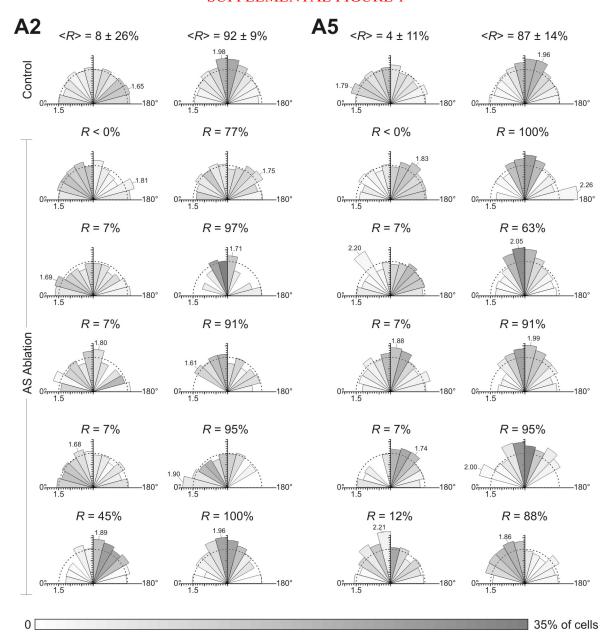


Figure S1. Dynamic elongation and alignment of germ band cells after ablation of one flank of the amnioseroa. For each rose diagram, the shading of a sector represents the fraction of cells aligned in a particular direction – darker for larger fractions (grayscale bar at the bottom of the figure). The length of each wedge is proportional to the mean aspect ratio of cells aligned within that sector. An aspect ratio scale is provided by tick marks on the radial axis, a semicircle at a mean aspect ratio of 1.5, and labeling of sectors with the most elongated cells. An angle of 90° represents alignment of cells towards the amnioserosa, *i.e.*, along the local *y*-axis. Dynamic cell shape changes were tracked in segments **A2** (two leftmost columns) and **A5** (two rightmost columns) from early to late germ band retraction. The first row shows a compilation of results from control-group embryos. Subsequent rows show results from individual embryos in which one flank of the amnioserosa was ablated. Pre- and post-ablation images of each ablated embryo

were taken one to two hours apart. Each pre-ablation image was stage-matched to control embryo image. Each post-ablation image was matched to a later image of the same control embryo based on the elapsed time between pre-and post-ablation images. The stage of this matching control (R = % retraction) is reported above each rose diagram. For the compiled control-group rose diagrams, R is reported as the mean \pm one standard deviation.