



Fig. 20 PANDA2 prediction. In the PANDA2 model of local post-buckling the axial wavelength of the buckles varies smoothly with axial load,  $N_x$ . This is because the PANDA2 Koiter-type model of local post-buckling is based on an axial segment of an infinite panel. There are no  $x$ -boundaries (boundaries at  $x = 0$  and at  $x = 9.7783$  inches. Therefore, there is no mode jumping in the PANDA2 model. The axial wavelength of the buckles is one of the four unknowns in the nonlinear local post-buckling analysis [3,22]. The presence of  $x$ -boundaries in STAGS models of local post-buckling sometimes causes the local post-buckling displacement pattern to change dynamically, something that cannot happen with the PANDA2 model. See Figs. 48 – 52 for an example of mode jumping as predicted by STAGS for this configuration.