



**Fig. S6. Fourier shell correlation (FSC) curves.** The estimated resolutions (FSC = 0.5) are 25 Å, 34 Å and 38 Å for the  $\Delta$ N-VPS4p, full-length Vps4p and Vta1p-Vps4p complexes, respectively. The N-terminal domain of Vps4p is responsible for recruiting substrates and contains an MIT domain and a long linker. It is therefore likely to be at least partially disordered. The adaptor protein Vta1p also participates in substrate binding and appears to be mostly disordered in solution (Wes Sundquist, unpublished). Thus the resolutions obtained correlate with the expected degree of disorder.