



Figure 4.4: (color online) Spectral density function, $A(x = .5L, k_y, E)$, for values of μ from 0 eV to .14 eV. These images are used in a movie found online[2]. The linear dispersion ($E \sim k$) transitions to a flat band ($E \sim k^N$) as μ increases. This flat band is responsible for the peak in DOS in figure 4.2.