



**Figure S4. Agenet Domain Binding to Methylated MLA Histone Substrates, Related to Figure 3**

(A) In vitro pull-downs using FMRP GST-Agenet domain and MLA histones carrying methyl lysine analogs at various sites.

(B–D) Equilibrium binding analysis of Agenet<sub>FMRP</sub> interaction with MLA histone substrates using microscale themophoresis (MST). Independent binding reactions were performed a minimum of three times. Data points were plotted with the x axis representing nM concentration of modified histone proteins and y axis representing  $\Delta F_{Norm} [\%]$ , which is the reduction of fluorescence due to directed movement of molecules in a microscopic temperature gradient.