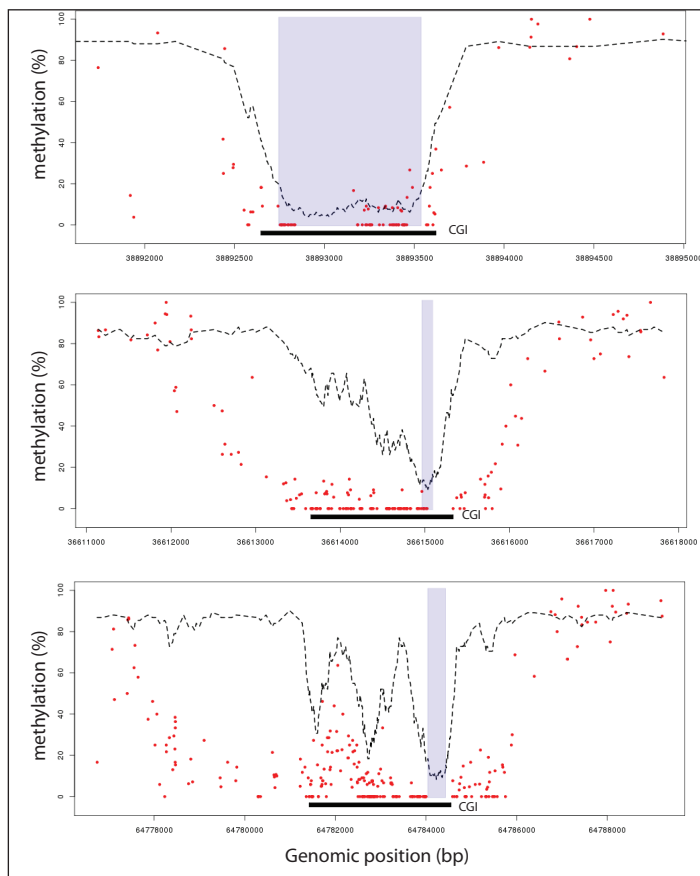


A



B

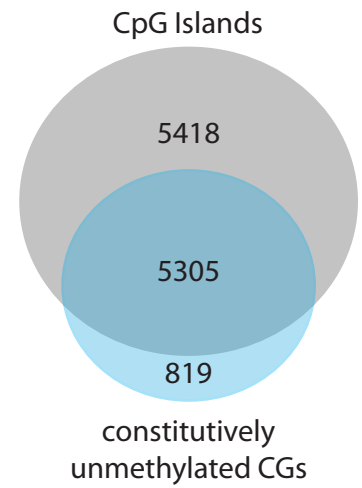


Figure 5-figure supplement 1:

(A) Single locus examples of constitutively unmethylated regions (highlighted by blue boxes). Regions were defined as stretches of successive CGs with low predicted score based on their CG density ( $<20\%$ ). Shown are single CG methylation levels in mESC (red dots) and the predicted methylation based on CG density only (dotted line). The examples illustrate the diversity of distribution of those regions in the context of CGI definition, illustrating the heterogeneity of methylation regulation within islands. (B) Distribution of the constitutively unmethylated regions relative to CpG islands (CGI from UCSC). While the vast majority of the constitutively unmethylated regions are contained within islands, less than 50% of CGI contain such a constitutive CGs.