

Figure S3. Waterfall plot highlighting SNP-environment interactions in in situ melanoma (M-is).

Relationships were computed using a robust joint interaction test and assessed for significance using the False Discovery Rate (FDR) method. These findings highlight sunlamp use and history of childhood sunburns as major and moderate (respectively) interacting factors with DNA repair genes to mediate the risk of M-is. This figure also highlights *POLK* and *MNAT* as critical genes which interact with nearly every demographic, environmental and behavioral variable.