










**Supplementary Table S1.** ATAC-Seq enriched motifs in EZH2 GOF mutants.

Name	Composite Logo	p-value	
		EZH2 <sup>Y641F</sup>	EZH2 <sup>A677G</sup>
ATF1		1E-169	NF
FOXF1		NF	1E-68
FOXO1		1E-249	NF
GATA4		1E-64	1E-41
HOXB9		1E-53	NF
RELA		NF	1E-56
SMAD3		1E-129	NF
SMAD4		1E-86	1E-27
ZIC2		1E-164	1E-59

NF, Not found significant.