

Variable	Selection
At least 1 AK8 jet J	$p_T > 300 \text{ GeV}, \eta < 2.4$
At least 2 AK4 jets j_1 and j_2	$p_T > 30 \text{ GeV}, \eta < 2.4$
$\Delta R(J, j_i)$	> 0.8
$\Delta R(j_1, j_2)$	< 1.5
$ \Delta\eta(J, j_1 + j_2) $	≤ 2
$m_{Jj_1, \text{red}}$	$> 750 \text{ GeV}$
J soft-drop mass	105–135 GeV
J τ_{21}	< 0.55
J double-b tagger discriminator	> 0.8
$j_1 + j_2$ mass	90–140 GeV
$j_1 + j_2 + (\text{nearest AK4 jet})$ mass	$> 200 \text{ GeV}$
j_1 and j_2 DeepCSV	70% b-tagging eff., 1% mistag
Number of isolated leptons (e or μ)	$= 0$