k	R_z	R_x	R_y
1	T	HTH	$SHTHS^\dagger$
2	S	HSH	HZ
3	$ZT^\dagger$	$HZT^\dagger H$	$SHZT^\dagger HS^\dagger$
4	Z	X	ZX
5	ZT	$HZTH$	$SHZTHS^\dagger$
6	$S^\dagger$	$HS^\dagger H$	ZH
7	$T^\dagger$	$HT^\dagger H$	$SHT^\dagger HS^\dagger$