

Sea detuning sweep report (Ga sea / Al rare)

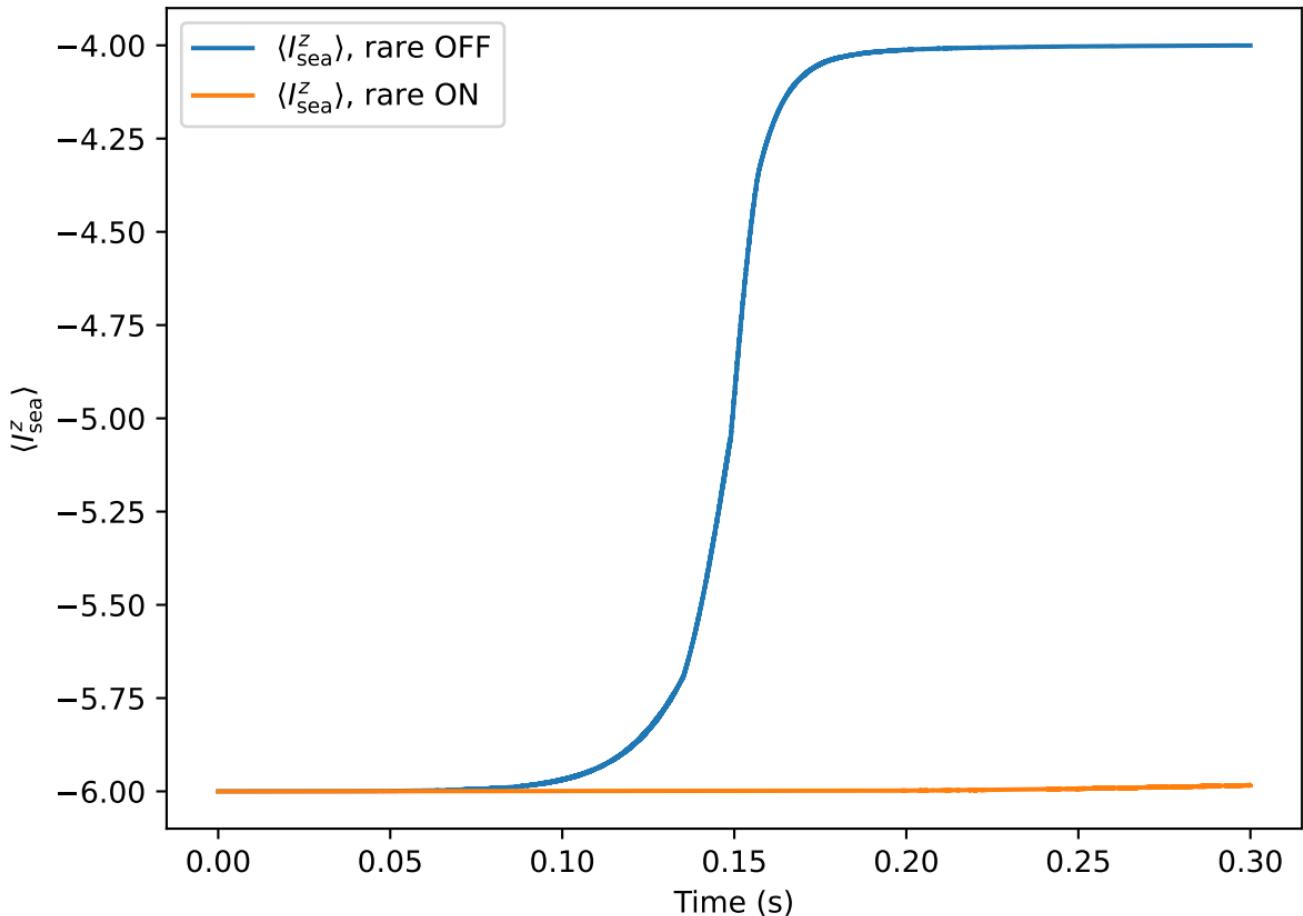
Global parameters (constant across sweep):

f_Az (sea Larmor)	= 39.062 MHz
f_Rz (rare Larmor)	= 33.308 MHz
f1A (sea Rabi)	= 0.020 kHz
f1R (rare Rabi)	= 2.000 kHz
gamma_sea	= 8.181e+07 rad·s ⁻¹ ·T ⁻¹
gamma_rare	= 6.976e+07 rad·s ⁻¹ ·T ⁻¹
B0_common	= 3.000 T
B1_sea	= 1.536e-06 T
B1_rare	= 1.801e-04 T
dipolar_scale_SI	= 1.055e-41
shell_scale	= 0.300 nm
t_final	= 3.000e-01 s
steps	= 20000
n_sea	= 12
phi_sea	= 1.571 rad
phi_rare	= 1.571 rad
sea_spin_type	= 1/2
rare_spin_type	= 1/2

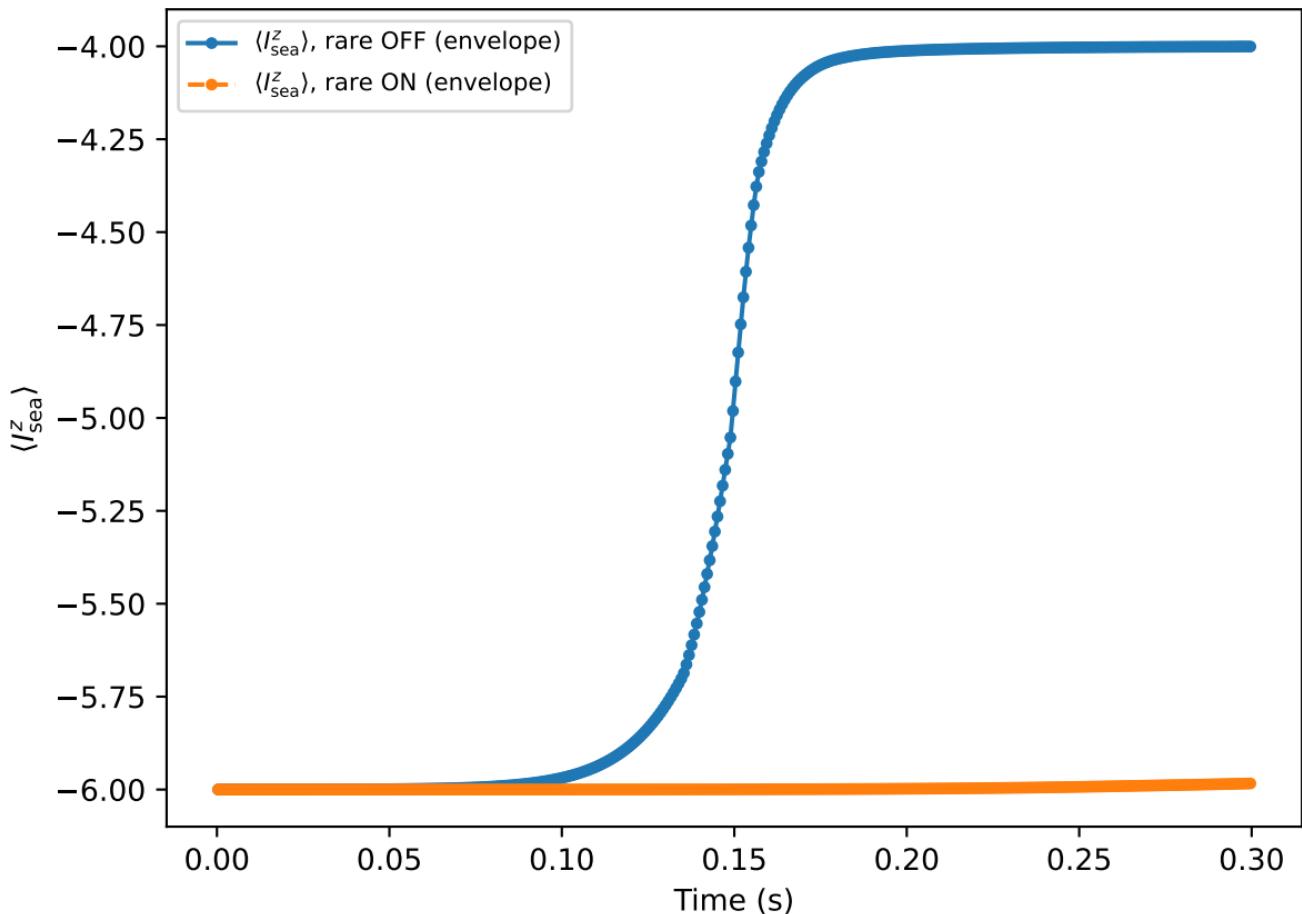
Sea detunings ($\delta_A = f_Az - f_rf, A$) in Hz:

+10000.0, +15000.0, +20000.0, +25000.0, +30000.0, +35000.0, +40000.0, +45000.0, +50000.0

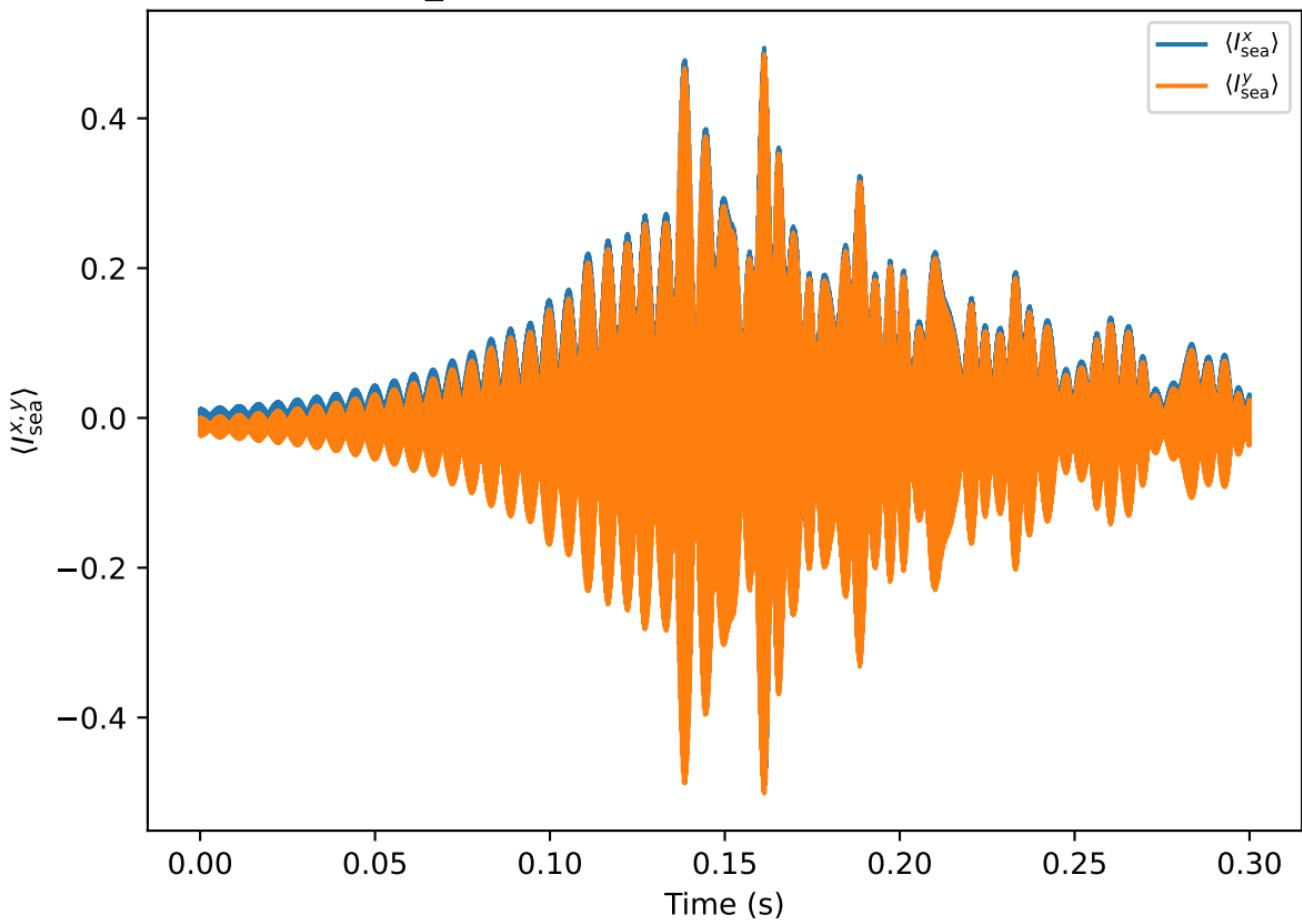
$\delta_A = +10000.0$ Hz



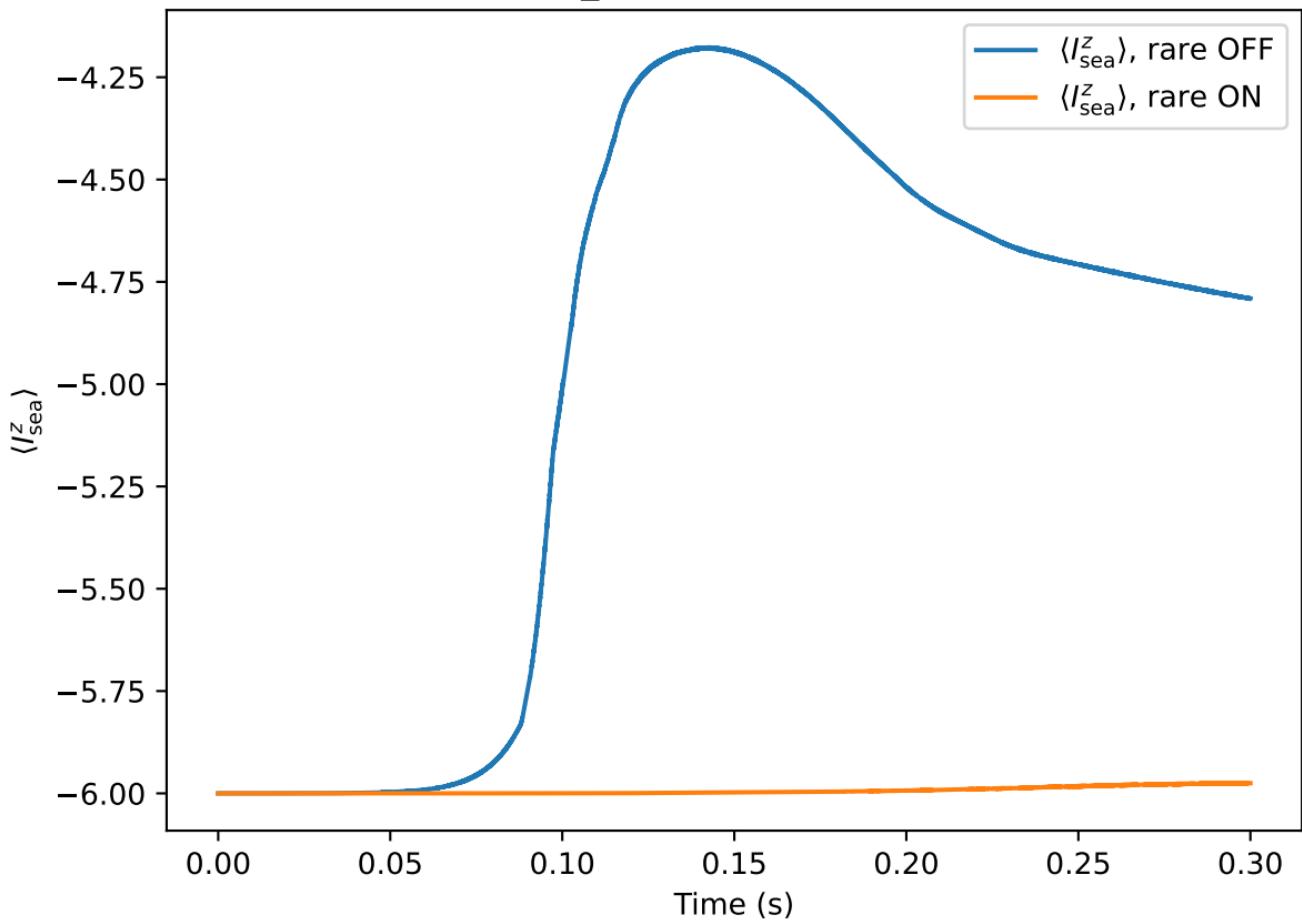
$\delta_A = +10000.0$ Hz (pseudo T_1 envelope)



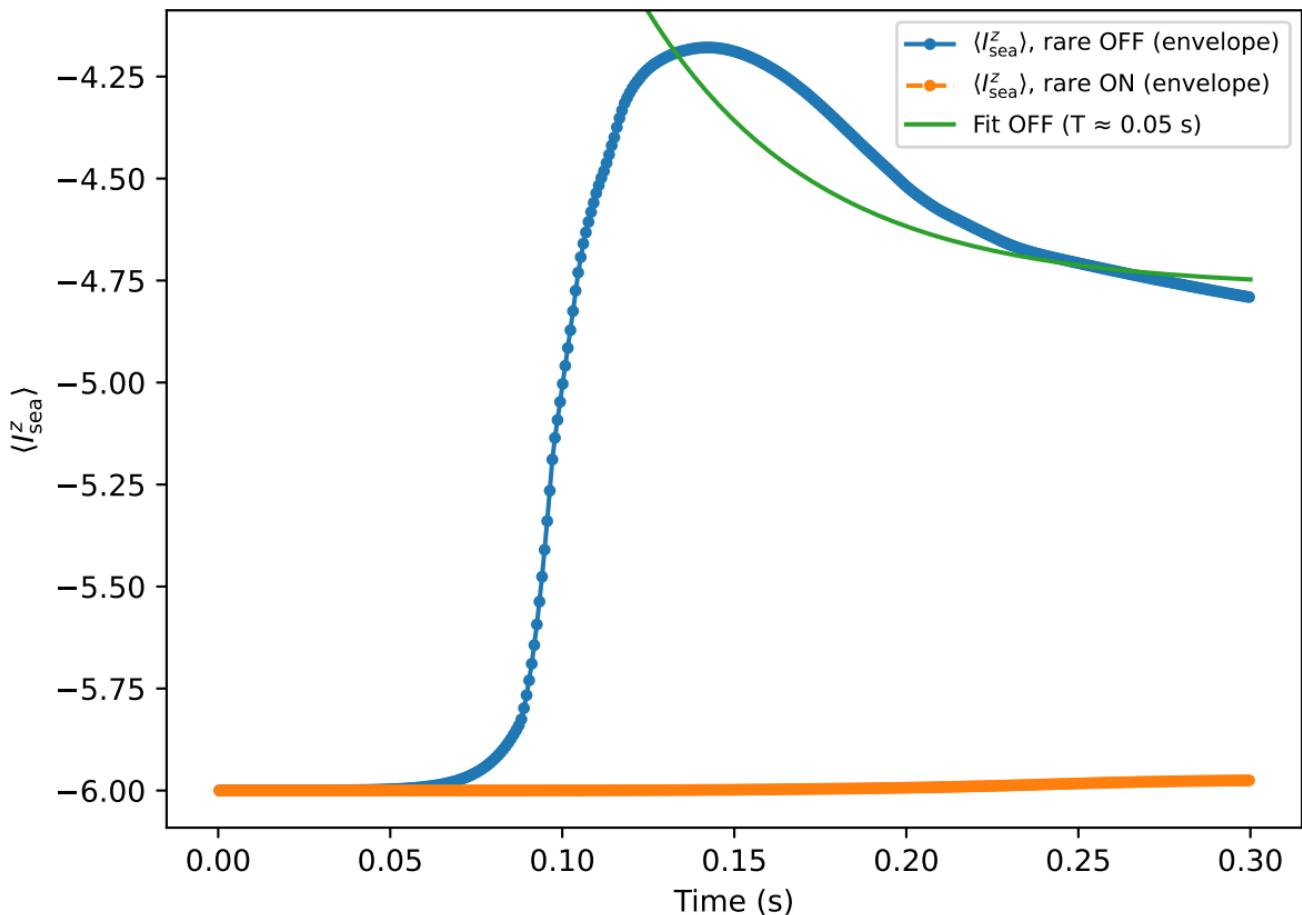
$\delta_A = +10000.0$ Hz (rare drive OFF)



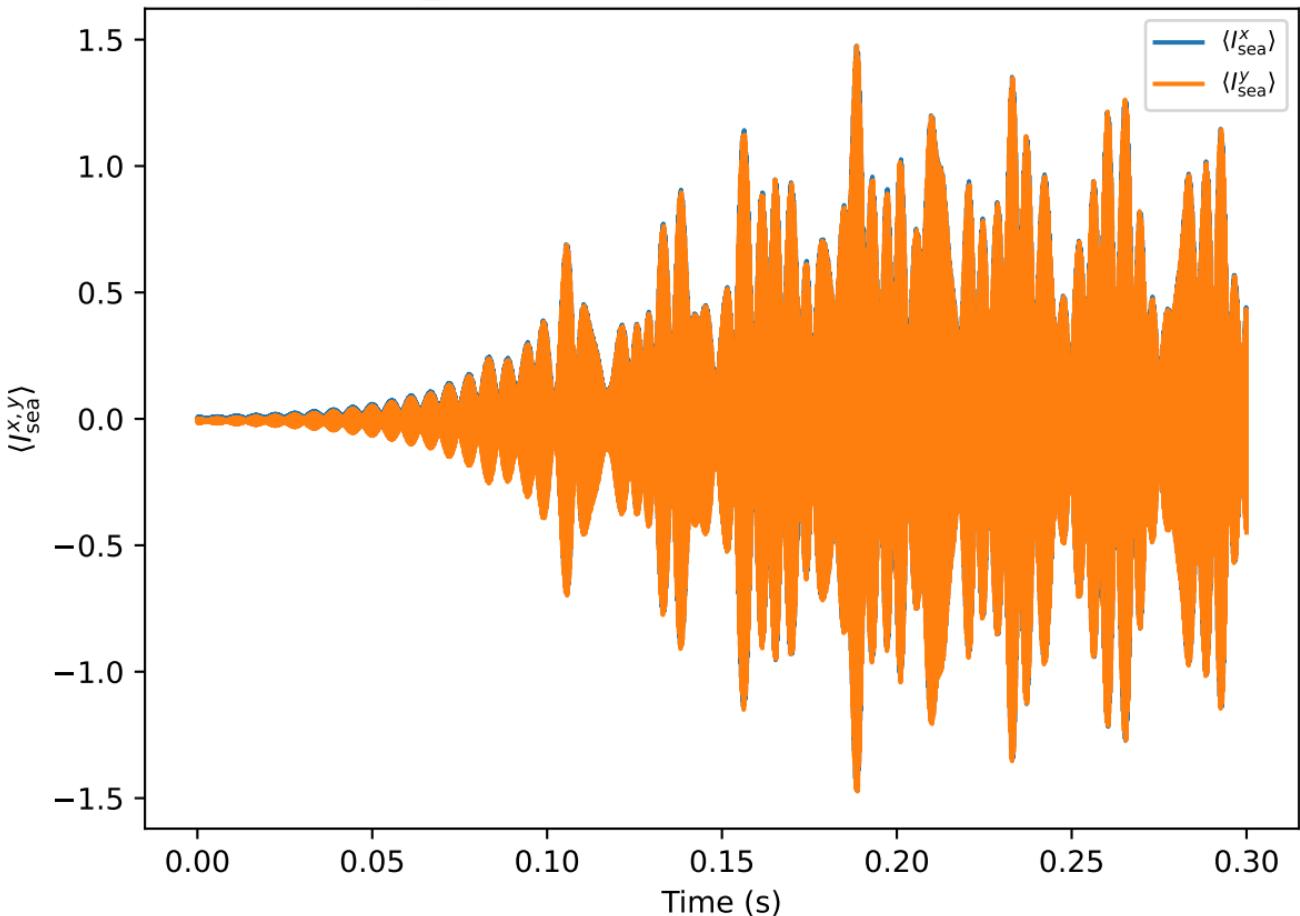
$\delta_A = +15000.0$ Hz



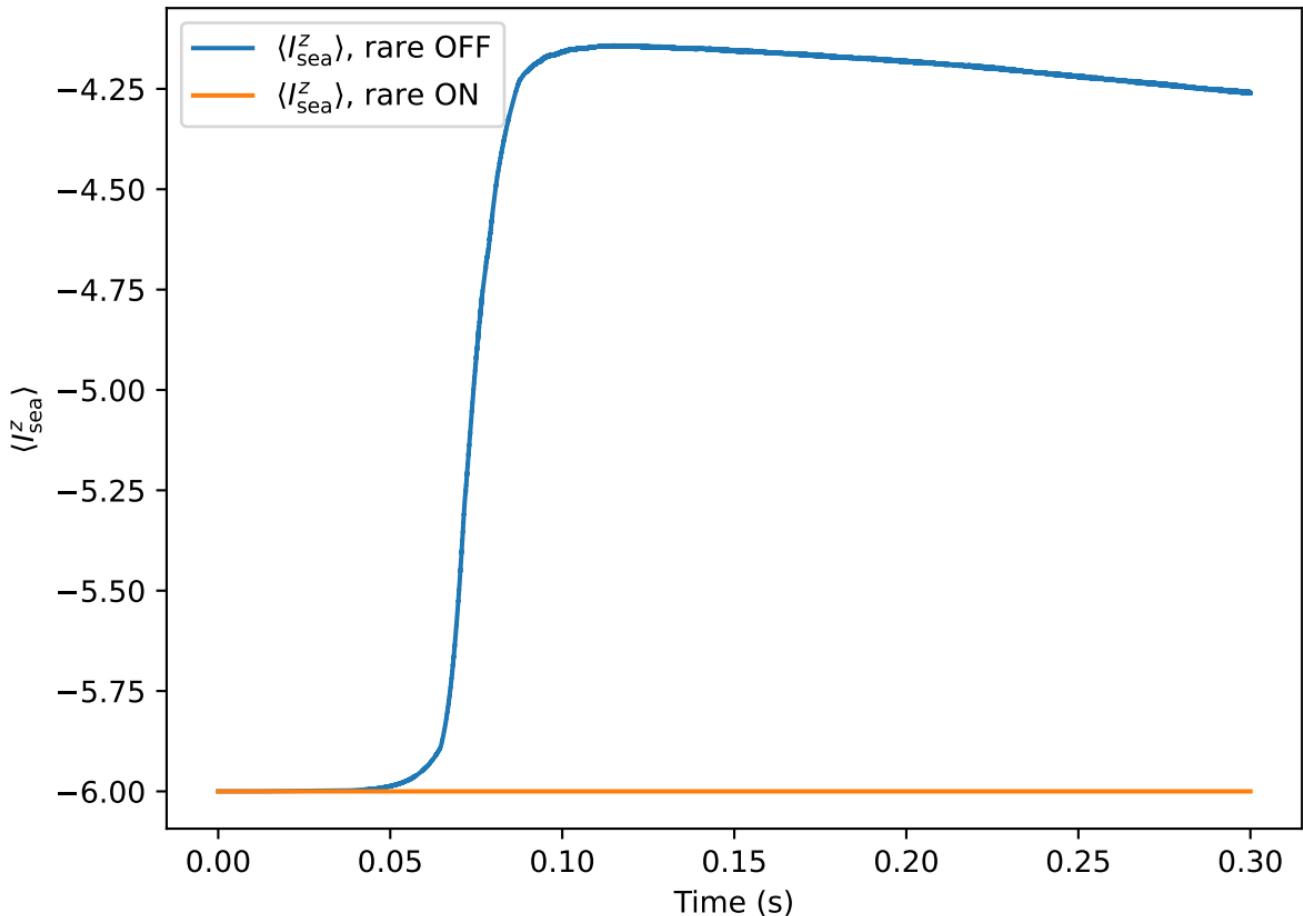
$\delta_A = +15000.0$ Hz (pseudo T_1 envelope)



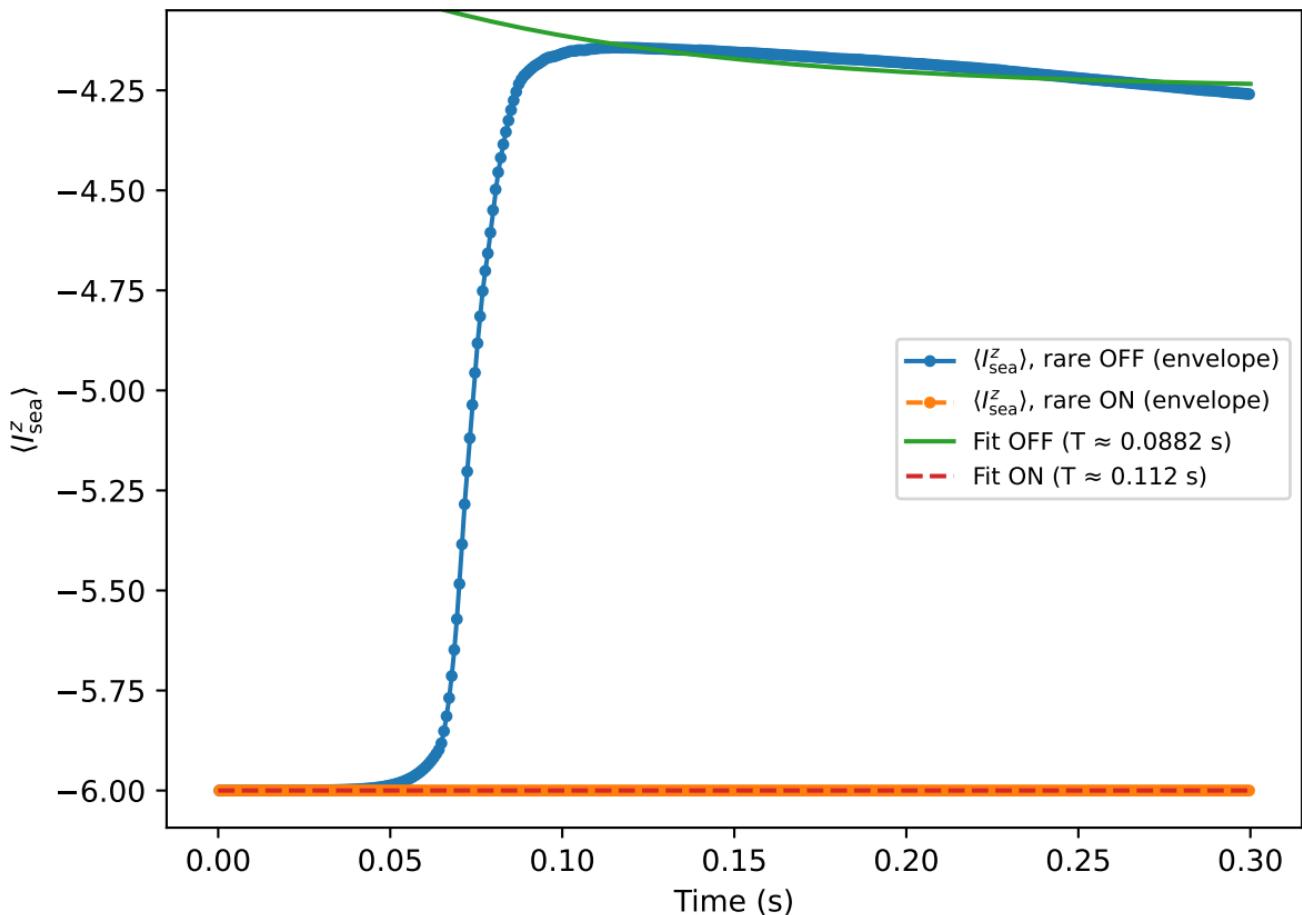
$\delta_A = +15000.0$ Hz (rare drive OFF)



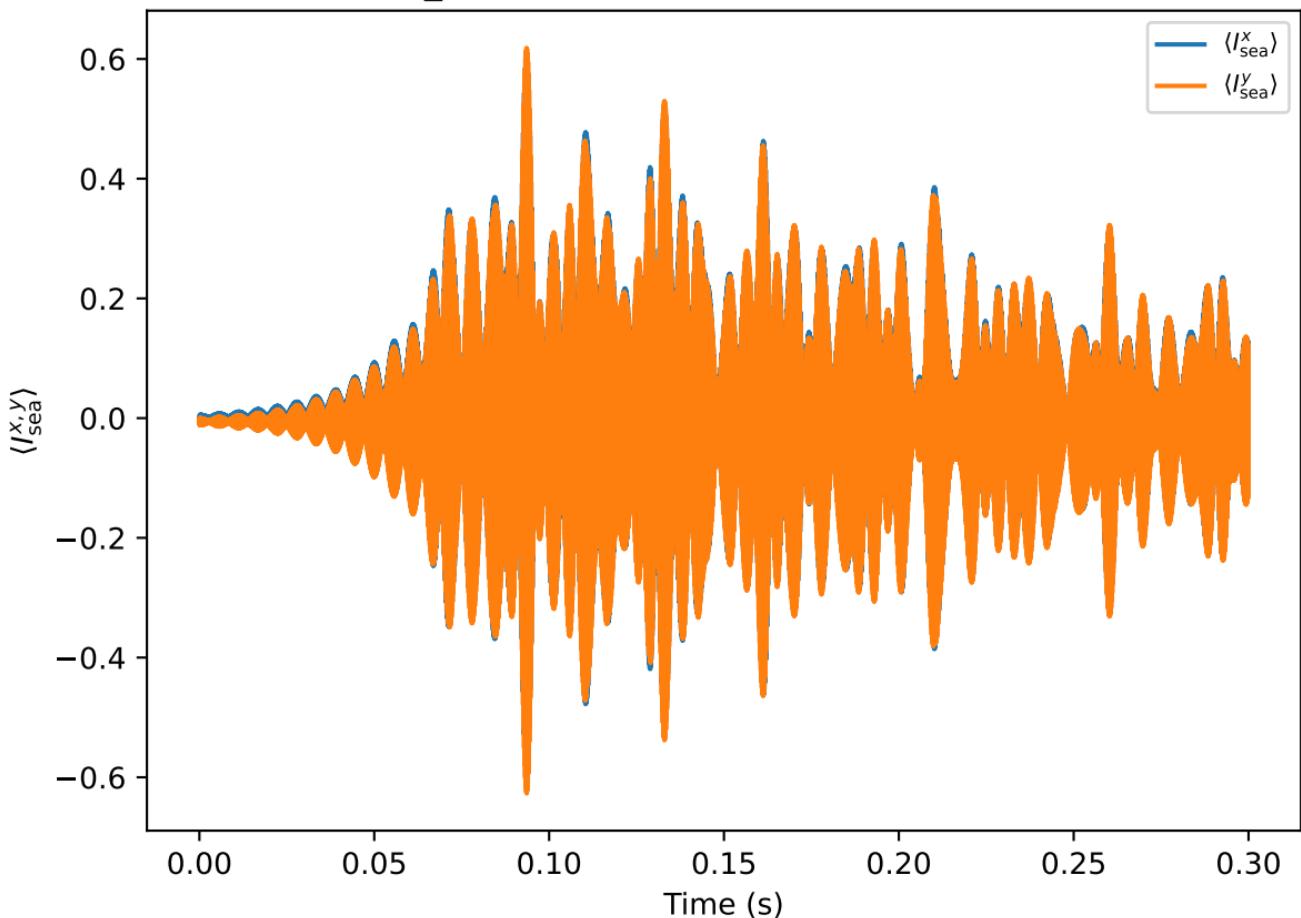
$\delta_A = +20000.0$ Hz



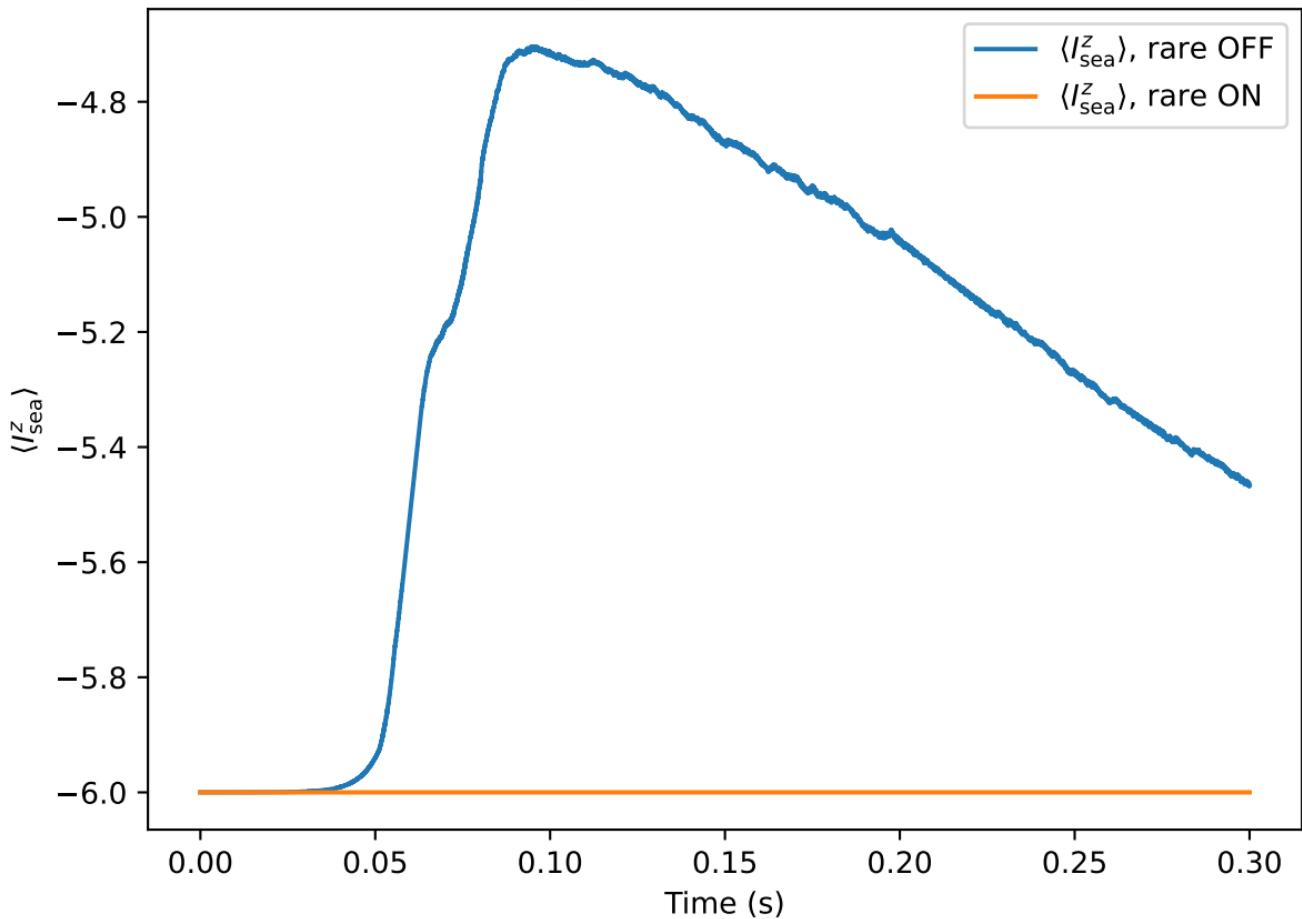
$\delta_A = +20000.0$ Hz (pseudo T_1 envelope)



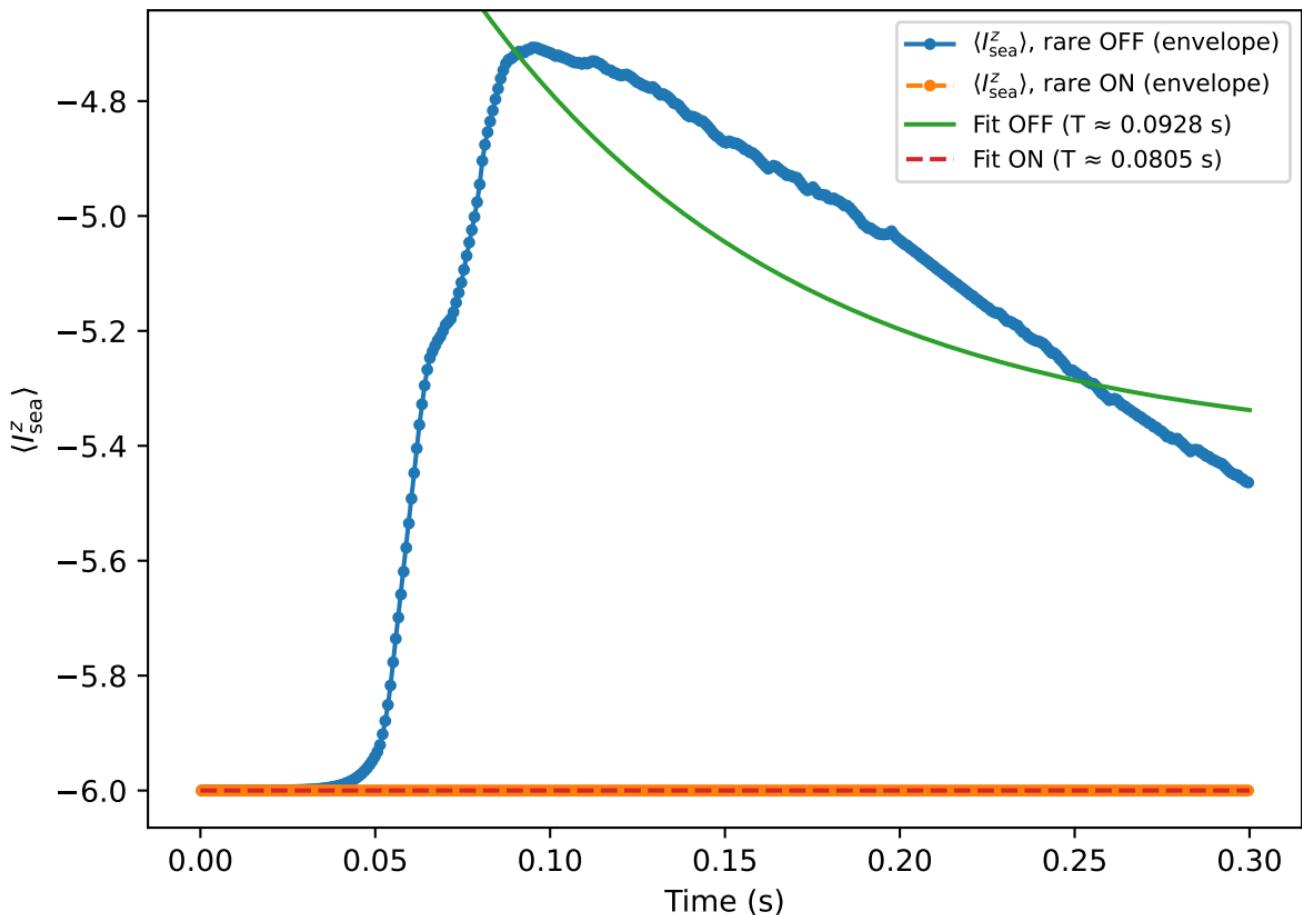
$\delta_A = +20000.0$ Hz (rare drive OFF)



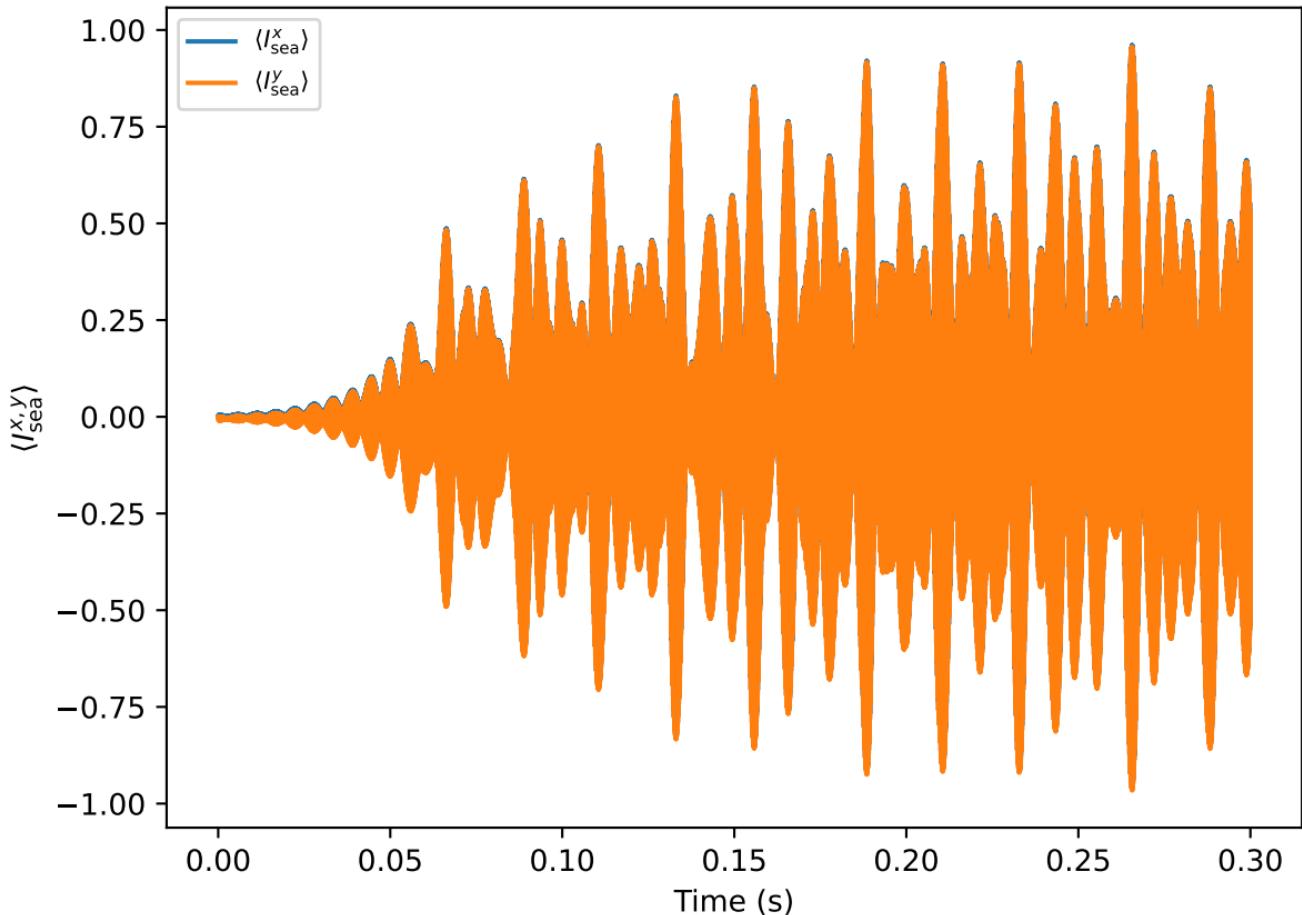
$\delta_A = +25000.0$ Hz



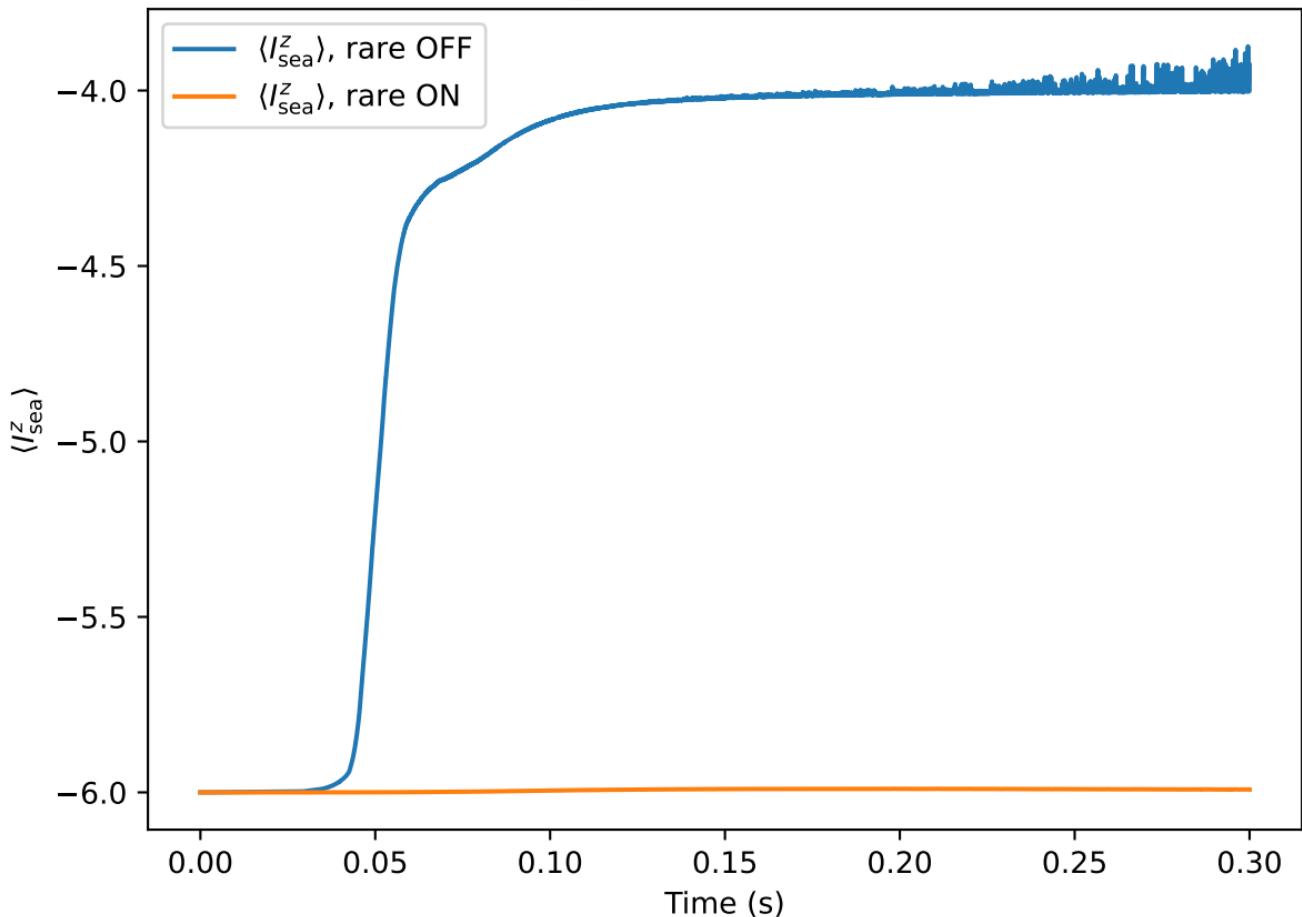
$\delta_A = +25000.0$ Hz (pseudo T_1 envelope)



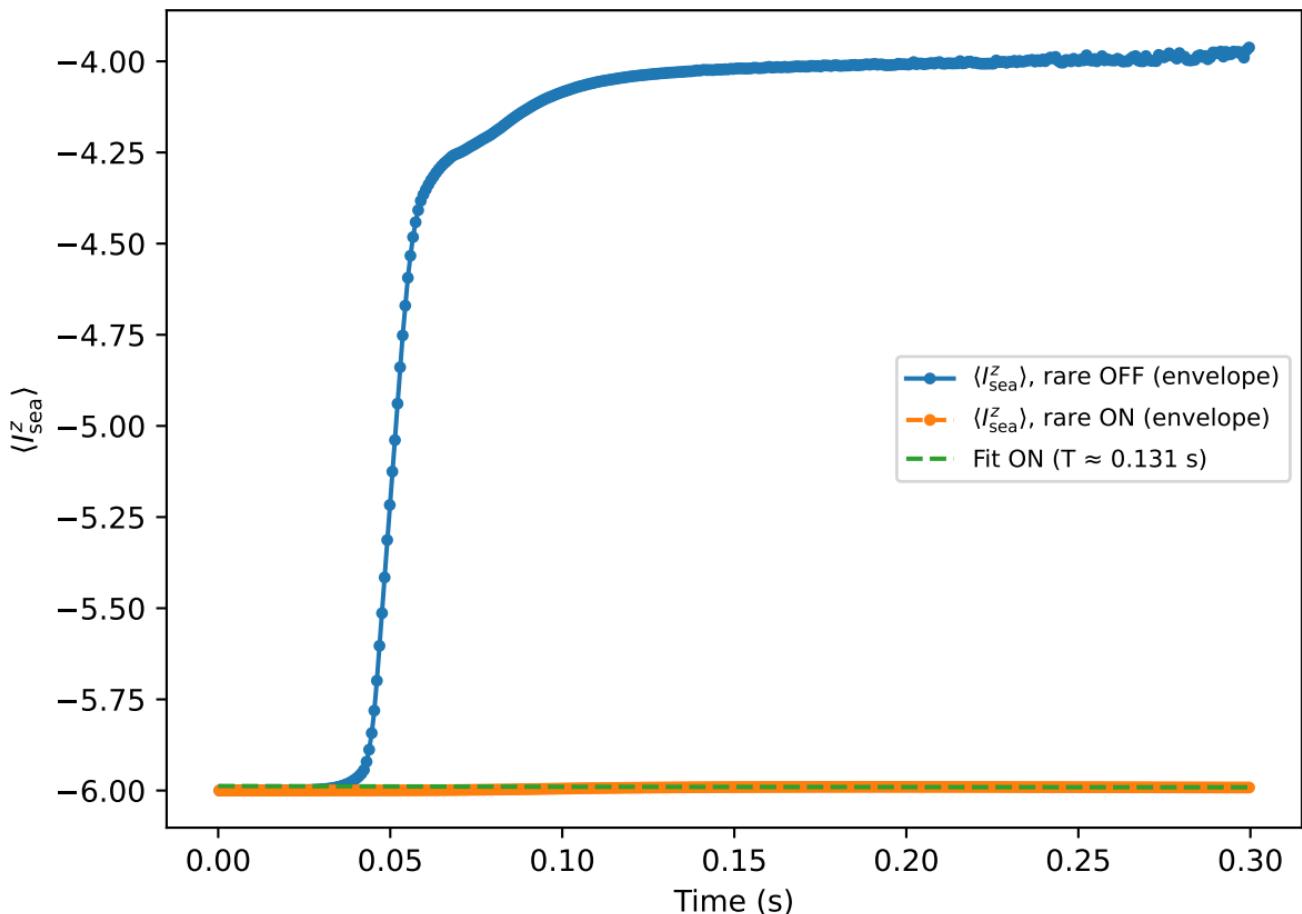
$\delta_A = +25000.0$ Hz (rare drive OFF)



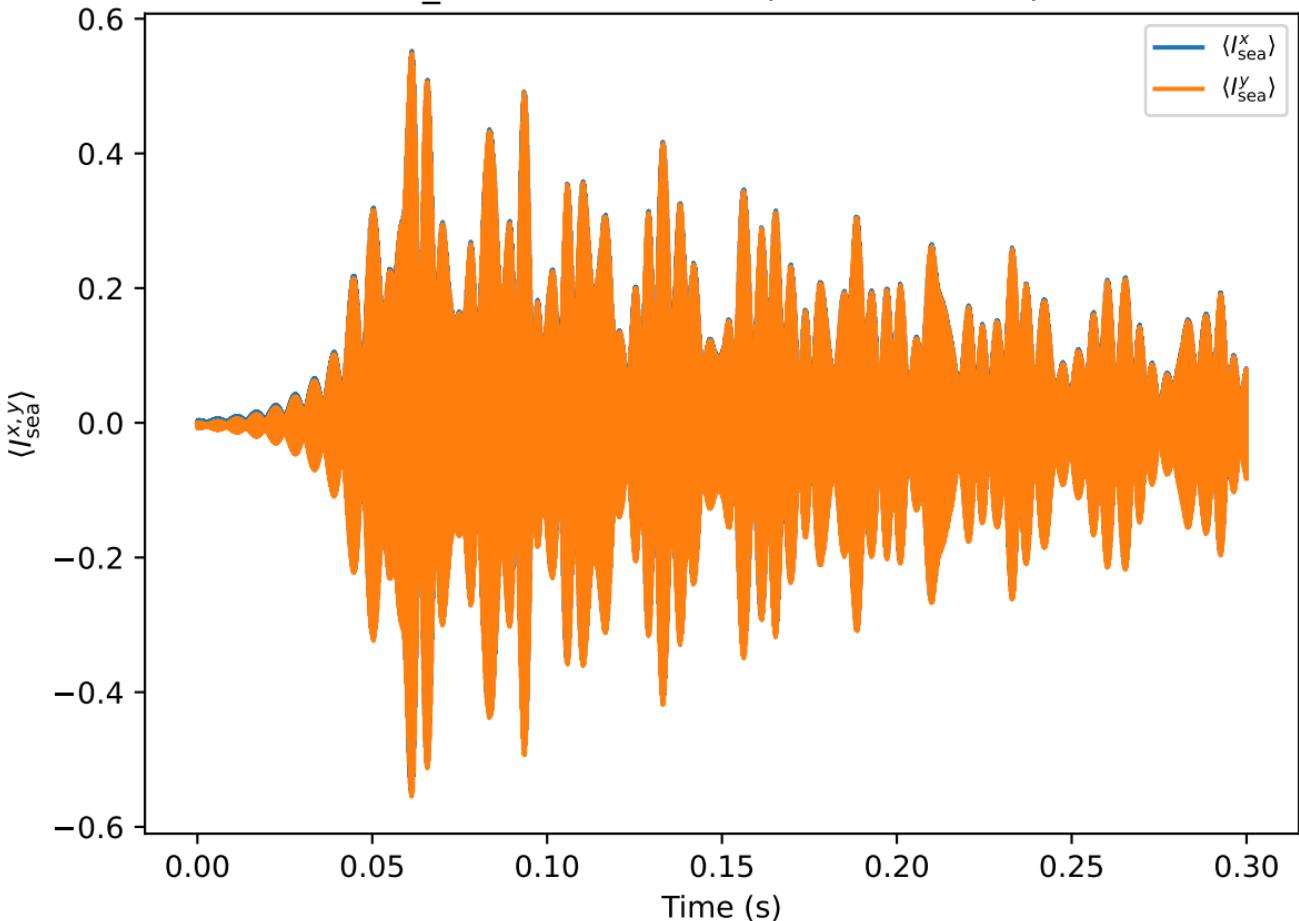
$\delta_A = +30000.0$ Hz



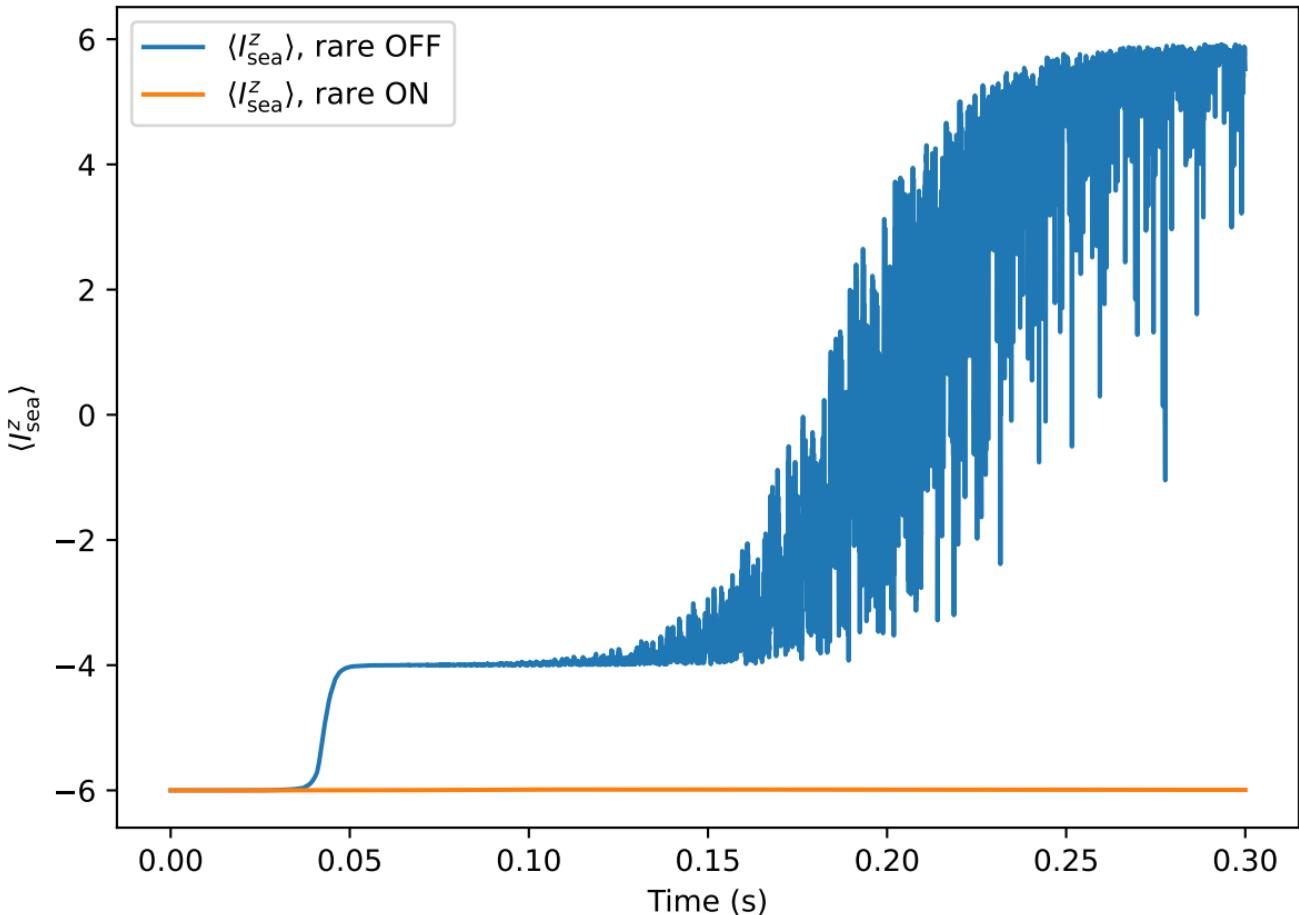
$\delta_A = +30000.0$ Hz (pseudo T_1 envelope)



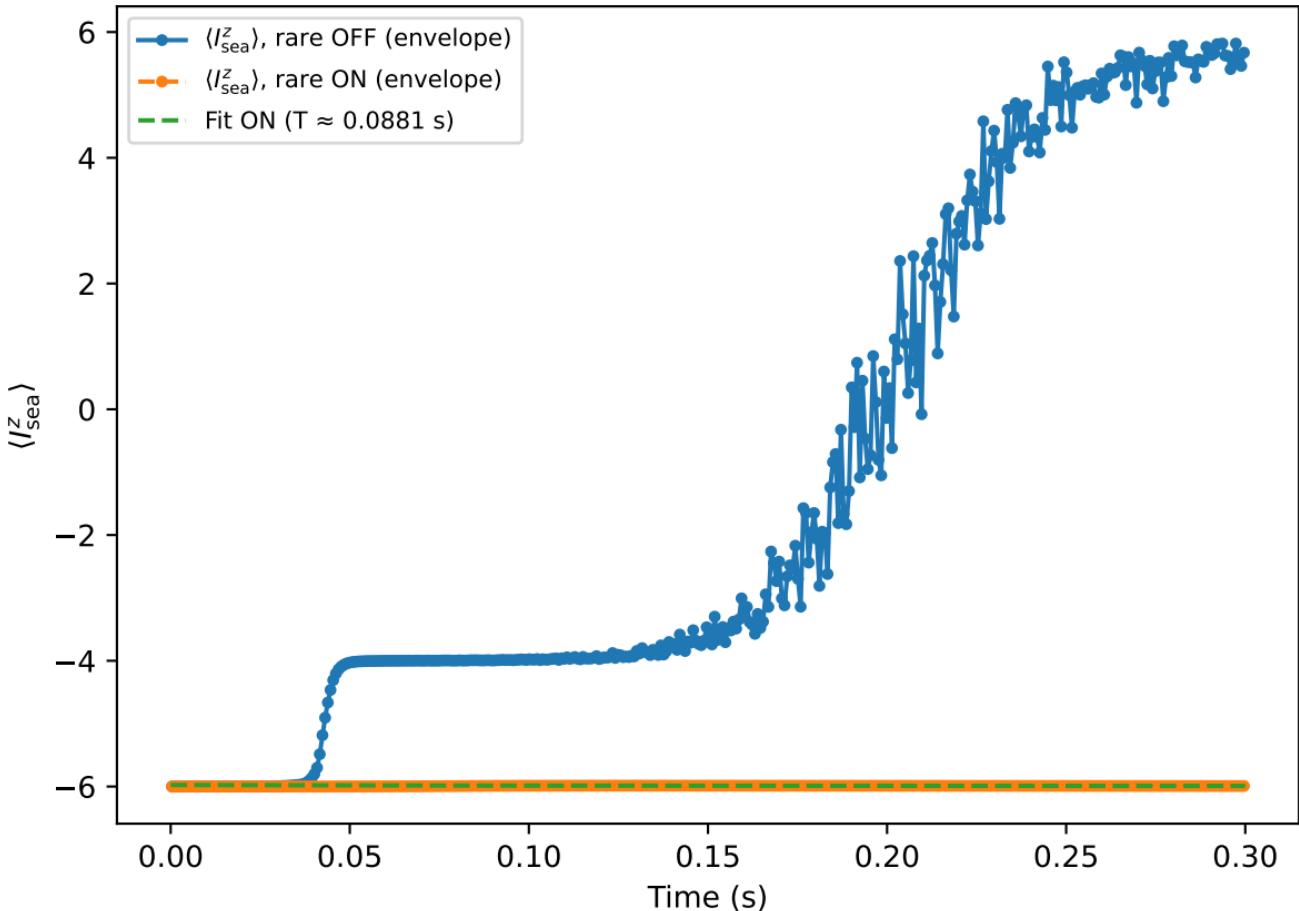
$\delta_A = +30000.0$ Hz (rare drive OFF)



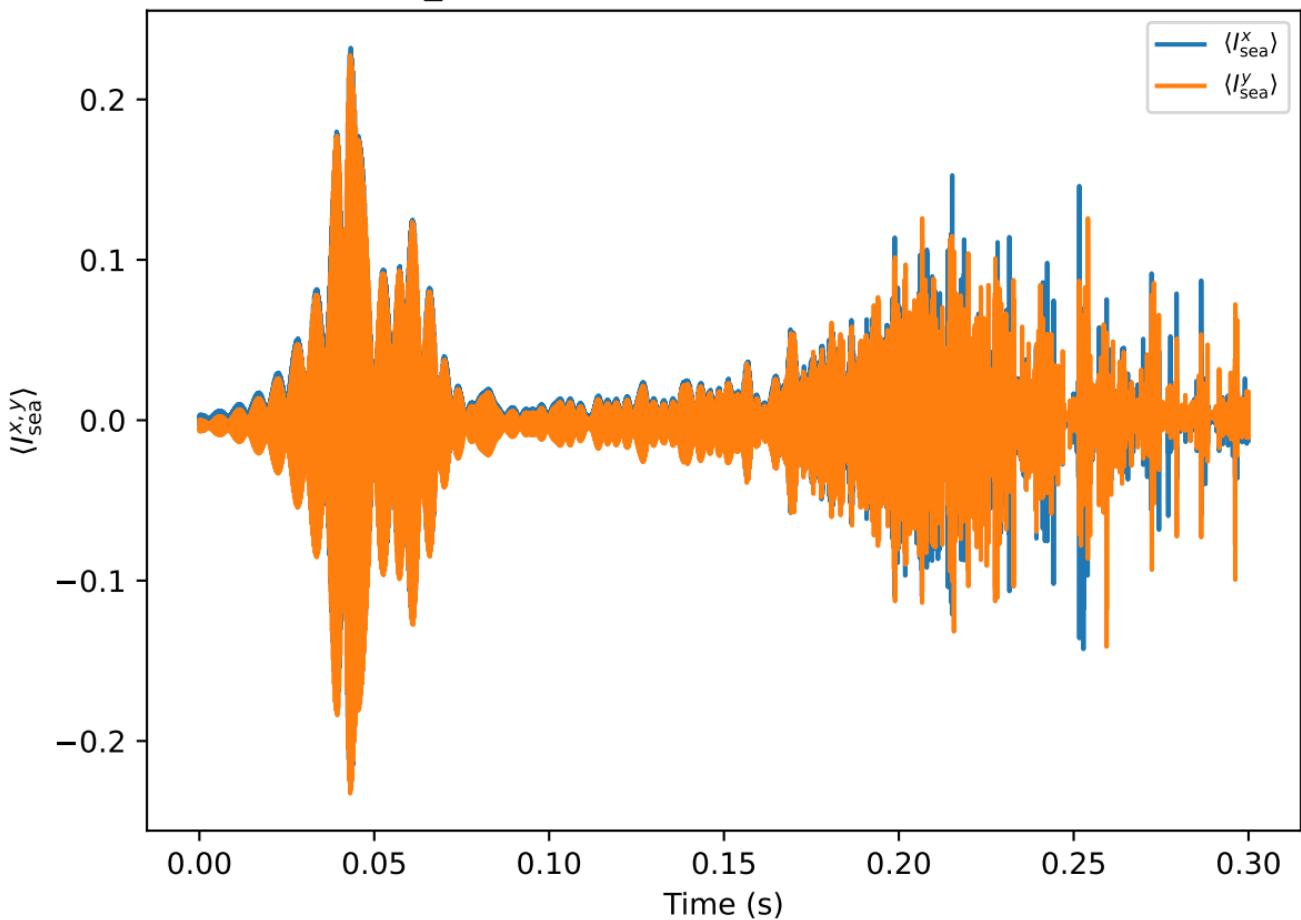
$$\delta_A = +35000.0 \text{ Hz}$$



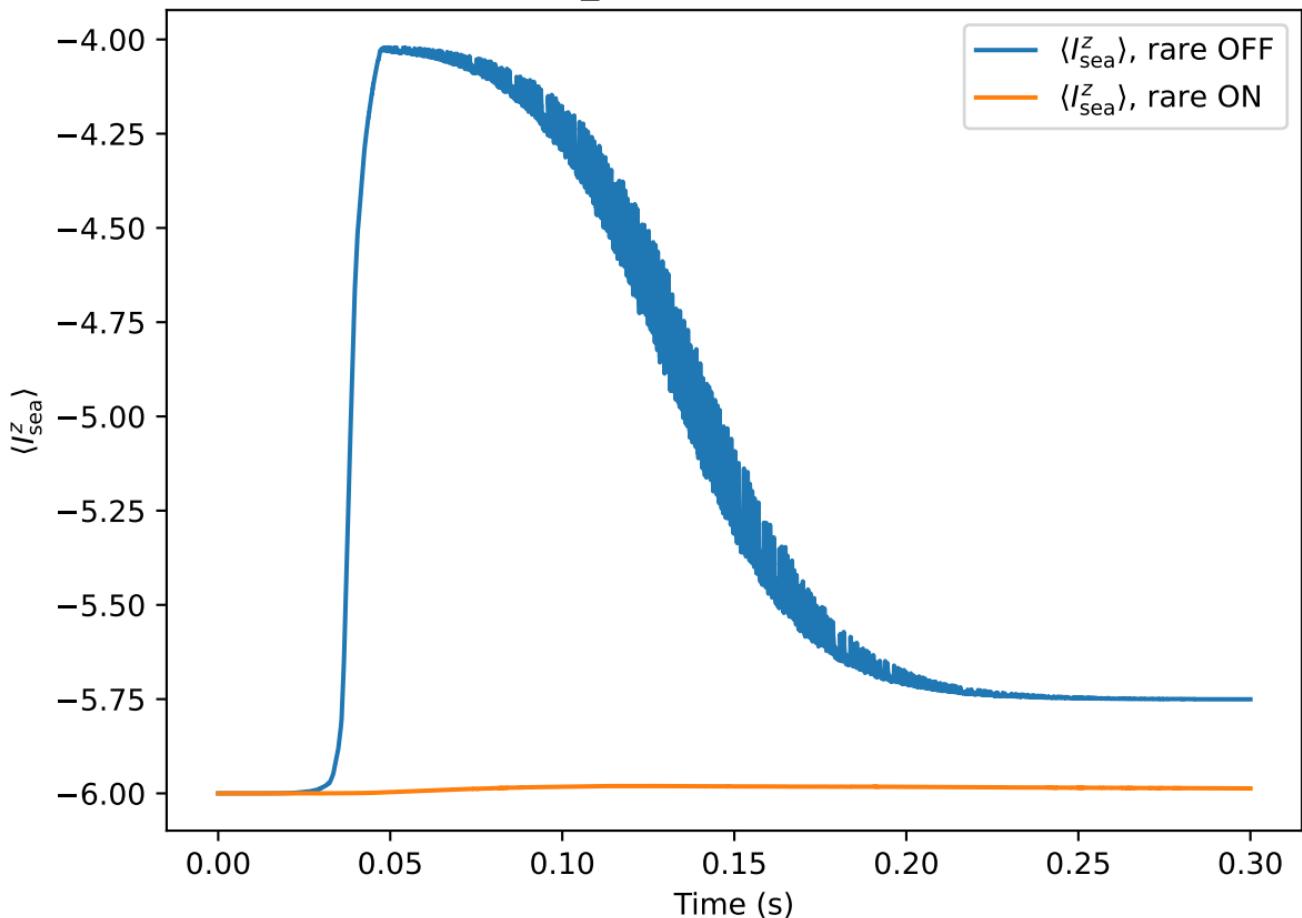
$\delta_A = +35000.0$ Hz (pseudo T_1 envelope)



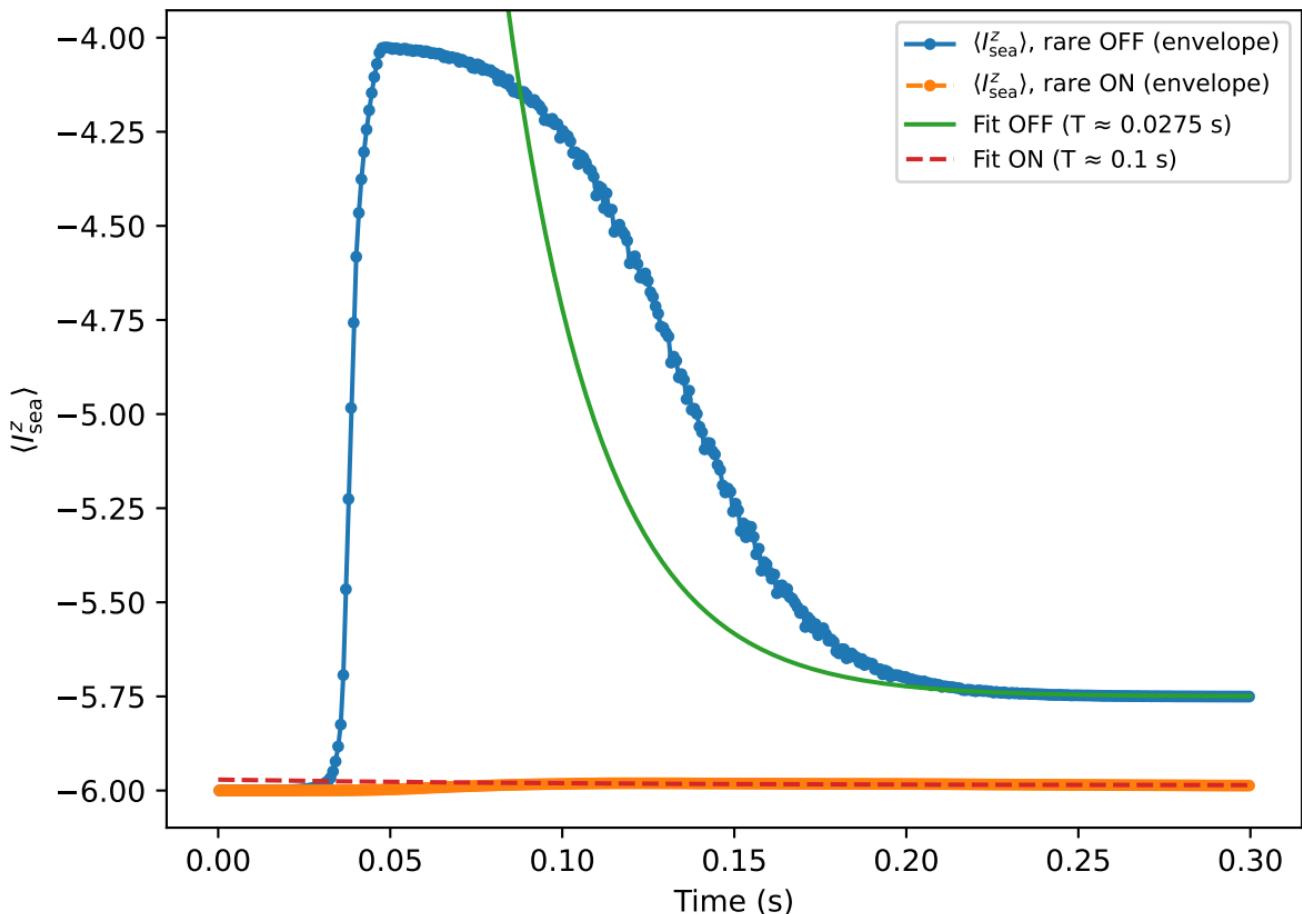
$\delta_A = +35000.0$ Hz (rare drive OFF)



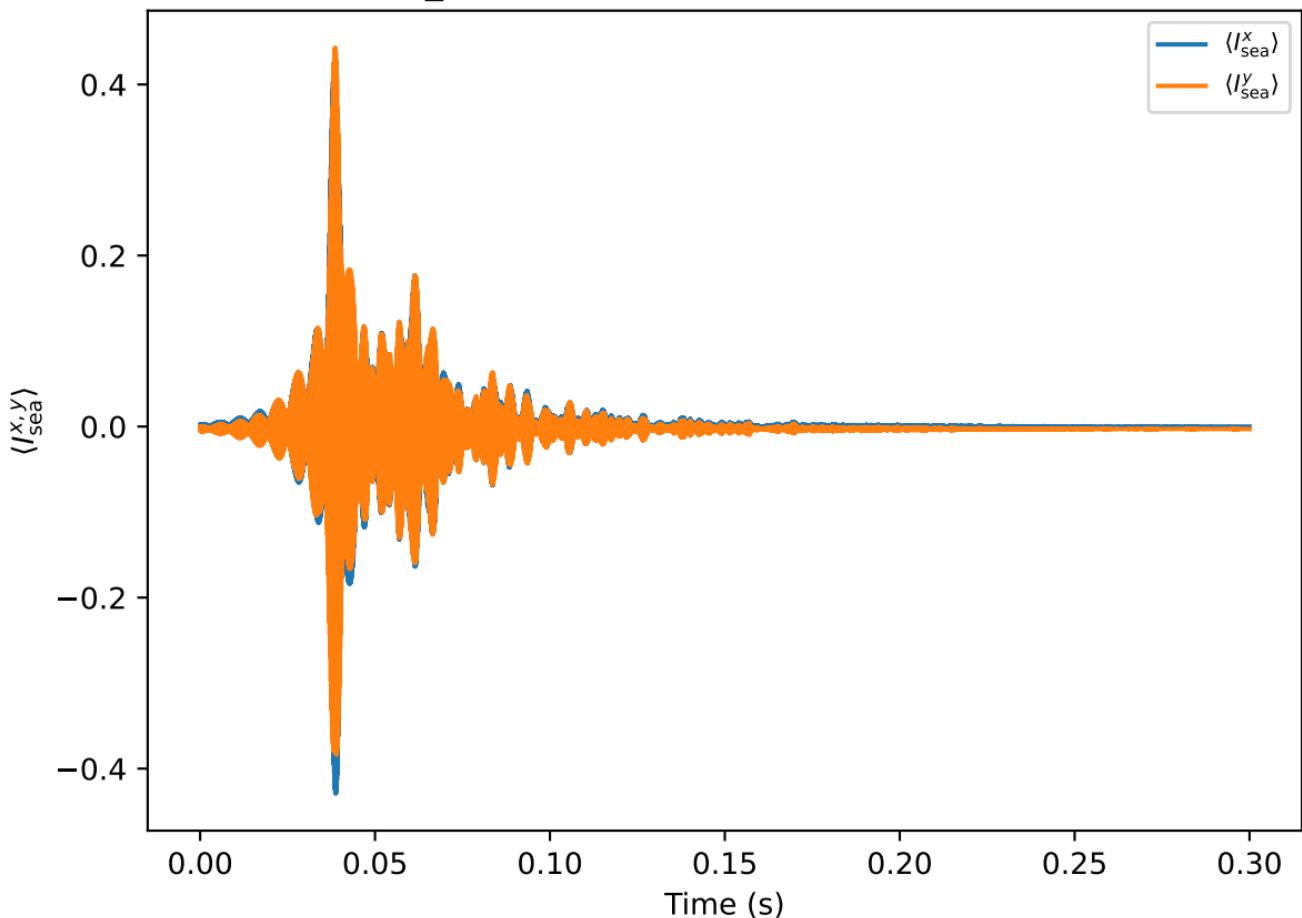
$\delta_A = +40000.0$ Hz



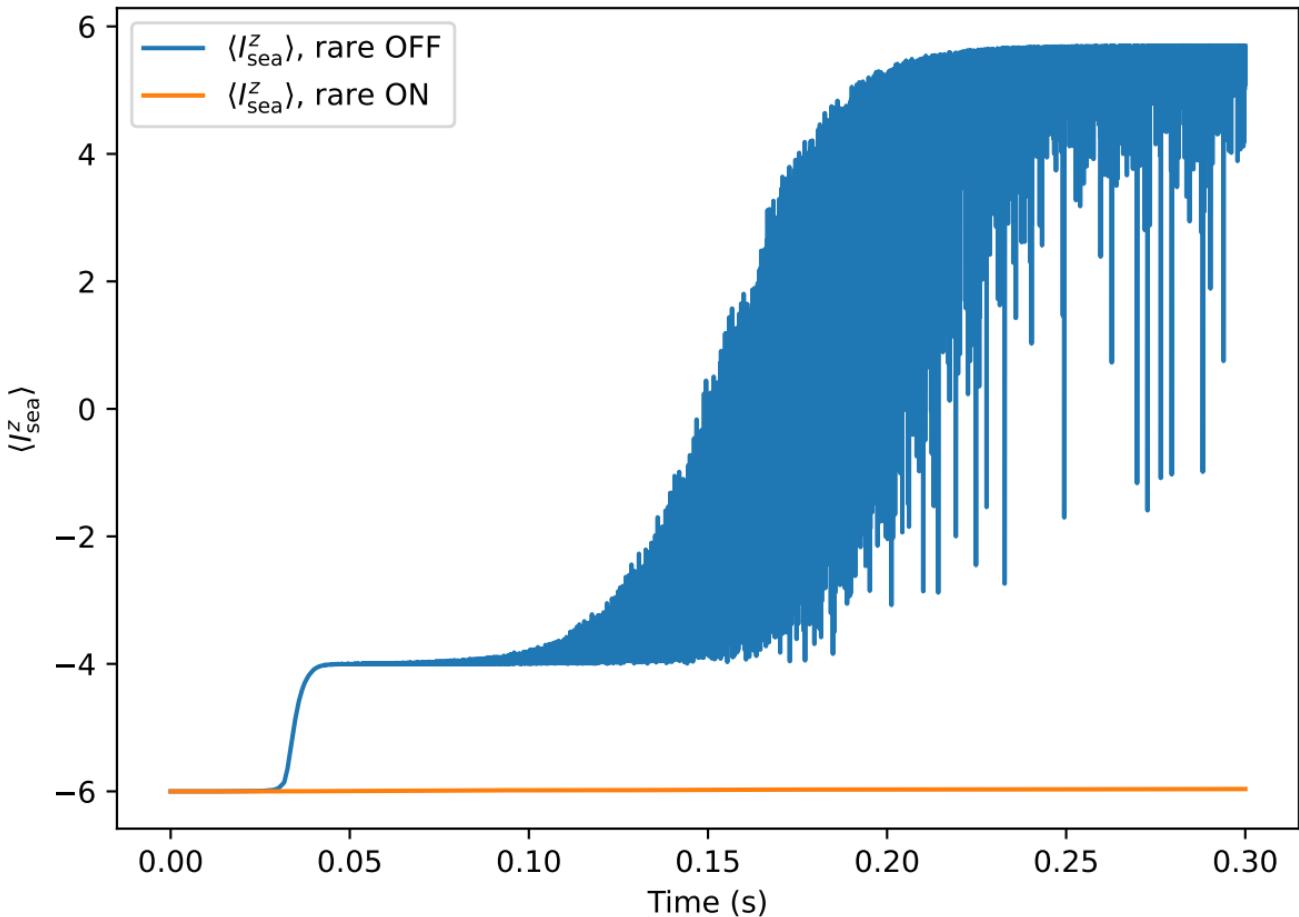
$\delta_A = +40000.0$ Hz (pseudo T_1 envelope)



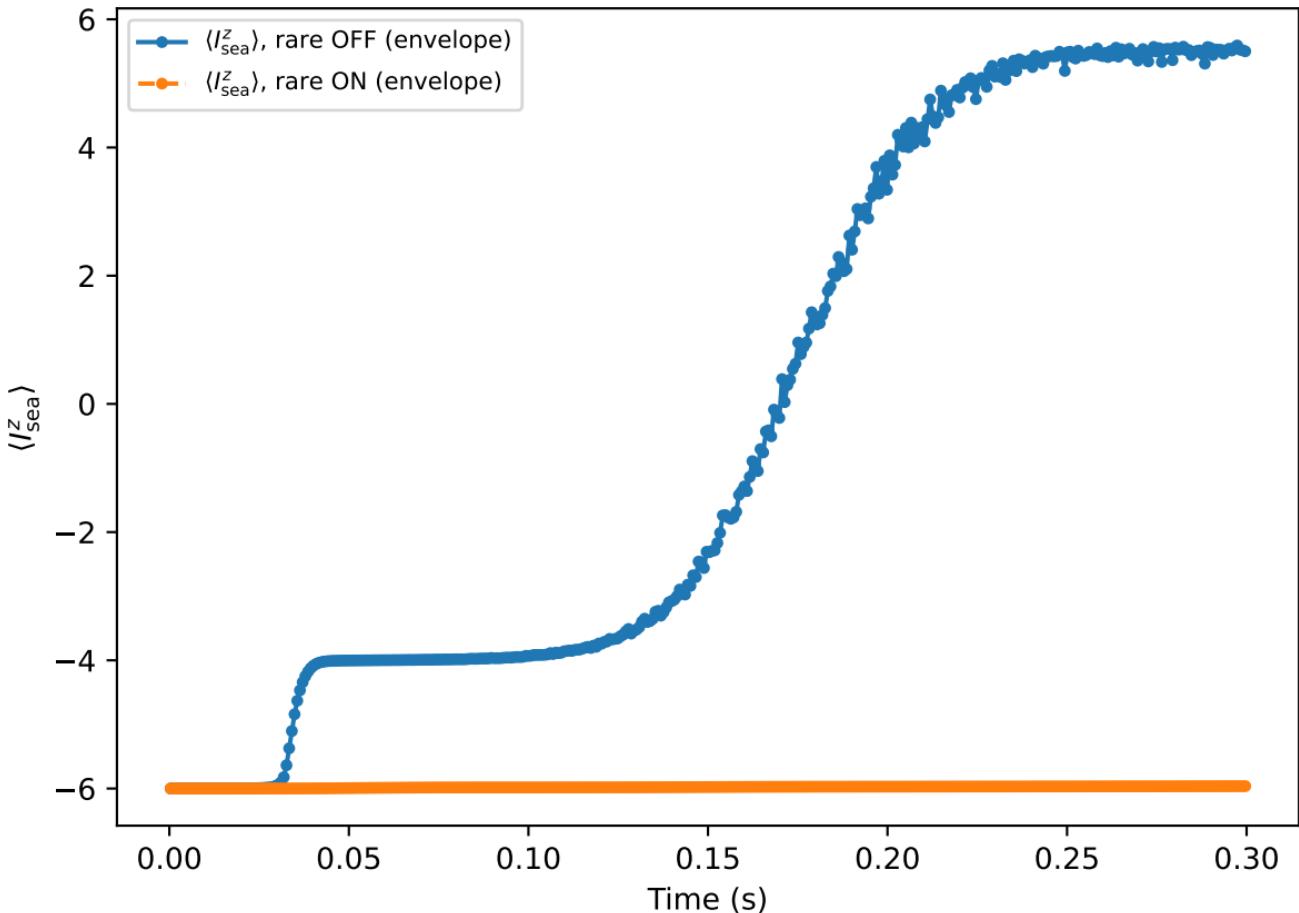
$\delta_A = +40000.0$ Hz (rare drive OFF)



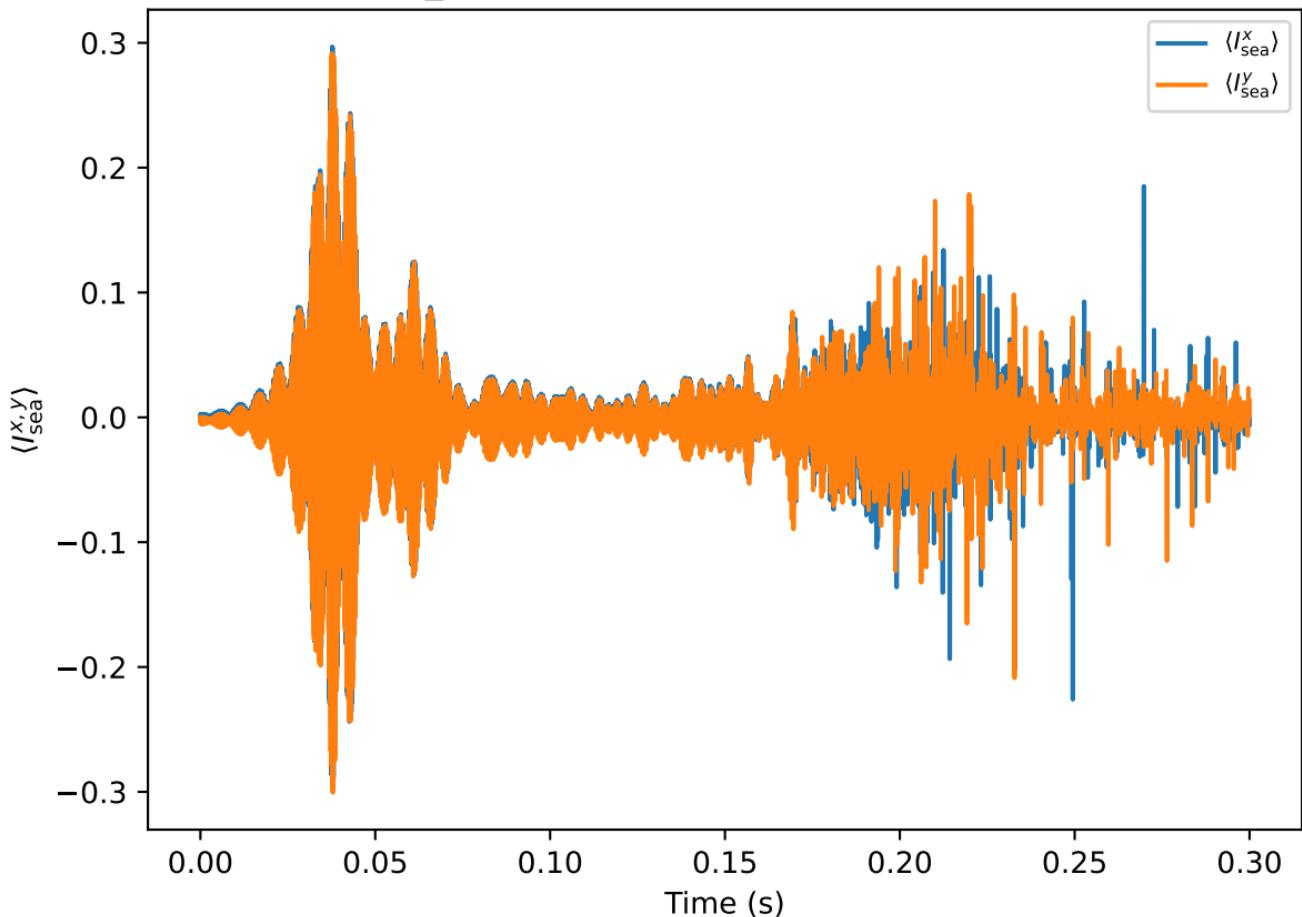
$\delta_A = +45000.0$ Hz



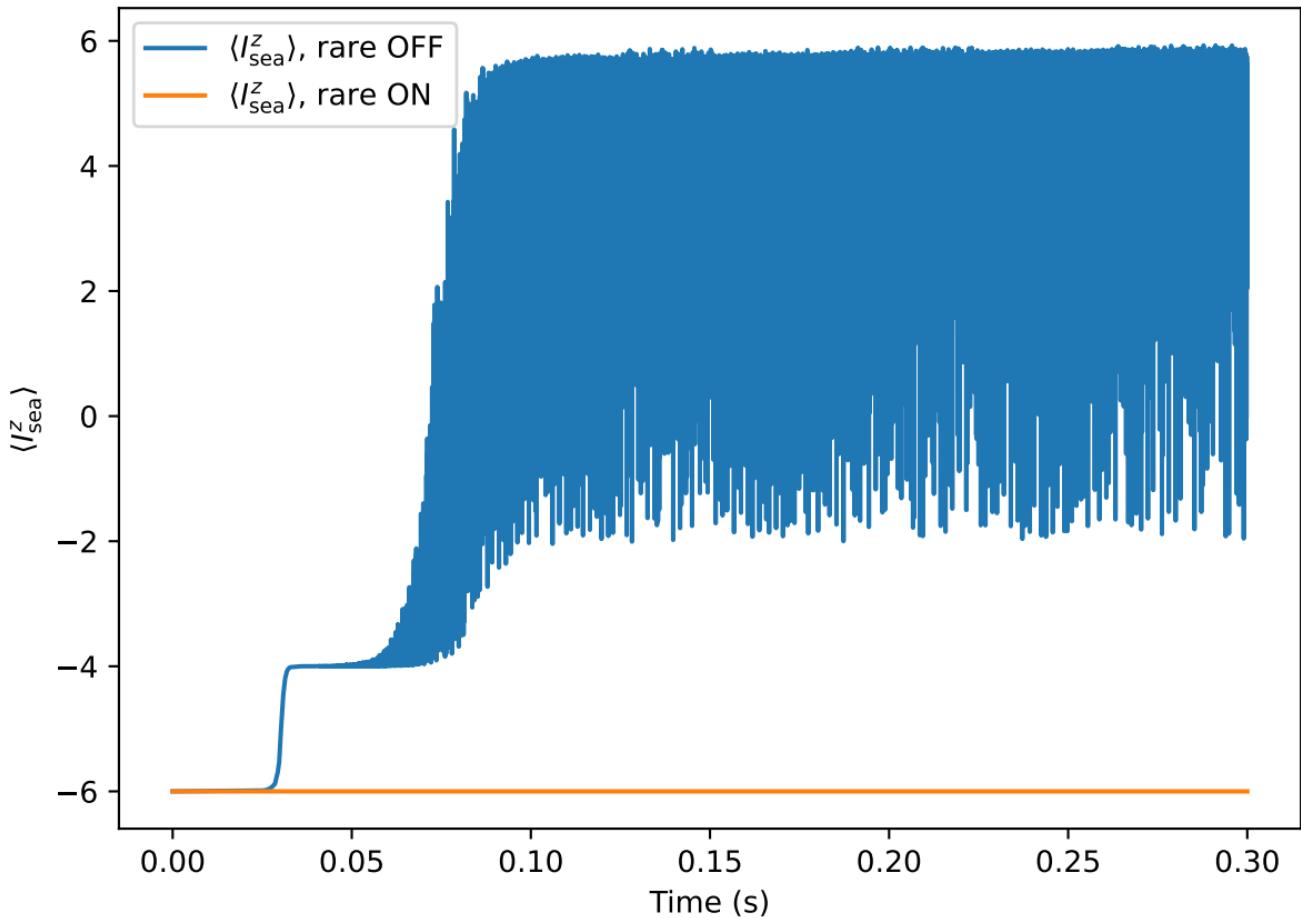
$\delta_A = +45000.0$ Hz (pseudo T_1 envelope)



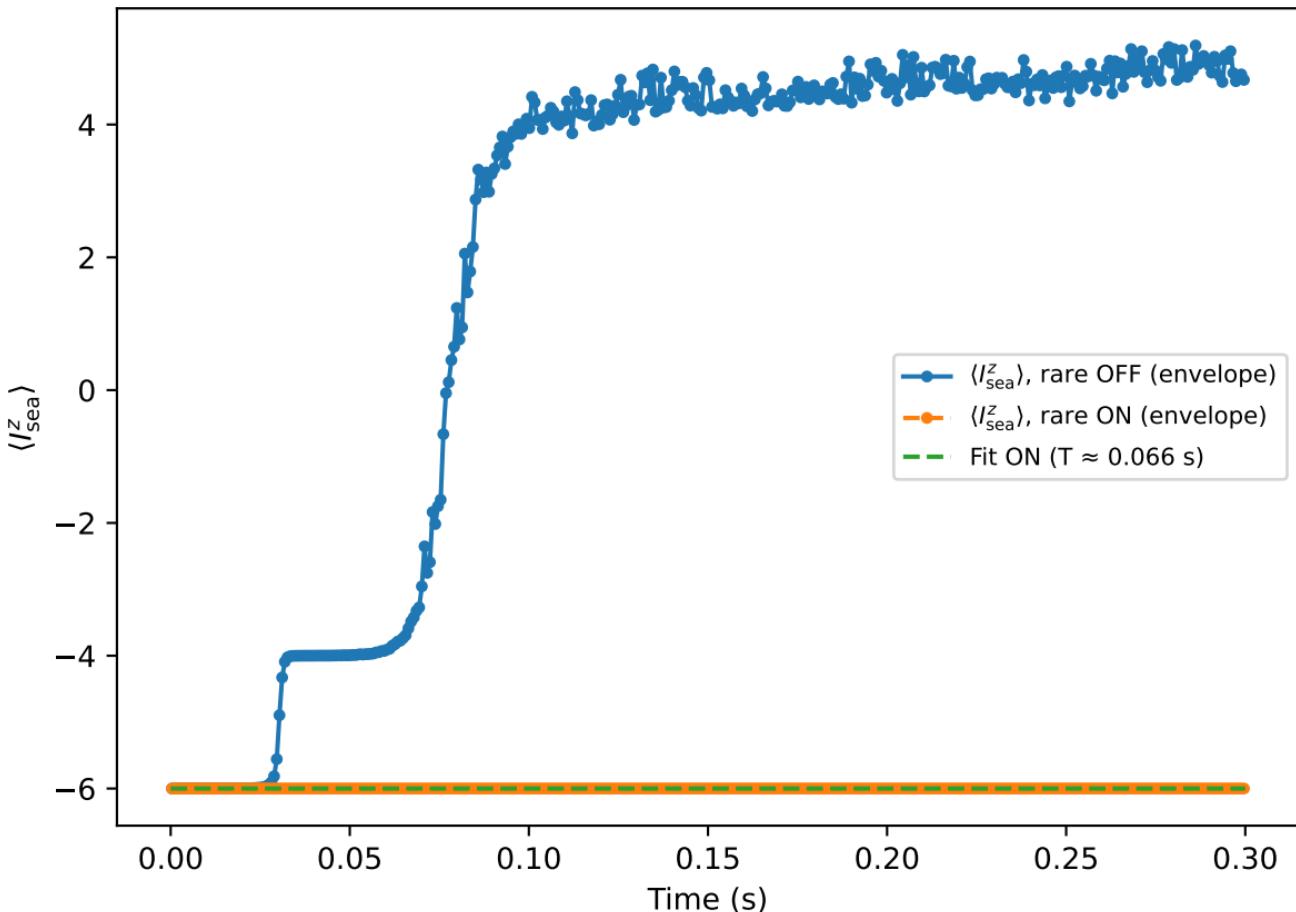
$\delta_A = +45000.0$ Hz (rare drive OFF)



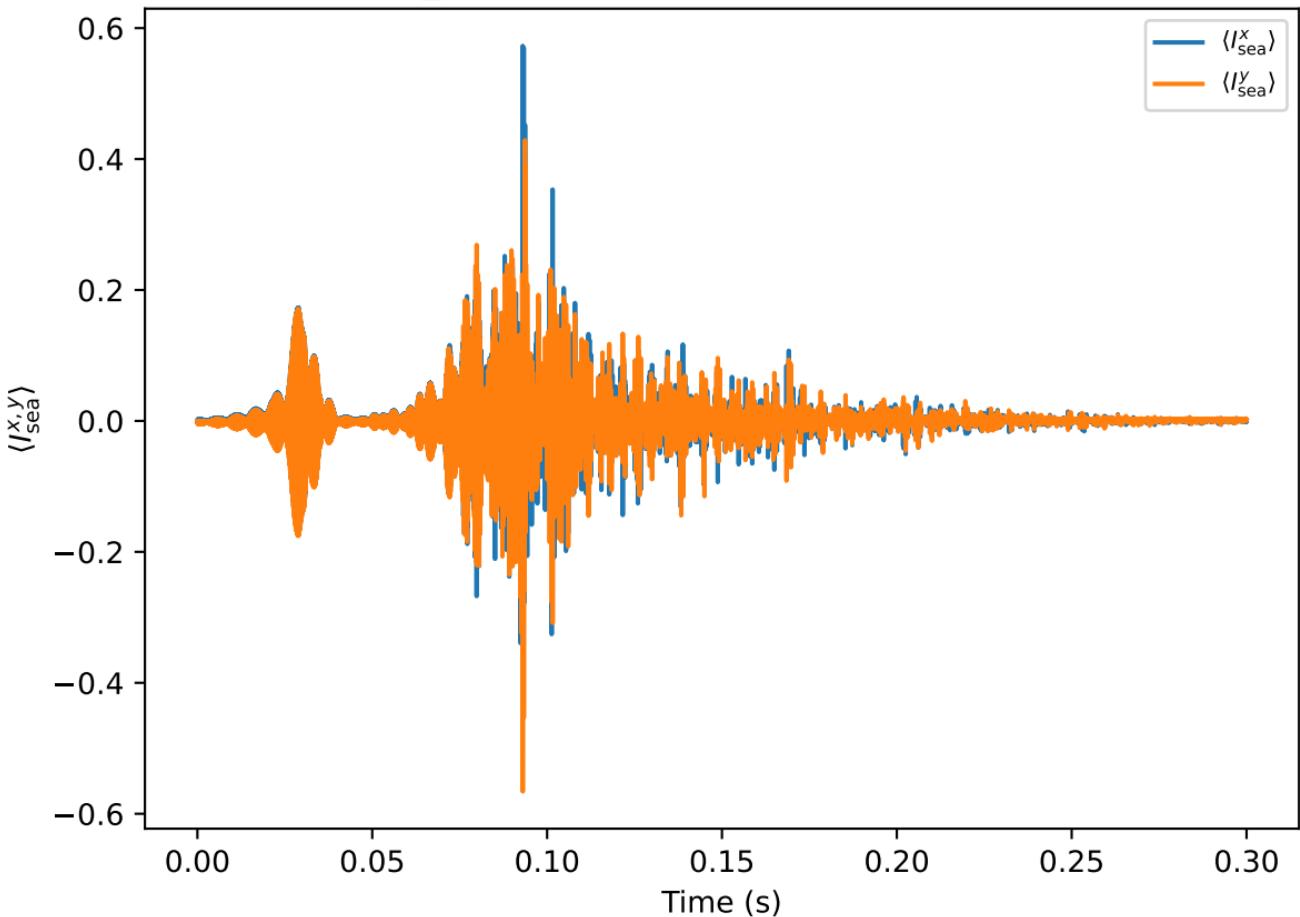
$$\delta_A = +50000.0 \text{ Hz}$$



$\delta_A = +50000.0$ Hz (pseudo T_1 envelope)



$\delta_A = +50000.0$ Hz (rare drive OFF)



T-like decay fits from $\langle I^z_{\text{sea}} \rangle$ traces

delta_Hz	T_Iz_sea_off	T_Iz_sea_on
+10000.0	NA	NA
+15000.0	0.05	NA
+20000.0	0.0882	0.112
+25000.0	0.0928	0.0805
+30000.0	NA	0.131
+35000.0	NA	0.0881
+40000.0	0.0275	0.1
+45000.0	NA	NA
+50000.0	NA	0.066