

ADAPT Confidence Campaign

Generated (UTC): 2026-02-21T18:59:02.872319+00:00

Scope:

Methods: exact, HF, hardcoded VQE, Qiskit VQE, ADAPT-UCCSD(adapt/fixed), ADAPT-CSE
Sites: [2, 3]

Gates:

VQE: $L2 \leq 1.0e-08$, $L3 \leq 1.0e-06$
ADAPT-UCCSD fixed: $L2 \leq 1.0e-08$, $L3 \leq 1.0e-06$
ADAPT-UCCSD adapt: $L2 \leq 1.0e-07$, $L3 \leq 1.0e-05$
ADAPT-CSE: gap_closure ≥ 0.90

Run caps:

per_method_max_time_s=20.0
adapt_trial_max_time_s=3.0
adapt_fixed_trial_max_time_s=4.0

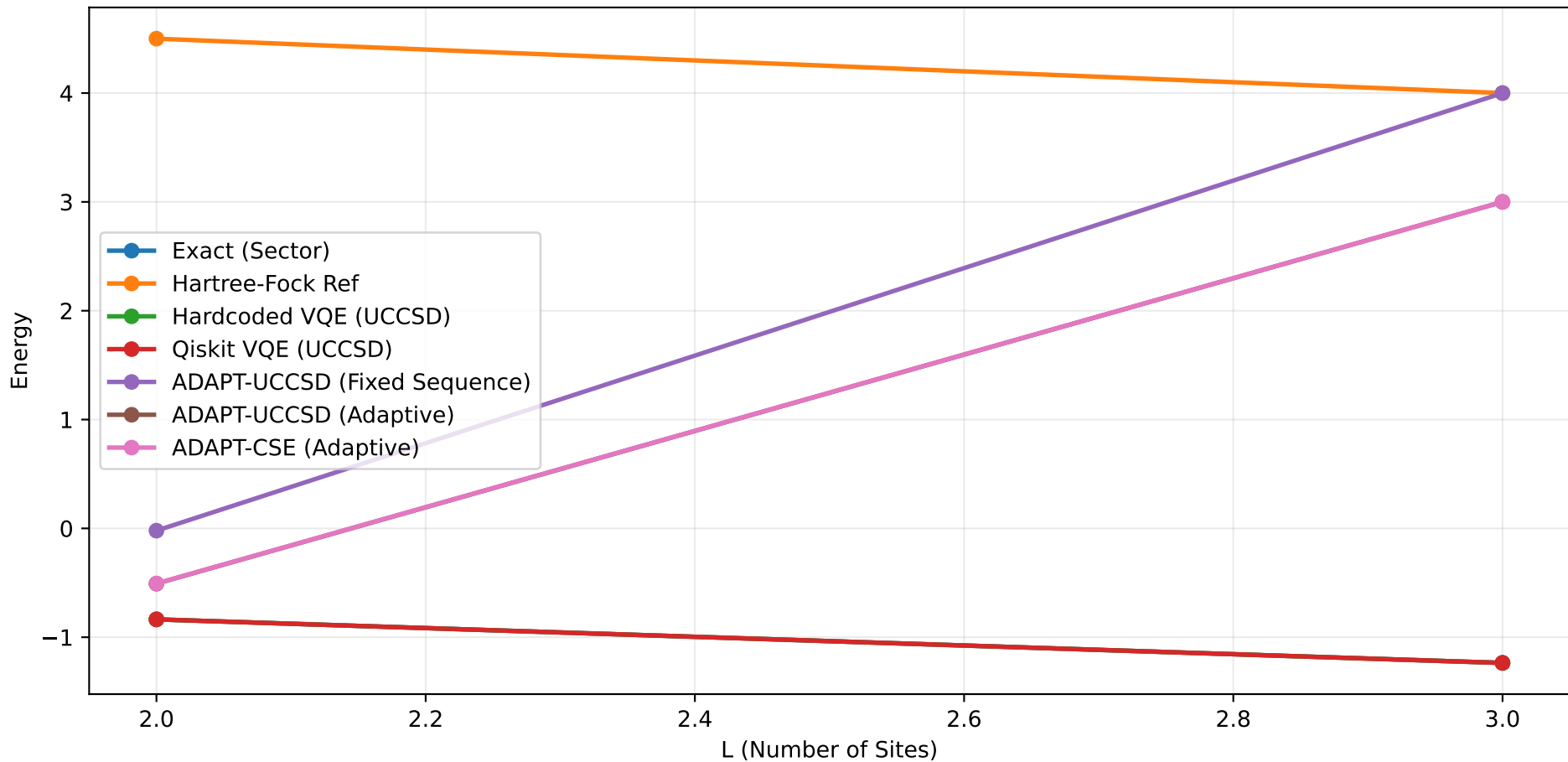
L=2 (n_up=1, n_down=1)

Exact=-0.836057118155	HF= 4.500000000000	
Hardcoded VQE (UCCSD)	E=-0.836057100816	dE =1.734e-08 t=0.28s gate_pass=False
Qiskit VQE (UCCSD)	E=-0.836057117595	dE =5.600e-10 t=4.22s gate_pass=True
ADAPT-UCCSD (Fixed Sequence)	E=-0.020821263064	dE =8.152e-01 t=5.69s gate_pass=False
ADAPT-UCCSD (Adaptive)	E=-0.507936507935	dE =3.281e-01 t=7.57s gate_pass=False
ADAPT-CSE (Adaptive)	E=-0.506312970694	dE =3.297e-01 t=5.77s gate_pass=True

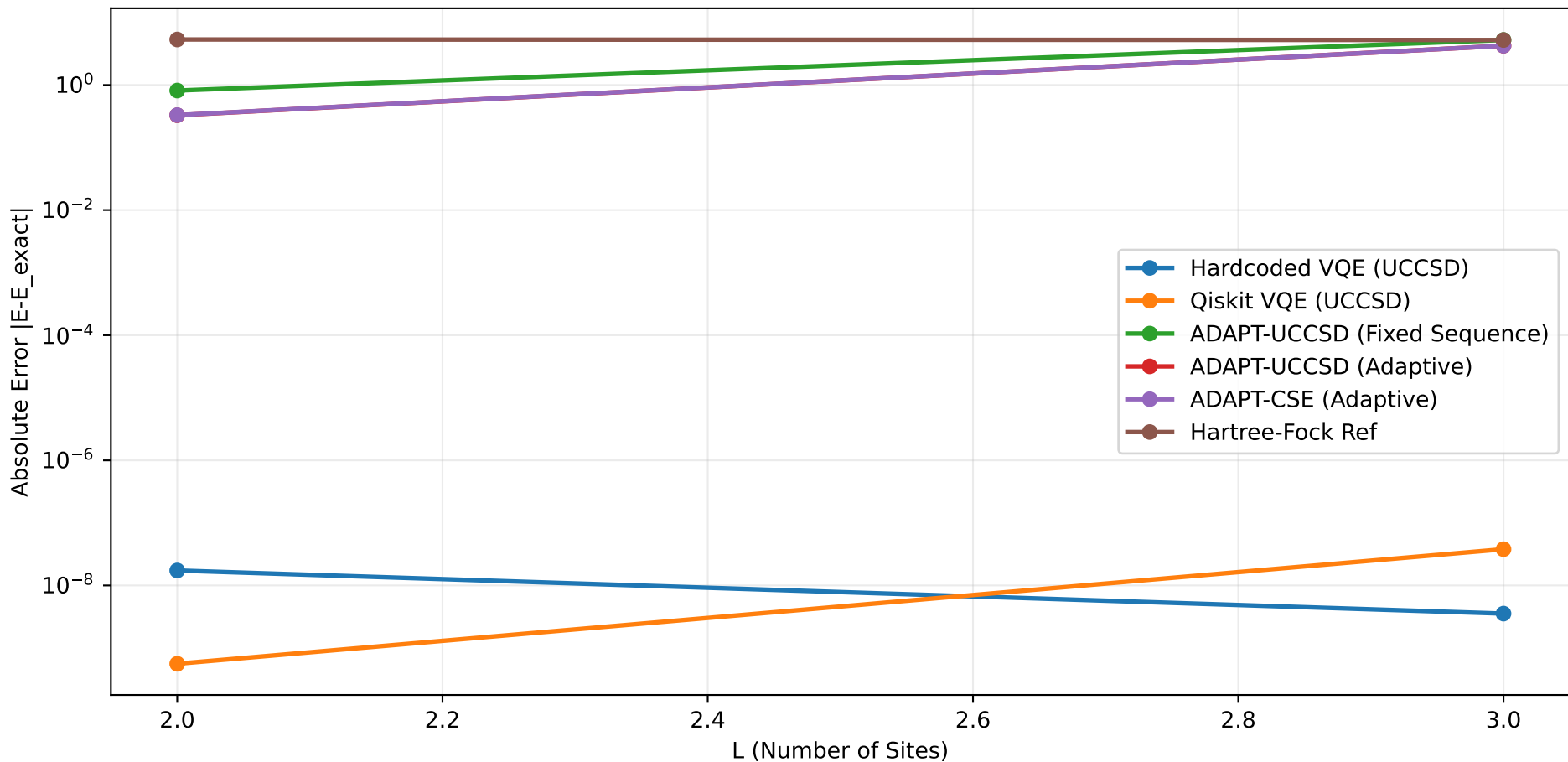
L=3 (n_up=2, n_down=1)

Exact=-1.236067977500	HF= 4.000000000000	
Hardcoded VQE (UCCSD)	E=-1.236067973953	dE =3.547e-09 t=6.70s gate_pass=True
Qiskit VQE (UCCSD)	E=-1.236067939546	dE =3.795e-08 t=86.10s gate_pass=True
ADAPT-UCCSD (Fixed Sequence)	E= 4.000000000000	dE =5.236e+00 t=6.44s gate_pass=False
ADAPT-UCCSD (Adaptive)	E= 3.000000000000	dE =4.236e+00 t=2.61s gate_pass=False
ADAPT-CSE (Adaptive)	E= 3.000000000000	dE =4.236e+00 t=3.32s gate_pass=False

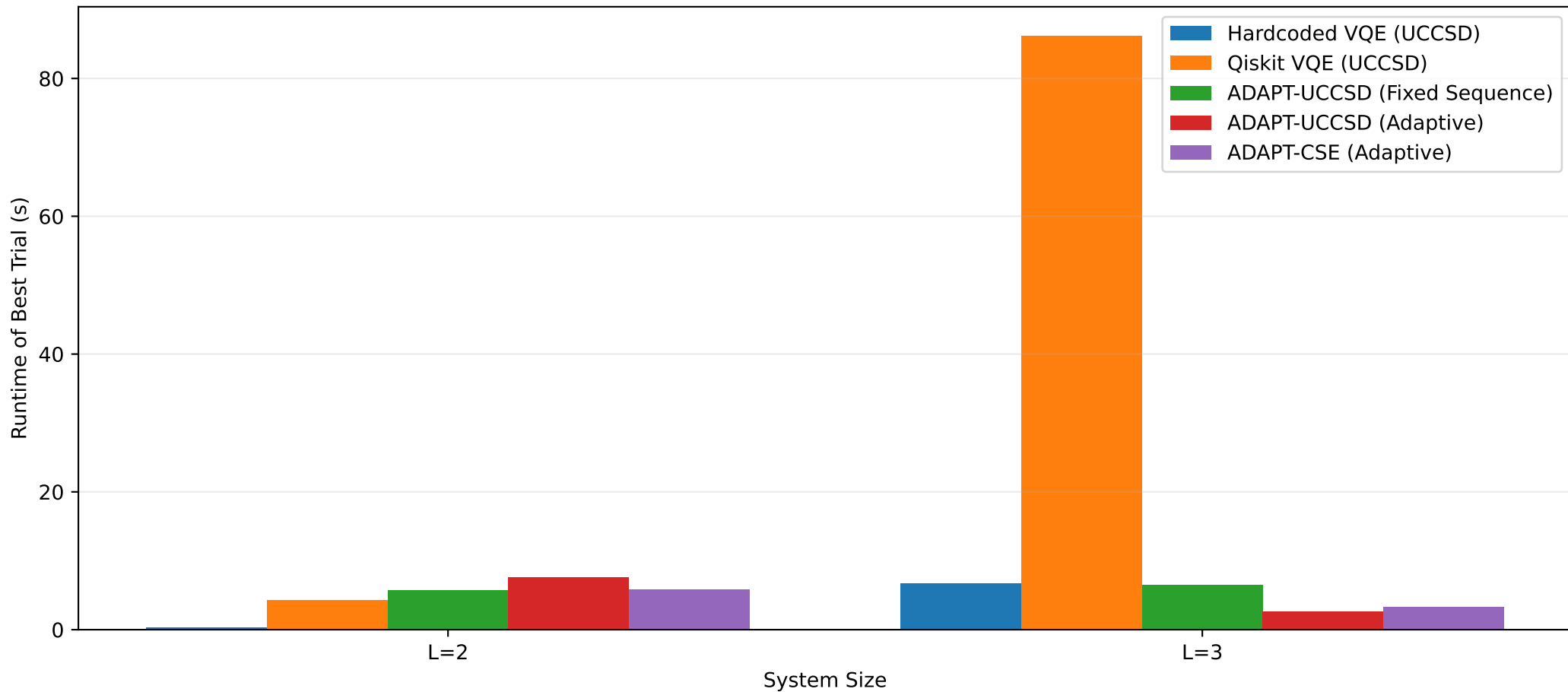
Best Energy by Method



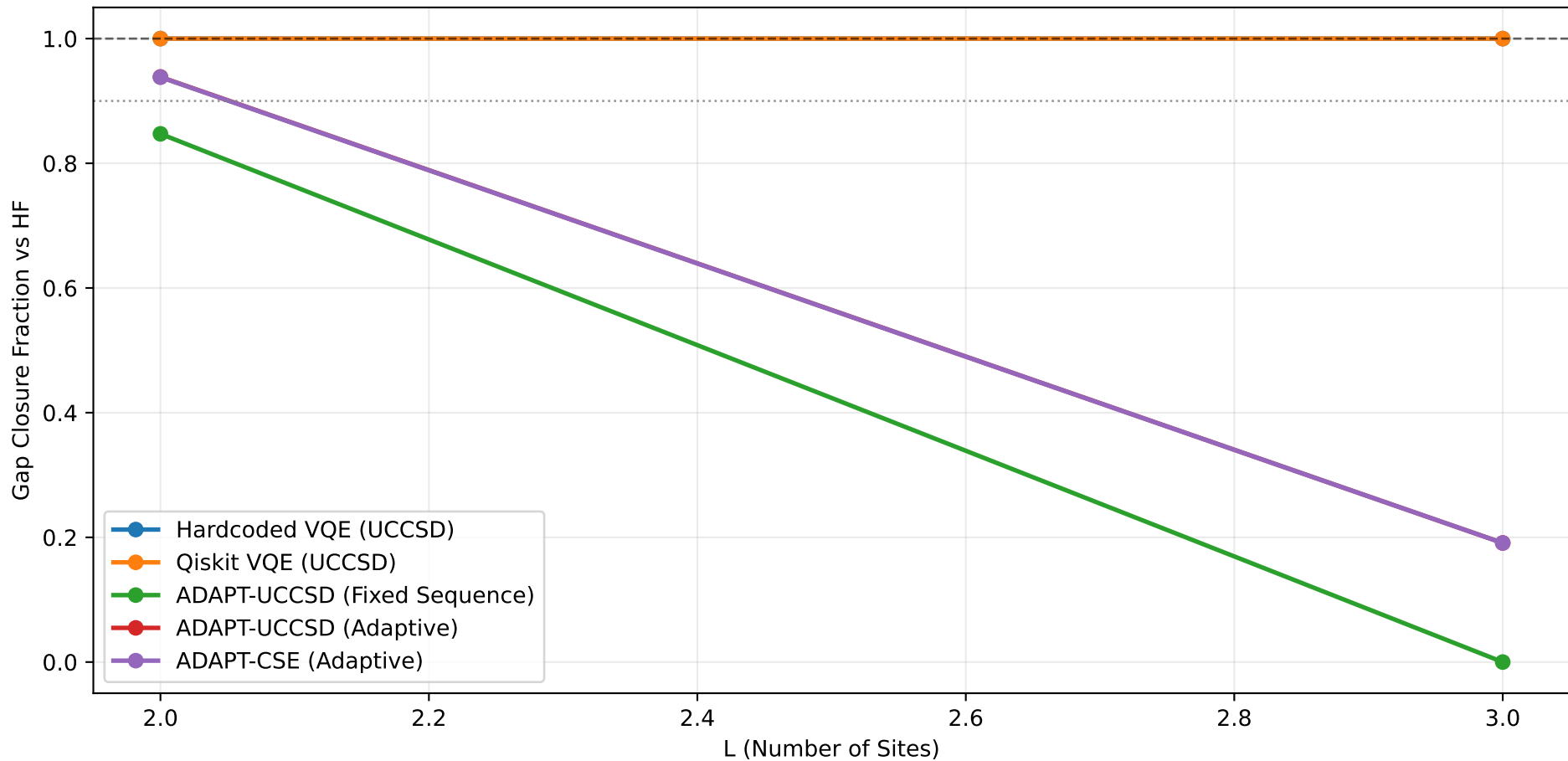
Best Absolute Error vs Exact



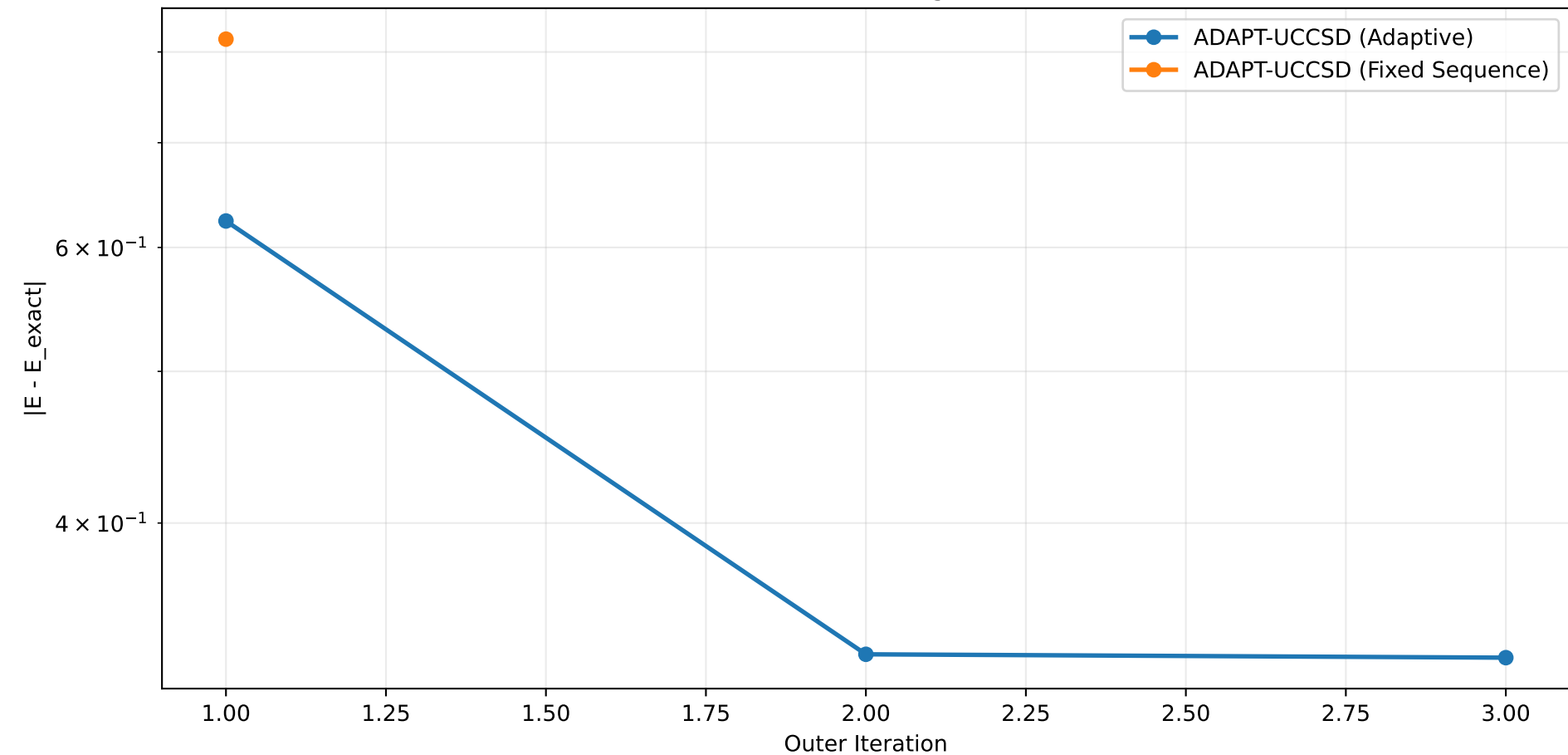
Best-Trial Runtime by Method



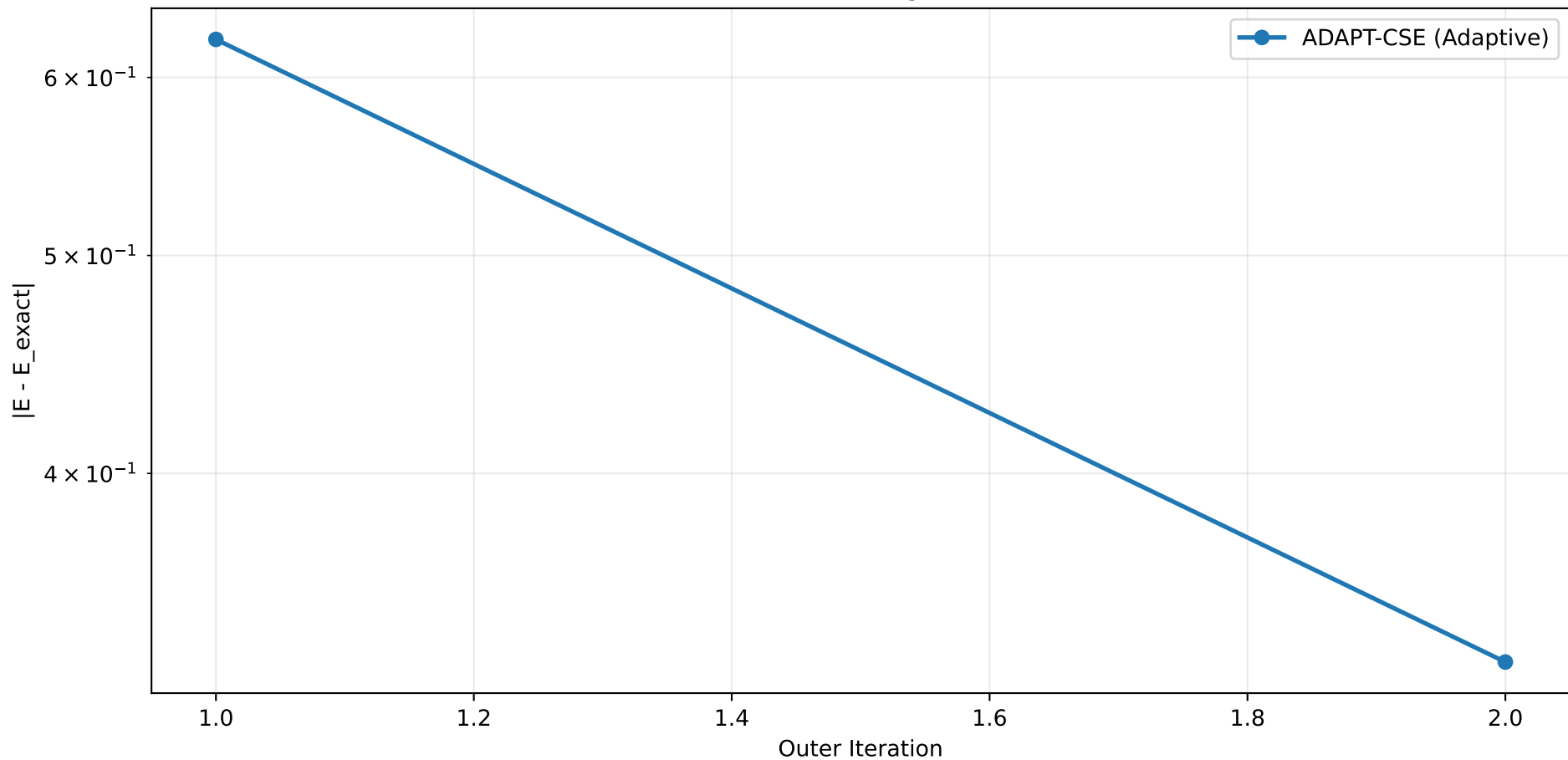
HF Gap-Closure by Method (1.0 = exact)



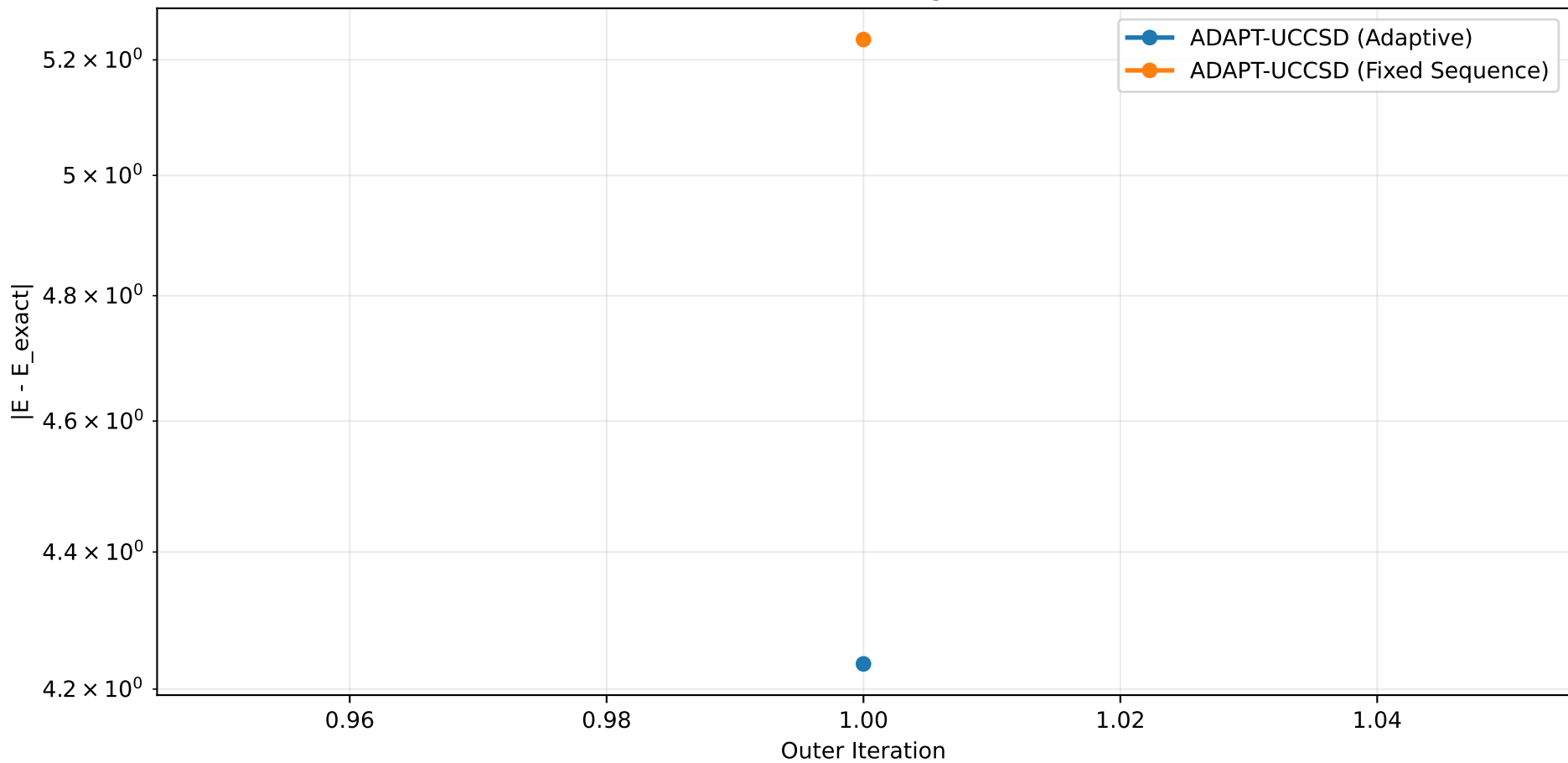
ADAPT-UCCSD Convergence (L=2)



ADAPT-CSE Convergence (L=2)



ADAPT-UCCSD Convergence (L=3)



ADAPT-CSE Convergence (L=3)

