

# Bayesian Optimization Report

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## Configuration Data

**experiment\_name:** hip\_latticing

**minimize:** False

**model:** GPEI

**num\_of\_iters:** 20

**num\_sobol\_steps:** 5

**num\_of\_params:** 2

**uniform\_params:** False

**up\_bound:** None

**lo\_bound:** None

**parameters:** [{'name': 'cell\_size', 'type': 'range', 'bounds': [20.0, 40.0], 'value\_type': 'float'}, {'name': 'lattice\_thickness', 'type': 'range', 'bounds': [2.0, 6.0], 'value\_type': 'float'}]

**objective\_metric:** weight\_savings

**outcome\_constraints:** ['stress <= 40e9']

**constraint\_metrics:** ['stress']

## Optimisation Results

**weight\_savings:** 78.2838640399951

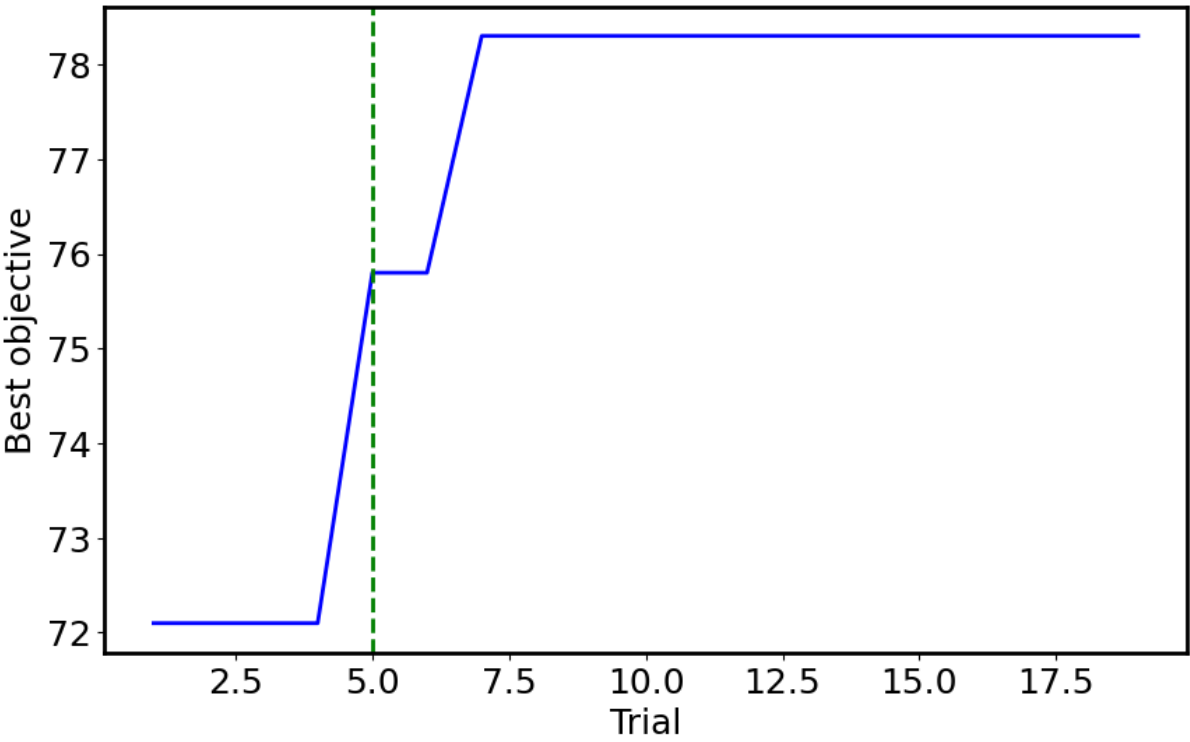
**stress:** 0.6932608118298247

**cell\_size:** 40.0

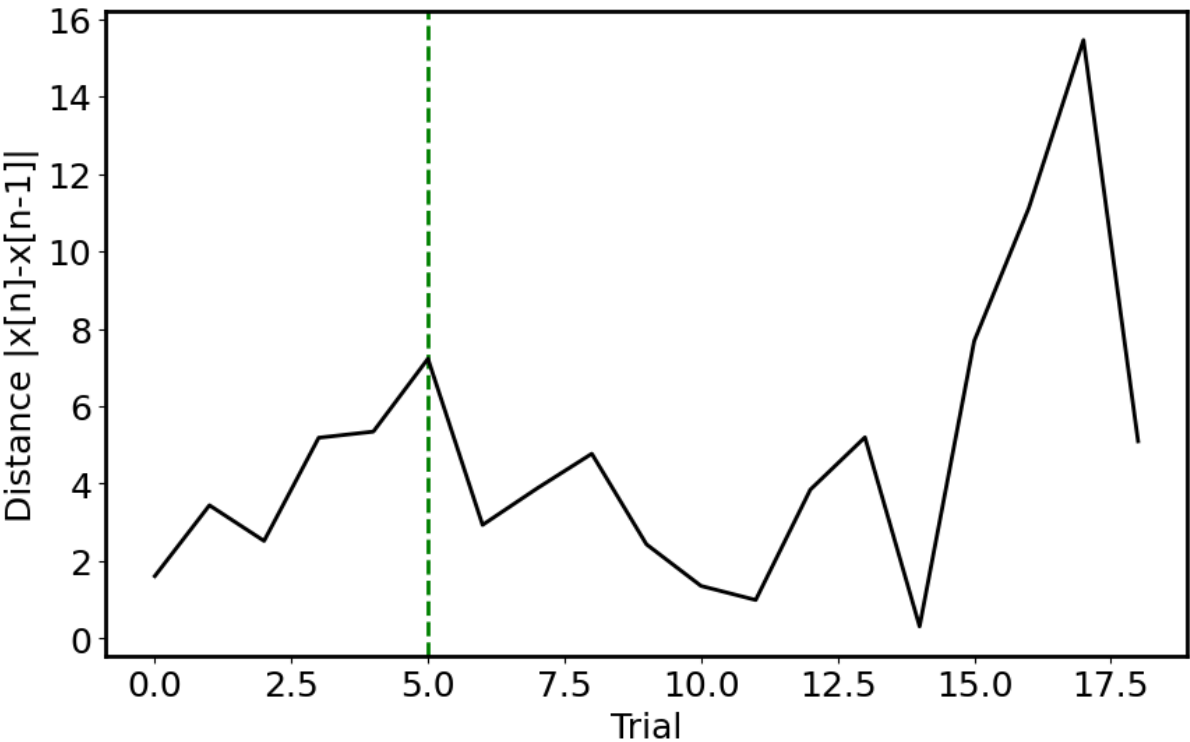
**lattice\_thickness:** 2.0

Plots

convergence\_plot



distances\_plot



evaluations\_plot

