

InterFROST 2 – TH3

# SUTRA Settings

# Settings

- 5s time steps, running for 15E4 seconds
- Grid size 300x150 elements (45,000 elements)
- Using Direct Solver (Banded Gaussian Elimination)
- Run Time = ~20 hours;

## SUTRA stuff

- GNUP = 50
- GNUU = 100,000

No Flow, No Heat Flux

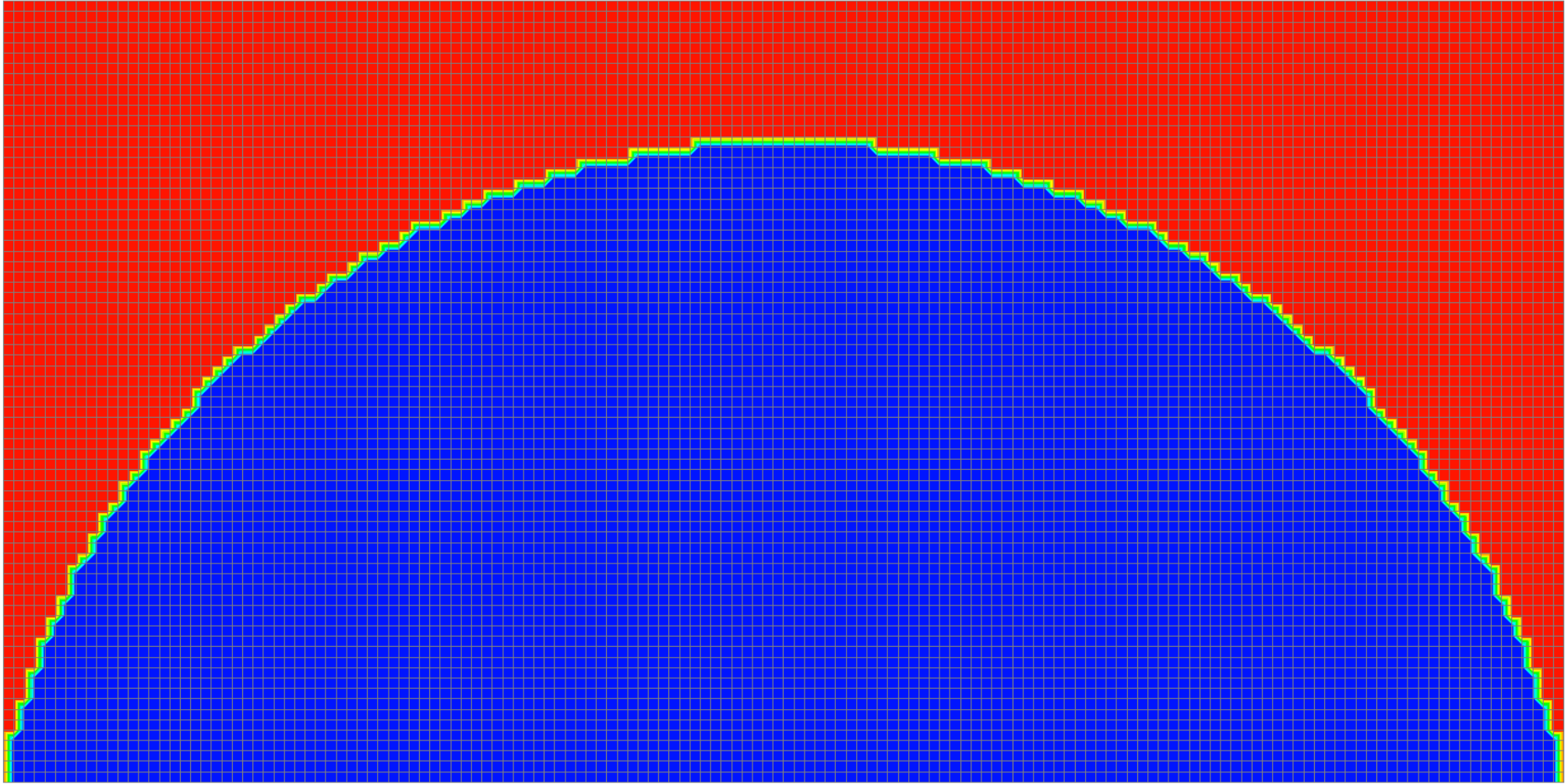
(1 m, 0.5 m)

Specified Temperature and  
Pressure (T=+5; P=0, 294.3, 882.9,  
or 1471.5 Pa)

Specified Pressure (P=0 Pa)

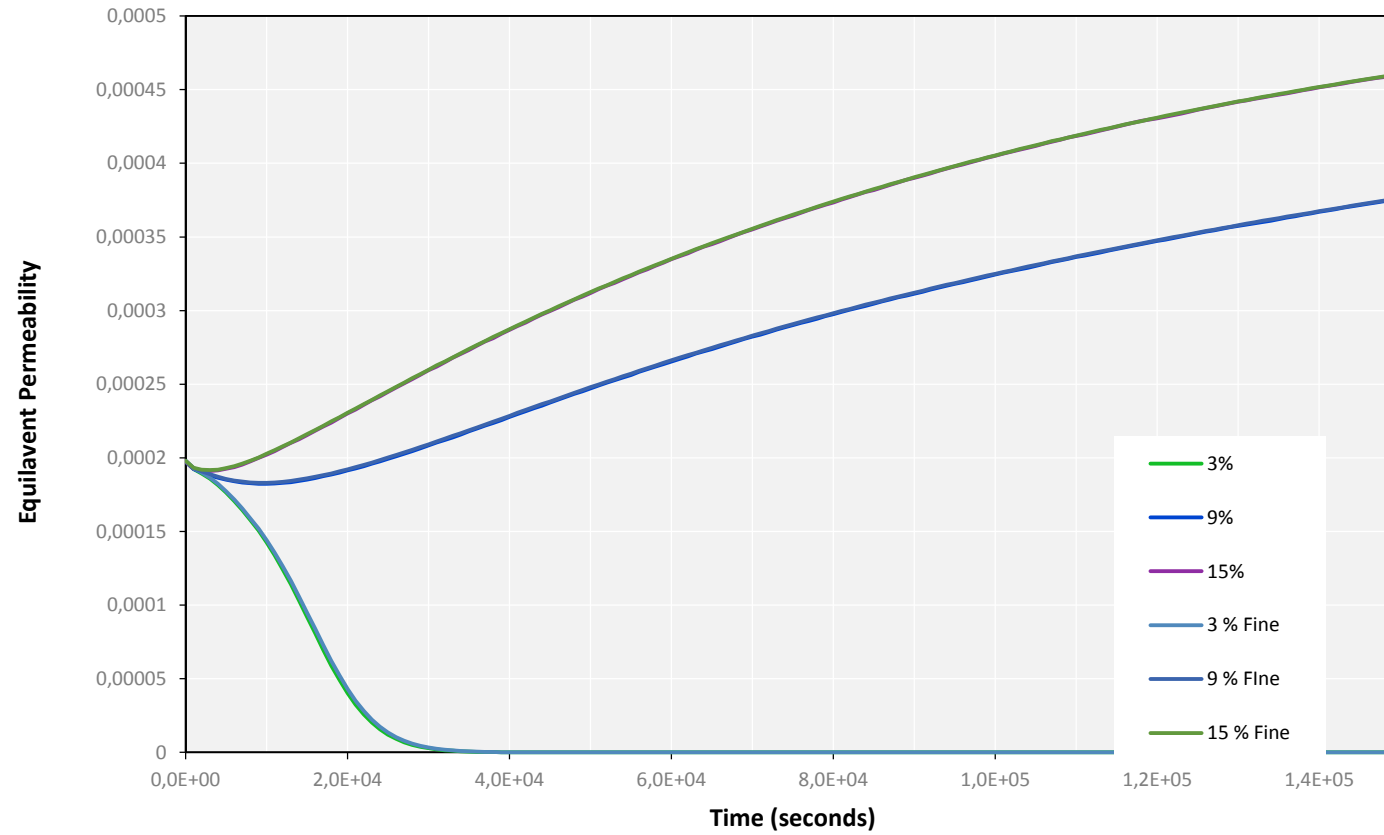
(0 m, 0 m)

Specified Temperature (-5)

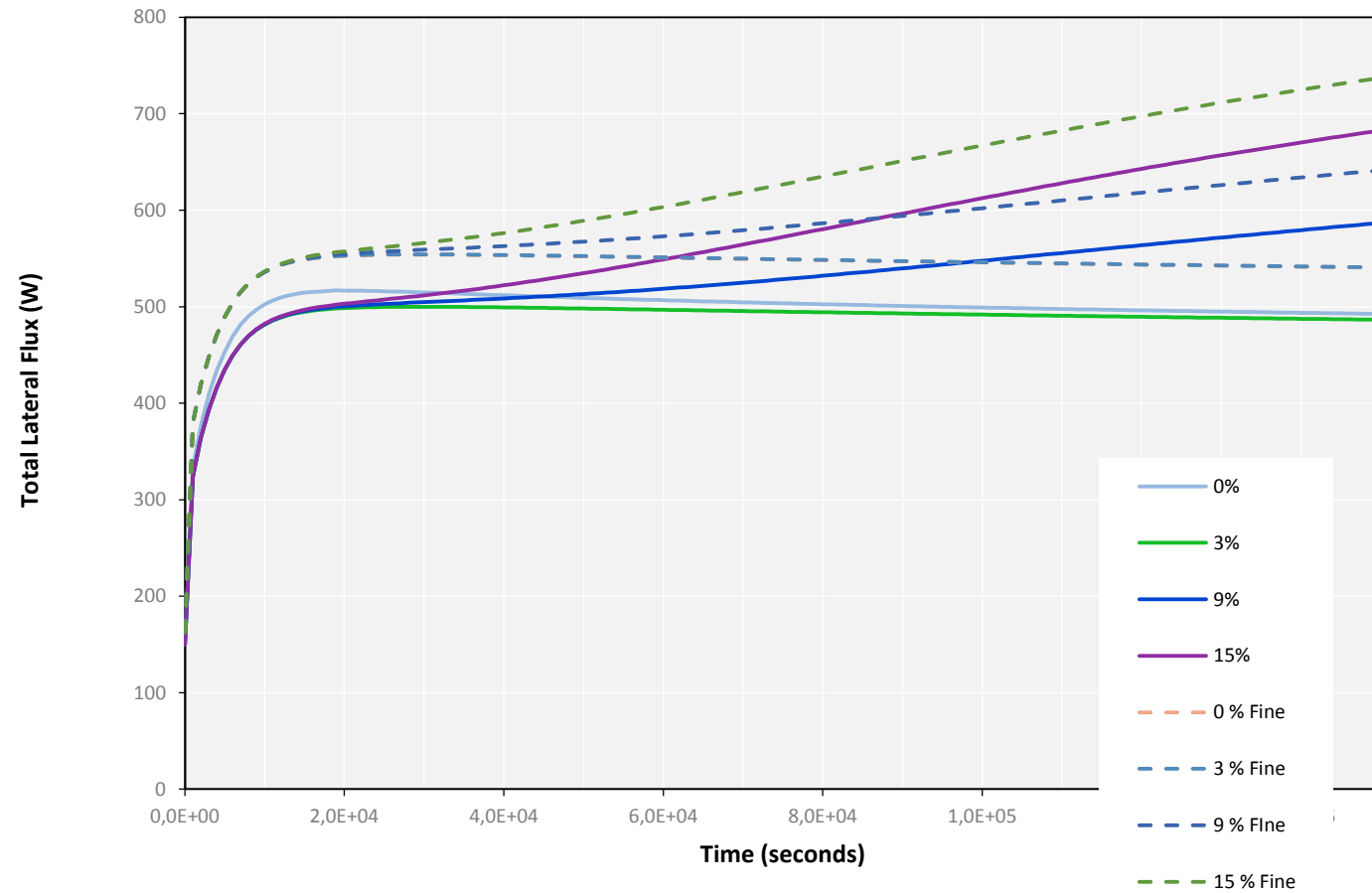


# SUTRA Results

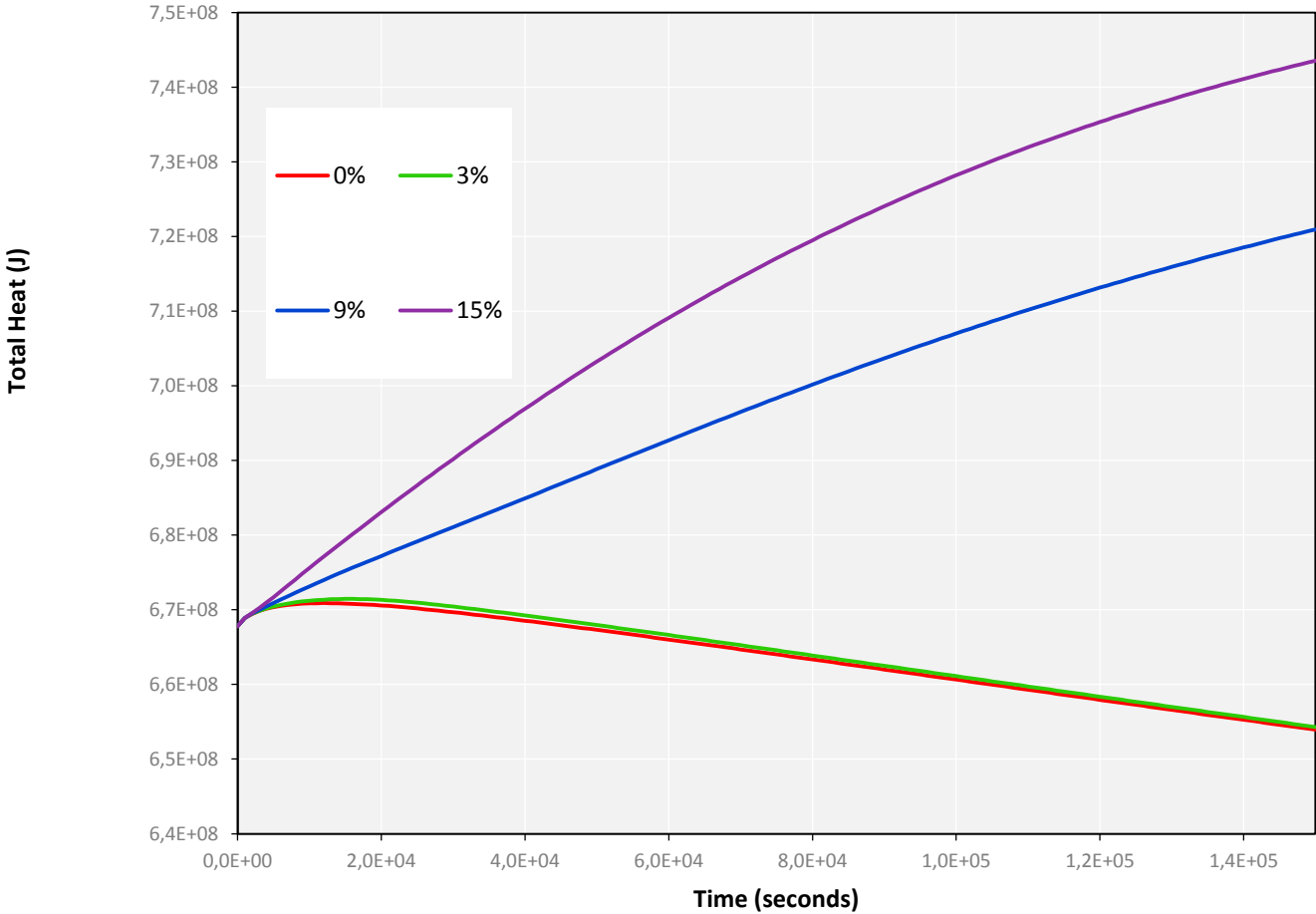
# Equivalent Hydraulic Conductivity



# Lateral Heat Flux (W)



# Total Heat





# Thoughts

- For our runs to work, we need to have a specified Temperature boundary on the left side of the model domain (not clear that this is the case from the instructions)
- What happens in the bottom two corners in terms of boundary conditions? We have all +5 down left side, and -5s specified temperature starts one node over