

Rescales HPC Capabilities

Status	IN PROGRESS
Stakeholders	Solvay Simulation and Modeling Team
Outcome	
Due date	
Owner	Sikora, Ben

Background

Solvay simulation and modeling team is currently looking to see how best to meet the growing HPC needs of the simulation and modeling team. One such way is through cloud computing, with Rescale being one of those solutions. We want to decide here if Rescale has the capability to fulfill the requirements of the Solvay simulation and modeling team.

Notes

Pros

- API access, CLI available
- Ability to create desktop templates
- Ability to create job templates
- Ability to run custom codes (workstation only?)
- High performance I/O available (storage)
- ssh into workstations
- multiscreen capabilities

Cons

- Slow initial start up
- Custom codes require Apptainer/Singularity
- Unsure if custom codes can be included in template without Apptainer/Singularity
- Unsure how to run custom code through job command
- Unsure how to run custom code through API
- High performance storage costs per hour
- Cloud storage cost?
- One hour wait time after suspending computer

Questions

1. If a workstation is shutdown or hits the walltime, can that workstation's previous state be recovered?

Action items

