

Heat storage types: sensible heat with natural separation of hot and cold oil

front

- Principle: Thermal stratification can provide heat in/out at constant temperature
- Ideal: thermal front moves up (discharging) or down (charging)
- The storage can be a rock bed
- Reality: The thermal front decays due to heat conduction
- Tests with single phase oil and with rock bed using oil or air as heat transfer fluid



Air-rock bed tests (Denis Okello)





Horzintal air-rock bed test (Amos Veremachi)



Artistic version

