Summary of measurable quantities; all quantities are assumed to be per mole.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Name** | **Symbol** | **Dimension**  **(SI unit)** | **Definition** | **Comment** |
| Isothermal Joule-Thomson coefficient |  | Volume |  |  |
| Adiabatic Joule-Thomson coefficient |  | Temp/Pressure |  | Measured in the Joule-Thomson experiment |
| Isothermal Joule coefficient (aka internal pressure) |  | Pressure |  | Measured in the Joule experiment |
| Isobaric heat capacity |  | Energy/Temp |  | Measure, or approximate as |
| Isochoric heat capacity |  | Energy/Temp |  | Est. from equipartition, or approximate as |
| Isothermal compressibility |  | 1/Pressure |  | Water density at the ocean floor |
| Isobaric thermal expansivity |  | 1/Temp |  | Sea level rise |
| Expansivity-to-compressibility ratio |  | Pressure/Temp |  | From Euler chain relation |
| Inversion temperature |  | Temp | Temp at which | vdw: |
| Critical temperature |  | Temp | Temp at which | vdw: |