* Should be high d18O 🡪 low temperature.
* So high d18O\_oto – d18O\_water 🡪 low temperature.

dC – dW = a + b \* T

## Notes on Selecting a Temperature Prior

|  |  |  |
| --- | --- | --- |
| **Paper** | **Min** | **Max** |
| Collins 2008 | 1.4 | 3 |
| Kozlov 1991 | 1.5 | 5 |
| Lourenco 2017 | -0.2 | 4 |
| Piatkowski 1994 | -0.7 | 2.9 |
| Saunders 2014 | -1.6 | 1.5 |
| JR16003 Cruise Reports | -1 | 5.6 |
| JR15004 Cruise Reports | -0.8 | -0.6 |
| JR177 Cruise Reports | -3.5 | -1.5 |

* Set prior as normal distribution with a mean of 2 and SD of 3.
  + Encompasses most reported temperatures in literature and cruise reports.
* Prevents estimates below freezing point of seawater.
  + Lower end at freezing point of seawater (DeVries and Wohlschlag 1969).