|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  | **Intercept only** | **GLS** | **LMM1** | **LMM2** | **LMM3** |
| *Predictors* | *Estimates* | *Estimates* | *Estimates* | *Estimates* | *Estimates* |
| (Intercept) | 4.64 \*\*\* | 3.60 \*\*\* | 4.01 \*\*\* | 4.03 \*\*\* | 4.01 \*\*\* |
| temp C |  | 0.09 \*\*\* | 0.04 \*\*\* | 0.04 \*\*\* | 0.04 \*\*\* |
| nutrient trt [1] |  | 0.24 | 0.06 | 0.06 | 0.06 |
| month [1] |  | 0.91 | -0.47 \*\*\* | -0.47 \*\*\* | -0.47 \*\* |
| month [2] |  | 0.65 | 0.51 \*\* | 0.49 \*\* | 0.46 \*\* |
| month [3] |  | 0.16 | 0.75 \*\*\* | 0.78 \*\*\* | 0.78 \*\*\* |
| month [4] |  | 0.84 \* | -0.55 \*\*\* | -0.55 \*\*\* | -0.54 \*\*\* |
| temp C \* nutrient trt [1] |  | -0.03 | -0.00 | -0.00 | -0.00 |
| temp C \* month [1] |  | -0.08 \* | 0.05 \*\*\* | 0.05 \*\*\* | 0.05 \*\*\* |
| temp C \* month [2] |  | -0.06 | -0.03 \*\*\* | -0.03 \*\*\* | -0.03 \*\*\* |
| temp C \* month [3] |  | -0.06 | -0.04 \*\*\* | -0.04 \*\*\* | -0.04 \*\*\* |
| temp C \* month [4] |  | -0.08 \* | 0.01 | 0.01 | 0.00 |
| nutrient trt [1] \* month [1] |  | 0.08 | -0.06 | -0.06 | -0.04 |
| nutrient trt [1] \* month [2] |  | -0.59 | -0.14 | -0.14 | -0.11 |
| nutrient trt [1] \* month [3] |  | -1.02 | -0.04 | -0.04 | -0.07 |
| nutrient trt [1] \* month [4] |  | -1.31 \* | 0.08 | 0.06 | 0.06 |
| (temp C \* nutrient trt [1]) \* month [1] |  | 0.01 | 0.01 | 0.01 | 0.00 |
| (temp C \* nutrient trt [1]) \* month [2] |  | 0.04 | 0.01 | 0.01 | 0.01 |
| (temp C \* nutrient trt [1]) \* month [3] |  | 0.06 | 0.00 | 0.00 | 0.00 |
| (temp C \* nutrient trt [1]) \* month [4] |  | 0.10 \* | -0.00 | -0.00 | -0.00 |
| **Random Effects** | | | | | |
| σ2 |  |  | 0.01 | 0.01 | 0.01 |
| τ00 |  |  | 0.08 rock\_ID | 0.08 rock\_ID | 0.17 rock\_ID |
| τ11 |  |  |  |  | 0.00 rock\_ID.temp\_C |
| ρ01 |  |  |  |  | -0.83 rock\_ID |
| ICC |  |  | 0.89 | 0.88 | 0.91 |
| N |  |  | 78 rock\_ID | 78 rock\_ID | 78 rock\_ID |
| Observations | 153 | 153 | 153 | 153 | 153 |
| R2 | -6.289 | -6.281 | 0.668 / 0.963 | 0.663 / 0.961 | 0.661 / 0.971 |
| AIC | 1564.788 | 1502.044 | 1390.943 | 1376.967 | 1369.317 |
| *\* p<0.05   \*\* p<0.01   \*\*\* p<0.001* | | | | | |