

KPESIL - Keck Paleoenvironmental & Environmental Stable Isotope Laboratory (University of Kansas)

CURRENT RATES (2019)

| | Rate Academic KU | Rate Academic Non-KU | Rate Non Academic (Commercial) | Peripheral-Mass spectrometer | Precision |
|--|---|---|---|---|--|
| EA $\delta^{13}\text{C}$ and $\delta^{15}\text{N}$ of solid samples (includes %C and %N) | \$7.00 | \$11.00 | \$13.00 | Costech Elemental Analyzer 4010- ThermoFinnigan MAT253 IRMS (continuous flow) | $\delta^{13}\text{C}=0.13\text{‰}$ $\delta^{15}\text{N}=0.27\text{‰}$ |
| Gasbench $\delta^{13}\text{C}$ of CO_2 and air samples $\delta^{13}\text{C}$ & $\delta^{18}\text{O}$ of Carbonates | \$7.00 \$7.00 | \$11.00 \$11.00 | \$20.00 \$20.00 | ThermoFinnigan GasBench II- ThermoFinnigan MAT253 IRMS (Continuous Flow) | $\delta^{13}\text{C}=0.06\text{‰}$ / $\delta^{18}\text{O}=0.13\text{‰}$ |
| Picarro $\delta^{18}\text{O}$ + $\delta^2\text{H}$ of liquid samples | \$9.00 | \$13.30 | \$18.00 | Cavity Ringdown Spectrometer (Laser) | $\delta^2\text{H}=0.2\text{‰}$ $\delta^{18}\text{O}=0.11\text{‰}$ |
| TC/EA $\delta^{18}\text{O}$ of solid samples $\delta^{18}\text{O}$ and δD of liquid samples | \$10.00 \$10.00 | \$15.70 \$15.70 | \$29.00 \$29.00 | ThermoFinnigan TC/EA- ThermoFinnigan MAT253 (Continuous Flow) | Phosphate $\delta^{18}\text{O}=0.34\text{‰}$ Cellulose $\delta^{18}\text{O}=0.19\text{‰}$ |
| Kiel IV $\delta^{18}\text{O}$ and $\delta^{13}\text{C}$ of carbonates | \$7.00 | \$11.00 | \$15.00 | ThermoFinnigan Kiel IV- ThermoFinnigan MAT253 (Dual Inlet) | $\delta^{13}\text{C}=0.03\text{‰}$ $\delta^{18}\text{O}=0.05\text{‰}$ |
| GC/TC III $\delta^{13}\text{C}$ and δD of methane samples | \$12.00 | \$18.80 | \$23.00 | ThermoFinnigan Trace GC Ultra- ThermoFinnigan MAT253 | unavailable |
| Labour Based Fees | | | | | |
| Lab Manager Time | \$30.00 | \$30.00 | \$75.00 | | |
| Lab Director Time | \$75.00 | \$75.00 | \$180.00 | | |
| Graduate Student Time | \$25.00 | \$25.00 | \$60.00 | | |
| Undergraduate Student Time | \$10.00 | \$10.00 | \$25.00 | | |
| Sample Weighing | \$1.25 | \$1.25 | \$3.00 | | |
| Sample Decarbonation | \$3.00 | \$3.00 | \$7.50 | | |
| Material & Supplies not covered by fees | Actual Cost | Actual Cost | Actual Cost | | |
| Special processing & handling | Cost of Materials & Labour. Minimum \$30.00 | Cost of Materials & Labour. Minimum \$30.00 | Cost of Materials & Labour. Minimum \$60.00 | | |

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