

2018

Simultaneous Metabolic Quantification to Improve Mechanistic Understanding of Nutrient Function and Efficacy

Clara E. Cho

Utah State University, clara.cho@usu.edu

Follow this and additional works at: https://digitalcommons.usu.edu/funded_research_data

 Part of the [Animal Sciences Commons](#)

Recommended Citation

Cho, Clara E., "Simultaneous Metabolic Quantification to Improve Mechanistic Understanding of Nutrient Function and Efficacy" (2018). *Funded Research Records*. Paper 54.

https://digitalcommons.usu.edu/funded_research_data/54

This Grant Record is brought to you for free and open access by DigitalCommons@USU. It has been accepted for inclusion in Funded Research Records by an authorized administrator of DigitalCommons@USU. For more information, please contact dylan.burns@usu.edu.



Data Management Plan

Expected Data Type. Spreadsheets, pictures, handwritten records from individual observation records and digital output from the CLAMS-HC system.

Data Format. Raw data will be gathered as hard copy documentation recorded permanently in laboratory notebooks and/or as electronic files, as follows:

Written material: Word and Pages files

Spreadsheets: Excel CVS and TXT files

Digital images: BMP, GIF and PNG

Statistical analysis files: CLAMS data eXamination Tool (CLAX), SAS, Jmp and GraphPad Prism

Other: PowerPoint, Adobe PDF

All hard copy data will be digitized as either images (jpeg), spreadsheets (Excel) or PDF documents.

Data Storage and Preservation. Dr. Cho (PD) and each faculty using the CLAMS-HC system will be responsible for retaining all measured data output. All hard copy records will be archived and securely stored onsite in the laboratory. All digital data will be stored secured on individual computers, on a secure cloud server (Box.com) maintained by the university with restricted access and on an external hard drive maintained offsite at the PD and each faculty's home locked in a fire-proof safe. Digital data will be backed up to the cloud and external hard drive on a daily basis.

Data Sharing and Public Access. Research data will be shared with the public through publication in peer-reviewed journals and presentations in professional meetings. Prior to public availability, the data will be available upon request. Raw data arising from this project will be made available through USU's Digital Commons repository (<http://digitalcommons.usu.edu>) or may be deposited as supplementary information at the journal website.

All original research data will be secured with access restricted to personnel involved directly in this research. Access will be granted and managed by the PD and each faculty using the equipment; access to cloud storage via Box.com is managed using various permission level settings (e.g., view access only, or view/edit/delete access).

Roles and Responsibilities. Data management plan will be implemented by the PD and each faculty, and their students involved in this project. Students will be responsible for collecting data in their laboratory notebooks, transferring data to digital formats and retaining all digital outputs from the CLAMS-HC system on a secure cloud server Box.com. The PD and each faculty will have direct oversight of the data management plan and train all students. Weekly meetings with students will be held to ensure that all project data are stored securely and protected. After the project completion, the PD and each faculty will be responsible for long-term data storage and preservation.

Monitoring and Reporting. The project and data management plan will be monitored as specified by USDA NIFA.