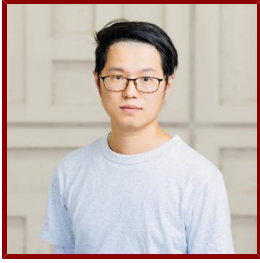


Stanford



Xiaotao Shen

Postdoctoral Scholar, Genetics

 Curriculum Vitae available Online

Bio

HONORS AND AWARDS

- Travel Award, Journal Metabolites (2018)
- Student Travel Award, The International Metabolomics Society (2018)

PROFESSIONAL EDUCATION

- Doctor of Philosophy, Chinese Academy Of Sciences (2019)
- BS, Inner Mongolia University (2013)

STANFORD ADVISORS

- Michael Snyder, Postdoctoral Faculty Sponsor

LINKS

- Personal website: <http://shenxt.info/>

Research & Scholarship

LAB AFFILIATIONS

- Michael Snyder, Snyder Lab (4/1/2019)

Publications

PUBLICATIONS

- **Multi-omics microsampling for the profiling of lifestyle-associated changes in health.** *Nature biomedical engineering*
Shen, X., Kellogg, R., Panyard, D. J., Bararpour, N., Castillo, K. E., Lee-McMullen, B., Delfarah, A., Ubellacker, J., Ahadi, S., Rosenberg-Hasson, Y., Ganz, A., Contrepois, K., Michael, et al
2023
- **Deep learning-based pseudo-mass spectrometry imaging analysis for precision medicine.** *Briefings in bioinformatics*
Shen, X., Shao, W., Wang, C., Liang, L., Chen, S., Zhang, S., Rusu, M., Snyder, M. P.
2022
- **massDatabase: utilities for the operation of the public compound and pathway database.** *Bioinformatics (Oxford, England)*
Shen, X., Wang, C., Snyder, M. P.
2022
- **TidyMass an object-oriented reproducible analysis framework for LC-MS data.** *Nature communications*
Shen, X., Yan, H., Wang, C., Gao, P., Johnson, C. H., Snyder, M. P.

2022; 13 (1): 4365

- **Precision environmental health monitoring by longitudinal exposome and multi-omics profiling.** *Genome research*
Gao, P., Shen, X., Zhang, X., Jiang, C., Zhang, S., Zhou, X., Schüssler-Fiorenza Rose, S. M., Snyder, M.
2022
- **Multimic analysis reveals cell-type-specific molecular determinants of COVID-19 severity.** *Cell systems*
Zhang, S., Cooper-Knock, J., Weimer, A. K., Shi, M., Kozhaya, L., Unutmaz, D., Harvey, C., Julian, T. H., Furini, S., Frullanti, E., Fava, F., Renieri, A., Gao, et al
2022
- **metID: a R package for automatable compound annotation for LC-MS-based data.** *Bioinformatics (Oxford, England)*
Shen, X., Wu, S., Liang, L., Chen, S., Contrepois, K., Zhu, Z., Snyder, M.
2021
- **Metabolic Dynamics and Prediction of Gestational Age and Time to Delivery in Pregnant Women** *OBSTETRICAL & GYNECOLOGICAL SURVEY*
Liang, L., Rasmussen, M., Piening, B., Shen, X., Chen, S., Rost, H., Snyder, J. K., Tibshirani, R., Skotte, L., Lee, N. Y., Contrepois, K., Feenstra, B., Zackriah, et al
2020; 75 (11): 649–51
- **Metabolic Dynamics and Prediction of Gestational Age and Time to Delivery in Pregnant Women.** *Cell*
Liang, L., Rasmussen, M. H., Piening, B., Shen, X., Chen, S., Rost, H., Snyder, J. K., Tibshirani, R., Skotte, L., Lee, N. C., Contrepois, K., Feenstra, B., Zackriah, et al
2020; 181 (7): 1680
- **Metabolic reaction network-based recursive metabolite annotation for untargeted metabolomics** *NATURE COMMUNICATIONS*
Shen, X., Wang, R., Xiong, X., Yin, Y., Cai, Y., Ma, Z., Liu, N., Zhu, Z.
2019; 10: 1516
- **LipidIMMS Analyzer: integrating multi-dimensional information to support lipid identification in ion mobility-mass spectrometry based lipidomics** *BIOINFORMATICS*
Zhou, Z., Shen, X., Chen, X., Tu, J., Xiong, X., Zhu, Z.
2019; 35 (4): 698–700
- **Development of a Correlative Strategy To Discover Colorectal Tumor Tissue Derived Metabolite Biomarkers in Plasma Using Untargeted Metabolomics** *ANALYTICAL CHEMISTRY*
Wang, Z., Cui, B., Zhang, F., Yang, Y., Shen, X., Li, Z., Zhao, W., Zhang, Y., Deng, K., Rong, Z., Yang, K., Yu, X., Li, et al
2019; 91 (3): 2401–8
- **MetFlow: An Interactive and Integrated Workflow for Metabolomics Data Cleaning and Differential Metabolite Discovery** *Bioinformatics*
Shen, X., Zhu, Z.
2019
- **LipidCCS: Prediction of Collision Cross-Section Values for Lipids with High Precision To Support Ion Mobility-Mass Spectrometry-Based Lipidomics** *ANALYTICAL CHEMISTRY*
Zhou, Z., Tu, J., Xiong, X., Shen, X., Zhu, Z.
2017; 89 (17): 9559–66
- **Large-Scale Prediction of Collision Cross-Section Values for Metabolites in Ion Mobility-Mass Spectrometry** *ANALYTICAL CHEMISTRY*
Zhou, Z., Shen, X., Tu, J., Zhu, Z.
2016; 88 (22): 11084–91
- **Serum metabolomics for early diagnosis of esophageal squamous cell carcinoma by UHPLC-QTOF/MS** *METABOLOMICS*
Wang, J., Zhang, T., Shen, X., Liu, J., Zhao, D., Sun, Y., Wang, L., Liu, Y., Gong, X., Liu, Y., Zhu, Z., Xue, F.
2016; 12 (7)
- **Normalization and integration of large-scale metabolomics data using support vector regression** *METABOLOMICS*
Shen, X., Gong, X., Cai, Y., Guo, Y., Tu, J., Li, H., Zhang, T., Wang, J., Xue, F., Zhu, Z.
2016; 12 (5)

PRESENTATIONS

- Metabolic Reaction Network-based Recursive Metabolite Identification for Untargeted Metabolomics - Metabolic Reaction Network-based Recursive Metabolite Identification for Untargeted Metabolomics (oral) The 14th International Conference of the Metabolomics Society
- Normalization and Integration of Large-Scale Mass Spectrometry-based Metabolomics Data Using Support Vector Regression - The 34th China Mass Spectrometry Society Conference