

PUBLICATIONS

See [ADS](#), [Google Scholar](#), and [INSPIRE](#) for the complete publication list

First-author papers (8 published/accepted; 1 submitted)

1. “*Mapping Galactic Dust Emission and Extinction with HI, HII, and H₂*”
Y.-T. Cheng, B. S. Hensley, T.-C. Chang, and O. Doré; 2024, [ApJ submitted](#); [arXiv:2411.12801](#)
2. “*Bayesian Multi-line Intensity Mapping*”
Y.-T. Cheng, K. Wang, B. D. Wandelt, T.-C. Chang, and O. Doré; 2024, [ApJ](#), **971**, 159; [arXiv:2403.19740](#)
3. “*Is the Radio Source Dipole from NVSS Consistent with the CMB and Λ CDM?*”
Y.-T. Cheng, T.-C. Chang, and Adam Lidz; 2023, [ApJ](#), **965**, 32; [arXiv:2309.02490](#)
4. “*Data-driven Cosmology from Three-dimensional Light Cones*”
Y.-T. Cheng, B. D. Wandelt, T.-C. Chang, and O. Doré; 2023, [ApJ](#), **944**, 151; [arXiv:2210.10052](#)
5. “*Near-infrared Extragalactic Background Light Fluctuations on Nonlinear Scales*”
Y.-T. Cheng, and J. J. Bock; 2022; [ApJ](#) **940**, 115; [arXiv:2207.13712](#)
6. “*Cosmic Near-Infrared Background Tomography with SPHEREx Using Galaxy Cross-Correlations*”
Y.-T. Cheng, and T.-C. Chang; 2022, [ApJ](#) **925**, 136; [arXiv:2109.10914](#)
7. “*Probing Intra-Halo Light with Galaxy Stacking in CIBER Images*”
Y.-T. Cheng, et al. (CIBER Collaboration); 2021, [ApJ](#), **919**, 69; [arXiv:2103.03882](#)
8. “*Phase-Space Spectral Line De-confusion in Intensity Mapping*”
Y.-T. Cheng, T.-C. Chang, and J. J. Bock; 2020, [ApJ](#), **901**, 142; [arXiv:2005.05341](#)
9. “*Optimally Mapping Large-Scale Structures with Luminous Sources*”
Y.-T. Cheng, R. de Putter, T.-C. Chang, and O. Doré; 2019, [ApJ](#), **877**, 86; [arXiv:1809.06384](#)
10. “*Spectral Line De-Confusion in an Intensity Mapping Survey*”
Y.-T. Cheng, T.-C. Chang, J. J. Bock, C. M. Bradford, and A. R. Cooray; 2016, [ApJ](#), **832**, 165; [arXiv:1604.07833](#)

Co-author papers

1. “*Inferred Measurements of the Zodiacal Light Absolute Intensity through Fraunhofer Absorption Line Spectroscopy with CIBER*”
P. M. Korngut, et al., 2022, [ApJ](#), **926**, 133; [arXiv:2104.07104](#)
2. “*Probing Cosmic Reionization and Molecular Gas Growth with TIME*”
G. Sun, T.-C. Chang, et al., 2021, [ApJ](#), **915**, 33; [arXiv:2012.09160](#)
3. “*Superresolution Reconstruction of Severely Undersampled Point-spread Functions Using Point-source Stacking and Deconvolution*”
T. Symons, M. Zemcov, et al., 2021, [ApJS](#), **252**, 24; [arXiv:2102.01094](#)
4. “*Hafnium Films and Magnetic Shielding for TIME, A mm-Wavelength Spectrometer Array*”
J. Hunacek, et al., 2018, [JLTP](#), **193**, 893
5. “*A Foreground Masking Strategy for [C II] Intensity Mapping Experiments Using Galaxies Selected by Stellar Mass and Redshift*”
G. Sun, L. Monceli, M. P. Viero, et al., 2018, [ApJ](#), **856**, 107; [arXiv:1601.10095](#)
6. “*Design and fabrication of tes detector modules for the time-pilot [cii] intensity mapping experiment*”
J. Hunacek, et al., 2016, [JLTP](#), **184**, 733

Non-refereed review papers / white papers

1. “*PRIMA General Observer Science Book*”
A. Moullet, et al., 2023, [arXiv:2310.20572](#) (contributing a line intensity mapping science case for PRIMA)
2. “*Tomography of the Cosmic Dawn and Reionization Eras with Multiple Tracers*”
T.-C. Chang, et al., 2019, Astro2020 White Paper, [arXiv:1903.11744](#)
3. “*Line-Intensity Mapping: 2017 Status Report*”
E. D. Kovetz, M. P. Viero, et al., 2017, [arXiv:1709.09066](#)

Conference proceedings

1. “*A status update on TIME: a mm-wavelength spectrometer designed to probe the Epoch of Reionization*”
A. Crites, et al., 2020, [SPIE, 114530G](#)
2. “*Detector modules and spectrometers for the TIME-Pilot [CII] intensity mapping experiment*”
J. Hunacek, et al., 2016, [SPIE, 99140L](#)