COSIMA EIBENSTEINER

Jansky Postdoctoral Fellow | National Radio Astronomy Observatory, Charlottesville, US Austrian Citizen - ceibenst@nrao.edu - website: https://ceibensteiner.com ads link

The structure, chemistry and kinematics of the interstellar medium in galaxies; neutral atomic hydrogen - (dense) molecular gas - star formation; radio astronomy and interferometry; multi-wavelength observations.

Research Appointments

NRAO Jansky Fellowship Program, Jansky Fellow National Radio Astronomy Observatory (Charlottesville, Virginia, United States)	Nov. 2023 - Present
PhD Researcher Argelander Institute for Astronomy, University of Bonn; International Max Planck Research School (Bonn, Germany)	2019-2023
Researcher (Guest Contract) Max Planck for Radioastronomy MPIfR (Bonn, Germany)	2020-2021
Education	
Ph.D. in Astrophysics , University of Bonn/International Max Planck Research School Advisor: Prof. Frank Bigiel, Second Advisor: Prof. Karl Menten	2019-2023
Thesis: Gas matters: The Molecular and Atomic Gas Budget in Nearby Galaxies from Centers to Outskirts (DOI: https://doi.org/10.48565/Bonndoc-184)	Magna cum Laude
Master of Science, Astronomy, University of Vienna, Advisor: Prof. Manuel Güdel	2016-2019
Thesis: Disks and Outflows of DG Tau using ALMA	1.0 (full marks)
Bachelor of Arts, Journalism & Communication science, University of Vienna	2015-2019
Bachelor of Science, Astronomy, University of Vienna	2013-2016
Awards and Honors	
Prize talk, Conference: Dust and Gas throughout cosmic time; Hiroshima, Japan	2024
IAU GA 2024 travel grant (~\$500)	2024
Jansky Fellowship, National Radio Astronomy Observatory (~\$267K+\$15K)	2023
Astro Plot of the Week, Fig5 in Eibensteiner et al. 2023	2023 ~\$95K) 2019
Fellowship at International Max Planck Research School, Max Planck for Radioastronomy (Merit-based scholarship, University of Vienna (\sim \$1K)	~\$95K) 2019 2017
o ~\$378,500 total in fellowship and grant funding	
o Publication Statistics — (Full list attached at the end; Page 8-11)	
Peer-reviewed = 55 Total ($5 + 2$ pending as 1 st/ 2 nd author); +2 Conference Proce Citations = $1000 + (2$ papers have $100 + citations)$, h-index = 23	edings
o Observing Programs Statistics — (Full list attached at the end; Page 6-7)	
34 Total (<u>5 as PI</u> , <u>3 as co-PI) // Telescopes: VLA, ALMA, NOEMA, SMA, MeerKAT, JV</u>	VST, IRAM 30m
~1000 hours PI time; PI for a VLA Large Program & co-PI for a ALMA Large Prog	gram;
o Talks & Professional Experience Statistics — (Full list of talks attached at the end; Pag 20+ Total (10 Invited Talks, 1 Prize Talk, 10 Contributed Talks, Several Poster Pre 8 x Mentoring students (2 Master, 2 Bachelor & 4 Summer student) 1 x Lectures; 5 x Teaching Assistance (Master and Bachelor courses),	
Referee for A&A, MNRAS, ApJ Group Leader, PHANGS collaboration science working group on "Atomic gas and Rad	io Continuum"

Teaching

Summer Research Lecture on Nearby Galaxies	Lecturer: C. Eibensteiner , NRAO	For REU&NAC summer students	2024		
As Teaching Assistant: (Discussing and preparing Exercises, Exams and Grading them)					
- Physics of the Interstellar Medium	Lecturer: F. Bigiel, Univ. Bonn	Graduate level	2022		
- Introduction to Astronomy	Lecturer: F. Bigiel, Univ. Bonn	Undergraduate level	2022		
- Presentation skills for Physicists	co-lead with R. Mauersberger, Univ. Bonn	Undergraduate level	2021		
- Introduction to Astronomy	Lecturer: F. Bigiel, Univ. Bonn	Undergraduate level	2021		
- Physics of the Interstellar Medium	Lecturer: F. Bigiel, Univ. Bonn	Graduate level	2020		
Pedagogy Training					
How to teach and tutor successfully, offered by IMPRS (online)					

Supervising and Mentoring

Ellie Spande	REU summer student	NRAO	Summer 2025 / 10 weeks	
	Topic: Velocity dispersion (HI, CO) in nearby PH	HANGS-MeerKAT gala	axies	
Sebastian Laudage	Master thesis project (Graduate student)	University Bonn	2022-2023	
	Published paper : Neutral atomic and molecula	ır gas dynamics in Pl	HANGS-MeerKAT galaxies	
Josephine Benna	Bachelor thesis project	University Bonn	10/2022-01/2023	
	Topic: Toomre Q stability analysis of PHANGS ga	alaxies		
Roberto Emulo	Master thesis project (Graduate student)	University Bonn	2020-2021	
	<i>Topic</i> : HI gas and its kinematics in the star form	ning outskirts of M83	3	
<u>As Co-Advisor:</u>				
Anna Dignan	Graduate student	Univ. of Virginia	2024 - ongoing	
(w/ Eric Murphy)				
Nerea Real Nsi	REU summer student	NRAO	Summer 2025 / 10 weeks	
(w/ Loreto Barcos Munos& Devaky Kunneriath)	Topic: CO SLEDs of ULIRGs			
Breanna Yeboah	NAC summer student	NRAO	Summer 2024 / 8 weeks	
(w/ Loreto Barcos Munos	Topic: CO SLED of one ULIRG			
& Devaky Kunneriath)				
Anna Dignan	Post-Bacc	NRAO	11/2023 - 08/2024	
(w/ Eric Murphy & Brian Mason)	Published paper: Topic: Spectral Indies of 120 star forming complexes within the SFRS			

Media Coverage

Science spotlight: Atomic-to-Molecular Gas Transition in Galaxies	NRAO eNews	July 2025
The SWAN View Of Dense Gas In the Whirlpool — A Cloud-scale Comparison Of N2H+, HCO+, HNC And HCN Emission In M51	Astrobiology news	July 2025
NRAO Jansky Postdoctoral Fellows particiated in the 53rd Young European Radio Astronomers Conference (YERAC)	NRAO eNews	Sept. 2024
Unraveling the Mysteries of Star Creation in the Whirlpool Galaxy	SciTechDaily	Jan. 2024
2023 Jansky Fellows Awarded	NRAO Press	April 2023
2023 Jansky Fellowships awarded to IMPRS Alumnae Cosima Eibensteiner	International Max Planck Research School eNews	2023

Collaborations

Physics at High Angular Resolution in Nearby GalaxieS (PHANGS)

2019 - Present

Team lead: Eva Schinnerer; Team project scientist: Adam Leroy; Team manager: Erik Rosolowsky

Multi-wavelength high resolution view of nearby galaxies (ALMA, JWST, HST, VLT/MUSE, VLA, MeerKAT, AstroSat)

Science Working Group Leader in PHANGS: "HI and Radio Continuum" (bi-weekly meetings)

2022 - Present
2024 - Present

The Local Group L-Band Survey (LGLBS)

2024 - Present

PI: Adam Leroy, Laura Chomiuk, Julianne Dalcanton, Erik Rosolowsky, Snezana Stanimirovic, Fabian Walter VLA X-Large Program // deepest and highest spatial & velocity resolution of HI and L-band

continuum emission of six actively star-forming Local Group galaxies

Multiphase Astrophysics to Unveil the Virgo Environment (MAUVE)

2025 - Present

Team leads: Barbara Catinella, Luca Cortese, Toby Brown, Jiayi Sun, David Thinker
A multi-wavelength program designed to investigate how the cluster environment
shapes the gas-star formation cycle in galaxies falling into the Virgo Cluster

Great Observatories All-sky LIRG Survey (GOALS-east @UVa/NRAO)

2024 - Present

Team leads: Aaron Evans & Lee Armus

Leading the weekly group meetings at NRAO

Multi-wavelength high resolution view of LIRGS and ULIRGS (personal interest; ALMA's view of these targets)

Extragalactic Star Formation, Star Formation Radio Survey (SFRS, @NRAO)

2024 - Present

Team lead: Eric Murphy

Studying of star formation sites (&AME) via continuum observations using VLA+GBT

Starburst Heaters (@NRAO)

2024 - Present

Team leads: Jeff Mangum, Serena Viti

Investigating multiple molecules at high resolution in the CMZ of the starburst galaxy NGC253 based on ALMA projects that emerged from the ALCHEMI survey.

MeerKAT HI Observations of Nearby Galactic Objects - Observing Southern Emitters (MHONGOOSE)

2024 - Present

PI: W.J.G. de Blok

A Large Survey Project to obtain extremely sensitive observations of neutral hydrogen distributions in a sample of 30 nearby star-forming galaxies

Professional Experiences

Referee for astronomical journals and funding proposals

A&A (since 2023), MNRAS (since 2024), ApJ (since 2025)

Fondecyt Research Initiation Project Competition 2025

Conference Organization

Organizer for NRAO TUNA (WUNA, FUNA) Lunch Talk Series

OC — NRAO/GBO Postdoc Symposium 2024 (in Green Bank at GBO)

LOC and host, 7th IMPRS Conference

LOC, IAU Summer School: Basics of Astrobiology, University of Vienna, Austria

Volunteer, IAU GA 2018, Vienna, Austria

March 2024 - Present

March 2024 - Present

May 2021

August 2018

Astronomical Community

Last updated: November, 2025 Cosima Eibensteiner . Curriculum Vitae 3/11

SWG AtLAST	2025 - Present
SWG ngVLA	2024 - Present
Member of SFB 956 Gender Board	2021-2023
Observing	
SMT observations (10+ nights, ongoing)	April/May 2025
IRAM 30m observation for Project: 140-23 (6 nights)	March 2024
IRAM 30m observation for Project: 197-20 (3 nights)	Dec. 2020
Observing scripts for: VLA, NOEMA, SMA	
Data reduction and analysis	
CASA for VLA, ALMA and SMA data reduction, calibration and imaging; GILDAS	
Programming languages: Python	
Astronomy Packages/Tools: Matplotlib, AstroPy, SpectralCube, APLpy, linmix, ds9, CARTA	
Astronomy Training	
CosmicAI Bootcamp	May 2025
SMA Interferometry School (online)	Jan. 2022
Project: CO isotopologues ratios in the center of M82	jan. 2022
10 th IRAM 30m Winter School (<i>online</i>)	Nov. 2021
ISM Summer School (online)	June 2021
Project: Shocks in ISM with Sylvie Cabrit & Tram le Ngoc	june 2021

Outreach and Training (in *brown* are additional jobs I had during my undergraduate to fund my Astronomy studies)

7th NRAO-VLA Data Reduction Workshop, Socorro, New Mexico & Collaboration meetings with Jürgen Ott and David Meier

Outreach Talk for Charlottesville Astronomical Society (CAS); Gained 6K views in the first month on Youtube : https://www.youtube.com/watch?v=0K8xgpVfXJc	August 2025
	2022
PHANGS Youtube Account	2023-present
 Content Management and video editing 	
PHANGS Twitter Account (Content Management)	2022-2023
Organiser of Astronomy on Tap (AoT) Bonn	2022-2023
 Moderation of AoT events; actively seeking for speakers 	
Organiser and Social Media for Astroclub Bonn	2021-2023
German Member of SKA Communications and Outreach Network (SKACON)	2019-2023
 Represented and actively contributed together with Norbert Junkes the German side of outreach related questions 	
<i>Planetarium Operator</i> (weekend), at Museum of Natural History, Vienna	2018-2019
 Moderation of live star shows to an audience of ~60 people 	
Public Relation (~30 hrs/week), at Grayling Austria (Austria's leading international communications consultancy)	2018-2019
Press office, IAU GA 2018	Aug. 2018
Scientific Journalist, at ORF & science.orf.at — "Wissen aktuell"	Feb. 2017
Softskills Seminars	
#UnsichtbarWarGestern/Outreach training for Women in Science (online)	2021-2022
Efficiency Skills for Scientists, offered by IMPRS (online)	2021
How to teach and tutor successfully, offered by IMPRS (online)	2020
Mental strategies - Stress management for doctoral students, offered by IMPRS	2020

Oct. 2019

List of Talks

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26+ Total talks	10 Invited Talks, 10	Contributed
Scheduled; Invited Talk	CTC Seminar Series at UMD Astronomy Department	Dec. 2025
Contributed Talk	Stellar Origins 2025, Vienna, Austria	Sep. 2025
Invited Talk	Galactic Ecosystems under the Microscope: Lessons from highly- resolved studies, Garching, Germany	July 2025
Invited Talk	NRAO/GBO PostDoc Symposium, Charlottesville, USA	May. 2025
Contributed Talk	PHANGS collab. meeting: Nice, France	Feb. 2025
Poster Presentation	AAS National Harbor, Maryland, USA (my first AAS meeting)	Jan. 2025
Prize Talk	Dust and Gas throughout Cosmic Time, Hiroshima, Japan	Dec. 2024
Contributed Talk	UVa/NRAO PostDoc Symposium	Oct. 2024
Contributed Talk	GOALS team meeting, Pasadena, USA	Sep. 2024
Contributed Talk	YERAC 2024, Madrid, Spain	Sep. 2024
Contributed Talk	IAU GA 2024, FM2, Cape Town, South Africa	Aug. 2024
Invited Talk	NRAO/GBO PostDoc Symposium, Green Bank, USA	Mar. 2024
Invited Talk	PHANGS collab. meeting: Garching, Germany	Feb. 2024
Contributed Talk	MeerKAT@5, Stellenbosch, South Africa	Feb. 2024
Invited Talk	NRAO/UVa Colloquia, Charlottesville, Virginia, USA	Feb. 2024
PhD Colloquium	Promotionskolloquium, MPIfR/AIfA, Bonn, Germany	Oct. 2023
Invited Talk	PHANGS collab. meeting: Pasadena, USA	Feb. 2023
Invited Talk	NRAO Astronomy (TUNA) Lunch Talks (online)	Nov. 2022
Invited Talk	SMA Science Seminar at CfA (online)	Nov. 2022
Contributed Talk	Chile-Cologne-Bonn Symposium 2022, Puerto Varas, Chile	Sept. 2022
Invited Talk	Puzzles of the galactic centre, Heidelberg, Germany Central Molecular Zones from a different angle	Sept. 2022
Poster Presentation	From Stars to Galaxies II, Gothenburg, Sweden	June 2022
Poster Presentation	Multi-line Diagnostics of the Interstellar Medium, Nice, France	April 2022
Poster Presentation	ISM Beirut 2021 (online)	May 2021
Contributed Talk	IMPRS 6th Conference (online)	Nov.2020
Contributed Talk	PHANGS collab. meeting: Royal Observatory of Madrid, Spain	Jan. 2020
Outreach Talk	Charlottesville Astronomical Society (CAS)	Aug. 2025

List of Observing Programs 34 Total (<u>5 as PI</u>, <u>3 as co-PI</u>)

PI //	/ Telescope	Year	Title	Time
PI: Eibensteiner	VLA 26A B-ranked	2025	Large Program: High Quality HI Coverage of the Northern PHANGS JWST+HST+ALMA Targets	541 hours
co-PI: Eibensteiner (PI: Linden)	ALMA C12 A-ranked	2025	Large Program: Meet in the Middle: An ALMA Treasury of Mid-Stage Mergers	111.0 hours 12m
co-PI: Eibensteiner, Scibelli	SMT	2025	Dense gas mapping in the nearby face-on starburst galaxy NGC6946	~240 hours
PI: Eibensteiner	ALMA C11 B-ranked	2024	CO 2-1 observations of nearby intermediate massive galaxies of MeerKAT's MHONGOOSE survey	27.6 h 12m
PI: Eibensteiner	ALMA C11 A-ranked	2024	The AGN-ISM interplay in the molecular disk of the iconic Seyfert II galaxy — Circinus	3.2 h 12m
PI: Eibensteiner	SMA B-ranked	2023	Untangling the molecular gas physics in the center of the starburst galaxy NGC 6946	20 hours
co-PI: Eibensteiner,	IRAM 30m	2023	DDT: CO isotopologues ratios in the center of M82	2.5 hours
Beslic, den Brok	SMA 2022	2022	SMA school: CO isotopologues ratios in the center of M82	10 hours
PI: Eibensteiner	NOEMA 2021 B-ranked	2021	Deriving Gas Masses with CO isotopologues in the Central 400pc of the Fireworks Galaxy, NGC6946	10 hours
PI: Eibensteiner	VLA 22 A B-ranked	2021/2	Fireworks of Ammonia: Temperature Constraints in NGC6946	25 hours
as Co-I (PI: A. Leroy)	ALMA C12 A-ranked	2025	Large Program: The 10 pc Survey of Molecular Clouds and Stellar Feedback	107.1 hours 12m + 216.2 h 7m + 359.9 h TP
as Co-I (PI: A. Leroy)	JWST Cycle 2	2023	Treasury Program: A JWST Census of the Local Galaxy Population: Anchoring the Physics of the Matter Cycle	148.8 hours
as Co-I (PI: Linden)	HST Cycle 33	2025	The Hidden Engines That Could: Tracing Clump Formation and Evolution in the Hearts of Infrared-Luminous AGN Hosts	16 orbits
as Co-I (PI: E. Koch)	ALMA C11 A-ranked	2024	Linking Molecular Cloud Structure to Massive Star Formation: 5000 molecular clouds, filaments, and bubbles across M33	38.6 h 12m
As Co-I (PI: M.J.Jimenez- Donaire)	ALMA C11 A-ranked	2024	Resolving N2H+(1-0) emission for the first time across the galaxy disk of M100 $$	69.9 h 7m
as Co-I (PI: E. Mills)	ALMA C11 B-ranked	2024	The Definitive View of M83's Center: Completing A Deep Parsec-Scale Survey of the Nearest Nuclei	34.6 h 12m
as Co-I (PI: R. Chown)	ALMA C11 B-ranked	2024	A Complete View of Low Metallicity Star Forming Complexes in the Local Group Dwarf NGC 6822	27.8 h 12m
as Co-I (PI: J. Sun)	ALMA C11 B-ranked	2024	Beholding Massive Star Cluster Formation and Evolution with the "Evil Eye"	9.8 h 12m
as Co-I (PI: L. Barcos- Munoz)	ALMA C11 B-ranked	2024	Studying CO SLEDs of local LIRGs at 100 pc resolution	30.1 h + 46.0 h
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as Co-I (PI: J. den Brok)	ALMA C11 C-ranked	2024	CO Excitation Across the Local Galaxy Population	
as Co-I (PI: L. Neumann)	ALMA C11 C-ranked	2024	A Deep, Full-Galaxy Dense Gas Map of M99	
as Co-I (PI: E. Koch)	VLA 24B B-ranked	2024	Resolved atomic ISM, HII regions and supernova remnants beyond the Local Group	176 hr
as Co-I (PI: J. Sun)	VLA 24B B-ranked	2024	A Census of Young Massive Clusters and Supernova Remnants in a Nuclear Starburst	8.24 hr
as Co-I (PI: E. Schinnerer)	JWST Cycle 3	2024	Unveiling the physics that govern massive star-formation in extragalactic Central Molecular Zones (eCMZs)	60.2 hours
as Co-I (PI: I. Beslic)	ALMA C10 C-ranked	2023	NGC 4945: The Milky Way's not-so-distant Cousin - ACA Standalone Mapping of the Full Disk in Band 3 Dense Gas Tracers	
as Co-I (PI: J. den Brok)	ALMA C10 C-ranked	2023	Cloud-Scale CO excitation drivers in nearby galaxies targeted with JWST	
as Co-I (PI: J. Sun)	JWST Cycle 2	2023	Beholding star cluster formation, feedback, and evolution with the 'Evil Eye'	3.15 hours
as Co-I (PI: A. Leroy)	JWST Cycle 2	2023	Resolving HII Regions and ISM Structure Across the Milky Way Analog NGC 253	22.06 hours
as Co-I (PI: den Brok)	SMA	2022	A wide-band high-resolution molecular survey in the starburst M82	85 hours
as Co-I (PI: D.J. Pisano)	MeerKAT	2022	A Complete Picture of Atomic Gas, Molecular Gas, and Star Formation in Ten of the Best-Studied MeerKAT-Visible Galaxies	60 hours
as Co-I (PI: A. Leroy)	ALMA Cycle 9	2022	ACA CO 1-0 Maps to Match MeerKAT 21-cm Maps	84.3h 7m
as Co-I (PI: I. Beslic)	ALMA Cycle 9	2022	Untangling the dynamics and structure of complex star- forming systems: bar-ends of the star-forming disc galaxy NGC 3627	17h 12m
as Co-I (PI: D. Thilker)	AstroSat	2022	UVIT FUV imaging of M83, the prototypical XUV disk	58.8ks
as Co-I (PI: A. Barnes)	ALMA Cycle 8	2021	Extragalactic Cloud Scale Observations of High Critical Density Tracers - Bridging the Gap to the Milky Way	24.3h + 109.4h ACA
as Co-I (PI: J. den Brok)	IRAM 30m 2020	2020	A detailed census of the key drivers of CO excitation: Metallicity, Radiation Field and the CO(2-1)/CO(1-0) Ratio Across M101	80 hours
as Co-I (PI: E. Schinnerer, F. Bigiel)	NOEMA 2019	2019	The First Cloud-by-Cloud Dense Gas Map of an External Galaxy	200 hours
PI: F. Bigiel	VLA		Kinematic analysis of the super-extended HI disk of the nearby spiral galaxy M83	40 hours
PI: E. Schinner	PdBI		A 2-3 mm high-resolution molecular line survey towards the centre of the nearby spiral galaxy NGC 6946	132 hours

List of Publications¹

ADS: https://ui.adsabs.harvard.edu/public-libraries/CNSbh5exT62tiFVS8jJo2A

A full listing of my publications can be found on ADS

[1000+ citations (2 papers have 100+ citations), h-index = 23 (as of Nov 15, 2025); mentees marked in **blue** colors]

First- or second-author publications (5 published + 2 pending, 96 citations):

- 7 **Eibensteiner**, Leroy, Sun, et al. "Adding multi-wavelength data to the Local Group L-Band Survey II: Star formation scaling relations of Local Group galaxies"
- 6 **Eibensteiner**, Leroy, Sun, et al. "Adding multi-wavelength data to the Local Group L-Band Survey I: Atlas and radial profiles of Local Group galaxies"
- 5. **Eibensteiner**, Sun, Bigiel, Leroy, Schinnerer, [+34 authors], 2024 "PHANGS-MeerKAT and MHONGOOSE HI observations of nearby spiral galaxies: physical drivers of the molecular gas fraction, Rmol", A&A 691, id.A163— 24pp; 18 citations
- 4. **Laudage, Eibensteiner**, Bigiel, Leroy, [+19 authors], 2024 "Neutral atomic and molecular gas dynamics in the nearby spiral galaxies NGC 1512, NGC 4535, NGC 7496", A&A 690, id.A169—15pp; 6 citations
- 3. **Eibensteiner**, Bigiel, Leroy, Koch, Rosolowsky, [+32 authors], 2023 "Kinematic analysis of the super-extended HI disk of the nearby spiral galaxy M 83", A&A, 675, A37 24pp; 15 citations
- 2. Eibensteiner, Barnes, Bigiel, Schinnerer, [+29 authors], 2022 "A 2-3 mm high-resolution molecular line survey towards the centre of the nearby spiral galaxy NGC 6946", A&A, 659, 37 37pp; 28 citations
- Qüdel, Eibensteiner, Dionatos, [+7 authors], 2018, "ALMA detects a radial disk wind in DG Tauri" A&A Letters 620, L1 7pp; 31 citations

Co-authored publications (50 refereed papers, [+2 unrefereed papers], 1000+ citations):

- Pathak et al. (incl. Eibensteiner), 2025 "Masses, Star-Formation Efficiencies, and Dynamical Evolution of 18,000 HII Regions", accepted for publication in ApJL
- 49. Dage et al. (incl. **Eibensteiner**), 2025, "Classifying Compact Radio Emission in Nearby Galaxies: a 10GHz Study of Active Galactic Nuclei, Supernovae, Anomalous Microwave Emission and Star Forming Regions", accepted for publication AJ
- 48. Stuber et al. (incl. **Eibensteiner**), 2025, "The SWAN view of dense gas in the Whirlpool -- A cloud-scale comparison of N2H+, HCO+, HNC and HCN emission in M51", accepted for publication in A&A.
- 47. Koch et al. (incl. **Eibensteiner**), 2025 "The Karl G. Jansky Very Large Array Local Group L-band Survey (LGLBS)" ApJ Supplement Series, 279, 2
- 46. **Dignan**, Murphy, Manson, **Eibensteiner** et al. "The Star Formation in Radio Survey: Adding 90 GHz Data to 3-33 GHz Observations of Star-forming Regions in Nearby Galaxies", ApJ, 988, 2, id.216

LAST UPDATED: NOVEMBER, 2025

^{1 25} ADS citations or more are marked with \bigcirc , 50 citation or more with \triangle , 100 citations or more with 200 citations or more wi

- 45. Chown et al. (incl. **Eibensteiner**), 2025, "Relationships between PAHs, Small Dust Grains, H2, and HI in Local Group Dwarf Galaxies NGC6822 and WLM Using JWST, ALMA and the VLA", ApJ, 987, 1, id.91
- 44. Huang et al. (incl. **Eibensteiner**), 2025 "Investigating the chemical link between H2CO and CH3OH within the CMZ of NGC 253" A&A, 699, id.A70
- 43. Johnstone et al. (inc. **Eibensteiner**), "Searching for Compact Obscured Nuclei in Compton Thick AGN", ApJ, 985, 2, id.259
- 42. Bouvier, Viti, Magnum, **Eibensteiner** et al., "Complex Organic Molecules towards the central molecular zone of NGC 253", A&A, 698, id.A261
- 41. Leroy et al. (incl. **Eibensteiner**), 2025, "Cloud-scale gas properties, depletion times, and star formation efficiency per free-fall time in PHANGS—ALMA", ApJ, 985, 1, id.14
- 40. Chown et al. (incl. **Eibensteiner**), 2025, "Polycyclic Aromatic Hydrocarbon and CO(2–1) Emission at 50–150 pc Scales in 70 Nearby Galaxies", ApJ, 983, 1, id.64
- 39. Stuber et al. (incl. **Eibensteiner**), 2025, "Surveying the Whirlpool at Arcseconds with NOEMA (SWAN) II: Survey design and observations", A&A, 696, id.A182
- 38. Zhang et al. (incl. **Eibensteiner**) 2025 "Application of resolved low-J multi-CO line modeling with RADEX to constrain the molecular gas properties in the starburst M82", ApJ, 982, 1, id.21
- 37. Savaria et al. (incl. **Eibensteiner**), 2025, "The Arp 240 Galaxy Merger: A Detailed Look at the Molecular Kennicutt-Schmidt Star Formation Law on Sub-kpc Scales " ApJ, 979, 2, id.217
- 36. den Brok et al. (incl. **Eibensteiner**), 2025, "CO isotopologue-derived molecular gas conditions and CO-to-H2 conversion factors in M51", ApJ, 69, 1, id.18
- 35. Neumann et al. (incl. **Eibensteiner**), 2025, "Dense gas scaling relations at kiloparsec scales across nearby galaxies with the ALMA ALMOND and IRAM 30m EMPIRE surveys, A&A, 693, id.L13

2024

- 34. Behrens et al. (incl. **Eibensteiner**), 2024, "Neural Network Constraints on the Cosmic-Ray Ionization Rate and Other Physical Conditions in NGC 253 with ALCHEMI Measurements of HCN and HNC", Accepted for publication in The Astrophysical Journal
- 33. Neumann et al. (incl. **Eibensteiner**), 2024, "A 260 pc resolution ALMA map of HCN(1-0) in the galaxy NGC 4321", *accepted for publication* in A&A
- 32. Chown et al. (incl. **Eibensteiner**), 2024, "Polycyclic Aromatic Hydrocarbon and CO(2-1) Emission at 50-150 pc Scales in 70 Nearby Galaxies", Submitted to ApJ
- 31. Pingel et al. (incl. **Eibensteiner**), 2024, "The Local Group L-Band Survey: The First Measurements of Localized Cold Neutral Medium Properties in the Low-Metallicity Dwarf Galaxy NGC 6822", ApJ
- 30. Bešlić et al. (incl. **Eibensteiner**), 2024, "The properties and kinematics of HCN emission across the closest starburst galaxy NGC 253 observed with ALMA", *accepted for publication* in A&A
- 29. Williams et al. (incl. Eibensteiner), 2024, "PHANGS-JWST: Data Processing Pipeline and First Full Public Data Release", accepted for publication in ApJS
 - 28. Teng et al. (Incl. **Eibensteiner**), 2024, "Star Formation Efficiency in Nearby Galaxies Revealed with a New CO-to-H2 Conversion Factor Prescription", ApJ, 961, 1, Id.42

2023

- 27. Stuber et al. (incl. **Eibensteiner**), 2023, "Surveying the Whirlpool at Arcseconds with NOEMA (SWAN). I. Mapping the HCN and N2H+ 3mm lines", 2023, A&A, 680, A4
- 25. Querejeta et al. (incl. **Eibensteiner**), 2023, "A sensitive, high-resolution, wide-field IRAM NOEMA CO(1-0) survey of the very nearby spiral galaxy IC 342", 2023, A&A, 680, A4
- 24. **Zakardijian et al. (incl. Eibensteiner)**, 2023, "The impact of HII regions on Giant Molecular Cloud properties in nearby galaxies sampled by PHANGS ALMA and MUSE", A&A, 678, id.A171
- 23. Belfiore et al. (incl. **Eibensteiner**), 2023, "Calibrationg mid-infrared emission as a tracer of obscured star formation on HII-region scales in the era of JWST", submitted to A&A
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