Katarzyna Magdalena Dutkowska

Curriculum Vitae

Personal Details

Email:	dutkowska@nbi.ku.dk
ORCID ID:	0000-0003-0980-6871
Nationality:	Polish

Education and Employment

12/2022 — Ph.D. fellow, Niels Bohr Institute & Centre for Star and Planet Formation, University of Copenhagen, Copenhagen, Denmark

Thesis: *Tracing star formation at high redshift using the Milky Way as a template*, supervisor: Lars Egstrøm Kristensen; Ph.D. expected at the beginning of 2023

08/2019 — M.Sc. (in Astronomy), Nicolaus Copernicus University, Toruń, Poland

Thesis: *Cluster-in-a-box: understanding how low-mass stars form in high-mass clusters using 338.4 GHz methanol emission as an outflow tracer*, advisor: Agata Karska, co-advisor: Lars Egstrøm Kristensen; defended on August 12th, 2019

07/2017 — B.Sc. (in Astronomy, Physics and Computer Usage), Nicolaus Copernicus University, Toruń, Poland

Thesis: *Searching for correlations between parameters of planetary nebulae and their central stars*, advisor: Krzysztof Gęsicki; defended on July 27th, 2017

Awards and Honors

2019 — Scholarship of the Minister of Science and Higher Education for outstanding achievements, Ministry of Science and Higher Education of the Republic of Poland

Science projects and proposals

03/2021 — Proposal: Unravelling low-mass protostars in a dense high-mass cluster
Scientific observations with Submillimeter Array in block 2021A; role: PI; cancelled due to COVID-19

01/2018–09/2018 — Project: The impact of physical and chemical conditions on the star formation process: identification and characterization of young stellar objects in the Outer Galaxy
Advisor: Dr. Marta Sewiło

06/2017–09/2018 — Project: Impact of the UV radiation on early star formation stages
Advisor: Dr. Agata Karska

Teaching experience

2022 — co-advisor of a B.Sc. project *Mass Distributions of Stars and Clusters in Galaxies*, University of Copenhagen

2021/2022 — TA during the B.Sc. course *Introduction to Computing for Physicists*, University of Copenhagen [hybrid]

2020/2021 — TA during the B.Sc. course *Experimental Physics*, University of Copenhagen [F2F]

2019/2020 — TA during the M.Sc. course *The Interstellar Medium and Formation of Stars*, University of Copenhagen [online]

Talks

05/2022	Annual Danish Astronomy Meeting, Fredericia, Denmark; Talk: *Star formation through Cosmic history: from the perspective of a Milky Way inhabitant*
05/2022	StarPlan Science Day, Copenhagen, Denmark; Talk: *Star formation: a Galactic view*
06/2021	StarPlan Science Day, Copenhagen, Denmark; Talk: *What is in the box?*
10/2018	Astronomy Students' Associations Conference *KSAKN*, Wrocław, Poland; Talk: *Basics of astrochemistry*
09/2018	National Astronomy Students' Seminar *OSSA*, Kraków, Poland; Talk: *Infrared and maser emission associated with low mass protostars*
09/2018	48th Young European Radio Astronomers Conference *YERAC*, Dwingeloo, Netherlands; Talk: *Infrared and 22 GHz water emission associated with a Sun-like protostar*
04/2018	Astronomy Students' Associations Conference *KSAKN*, Kraków, Poland; Talk: *Hawaiian observations*

Workshops and internships

06/2022	*The Interstellar Shocks School*, Les Houches, France
06/2021	*Virtual OPTICON Archival School using ESO and ALMA data*, online school
03/2021	*The Ultimate MySQL Bootcamp: Go from SQL Beginner to Expert*, online bootcamp
03/2021	*2021 SMA Interferometry School*, online school
12/2020	*Scientific Writing in Astro*, online workshop
03/2018	Student exchange visit, Munich - Garching, Germany
07/2017	Summer student internship in Astronomical Observatory of the University of Wrocław, Białków, Poland
06/2017	*Python in science*, workshop, Toruń, Poland

Public outreach and promotion

2014-2018	Volunteer during popular science public events
2018	Popular science articles for the Polish daily newspaper *Gazeta Wyborcza*
08/2018	Volunteer during the XXXth General Assembly of the International Astronomical Union, Vienna, Austria
10/2022	Volunteer during the Niels Bohr Legacy Symposium in Astrochemistry, Copenhagen, Denmark

Practical skills

Mother tongue:	Polish
Other languages:	English (fluent in reading, speaking, writing) French (can read with dictionary)

Astronomical data processing environments (CASA, HIPE, CLASS, basic IRAF and AIPS)

Programming languages: Python, SQL, CSS, basic C and C++