

## CURRICULUM VITAE - ERIK ZACKRISSON

**RESEARCH PROFILE**      Extragalactic astronomy (50% theoretical, 50% observational)  
**Main topics:** The first stars and galaxies, gravitational lensing, dark matter

- HIGHLIGHTS**
- Author of 21 first-author papers (including one review paper)
  - Supervisor/co-supervisor of 8 PhD students, 6 MSc students and 5 BSc students
  - Lead author of the *Yggdrasil* spectral synthesis code for the modelling and analysis of high-redshift galaxies
  - Observing time on the ESO Very Large Telescope as principal investigator and on ALMA, the Hubble Space Telescope, the Spitzer Space Telescope, FUSE and Gemini as co-investigator
  - Research grants of 6.9 million SEK (724,000 EUR, 994,000 USD) as main applicant and 14.3 million SEK (1.5 million EUR, 2,1 million USD) as co-applicant
  - Solely responsible (design, teaching, examination) for the course, that out of all the on-site astronomy courses at Stockholm University, attracted the most students in 2012, 2013 and 2014

**ACADEMIC DEGREES**      **ASSOCIATE PROFESSOR (DOCENT) IN ASTRONOMY**  
 2009, Stockholm University, Sweden

**PHD IN ASTRONOMY**  
 2005, Uppsala University, Sweden

**RESEARCH GROUP**      Juan González (Postdoc, 2013—2014)  
 Claes-Erik Rydberg (PhD student, 2010—2014)  
 Saghar Asadi (PhD student, 2012—)

- ACADEMIC POSITIONS
- Associate Senior Lecturer, Uppsala University, January 2015—
  - Senior Research Fellow, Stockholm University, Sweden, Feb 2013—Dec 2014
  - Assistant Professor, Stockholm University, Sweden, Sep 2008—Feb 2013
  - Postdoc, Tuorla Observatory, Finland, 25 months, 2006—2008
  - Guest Researcher, Dark Cosmology Centre, Denmark, May 2006
  - Guest Researcher, Stockholm University, Sweden, Nov—Dec 2005
  - PhD position, Uppsala University, Sweden, 2000—2005
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LEAVE OF ABSENCE

12 months of parental leave in 2006—2013

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- PUBLICATIONS
- Refereed journal articles: 49 papers (21 as first author, 9 as second author)
  - Invited reviews: 1 paper (as first author)
  - Refereed conference proceedings: 5 papers (2 as first author)
  - Non-refereed conference proceedings: 32 papers (16 as first author)
  - Popular articles: 3 (as first author)
  - h-index: 17; Citations: 800+
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SUPERVISION

**PhD students:** Primary supervisor of 2 PhD students at Stockholm Observatory. Co-supervisor of 2 PhD students with ongoing PhD projects and co-supervisor of 4 PhD students with completed projects. Mentor of another 4 PhD students with ongoing projects.

**MSc students:** Supervision of 6 completed MSc projects. 5 of these students ( $\approx 83\%$ ) were subsequently accepted into Swedish PhD programmes in astronomy, where typically  $\approx 30$  applicants compete for every position.

**BSc students:** Supervision of 5 completed BSc projects.

**Summer students:** Supervision of 2 summer students (2012, 2014)

## TEACHING

### **Courses for PhD students:**

*Modern Cosmology* (2005, Uppsala University)

*Gravitational lensing* (2011, Stockholm University)

### **Advanced-level courses:**

*Cosmology* (2008, 2009, 2010, 2011, Stockholm University)

*Galaxies* (2004, Uppsala University; 2012, Stockholm University)

Student evaluations (from 2008 onwards): 4.5—5.0 (out of 5)

### **Basic-level courses:**

*Fundamental Astronomy* (2004, Uppsala University; 2009, Stockholm University)

*Searching for extraterrestrial intelligence – Is there anybody out there?* (2012, 2013, 2014; Stockholm University). In these years, this course attracted more students than any other on-site astronomy course at Stockholm University.

Student evaluations (from 2009 onwards): 4.7—4.8 (out of 5)

### **As invited lecturer:**

*Extragalactic Astronomy* (2012, MSc course, Lund University, Sweden, 2 lectures)

*Observational cosmology and the formation and evolution of galaxies* (2012, summer school for MSc/PhD students, Onsala Observatory, Sweden, 2 lectures)

## MAJOR RESEARCH GRANTS<sup>1</sup>

- Wennergren & Swedish Research Council grants for organizing the international workshop *Lyman Continuum Leakage and Cosmic Reionization* (August 13-15, 2014) at the AlbaNova University Center, 154 000 SEK
- Wennergren stipend 2012—2013 for funding of a postdoc to work on the project *Gravitational lensing as a probe of the first stars and galaxies*: 600 000 SEK
- Research grant for Young Researchers from the Swedish Research Council, 2012—2015, for the project *The first stars and galaxies*, 3.66 million SEK
- Several Research grants (co-applicant; main applicant Göran Olofsson for 2010 and Göran Östlin for 2011—2014) from the Swedish National Space Board, 2010-2014: 13.5 million SEK in total
- 3-year research grant (co-applicant; main applicant Göran Östlin) from the Swedish Research Council, 2009—2011, for the project *Galaxy evolution in the distant and local Universe*, 750 000 SEK
- 3-year postdoctoral research grant from the Academy of Finland, 2007—2009, for the project *Dark Matter and Gravitational Lensing* (main applicant Zackrisson) at Tuorla Observatory, Finland, in total 1.7 million SEK. I terminated this position on September 1, 2008 to take up a position at Stockholm Observatory
- 7-month postdoctoral stipend from the Swedish Research Council, 2006, for the project *The Host Galaxies of Gamma-Ray Bursts* at the Dark Cosmology Centre, Copenhagen, 212 200 SEK (declined because of conflict with other successful applications)
- 1-year postdoctoral stipend from the Swedish Research Council, 2006, for the project *Dark Matter in the Form of MACHOs* at Tuorla Observatory, Finland, 289 300 SEK
- Research stipend from the Ingegerd Bergh foundation, 2006—2008, for the project *The Red Halos of Galaxies*, 220 800 SEK (declined because of conflict with other successful applications)
- 5-month postdoctoral stipend from the Royal Swedish Academy of Sciences, 2005, for the project *Dark Matter in the Form of MACHOs*, 100 000 SEK

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<sup>1</sup> Only grants of more than 100,000 SEK included

SUCCESSFUL  
OBSERVING  
PROPOSALS

**As principal investigator:** ESO VLT (27 hours), European VLBI Network (12 hours), ESO NTT (2.3 nights), ESO 2.2m (1.5 nights), AKARI (2 pointings) and the 2.5m Nordic Optical Telescope (18 nights)

**As co-investigator:** HST (31 orbits), Spitzer (8 hours), FUSE (428 hours), Gemini South (3 hours), ALMA (4 hours), ESO VLT (142 hours), Global VLBI (12 hours), VLA (6 hours), ESO NTT (14 nights), ESO 3.6m (5 nights), APEX (6 hours) and 2.5m Nordic Optical Telescope (64 nights)

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COMMITTEES

- Onsala/APEX/LOFAR Time Allocation Committee 2013—
- ESO Observing Program Committee panel 2007—2008
- PhD student selection committee, Department of Astronomy, Stockholm University (2009, 2012)
- Postdoc selection committee, Oskar Klein Centre, Stockholm University (2008, 2011)
- Examining committee at the PhD defence of Francesco Taddia, 2014
- SOC (co-chair) and LOC, Lyman continuum leakage and cosmic reionization workshop, Oskar Klein Centre, Stockholm University, Aug 13-15, 2014
- SOC Astronomdagarna 2015, Uppsala
- LOC, Blue Compact Galaxy workshop, Uppsala University, Oct 26—28, 2005
- Stockholm Observatory Board 2013—2014