

*Curriculum Vitae*

**Andreas J. Albrecht**

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***Honors***

Professional Societies

**Fellow of the American Academy of Arts and Sciences**  
**Fellow of the American Association for the Advancement of Science**  
**Fellow of the American Physical Society**  
**Fellow of the Institute of Physics (UK)**

Other honors

**Herbert A Young Society Dean's Fellow 2013-16**  
**Cornell University Class of 1979 Distinguished Alum**  
**Musk Lecture, University of Pennsylvania, September 2022**

***Appointments***

1. **UC Davis**, Davis CA; Inaugural Director of the Center for Quantum Mathematics and Physics (QMAP) 2017- Present
2. **UC Davis**, Davis, CA; Distinguished Professor 7/14 – Present
3. **UC Davis**, Davis, CA; Physics Department Chair 9/11 – 6/16
4. **UC Davis**, Davis, CA; Professor 7/98 – 6/14
5. **Imperial College**, London England; Professor 7/98-12/98, Reader 10/95 - 8/98, Lecturer 8/92 - 9/95.
6. **Fermilab**, Batavia, IL; Associate Scientist 2/87 - 8/92
7. **Los Alamos National Lab**, Los Alamos, NM; Post Doctoral Research Fellow 9/85 - 2/87. (Advisor: Wojciech Zurek)
8. **University of Texas**, Austin, TX; Post Doctoral Research Fellow 9/83 - 9/85 (Advisor: Steve Weinberg)

## *Higher Education*

1. **University of Pennsylvania**, Philadelphia, PA; Ph.D. May 1983 (Thesis title: "A New Inflationary Cosmology". Thesis advisor: Paul Steinhardt )
2. **Cornell University**, Ithaca, NY; BA May 1979 (Cum Laude in Physics, undergraduate research advisor: Bob Richardson)

## Selected publications

1. A. Albrecht and P. Steinhardt, *Cosmology for Grand Unified Theories with Radiatively Induced Symmetry Breaking* [Phys. Rev. Lett. 48, 1220 \(1982\)](#).
2. A. Albrecht and N. Turok, *Evolution of Cosmic Strings* [Phys. Rev. Lett. 54, 1868 \(1985\)](#)
3. A. Albrecht, P. Ferreira, M. Joyce, and T. Prokopec, *Inflation and squeezed quantum states* [Phys. Rev. D 50 4807 \(1994\)](#). [[astro-ph/9303001](#)]
4. A. Albrecht, D. Coulson, P. Ferreira, and J. Magueijo, *Causality, randomness, and the microwave background* [Phys. Rev. Lett. 76 1413 \(1996\)](#). [[astro-ph/9505030](#)]
5. A. Albrecht, *Cosmic Inflation and the Arrow of Time*, in "Science and Ultimate Reality: Quantum Theory, Cosmology and Complexity", honoring John Wheeler's 90th birthday. J. D. Barrow, P.C.W. Davies, & C.L. Harper eds. Cambridge University Press (2004) [[astro-ph/0210527](#)]
6. A. Albrecht and L. Sorbo *Can the universe afford inflation?* [[hep-th/0405270](#)] [Phys. Rev. D70 \(2004\) 063528](#)
7. A. Albrecht *et al.* *Report of the Dark Energy Task Force* [[arXiv:astro-ph/0609591](#)] (2006)
8. A. Albrecht and D. Phillips *Origin of probabilities and their application to the multiverse.* [[arXiv:1212.0953](#)] [Phys.Rev. D90 \(2014\) 12, 123514](#)
9. A. Albrecht, N. Bolis and R. Holman *Cosmological Consequences of Initial State Entanglement* [[arXiv:1408.6859](#)] [JHEP 1411 \(2014\) 093](#)
10. Z. Holmes, A. Arrasmith, B. Yan, P. Coles, A. Albrecht, A. Sornborger *Barren plateaus preclude learning scramblers* [[arXiv \[2009.14808\]](#)] [Phys. Rev. Lett. 126, 190501 \(2021\)](#)
11. A. Albrecht, R. Baunach and A. Arrasmith [[2105.14017](#)] [Einselection, Equilibrium and Cosmology \(arxiv.org\)](#) [Phys. Rev. D 106, 123507 \(2022\)](#)
12. A. Adil, A. Albrecht and L. Knox [[2207.10235](#)] [Quintessential Cosmological Tensions \(arxiv.org\)](#) (Accepted, Phys. Rev. D, 2022)