Austin Jennings

Bachelor of Science in Astronomy

Austin Jennings

95-1110 Anuanu St. Mililani HI, 96789

808.226.0110 aj2015@hawaii.edu

Skills

Interpersonal communication skills

Experience in Python

Ability to use Mac and PC software

Ability to type over 55 wpm

A well organized and independent worker

Works well in a team environment

Excellent in documenting work processes

Efficient in time management

Ability to learn quickly

Excellent at deduction and data analysis

Ability to make quick and accurate judgements

Adept at problem solving

Excellent math skills

Working knowledge of computer hardware

Experienced with Microsoft Office

Excellent public speaking skills

Ability to think creatively

Job Experience

UH Hilo / Peer Mentor

August 2018 - May 2019 200 W Kawili St. Hilo, HI, 96720

Helped to create a supportive community of peers and developed personal, academic, and leadership skills of first generation college students at the University of Hawaii at Hilo. Initiated and maintained weekly contact with mentees/students, face to face meetings, and notified the mentees concerning upcoming school social events. Developed weekly reports for each of my students/mentees and monitored their progress throughout the school year.

HI-SEAS / Research Assistant

August 2017 - May 2019 Maunaloa Hilo, HI, 96720

Assisted with logistic procedures such as the resupply of the Mars exploration

mission simulation and monitored mission control. Reviewed scientific articles and other resources to collect information regarding the task at hand. Carried out experiments according to the protocols of the principal investigators. Ensured the safety of the experiment at hand to make certain that everyone was following proper protocols. Recorded the data from all experiments. Ensured the accuracy of the data acquired by proofreading, editing, and fact checking. Maintained and serviced the equipment that was used in the experiments.

Institute for Astronomy / UH Observatory Technician Assistant

September 2017 - May 2018 640 N Aohoku PI #209 Hilo, HI, 96720

Assisted in projects using machine tools (such as a Milling machine, lathe, and drill press) and used TIG welding in order to repair or add parts such as mirror covers to the UH 88" telescope on Maunakea. Designed smaller projects with required materials necessary for other departments. Ensured that all equipment was properly cleaned and well maintained for future use. Inspected parts to determine the changes in dimensions by using instruments such as rulers and digital calipers.

Research Experience

Calculating Star Forming Rates in HII Regions in M33

January 2019 - May 2019, Big Island, HI

Experienced in using Python to analyze astronomical data. Calculated the star forming rates of HII regions in the southeastern part of M33, employing different line ratios in a given region to calculate the metallicity and ionization parameters. Afterwards, we used these values and applied them to the appropriate Python algorithms and calculated the star forming rate in the region.

SPIRou and ESPaDOnS Science Feasibility Project - Akamai Internship

June 2018 - August 2018, Waimea, HI

Analyzed the two spectrographs at the Canada-France-Hawaii Telescope to determine whether they are feasible to use simultaneously. This was accomplished by determining the range of stellar magnitudes that could be observed by both instruments for a given SNR (using the instruments exposure time calculator).

Data Reduction on Gravitational Lens

September 2017 - February 2018, Hilo, HI

Learned how to reduce data images using observation data acquired at the Gemini Observatory to calculate the redshift of an unusual case of gravitational lensing.

Education

University of Hawaii at Hilo

Aug 2015 - May 2019, Hilo, HI

Major: Astronomy Minor: Physics

Honors: Cum laude

Korea University

March 2017 - June 2017, Seoul, South Korea

Kamehameha Schools

Aug 2011 - May 2015, Kalihi, HI

Volunteer Services

'Imiloa Volunteer

December 2015 - May 2019, Hilo, HI

Assisted with movie presentations in the show rooms and any other accommodations that needed assistance.

Astrophysics Club Member

August 2015 - May 2019, Hilo, HI

Used on-campus opportunities as ways to gain experience as an undergrad student. Became involved in off-campus community outreach projects in the general field of astrophysics.

Awards

Daniel K. Inouye Scholarship in Astronomy - May 2018