

Trinity Joy Manansala (She/her/hers)

Date of Birth: 01/16/2003
Applicant type: Undergraduate student
Application date: 01/15/2024



Contact Information

Email 1: manansalatrinity@gmail.com
Current Address: 32542 Lake Tana St , Fremont, CA 94555, USA
Permanent Address: 32542 Lake Tana St , Fremont, CA 94555, USA
Cell Phone: +16613401774
Ok To Send Text Message? Yes
Linkedin: www.linkedin.com/in/trinity-manansala

Demographic Information

Race: Asian
Ethnicity: Not Hispanic or Latino
Sex Assigned at Birth: Female
Gender Identity: Female
Veteran Status: Non-Veteran
Received Pell Grant: No
Disability:
 Seeing: None
 Hearing: None
 Walking: None
 Lifting: None
 Concentrating, remembering, or making decisions: None

Family Information

Parent or Guardian 1: Male
Highest degree: Master's degree (e.g., MS, MA, MBA)
Occupation: Computer Occupations

Parent or Guardian 2: Female
Highest degree: Bachelor's degree (e.g., BS, BA, AB)
Occupation: Health Occupations

Current Enrollment

Enrolled in post-secondary degree? Yes
Institution: San Jose State University
Location: San Jose, CA
Carnegie Basic Classification: Master's Colleges & Universities: Larger Programs
College Level: Four or more years
College Control: Public, 4-year or above
Historically Black College and University: No
Hispanic Serving Institution: No
Minority Serving Institution: No
Tribal College: No
Predominantly White College: Yes
Status: Full-time
Degree: Bachelor's degree (e.g., BS, BA, AB)
Primary Major: Computer science
Expected Degree Completion: 12/16/2025
Expected Class Standing, Fall: Junior
College GPA: 3.8
GPA Scale: 4.0
How are you financing your degree(s)?
 Financial assistance from parents, spouse, other relatives, not to be repaid: Yes
 Financial assistance from your employer: No
 Financial assistance from the Veterans Educational Assistance Act: No
 Loans from parents or other relatives, to be repaid: Yes
 Loans from the school you attended, banks, federal or state government: No

Education

High School: American High School District:
Location: Fremont, CA 94536

Experience

Prior Research Experience

Prior research experience: No

Work Experience

Currently working as a teacher or professor? No

Test Scores

SAT

SAT Combined Score: 1330
SAT Reading Score: 620
SAT Math Score: 710

ACT

Not Available

GRE

Not Available

Program Awareness

How did you hear about the NSF program?
Other, Email from the SJSU Computer Science Department

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Tuition waivers, fellowships, grants, scholarships: No

Assistantships or work study: No

Earnings from employment: Yes

Personal savings: Yes

Other, please specify:

Additional Questions

1. Describe the areas of research in the marine geosciences that interest you most, your personal goals for this internship, and indicate your preference for working in office, lab, or field settings. (200-300 words)

The area of research that interests me the most is Ocean Engineering. I am a computer science major, so I would like to use what I have learned in my coursework during this program. I am also very interested in exploring the field of ocean engineering and what kinds of technology emerges from this field. When I think of computer science careers, I picture people working for mobile app companies. So I was surprised to find out that I could do oceanic research as a computer scientist. My goal for this internship is to explore this particular field of computer science. I have always been interested in the ocean, so it would be a dream come true if I was able to work with the ocean as a programmer. I also would like to experience my first internship and research opportunity. This way, I could see if I would like to pursue a master's degree in a certain field. I could also determine if I would like to keep researching in my professional career. I prefer either working in the lab or the field. The lab and field environments allow for more hands-on work, which I would be interested in doing.

2. Write about what your career goals are and how participating in this REU program will help you meet these goals. (200-300 words)

My career goal is to explore what pathways my field of study can take me so I have a good idea of where I would like to work for a long time. My method is to do work in different fields that I am interested in now so I can find out if I actually enjoy doing that work. I know that one of the subjects that I am interested in is the ocean, so finding out if I would be interested in a future career in that field is a good place to start. If I am able to participate in the REU program, then I would be able to finally see what a research job as a computer scientist would be like. Another career goal of mine is to become a great computer scientist with the ability to work in any field that I wish. I would like to enhance my skills in order to do work that I am passionate about, so this opportunity would be a great chance to practice the skills that I know and gain new ones. I have never done an internship before, so participating in the REU program would give me my first coding project in an internship setting. Gaining internship experience would be my first step into breaking into the programming industry.

3. What unique qualities and characteristics will you bring to our program? (you can also add an explanation to what might appear to be gaps or weaknesses in other parts of your application. Feel free to explain your side so these gaps or weaknesses do not detract from your strengths.) (300-400 words)

The unique qualities and characteristics I will bring to this program is my advanced professionalism, practiced communication skills, and coding experience. I have been working ever since I graduated from high school, so I know how to conduct myself in a working environment. I have worked in quite a few job environments, so I can adapt to a new one fairly quickly. I have also mastered carrying myself in a professional manner and I know how to communicate with bosses and coworkers in a respectful and appropriate manner. I have also been working jobs where I have to interact with customers and clients, so I know how to interact with other people extremely well in terms of de-escalation and collaboration. I have also been a public speaking tutor for approximately one year, so I

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know how to communicate with others. I also mentioned that I have been working ever since I started college, so I know how to communicate with bosses and coworkers and maintain an efficient workplace. I know how to code in C++, Java, and Assembly and I know that coding is becoming a big part of ocean research. Since I am a computer science major, I have more polished skills in coding than others who are not.

4. This REU program is dedicated to enhancing the diversity of future scientific communities and sharing our science with a broader audience. Please describe how you, based on your personal background and life experiences (including social, cultural, familial, educational, or other opportunities or challenges) will contribute to this mission during and after participation in this REU. (200-300 words)

I am a Filipino woman, so if I was to take a part in this program I would represent both Filipinos and women in science. I am able to see a disparity between men and women in computer science at times, so my presence in this field may be encouraging to others who would like to pursue it. I also do not hear of many Filipinos working in computer science, so I could inspire other Filipinos interested in the field to be a part of it. There are also not a lot of people in my life who do research, so I can share the world of scientific research to my social circle. The way I would inspire others is by talking about my experiences. If I am able to experience the new world of oceanic research, I would be able to speak on it and explain to others what it is like. By spreading the word, others will be able to discover if they would like to research marine science or do research in general. I always love to share my experiences with others, so if I have the opportunity to take part in this program I will definitely let others know about it.

5. REU Mentor #1 Name: Please review the mentors and projects list (<https://csumb.edu/reu/mentors-and-projects/>) and consider who you are most interested in working with as your first choice (REU Mentor #1). Please list the first and last name of REU Mentor #1 here.

Gene Massion

6. REU Mentor #1 Explanation: Please explain why you chose REU Mentor #1. (50-100 words)

I chose Gene Massion because he is researching ocean engineering, autonomous technology, and oceanography. This sounds like the perfect opportunity for me since my coding skills will be put to good use here. I have also mentioned that I am very interested in exploring how computer programming is used in oceanic research, so I would be excited to explore these subjects with Gene Massion as my mentor.

7. REU Mentor #2 Name: Please review the mentors and projects list (<https://csumb.edu/reu/mentors-and-projects/>) and consider who you are most interested in working with as your second choice (REU Mentor #2). Please list the first and last name of REU Mentor #2 here.

Dr. Holly Bowers

8. REU Mentor #2 Explanation: Please explain why you chose REU Mentor #2. (50-100 words)

I chose Dr. Holly Bowers because she is studying environmental biotechnology, and some of my knowledge would be useful there. Coding is used in biotechnology, so I can use some of my skills if I were to work with this mentor. This would also be an interesting subject to research, since I am also interested in working with the environment and conservation.

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9. REU Mentor #3 Name: Please review the mentors and projects list (<https://csumb.edu/reu/mentors-and-projects/>) and consider who you are most interested in working with as your third choice (REU Mentor #3). Please list the first and last name of REU Mentor #3 here.

Dr. Birgitte McDonald

10. REU Mentor #3 Explanation: Please explain why you chose REU Mentor #3. (50-100 words)

I chose Dr. Birgitte McDonald because she is studying marine mammal and seabird ecology and physiological ecology and polar science. It would be interesting to do some work in this field; I have always been interested in working with animals. It would be even better if the computer science knowledge I have could be applied when doing research with this mentor.

References

Reference 1

Reference Writer Name: Thomas Judge
Position: Mathematics Professor
Institution: Ohlone College
Phone: +15103318805
Email: TJudge@ohlone.edu
Status: COMPLETED
Reference Submitted Date: 01/14/2024
How long have you known the applicant? 12
Capacity: Professor
How applicant compares? Top 5%
Intellectual ability: Outstanding
Integrity: Outstanding
Work Habits: Outstanding
General Motivation: Outstanding
Leadership: Outstanding
Creativity: Outstanding
Ability to work with others: Outstanding
Maturity: Outstanding
Writing skills: Unable to judge
Verbal communication: Outstanding
Reference File Name : Trinity Manansala Letter of Recommendation re NSF Education and Training Opportunities.pdf

Reference 2

Reference Writer Name: Debra Caires
Position: Computer Science Professor
Institution: San Jose State University
Phone: +14087123854
Email: debra.caires@sjsu.edu
Status: REQUESTED

Trinity Manansala

Fremont, CA 94555 | (661) 340-1774 | manansalatrinity@gmail.com | linkedin.com/in/trinity-manansala |
github.com/6manansalaT

Education

B.S. Computer Science

December 2025

San Jose State University, San Jose, CA

Relevant Coursework: Programming in Java, Computer Architecture, Formal Language and Computability

Ohlone College, Fremont, CA, GPA: 3.9

May 2023

Relevant Coursework: Calculus, Discrete Structures, C++ Programming, Intro to Assembly, Data Structures, Linear Algebra

Skills

C++, ASM, Java, Unity, Visual Studio, GitHub

Projects

Mental Health App, Ohlone College

May 2023

- Collaborated with four other people to develop an ASM application and presented results to the class
- Application featured a main menu which branched to other programs, such as a trail finder and a breathing timer

Huffman Compression and Decompression Program, Ohlone College

Apr 2023

- Implemented a C++ program that uses character counts and a Huffman binary tree to encode the file into binary
- Program decoded a binary file by using a header to restore the character counts that were stored during encoding and rebuilding the Huffman tree

Visual Novel Computer Game, Personal Project

Dec 2022 - Present

- Programmed 3 different routes in the game's story, movement of 2 characters, control of backgrounds, pop-up windows, and audio in C#
 - Coded using Visual Studio Code and created with Unity
-

Experience

Student Assistant, San Jose State University IT Department, Fremont, CA

Aug 2023 - Present

- Managing technology equipment checkouts to the San Jose State University Community and perform preventative maintenance on technological devices in classrooms
- Built relationships with students using the service, resulted in higher customer retention and popularity through word-of-mouth

Various Tutoring Roles, Ohlone College Tutoring Department, Fremont, CA

Jan 2022 - Aug 2023

- Tutored hundreds of students attending Ohlone College as a Mathematics, C++, and Public Speaking tutor
 - Coached many students struggling with math, coding, and public speaking concepts in a professional manner, increased student retention with tutoring services and understanding of their class concepts
-

Activities

Girls Who Code, Member, San Jose State

Sep 2023 - Present

Akbayan Cultural Club, Member, San Jose State

Sep 2023 - Present