

STATEMENT OF PURPOSE

Ever since I wrestled with complex algorithms in my computer engineering undergrad, I've been fascinated by the hidden stories that data can tell. This **Master's program in Data Science at FAU Erlangen** feels like the perfect next step to unlock those secrets and shape a future driven by insights.

My academic journey began with a strong foundation in computer science. I completed my Secondary School Certificate Examination (SSC) in 2016 from the Maharashtra State Board of Secondary and Higher Secondary Education, Pune, India, achieving a score of 92.20% (equivalent to a German 1.36). This was followed by a Diploma in Computer Engineering from the Maharashtra State Board of Technical Education, Mumbai, India, between July 2016 and May 2019. Building upon this technical base, I pursued a Bachelor of Engineering in Computer Engineering at Savitribai Phule Pune University, India, from June 2019 to April 2022. During this program, I excelled academically, maintaining a CGPA of 9.32 (equivalent to a German 1.34). Most significantly, my undergraduate experience culminated in a bachelor project (2021-2022) focused on developing a cost-efficient data storage solution that integrates data privacy and security. This project explored the potential of cloud computing for data storage optimization and cost reduction, while ensuring data integrity with encryption techniques. To further refine my programming skills, I successfully completed a Knowledge Lit Careers Certificate Course (KLIC) in C++ Programming in 2018, scoring 84%.

My professional experiences have provided valuable exposure to the practical application of engineering principles. I participated in a one-day workshop on the i-Pro Program Stressing Success organized by the Directorate of Technical Education, Maharashtra Chamber of Commerce, Industry & Agriculture on January 14th, 2017. This workshop equipped me with valuable career development skills. Additionally, I interned at Wipro Limited from February 21st, 2022, to April 30th, 2022. During this internship, I successfully completed a project titled "JAVA/ J2EE" which contributed to my graduation requirements. This experience honed my technical skills in SQL functionalities, Oracle database proficiency, SCM modules, and programming languages like C, C++, and Python, along with data structures.

My undergraduate studies in computer engineering sparked a deep interest in leveraging data to solve real-world problems. While I gained a strong foundation in algorithms and software development, a Master's in Data Science feels like the natural progression to bridge the gap between theory and practical data manipulation. This program's focus on machine learning and data analysis aligns perfectly with my desire to translate raw data into actionable insights. The curriculum's emphasis on big data technologies and communication skills will equip me for success in a data-driven job market. I envision myself working as a Data Analyst or Business Intelligence Analyst, potentially at leading organizations like Siemens or Deutsche Telekom, where I can contribute to data-driven decision making and shape a future powered by information.

The Friedrich-Alexander University Erlangen-Nürnberg (FAU) stands out as the ideal institution for my Data Science aspirations. FAU's reputation for excellence in research and its focus on interdisciplinary collaboration deeply resonate with my desire to learn from leading experts and contribute to cutting-edge advancements. The availability of professors with expertise in areas like machine learning and data security particularly excites me, as these align perfectly with my academic goals. Furthermore, FAU's strong industry partnerships and career support services position graduates for success in the data science field – a crucial factor in my decision.

Germany's thriving technological landscape and focus on innovation make it the perfect environment to pursue my Master's in Data Science. The country is a hub for renowned companies like Siemens and SAP, offering exciting opportunities to learn from and potentially collaborate with industry leaders. Germany's emphasis on research and development fosters a culture of continuous learning, which aligns with my desire to stay at the forefront of the ever-evolving data science field. Additionally, Germany's strong work-life balance and focus on international collaboration create an ideal environment to flourish both professionally and personally.

Following are the reasons why I chose **FAU Erlangen** for my Master's:

- FAU's computer science program consistently ranks among the best in Germany (THE Top 10, CHE Excellence), making it an ideal environment to excel in advanced data science studies.
- The program's emphasis on practical learning aligns with my desire to bridge the theory-practice gap. I'm confident this approach will equip me with the necessary skills to thrive in the data science industry.
- FAU's unique curriculum with customizable technical qualification modules allows me to tailor my studies to my specific interests within the vast field of data science. This flexibility is incredibly valuable to me.

Eager to join your esteemed program. Thank you for considering my application!

Regards,

Swaranjali