

# SIDDHARTH SHARMA

## MSc. | Artificial Intelligence

Email - [siddharth.sharma.8000@gmail.com](mailto:siddharth.sharma.8000@gmail.com)

Mobile Number - +447341632482

### Skill Set

**Languages:** PYTHON, C, C++, C#, JAVA, .net, AJAX, HTML, XML, CSS, Apex Programming, Apex Data Loader, Visualforce Pages, Lightning Design System, JAVASCRIPT(JS), SQL, NoSQL.

**Platforms:** Salesforce Sales Cloud, Unity3D, Unreal Engine 4, MongoDB, Android Studio, Visual Studio, VS Code, GitHub, Google Colab.

### Education

- **Master of Science (M.S.) in Artificial Intelligence from Heriot-Watt University, Edinburgh, Scotland, UK, from Sept'22-Aug'23**
  - Advanced specialist program providing a comprehensive understanding of practical applications of AI, with a particular focus on software development.
  - Courses in Biologically Inspired Computation, Data Mining & Machine Learning, Big Data Management, and Advanced Human-Computer Interaction, among others, have equipped me with a strong foundation in AI and its various subfields.
- **Projects:**
  - **Genetic Algorithm**
    - Implemented the Genetic Algorithm (GA) from scratch using the Python libraries numpy and TensorFlow.
    - Conducted experiments comparing GA performance on three benchmark functions: Sphere function, Rastrigin function, and Styblinski-Tang function.
    - The best solution found in each run was recorded.
    - The results showed that the GA was able to find good solutions to the benchmark functions.
  - **Multi-layered Artificial Neural Network**
    - Implemented a configurable multi-layer ANN architecture from scratch using the Python libraries numpy and TensorFlow.
    - Trained the ANN on the UCI Breast Cancer dataset and investigated the impact of hyperparameters on binary classification.
    - The hyperparameters investigated were the following:
      - Number of hidden layers
      - Number of neurons per hidden layer
      - Learning rate
    - Prepared a report with experimental results, including tables and plots.
    - Completed as part of a group of two. Coded in Python.
  - **Robot Simulation**
    - Implemented Behaviour-Based Robotics (BBR) and Evolutionary Robotics (ER) approaches to control an e-puck robot in a maze.
    - Objective: Create the quickest robot exploring the maze while searching for the reward zone.
    - Completed as part of a group of three. Coded in Python.
    - Platform used was WeBots.
    - The BBR approach used the Braitenberg method. The ER approach used a GA.
  - **TESVSCA: The Elder Scroll V Skyrim Conversational Agent**
    - Will be developing a conversational agent for The Elder Scrolls V: Skyrim.
    - The CA will be voice-activated and have a fairy-like entity as its face.
    - Users will choose the personality of the conversational agent.
    - The TESVSCA will explain the lore of the area, identify item locations, and offer loot-weight optimization suggestions.
    - The TESVSCA will have a natural and engaging conversational style.
    - The project will be completed as a mod for the game.
- **Bachelor of Technology (B.Tech) in Computer Engineering from NMIMS' Mukesh Patel School of Technology Management & Engineering, Mumbai, India from July'14 to Aug'18**
  - Comprehensive program covering software engineering, programming languages, computer networks, databases, and algorithms.

- Key courses include Data Structures and Algorithms, Computer Organization and Architecture, Operating Systems, and Object-Oriented Programming.

- **Projects:**

- **Pharmacy Management System**

- Developed a PC application with database integration for consumers and distributors, featuring a login page.
    - Completed as part of a group of two, with a role as the team lead.
    - Coded in C# using Visual Studio.
    - Database integrated with MySQL.

- **FinnEdd: Android Project**

- Developed a gamified mobile application to answer basic FAQs about the stock market and provide real-time market information.
    - Completed as part of a group of four, with a role as the team lead.
    - Coded in Java using Android Studio.
    - The app was able to display external site info in real-time.

### Professional Qualifications/Certifications

- Microsoft Technology Associate: Software Development Fundamentals - Microsoft Institute (2015-16)
- Grade 1 Cyber Security Expert - Lucideus Tech Pvt. Ltd. In (2016)

### Professional Experience

- **Senior Engineer at Shri Radha Krishna Marble & Granite (P) Ltd., Sept'19 - June'21**
  - Developed and implemented integrated work processes, including planning, monitoring, and evaluation systems, improving operational efficiency and productivity.
  - Successfully managed projects, ensuring timely delivery within budget while maintaining high-quality standards.
  - Developed in **HTML** and **CSS**.
- **Associate Consultant at IRT Digital Analytics Solutions Pvt Ltd., July'18 - Aug'19**
  - Served as **Lead Support** for East-West Seeds, utilizing Salesforce to manage order placement and tracking.
  - Directly interacted with clients to gather business requirements, formulate solutions, write queries, and test.
  - Provided front-end and back-end support and development in **Apex language** on Sales Cloud of Salesforce, delivering reliable and scalable solutions.
  - Developed **Visualforce pages** and transitioned from classic to lightning in Salesforce.
- **APPIRO, A WIPRO COMPANY (Summer Internship), June'17 - July'17**
  - Developed a recruitment app as a solo project, catering to both companies searching for employees and individuals seeking employment.
  - Utilized software development skills to design and create the app, resulting in an efficient and user-friendly platform.
  - Demonstrated strong project management skills, ensuring timely delivery of the app.
  - Developed in Salesforce Sales Cloud.

### Extra-Curricular Activities

- **YSL Football League - Jaipur Youth Soccer League 2010**
  - Played as a central defender.
  - Gained skills in effective communication, teamwork, and understanding of the game.
- **International Business Challenge 2012 - Hwa Chong International School, Singapore**
  - Placed 5th out of 12 teams.
  - Designed and built a spy gadget: smart glasses with thermal imaging and sound recording, connected to an intelligence database for the identification of targets.
  - Created a one-minute ad for the product.