

# Md. Tariquel Islam Tamim

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Military Institute of Science and Technology (MIST),

B.Sc in Computer Science & Engineering (CSE)

CGPA: 3.69 out of 4.00

Adamjee Cantonment College, Higher Secondary Certificate

GPA: 5.00 out of 5.00

Dhaka, Bangladesh

Dhaka, Bangladesh

**Ideal School and College**, Secondary School Certificate GPA: 5.00 out of 5.00

Dhaka, Bangladesh

2014 - 2016

#### Research and Publication

Developing a Deep Learning-based AR Shoe Try-on App with 3D Shoe Modeling from Smartphone Images, Thesis

Completed thesis work based on 3D modeling using photogrammetry, Foot Keypoint Estimation using ResNet50, and Augmentation of 3D objects in 2D space using ARcore.

Footwear 3D Model Generation from Smartphone 2D Images Utilizing Photogrammetry, IEEE

This study proposes a potential and affordable method for using photogrammetry to create 3D representations of footwear.

**Identifying Design Guidelines of Interactive Whiteboard Interfaces Through Usability Evaluation,** Springer 

The objectives of this study are to evaluate the interfaces of the whiteboards to reveal their usability problems and to provide possible design guidelines to improve the usability of such embedded systems.

A Conceptual Framework of an Automated Mosquito Control in Drainage Systems for Combating Dengue in Bangladesh, IEEE  $\ \ \Box$ 

The detection process of this system showed success of more than 80% on all performance parameters.

# Skills

**Problem Solving** (Solved more than 1000 problems in various online judges and onsite contests including ACM ICPC Asia Dhaka Regional, National Collegiate Programming Contest (NCPC) and other competitive contests.)

C & C++ | C# | Java | Python | PHP | Java-Script | Futter & Dart | React | Laravel

MySQL, Oracle & SQLite | Firebase | Flask

**Machine Learning** (Hands-on experience with various machine learning and deep learning algorithms.)

#### Projects

**Agro-Drone**, Capstone Project ☑

A drone is used for the data retrieval process and that data is processed using machine learning and computer vision in a web-based system to detect plant disease, the current situation of deforestation, and river erosion.

- Hardware: Custom-made drone, FPV camera
- Frontend: HTML, CSS, JS
- Backend: Python, Flask, NodeJs
- Database: MongoDB

#### MIST Computer Club, Database Project

A website for managing computer clubs including club members, panel members, and moderators.

- Language/Framework: PHP, Laravel
- Database: Oracle, PL/SQL

#### NCPC Management, Java Project 🗷

GUI-based software for organizing and managing NCPC (National Collegiate Programming Contest) events.

· Language: Java

#### **QR-Contact**, Freelance Project

Both generate and extract QR codes for sharing business cards and contact details.

• Language/Framework: Flutter and Dart

Platform: Android and iOS
 PlayStore: QR Contact ☑

Nirbaan Express Courier, Freelance Project

An e-courier software. Developed and deployed both web and mobile apps.

• Language/Framework: Flutter and Dart

• Platform: Web & Android

• API: REST(Laravel)

• PlayStore: Nirbaan Express Courier

Medical Appointment, Freelancing Project

Developed and deployed a doctors' appointment web portal for a private clinic.

• Language/Framework: PHP, Laravel

Database: MySQL

Bongopedia, Personal Project

A virtual reality (VR) app for visualizing various places of Bangladesh.

• Language/Framework: Flutter and Dart

• Platform: Android

## **➡** Professional Experience

**JB Connect LTD**, Software Engineer ☑ Laravel, AWS & ReactJs

Apr 2023 – present

**Robi Axiata Limited**, *Internship* ☑ Blockchain and Data Science.

Feb 2022 – Mar 2022 Dhaka, Bangladesh

### 🕏 Extra-Curricular Activities

Software and Communication Team Lead, MIST Mars Rover Society

2021 - 2022

Built Mars rover and represented Bangladesh in two international competitions.

Mentor & General Secretary, MIST Computer Club

2020 - 2022

Took classes on Data Structure and Algorithm (DSA) and problem-solving

Problem-Setter and Tester, Codewar2020, Talent-hunt2021, Weekly Contest, etc.

2021 - 2022

Platform - codeforces, hackerrank, etc.

Organizer, MIST IUPC 2019, MIST NCPC 2020, Codewar 2020, Talenthunt 2021, etc.

## Awards and Certificates

Anatolian Rover Challenge (ARC) 2022, Istanbul, Turkey (2nd Runner-up)

University Rover Challenge 2021, USA (Champion)

MIST Dean's List of Honour-2020, Academic Session (2019 - 2020)

Mobile App Contest of Inter University ICT Innovation Fest- 2021, 1st runner-up

ACM ICPC Asia Dhaka Regional Online Preli 2022, MIST\_EndGame (42th) ☑

ACM ICPC Asia Dhaka Regional 2022, MIST\_EndGame (76th)

ACM ICPC Asia Dhaka Regional 2021, MIST\_ThreeHorseman (76th)

RUET IUPC 2022, MIST\_Hadron (45th) ☑

NCPC 2020, MIST\_Metasploit ☑

BAIUST IUPC-2019, MIST\_ZenerDiode (18th)

**UITS IUPC-2019**, MIST\_ZenerDiode (11th) □

#### International Conference on 4th Industrial Revolution,

Place in top 100 in MUJIB 100 Idea Contest amongst more than 1000 teams 🗷

Project Showcase (software) in RUET CSE FEST 2022, 2nd Runner-up

**DU Codesamurai Hackathon 2022,** Achieved a position in the top 15 amongst 400+ teams

SUST CTF (Capture The Flag) Competition 2023, 16th

# **▶** Problem Solving Profile

StopStalk, splash365 ☑ | Leetcode, splash365 ☑ | Codeforces, splash365 ☑ | Codechef, splash365 ☑ | vjudge, splash ☑ | UVA, splash365 ☑ | HackerRank, splash365 ☑ | ICPCID, Tariquel Islam Tamim ☑