Reuben Devanesan

Computer Science and Chemical Engineering (Dual Majors) | IITGN

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INTERNSHIPS

NLP RESEARCH INTERN | MITACS
MAY 2023 – AUG 2023 | ATHABASCA UNIVERSITY, CANADA | PROF. MAIGA CHANG

➜ Ask4Summary project is a Moodle plugin that provides users with a summary (from a particular course material) based on part of speech similarity to their question.

➜ Implemented **Optical Character Recognition** (OCR) and **Speech Recognition** to extract data from various course materials (.pdf, .png, .txt, .mp3) and convert them to the required JSON formats.

➜ Incorporated **Topic Modelling** to reduce the time taken to generate summaries.

➜ Worked in a Linux system and learnt to **run cronjobs**. Developed a dashboard to show the current progress of the OCR and topic modelling jobs running in the background.

SOFTWARE DEVELOPMENT ENGINEER (SDE) INTERN | ATTENTIVE AI
JAN 2022 – JULY 2022 | NOIDA, INDIA (REMOTE)

➜ Gained experience with **ReactJS, Ant Design, Django, OpenLayers (ol) and Turf libraries** to develop and maintain the user facing elements integrated securely with internal backend. Built a **feature rich dashboard for the internal APIs**.

➜ Designed and developed a platform for generating shareable links of client properties, that displays the **GeoJSON data** of the cartographers' outputs as separate layers on a OpenLayers map.

➜ **Coordinated with various agile teams** to understand user requirements and provide technical solutions for the same. High level performance was ensured using **Scrum framework** and **JIRA software**.

➜ Built a self-serving training module for cartographers that **tracks progress of newly inducted cartographers** and assesses their learnings through timed tests.

PROJECTS

DEXARCH - APP FOR ARCHAEOZOOLOGISTS | RESEARCH PROJECT | PROF. SHARADA CV
MAY 2022 - PRESENT | IIT GANDHINAGAR

➜ Designed and developed a mobile application using **Flutter, Firebase & Firestore** to aid archaeozoologists and researchers who analyze animal remains from archaeological sites to record their provenance, and all their observable quantitative and qualitative features both on and off the field. Project Report .

➜ Users can **add/edit/delete/import/export their analysis** of animal remains (entries) and can also share their entries with other users within the app.

➜ They can also **download maps** of a particular area beforehand. The app supports offline location detection through the downloaded maps. The first version of the app has been released on **Google Playstore.**

CODE-MIXED TEXT TOOLKIT | RESEARCH PROJECT | PROF. MAYANK SINGH
AUG 2022 - PRESENT | IIT GANDHINAGAR

➜ Code Mixed Text Toolkit (CMKT) is a simple, modular and efficient python library that is designed to allow **users to build end-to-end NLP pipelines for the processing of code-mixed text** with ease, specifically for the Hindi-English language pair in mixed scripts. It is also designed to be scalable and can easily accommodate new features.

➜ CMKT is well documented and can be quickly learnt and used by anyone. **Paper submitted to EMNLP 2023 conference**. EMNLP Paper

➜ The first version of the library has been released on PyPI .

EXTRACURRICULAR ACTIVITIES

➜ **Instructor of two Student-Run Graded Short Course**, IITGN: Intro to Web Development (SC 335) and Mathematics for Machine Learning (SC 336).

➜ **Volunteered at Teach for India**, helping students in their academic activities.

➜ **Hobbies**: Chess, Football and Playing guitar.

EDUCATION

IIT GANDHINAGAR
JULY 2019 - MAY 2024
B.Tech (Dual Majors) in Computer Science and Chemical Engineering

NL DALMIA HIGH SCHOOL
MAY 2019 | 97.75 %
CLASS 12 (ISC), PCM AND CS

RBK SCHOOL
MAY 2017 | 96.8 %
CLASS 10 (ICSE), PCM AND CS

SKILLS

LANGUAGES & TOOLS:
• PYTHON • JAVASCRIPT • C++
• MATLAB • PYTORCH • LATEX
• GOOGLE COLAB • STREAMLIT

WEB DEVELOPMENT:
• HTML • CSS • EXPRESSJS
• REACTJS • NODEJS • DJANGO
• MONGODB • GIT

APP DEVELOPMENT:
• FLUTTER • DART • FIREBASE
• CLOUD FIRESTORE

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ACADEMIC SECRETARY
STUDENT COUNCIL | IITGN
Responsible for governance, long-term strategy building and the management of academic activities on campus.

METIS SECRETARY
SOFTWARE DEVELOPMENT CLUB
Empowered the student community through engaging workshops, hackathons, and webinars, introducing them to new technologies.

ACHIEVEMENTS

Awarded the **MITACS Globalink Research Internship '23** award to perform research at Athabasca University, Alberta.

Felicitated by **Dean of Academics**, IIT Gandhinagar, for **Excellent Academic Performance**.