

Sridhar Suresh Ragupathi

Portfolio | ssa427@sfu.ca | [2368656698](tel:2368656698) | [Github:// Sridhar98](https://github.com/Sridhar98) | [LinkedIn:// Sridhar Suresh](https://www.linkedin.com/in/SridharSuresh) | [📍 Vancouver, BC](#)

SKILLS

LANGUAGES:

Python • C++ • Bash • SQL

TOOLS AND FRAMEWORKS:

AWS • PyTorch • RASA • Git • Google Colab • Atom • Blender • \LaTeX • TensorFlow • Visual Studio

PUBLICATIONS

Exploring Pair-Wise NMT for Indian Languages [↗](#)

• Presented at ICON 2020 - Patna, India [↗](#)

Guarding a polygon without losing touch [↗](#)

• Presented at SIROCCO 2020 - Paderborn, Germany [↗](#)

AWARDS

2019 Charpak Lab Scholarship [↗](#)

• 1 of 21 students selected from India to pursue a funded research internship at a French Laboratory

EDUCATION

Simon Fraser University

MASTER OF SCIENCE IN

PROFESSIONAL CS [↗](#)

Sep 2022 - present

NIT, Trichy

BTECH IN CS [↗](#)

Jul 2016 - Jun 2020

COURSEWORK

Machine Learning

Computer Vision

Image Processing

Natural Language Processing

Introduction to Probability Theory

Introduction to Algorithms

ACTIVITIES

Volunteer

NSS, National Service Scheme [↗](#)

• Educated and interacted with children at an orphanage

Deputy Manager

Festember Content Team, NIT Trichy [↗](#)

• Master of Ceremony for music & valediction events • Head of 30 member team for event reports • Newsletter designer

EXPERIENCE

COMPUTER VISION CO-OP, 3DM DEVICES

Deep Learning • Computer Vision • Image Processing

Python • C++

May 2023 - Dec 2023, Aldergrove, British Columbia [↗](#)

• Computer Vision for industrial inspection on low contrast tire heightmaps

• Detected barcodes on tires with an mAP of 92.8 using FasterRCNN object detector that performs 6x faster than an image processing-based detector

• Segmented defects on tire sidewalls with an mIoU of 72.8 using Deeplabv3+

• Identified distorted tire beads using a rule-based system developed by feature engineering tabular data from tire scan metrics.

• Curated and annotated machine learning datasets from raw tire scans for object detection and semantic segmentation

DATA SCIENTIST, ELTROPY

Data Analytics • Data Engineering

AWS Forecast • AWS QuickSight • Python

Nov 2021 - Jul 2022, Chennai [↗](#)

• Forecasted text messages for Credit Unions in the US categorized by departments and message types by implementing an ML pipeline using cloud services - Amazon Forecast and Amazon MWAA)

• Showcased KPIs for Credit Unions by designing performance optimized dashboards on AWS QuickSight and integrating them as a premium insights feature.

NLP ENGINEER, LIMECHAT

Deep Learning • Natural Language Processing

Python • RASA

Jan - Dec 2021, Chennai [↗](#)

• Boosted sales by 6% for a leading D2C men's grooming brand by designing and implementing a system to launch personalized chat re-marketing campaigns.

• Improved chatbot's ability to handle typos and synonyms for the product discovery quiz by creating a POS Tagging based system to obtain synonyms and typos from real user conversations with the chatbot

RESEARCH ASSISTANT, CVIT, IIIT HYDERABAD

Deep Learning • Natural Language Processing

Python • PyTorch • Bash Script

Jul - Dec 2020, Chennai [↗](#)

• Achieved state-of-the-art BLEU scores 19.07, 19.18 and 9.48 for English to Tamil, Urdu and Odia translation respectively and WAT20 En-Odia leaderboards rank 3 [↗](#) by fine-tuning a multilingual neural machine translation model

RESEARCH INTERN, LIRIS, ECOLE CENTRALE DE LYON

Deep Learning • Computer Vision

Python • Blender • PyTorch • Atom • Git

May - Jul 2019, France [↗](#)

• Increased mIoU score to 46.65 for semantic segmentation of fruits by creating a synthetic training dataset of fruit tree images using Blender and enhancing its photo-realism using generative adversarial networks (CycleGAN) [↗](#)

PROJECT INTERN, IIT BOMBAY

Deep Learning • Computer Vision

Python • Google Colab • Tensorflow

Dec 2018 - Apr 2019, Mumbai [↗](#)

• Created a labelled image dataset of people smoking cigarettes and finetuned Inception-ResNet-v2 to classify images of smokers with an F1 score of 0.7055