

Tharindu Karunanayake

Principal Engineer

tharinduk90@gmail.com github.com/tharindukn linkedin.com/in/tharindukn dev.to/tharindukn

PROFILE

I'm a principal engineer with 8+ years of experience building products from the ground up — from writing the first lines of code as a Software Engineer to leading teams and shaping system architecture.

At my core, I'm a designer of solutions — someone who doesn't just build what's asked, but reimagines how it should be built. I operate at the frontier of designing and developing novel systems · Web3 · Crypto — where decentralized thinking meets intentional craftsmanship. Whether it's a distributed system, a decentralized protocol, or a product experience — I bring the same principle to everything: design it right, build it to last, make it novel.

EXPERIENCE

KAST	Dec 2024 – Present
Architect	Dec 2025 – Present
Senior Tech Lead	Dec 2024 – Nov 2025

Kaiju Labs	May 2023 – Nov 2024
Architect	May 2023 – Nov 2024

LiveRoom & Render Island Studio	Sep 2017 – May 2023
Technical Lead	Jan 2021 – May 2023
Associate Technical Lead	Nov 2019 – Dec 2020
Senior Software Development Engineer	Nov 2018 – Oct 2019
Software Engineer	Sep 2017 – Oct 2018

- Grew from writing the first lines of code as a Software Engineer to leading teams and shaping system architecture across the company's products.
- Designed and built backend systems for web3, AI, and 3D commerce — from HD wallets and blockchain indexers to computer-vision pipelines.
- Provided technical direction through coaching and mentorship, and established engineering practices that kept quality high as teams grew.
- Owned systems end-to-end: architecture, smart contracts, event pipelines, cloud infrastructure, and the occasional frontend.

Dialog Axiata PLC	Apr 2016 – Oct 2017
Senior Executive (Engineer)	Apr 2016 – Oct 2017

SKILLS

Backend & System Design: Node.js, Python, Django, Kafka, Serverless Framework, event-driven architecture, microservices, REST APIs

Crypto & Web3 Backend: Solidity, Ethers.js, Hardhat, HD wallets, The Graph / Subgraph, Ethereum, Avalanche, Solana

AI & Data: Deep learning, image processing, OpenSearch, data science, Python ML stack

Cloud & Databases: AWS, GCP, DynamoDB, MongoDB, PostgreSQL, S3, Lambda

Frontend (working knowledge): Next.js, React, Three.js, React Three Fiber, WebGL

SELECTED PROJECTS

Crypto Wallet · [Web3 Backend](#) · [Multi-chain](#)

Multi-chain NFT wallet with HD wallet key derivation, native + ERC-20 transfers across Ethereum, Avalanche, and Solana, and NFT buy/sell/resale flows.

Node.js · Solidity · Ethers.js · DynamoDB · Serverless · OpenSearch · Next.js

Blockchain Indexer · [Distributed Systems](#) · [Event Streaming](#)

Real-time indexing pipeline tracking the full lifecycle of NFTs and marketplace orders — every mint, transfer, burn, and sale — via a Kafka-based event pipeline.

Node.js · Kafka · MongoDB · Solidity · Ethers.js · Serverless

NFT Marketplace · [Smart Contracts](#) · [Search](#)

Cross-chain NFT marketplace for 3D and AR assets: Solidity marketplace contracts, Subgraph transaction history, OpenSearch discovery, MetaMask/WalletConnect integration.

Solidity · Subgraph · OpenSearch · DynamoDB · Moralis · Python · Next.js

Bigpool · [AI Backend](#) · [Fintech](#)

Insurance platform for SMEs with an AI-powered backend turning first agent conversations into instant, risk-assessed policy quotes.

Python · Django · Node.js · PostgreSQL · GCP

ProofTec · [Computer Vision](#) · [Deep Learning](#)

Automated vehicle damage detection platform spotting incremental changes to a car's exterior from video — gantry or handheld.

Python · Deep Learning · Image Processing · AWS

Virtual Fitting Room · [3D](#) · [Machine Learning](#)

Virtual try-on generating a digital human from real body measurements, with a cloth-simulation pipeline for realistic garment fit.

Node.js · Machine Learning · WebGL · Three.js · AWS

Also: 3D Product Configurator · Virtual Showroom · FIT (3D body scanning) · Island Madness (HTML5 game)

EDUCATION

MSc in Computer Science — Data Science and Analytics, University of Moratuwa 2020 – 2022

BSc in Engineering (Hons) — Electronic and Telecommunication, University of Moratuwa 2011 – 2016