M Zulfikar Isnaen

SOFTWARE ENGINEER · MES (MANUFACTURING EXECUTION SYSTEM) ENGINEER

No.16 Karang Sari Street, Kec. Cimahi Selatan, Jawa Barat, Indonesia 40535

📱 (+62) 857-5996-6626 | ✉ isnaen70@gmail.com | 🏠 zulfikarisnaen.com | ⬛ zulfikar4568 | in

zulfikar-isnaen-5974121b6

Summary

Experience in Software Enterprise (Manufacturing Execution System) from Siemens and Software Development +3 Years specializing in the fullstack development as a Web Developer, software enterprise in Manufacturing refer to ISA-95 and I manage infrastructure (Linux or Windows) Environment On Premises or Cloud (Google Cloud Platform) as well. My passion is creating innovation to solve problems and helping people to reach their purpose, and learning new technologies and tools if the need arises.

I have strong Engineering professional with a Diploma 3 focused in Mechatronics, Robotics, Automation Engineering from Politeknik Manufaktur Negeri Bandung (PMS-ITB)

Skills

Core Languages	Typescript, C#
Environment	Nodejs, .NET
Web Framework	Nestjs, Vue, Vite
Databases	Microsoft SQL Server, PostgreSQL
Infrastructure Tool	Docker, Kubernetes, Helm, Terraform, Terragrunt, Github Action, Lens, Google Cloud Platform
Messaging System and Caching	NATS, Redis
Robotics	C++, Robot Operating System
Low Code Development	Mendix Siemens
Enterprise Industrial	Manufacturing Execution System, Opcenter Core Siemens Software

Work Experience

Opex Consulting Group
Indonesia - Singapore - Malaysia

SOFTWARE ENGINEER | MES (MANUFACTURING EXECUTION SYSTEM) ENGINEER · *Apr. 2021 - Present*

- Implement and Deliver Solution for Digital Transformation in Manufacturing 4.0
- Configured System Administration of Windows Server 2019
- Integration of Enterprise Software
- Administration of SQL Database Server
- Setup Observability Tools
- Opcenter Siemens Execution Core / Electronics (Modelling Bussiness Process of Physical, Process, Execution) MES
- Opcenter Siemens Execution Core / Electronics (Configuring Bussiness Logic in Designer, and manage Portal Studio) MES
- Design and Create Custom Application for Manufacturing Process using (.NET and Mendix Siemens)
- Manage Google Cloud Platform
- Knowledge gained: Software Enterprise, Process Control, Aquisition Data, Production Management, Quality, Material Management, Maintenance Management, Data Integration
- Tech Stack: C#, Google Cloud Platform, Opcenter MES Siemens software, Desktop Application .NET, Siemens Mendix, System Administration Windows Server 2019, NLB (Network Load Balancer), IIS 8, Redis, Windows Service .NET, ASP.NET, Prometheus, AlertManager, Grafana, Grafana Loki, Promtail

Vechr Community
Indonesia

FULL STACK ENGINEER · *Jan. 2022 - Jan 2023*

- Developing an application IIoT refer to ISA-95
- Developing an Event driven Application Monitoring Machine using Nest/Typescript and Vue/Typescript
- Create Realtime Historian data machine using Web Socket
- Create Audit History app
- Create Drag & Drop Chart (Widget) for Dashboard, and connect with Web socket to achieve Realtime Chart System
- Manage Database Postgresql and Time Series Database (InfluxDB)
- Create Deployment Kubernetes using Helm Chart
- Sending Alert to SMTP
- Knowledge gained: Event Driven Architecture, Microservices Pattern, Usage of Message Broker (NATS, MQTT), Container Orchestration, Manufacturing System, Design Authentication and Authorization, Restfull Pagination
- Tech Stack: Kubernetes & Helm Chart, Terraform, Terragrunt, GCP, Docker, NATS (Messaging System and Caching), MQTT, GIT Hooks, NGINX API Gateway, Node Mailer, Nest, Prisma ORM, State Management(pinia), Vue/Typescript, Husky, Commitizen, linter

ThreeSixty

Remote

SOFTWARE DEVELOPER (FREELANCE)

Feb. 2022 - Jul. 2022

- Created Frontend Application.
- Doing Integration with Backend Rest API.
- Collaborative using Agile (JIRA).
- Knowledge gained: Vuejs/Typescript, Docker, JWT auth, Stripe

Synergy Engineering

BSD Tangerang, Indonesia

FULL-STACK DEVELOPER

Jan. 2021 - Apr. 2021

- Developing Application SBS (Synergy Bussines Suite) to create Front End and Backend using Ruby On Rails Framework.
- Collaborate team with Kanban Methodologies using Trello.
- Create API backend Rails with Postgresql.
- Create Drawing tagging for Engineering Drawing.
- Version Control System using Git and Gitlab.
- Knowledge gained: Database Design, Authentication & Authorization, GIT FLOW
- Tech Stack: ruby, rails MVC, Javascript, HTML (.erb)/ Slim, SASS, NPM, GITLAB, Leafletjs, Cancancan, Devise, Dropzonejs, Bootstrap 4.

L'Oréal (PT Yasulor Indonesia)

North Cikarang, West Java, Indonesia

SOFTWARE DEVELOPMENT ENGINEER

Sept. 2019 - Jan. 2020

- Doing Software Development "Inspection Check application using ASP.NET and VB.NET".
- Doing Maintenance & Preventive on Filling Machine.
- Doing Maintenance & Preventive Process Machine SKID.
- Knowledge Gained: VB.net, ASP.net, Desktop Application, Maintenance system.

PT Datareka Integrasia Teknologi

Cimahi, West Java, Indonesia

FREELANCER

March. 2017 - July. 2017

- Troubleshooting Board PCB of Security Panel
- Assembly Board PCB Controller and Power Supply using SMD Component

Midea Electronics Indonesia

North Jakarta, Indonesia

FIELD SERVICE ENGINEER

Jun. 2016 - August. 2016

- Maintenance and repair Air Conditioner.

Honors & Awards

DOMESTIC

2020	**1th Place**, BEST GRADUATION OF POLMAN		*Bandung,Indonesia*
2019	**1th Place**, BEST ACADEMIC OF POLMAN		*Bandung,Indonesia*
2019	**4th Place**, ROBOT ABU INDONESIA (KRAI)		*Bandung,Indonesia*
2018	**1th Place**, BEST ACADEMIC OF POLMAN		*Bandung,Indonesia*
2016	**4th Place**, MOBILE ROBOTICS NATIONAL 4th		*Malang,Indonesia*
2016	**1th Place**, MOBILE ROBOTICS WEST JAVA		*WestJava,Indonesia*

Certificates

2022	**Certified Practical DevOps Engineer**, Studi DevSecOps
2022	**Docker & Kubernetes: The Practical Guide**, Udemy
2022	**The Nest JS Bootcamp - Complete Developer Guide**, Udemy
2021	**Rapid - Mendix Developer Certification**, Mendix
2021	**React Js Web Frontend**, SanberCode

Education

Bandung Polytechnic for Manufacturing (Polman)

Bandung, Indonesia

ASSOCIATE'S DEGREE IN MECHATRONICS ENGINEERING 3,60 OF 4,00

2017 - 2020

- Final project for "Implementation Navigation System using ROS (Robot Operating System) for Autonomous Mobile Robot (AMR)"
- Other project "Implementation interpolation CNC 2.5D using Algorithm Digital Differential Analyzer (DDA)"

Vocational High School - SMKN 1 Cimahi

Cimahi, Indonesia

ASSOCIATE'S OF INDUSTRIAL ELECTRONICS

2013 - 2017

- Final project for "How to Work of System Air Conditioner Type MSF09CRN"

Projects

Freyabadi	**Pseudo Manufacturing Execution System**, Jan, 2024 - Present	*Karawang,Indonesia*
PCI	**Manufacturing Execution System**, November, 2022 - August, 2023	*Batam,Indonesia*
WIK	**Manufacturing Execution System**, October, 2021 - December, 2022	*Batam,Indonesia*
Vechr	**Vehcr IIoT Web App (Open Source)**, January, 2022 - Sep, 2022	*Indonesia*
ThreeSixty	**paymeforms.com**, February, 2022 - July, 2022	*Remote*
Opex	**Ivermectin Bank App Hybrid Mobile Apps**, June, 2021 - July,2021	*Remote*
Opex	**Enterprise Dashboard Web Application**, May, 2021 - June, 2021	*Remote*
Synergy	**Synergy Bussines Suite Web Application**, January, 2021 - April, 2021	*Bandung,Indonesia*
Polman	**Autonomous Mobile Robot Interface HMI WEB**, August, 2020 - September, 2020	*Bandung,Indonesia*
Polman	**CNC Servo Controller with Digital Differential Analyzer Interpolator**, June, 2020 - August, 2020	*Bandung,Indonesia*
Polman	**Prototype Autonomous Mobile Robot**, June, 2020 - August, 2020	*Bandung,Indonesia*
Loreal	**Inspection and Breakdown Check Web App**, November, 2020 - December, 2020	*Bandung,Indonesia*
Loreal	**Inspection Check Desktop App**, October, 2020 - November, 2020	*Bandung,Indonesia*