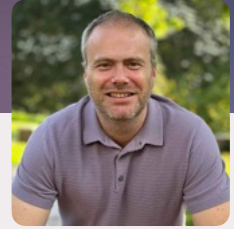# Fitti Weissglas

Principal Software and Data Engineer

Profile

- I am a experienced **technical leader and software engineer** with a strong background in **leading engineering teams** and delivering high-performance systems. I have built and guided global teams, driving projects across software development, data engineering, and cloud infrastructure.

- As an **all-round software engineer**, I have extensive experience in backend (Django, Python), frontend (React, TypeScript), and iOS development (Objective-C, Swift). My expertise spans **data engineering**, ETL pipelines, and AI-driven automation, enabling large-scale data processing and analytics.

- I am known for my analytical mindset and problem-solving approach, I excel at **architecting scalable solutions**, optimising performance, and leading teams toward innovation. I thrive in **technical leadership roles**, **mentoring engineers**, defining technical roadmaps, and ensuring seamless execution of complex projects.

Employment History   details

Director Global Digital Health, University of California, San Francisco
2011-current

- Founded a **45-member global technical team**, directing a **$10M portfolio** across software, data engineering, and system architecture.
- Designed and implemented large-scale data platforms, backend systems, and AI-driven automation solutions.
- Built data warehousing and analytics dashboards, developed scalable data collection and processing systems, and led app development, including Objective-C and iOS solutions.
- Established team leads, secured funding, and drove technical strategy for enterprise interoperability and automation.

Software Development Lead, US Government Centers for Disease Control
2004-2011

- Overseeing the technical development of clinical software for HIV implementing partners in Uganda as part of PEPFAR
- Conducting epidemiological activities and surveillance studies
- Support Ministry of Health in Uganda agencies with the national health information system needs
- Designed business intelligence and reporting solutions in C# and .NET.

Prior to that

- Software Engineer, IDI, Kampala Uganda (2004)
- ICT Coordinator, Kampala International University (2002-2004)
- Software Developer, ICM Solutions, Netherlands, 2001-2002
- Software Developer, KPN, Netherlands, 1999-2001

Nairobi, Kenya

[GitHub](#)

[LinkedIn](#)

info@fittiweissglas.com

fittiweissglas.com

English / Dutch

US/Europe/Africa Work Hours

Education History

MBA
Imperial College London, 2016

MSc in Epidemiology
London School of Hygiene & Trop Med, 2009

BSc, Software Engineering
The Hague University, Netherlands, 1999

Skills   details

Leadership & Mentorship
Team leadership, coaching, technical strategy

Software Engineering
Python, Django, React, TypeScript, C#, Objective-C, Swift

Data Engineering
SQL, PostgreSQL, ETL, PySpark, Data Warehousing

AI & Automation
AI-assisted coding, machine learning pipelines, automation

Business Analysis & Product Strategy
Product envisioning, technical roadmaps, requirement gathering

Open to remote short-term, longterm and freelance work

Portfolio Highlights

Global Digital Engineering Team   details

Founder & Director | 45+ Member Global Team | $10M Portfolio

Built and led a globally distributed engineering team delivering large-scale software, data, and cloud solutions. Directed product envisioning, technical strategy, recruitment, and partnerships across multiple countries. Designed and implemented multi-country data platforms, national data warehouses, and enterprise interoperability frameworks. Led the development of EMRs, surveillance platforms, and AI-powered analytics dashboards to enable real-time, data-driven decision-making.

Impact: Established a sustainable global engineering hub, driving cutting-edge innovation, large-scale digital transformation, and enterprise data solutions.

Data Engineering & Visualisation Platform   details

Founder & Lead Engineer | Modular Data Architecture | AI-Driven Automation

Designed and developed DUFT, a highly configurable, API-driven data integration and visualisation platform built with Django, Python, and React. Architected the backend with a modular, API-driven structure, ensuring scalability, automation, and real-time analytics. Led a multi-disciplinary team, driving data engineering, automation, and AI-powered insights.

Impact: DUFT redefines data visualisation and automation, merging configurability, real-time data interaction, and AI-driven analytics into a scalable system.

Health Information Systems & Data Engineering

Architecting Scalable Health Data Systems | AI & Interoperability

Developed national health information systems, integrating EMRs, surveillance platforms, data warehouses, and cloud-based analytics. Built and optimised data pipelines, AI-driven analytics, and secure infrastructure for real-time decision-making.

- EMRs & Digital Health Systems – Led electronic medical record implementations and developed custom Django-based EMRs
- Data Warehousing & Reporting – Engineered scalable data repositories and data warehouses integrating real-time analytics dashboards
- Interoperability & Standards – Integrated FHIR, DHIS2, OpenMRS, and ODK, enhancing data exchange, terminology services, and patient identity management.

Impact: Engineered scalable health data systems, enhancing interoperability, reporting, and real-time decision-making across multiple countries.

more portfolio