

# Marko Pacak

## Senior Data Engineer

Basel, CH - info@markopacak.com - 0041 (0) 77 484 56 16

2025-9 2023-6

2025-8

Senior Data Engineer / Project Lead (Platform, Cloud & Analytics)

RoomPriceGenie AG - Remote, Zug (CH), Mannheim (DE)

Snowflake, DBT, Terraform, AWS, Polars, Pandas, Postgresql, cube.dev, Django, Datadog

- Managed reporting tool for 1000+ pro clients. Includes verifying calculations, benchmarking against external reports, developing new models, and maintaining/refactoring legacy ones
- Modelled and maintained Data Warehouse using Kimball design (30 GB main fact table, hourly refreshes, near-real-time ingestion)
- Accelerated reporting calculations up to 10× via pre-calculated snapshots and aggregate tables; introduced analytical semantic layer with Cube.dev
- Centralized transformations in Snowflake/DBT/Dagster, enabling faster development and parallel work across multiple data teams; leveraged AI-assisted DBT transformation drafting
- Implemented data contracts to coordinate upstream/downstream changes, improving team alignment
- Built Terraform / AWS modules to support Dagster workflows (demo on GitHub)
- Deployed AWS-native analytics tools: Athena, Glue Catalog/Jobs, Delta Tables (demo on GitHub)
- Led complex data integration that drove record revenue month (opening the Australian market)
- Developed data quality & freshness checks in DBT/Dagster; monitored pipeline health in Datadog.
- Conducted technical & team-fit interviews, performance reviews, coaching sessions, and workshops.

2022-9 2023-6

## Senior Cloud & Data Engineer

Galeria Kaufhof Karstadt - Remote, Essen (DE)

AWS, Terraform Python, Nodejs, Docker, Jenkins, Datadog

- Developed and maintained data pipeline and multiple analytics calculations in production (Terraform, SQS, S3, Lambda, Glue, Spark, Step Functions, Redshift), processing up to 5 gigabytes / 10 minutes
- Introduced Data Quality Checks for identifying anomalies in items stock data (AWS Glue)
- Led projects with teams of external consultants
- Maintained jenkins pipeline automating build/push of containers to EC Registry
- Set-up monitoring views and automated alerts in Datadog and AWS Cloudwatch

2020-9 2022-9

### Senior Cloud & Software Engineer

NextBigThing AG - Berlin (DE)

AWS, Terraform, IoT, Python, Docker, Django, SQLAlchemy, Pandas, Grafana

- Developed real-time ETL pipelines for ingesting and processing sensors event data (IoT Core, Kinesis Streams, Lambda, Pandas, S3, DuckDB), with peaks of 2K requests / second
- Developed API Services (Django/Flask, AWS API Gateway, Lambda, EC2, AutoScaling, Redis)
- Managed CI/CD pipelines (GitLab CI, AWS CodePipeline)
- Introduced Terraform to the company and moved from ClickOps to IaC

### Personal Information

nationality Swiss

date of birth 01.06.1991

linkedin /in/markopacak

github /markopacak

stackoverflow /users/8524301/payloc91

## Languages

#### Italian

native / bilingual

#### English

full professional proficiency

#### German

professional working proficiency

Bosnian / Serbo-Croatian

native, bilingual

#### French

basic skills

## Management Experience

**Project Management and Milestones** 

Prioritization and alignment with Product

Technical and team-fit interviews

Performance Reviews

Workshops and Coaching

## Side-gigs and hobbies

Hiking Groups Guide and Organizer

All-round-help and snowboard instructor assistant for scout kids

## Contributions (see github)

numpy/numpy

pandas-dev/pandas

pytest-dev/pytest

### Freelance Software & Cloud Engineer

2020-6 2021-9 Bryt

Bryter GmbH - Remote, Frankfurt (DE)

AWS. Openfaas, Kubernetes, Java, Kotlin, Python

- Developed the Bryter state-machine platform
- Integrated 3rd party APIs: DocuSign, iManage, British commerce register...
- Mentored external developers on how to use the framework

2020-1 2021-9

Auxolar GmbH and Next Big Thing AG - Remote, Berlin (DE)

AWS, IoT, Django, Python, Pandas, C++

- Developed calculations of energy consumption and generation (AWS Lambda/EC2)
- Prepared data models for data scientist
- Developed embedded software (Python, METR M-Gate, Raspberry)

2018-6 2019-12

Assetmax AG - Remote, Zurich (CH)

AWS, Java, Python, Pandas, IT-Security

2017-6 2018-6

## Software Engineer

Assetmax AG - Lugano, Zurich (CH)

AWS, Java, Python, Pandas, IT-Security, Postgresql

- Migrated home-made web-framework to Spring web-services
- Automated deployment the Assetmax software in banking systems
- Developed financial calculations and asset reporting (Java/Python, Lambda, EC2)
- Managed an external team of front-end engineers
- Integrated authentication protocols with banking networks: OAuth, Kerberos, SPNEGO, ...
- Developed data extraction with Bloomberg, SIX, ...
- Ran penetration attacks and hardened systems deployed in clients network: worked with one of the largest IT-Sec companies in Europe
- Wrote tooling / scripts to automate the release of the Assetmax software within banking networks (Python scripting / tooling)
- Database optimization

2013-1 2013-9

## Pricing Management Assistant

EFG Bank - Lugano (CH)

- Strategic and Operative Pricing Management
- Automated processes and queries on the banking platform Avalog

### Education & certifications

2013-9 2017-1

## Bachelor of Science in Computer Science and Engineering

University of Applied Sciences of Southern Switzerland (SUPSI) - Lugano (Switzerland)

BA thesis: Real-time streaming of video content over UDP/TCP using the gstreamer (C++) framework Supervisor: Prof. Leidi Tiziano

### AWS Certified Developer Associate

Credential number: Y5SHLSTC5JV41DWD

- DeepLearning.AI Tensorflow Developer Specialization
- DeepLearning.Al Deep Learning Certification