



Petri Luukkonen

Software Developer, Data Scientist

Espoo, Uusimaa

petri.luukkonen@protonmail.com

+358452244780

S O C I A L

Petri Luukkonen

GitHub profile

Musiikkiprojekti: Showfar

Film Music Enthusiast (Music Projects)

P R O F I L E

Experienced full stack software developer of web based applications with interest toward intelligent data centric solutions. Petri has acquired experience from data science projects through academic research and industry knowledge of web app development.

E D U C A T I O N

Master of Science

Applied mathematics
University of Helsinki
1.9.2012 - 1.3.2016

Bachelor of Science

physics
University of Helsinki
1.8.2006 - 1.8.2012

E X P E R I E N C E



Data Developer

1.6.2021 - 11.10.2021 | CGI

Back-end software development. Specialization to data centric application development by applying machine learning and data analysis techniques

Tech. stack: Azure ML Studio, Azure Databricks, Azure Storage, Spring Framework (Java), Python



Full-stack developer

1.9.2017 - 31.5.2021 | Zeroni Oy

Full stack development of Zeroni, a SaaS for managing construction sites from the angles of supply chain management, approval processes, access control and safety. Developing Data Platform on top of AWS

Tech. stack: Java, Javascript, Python, Spring Framework, Hibernate, PostgreSQL, Liquibase, AngularJS, Liquibase, Bash-script, Atlassian Bitbucket, Git, AWS (S3, KMS, IAM, Glue, CDK, Athena, QuickSight), Apache Spark, Docker



Research Assistant, Re:Know

1.6.2015 - 31.8.2016 | Helsinki Institute of Information Technology (HIIT)

Implementing a system for pro-active information retrieval for a text writing scenario (POC). carrying user studies, and analysing user activity data. Testing suitable ML algorithms with simulations(LinRel ja LSTM) for keyword enrichment of search queries. writing two scientific publications

Tech. stack: Python, Scipy, Gensim (NLP-kirjasto), Tensorflow, PyQt, Bash, Git, LaTeX



Sound Engineer

1.12.2010 - 31.10.2014 | TV7

Planning and making sound recordings, live and post mixing for various TV series and live broadcasts. Technical documentation

Tech. stack: Audinate Dante AV system, Yamaha CL-series mixers, Sennheiser, Shure, RX Izotope



Research Assistant

1.6.2008 - 31.8.2010 | Helsingin Yliopisto, Materiaalifysiikan laitos

Molecular dynamics simulations of radiation processing of polyethylene and cellulose. Writing scripts for performing atomistic simulations and analyzing the produced data. Testing several atomistic interaction models developed for organic compounds. Construction of the atomic structures of polyethylene and cellulose and analyzing structure changes

Tech. stack: C++, VMD (Visual Molecular Dynamics), Awk, Bash, RasMOL, GnuPlot, LaTeX

SKILLS

Programming Languages

- Java
- Javascript
- PostgreSQL
- Python
- CSS

Frameworks

- Spring Framework
- Hibernate
- AngularJS

Software libraries

- ReactJS
- SciKit-Learn
- Finnish
- English
- Swedish
(basics)
- Farsi
(elements)

INTERESTS



Music



Reading



Gym and
Running

CERTIFICATES



Microsoft Certified: Azure Data Scientist Associate

31.8.2021 | Microsoft

Learn to implement and deploy machine learning workloads on Azure



Microsoft Certified: Azure Fundamentals

2.7.2021 | Microsoft

Foundations of cloud services on Azure



Enriched Web Development with Angular 11

2021 | Skillsoft

SPA development using front-end framework Angular 11



Fundamentals of Scalable Data Science

7.3.2021 | IBM

Learning to implement scalable data science workloads using Apache Spark, python and pyspark



Full Stack Open (9 ECTS)

1.12.2020 | University of Helsinki

Learn full stack web app development using React, Redux, Node.js, MongoDB, GraphQL ja TypeScript



Spring & Hibernate for Beginners

13.7.2017 | Udemy

Learn Spring 5 Core, AOP, Spring MVC, Spring Security, Spring REST, Spring Boot 2, Thymeleaf, JPA & Hibernate

PUBLICATIONS

- [] Koskela, Markus, Petri Luukkonen, Tuukka Ruotsalo, Mats Sjöberg, and Patrik Floréen. "Proactive information retrieval by capturing search intent from primary task context." *ACM Transactions on Interactive Intelligent Systems (TiiS)* 8, no. 3 (2018): 1-25.
- [] Luukkonen, Petri, Markus Koskela, and Patrik Floréen. "LSTM-based predictions for proactive information retrieval." *arXiv preprint arXiv:1606.06137* (2016).
- [] Polvi, Jussi, Petri Luukkonen, Kai Nordlund, Tommi T. Järvi, Travis W. Kemper, and Susan B. Sinnott. "Primary radiation defect production in polyethylene and cellulose." *The Journal of Physical Chemistry B* 116, no. 47 (2012): 13932-13938.