Mariusz Janusz Galus

Curriculum Vitae (CV) • Work: (507) 246-6545 • mg@mgal.us • www.mgal.us

This documents my past professional experience, education, skills, awards, and interests.

EMPLOYMENT HISTORY

• State Farm Insurance/Hybrid, TX Sept 2022 – Present – Full-Time

Senior Lead Software Engineer ET Enterprise Data Enablement

Working in Data Platform & Engineering department. Lead two cross-functional teams to develop Data Production, Consumption, Governance, and Lineage solutions using AWS Redshift, Starburst, and Azure. Focus on building out and supporting the Data Lakehouse architecture.

- Worked with third party vendors, Information Security, and Risk areas to POC and introduce Starburst into State Farm. (Q4 2022)
- Developed observability, monitoring and alerting solutions for the enterprise centralized AWS Redshift cluster. (Q1 2023) _
- On-boarding and support for business areas to our enterprise AWS Data Lake and Warehouse (Q3 2023)
- Developed Terraform, and Disaster Recovery solutions for our centralized and standalone Redshift clusters. (Q1 2023+)
- Coordinating with business areas, stakeholders, producers, and consumers of strategic directions. Planning data migrations. (Q3 2024) _
- State Farm Insurance/Richardson, TX July 2017 Sept 2022 Full-Time Lead Software Engineer PCAS Innovation REDLabs ModelLifecycle Developed and supported multiple internal tools belonging to Model Management Workbench (MMW). MMW is used by business partners from multiple departments engaging in data analytics. MMW helps facilitate the Life-cycle (management, simulation, deployment, and execution) of rating and risk models across the enterprise and is used in determining insurance policy quotes. Mentored a diverse set of engineers of varying experience levels and backgrounds. Lead a team of 4 developers. Developed, socialized, and hosted an internal CTF security competition.
 - Developed the Deployment and Selection subsystems of MMW, used in analytics and operations AWS environments by hundreds of data modelers/analysts to deploy and execute thousands of model-services in Kubernetes using AWS. (MAR 2020)
 - Developed build and deployment Ci/CD pipelines for Clojure-based risk and rating models using AWS CodeBuild and ECR. Created custom _ maven plugins to deploy built code to S3 for model-developers to use said pipeline in their current development-flows. (JAN 2020)

Inherited PMA (Product-Management-Automation), the Java monolith predecessor to MMW. Developed new features for managing products, such as branching. Added to existing library of React components for PMA to expose new functionality. Implemented fine-grained authorization into PMA. (2019)

- Developed the Business-Content Unit-Testing BUSCUT Front-end and Back-end APIs, used to define tests for legacy Java-based risk and rating models. (2019)

Migrated existing on-premises solution into the cloud. Moved and refactored existing products using SpringBoot Dockerized containers running _ on our Cloudera-managed Hadoop, Kafka, and Docker tech-stack from on-prem to AWS. (OCT 2018)

- Refactored legacy Java SpringBoot applications to NodeJs/Typescript.
- Developed APIs, services, and utilities to enable and support the program-wide use of Cognitect's Datomic Clojure database. Features included a web-service that wrapped the datomic-api, libraries to facilitate data management in Datomic. health monitoring, data backup and data restoration.

Developed a change-record service for (model-simulation) teams to call from their production pipelines. This service is critical to automate the _

- internal change-record management process required for deploying any component into production environments. (2018)
- Developed Ci/CD pipelines for Jenkins in Groovy. (2017-2018)
- Developed a multi-threaded big-data log processor with Scala using Akka Actor-Model system running in Apache Spark. (2017)
- Developed system-event-generator and core-event logging libraries in Java and Scala for PCAS product teams to use in their code. (2017) _

Raytheon IIS/Garland, TX Jun 2014 - July 2017 – Full-Time

Worked on multiple programs to provide software development, integration, and maintenance solutions. Provided:

- Automated deployments & Configuration Management via CHEF
- Continuous integration and testing via Maven, Bamboo, & Jenkins
- Data persistence via Java Persistence API (JPA), Hibernate, Postgresgl & MongoDb
- UI/UX via AngularJs, HTML5 & CSS3

Web technology based solutions via WebServices, JRS, JWS, RestEasy, Jackson & Jersey

Helped build the foundation for a newly started program that will be used by future end-users and added on by engineers.

- Co-lead the initial installation, configuration and deployment of a business rules engine and framework.
- Created software configuration baselines for entire program's systems and its automated deployments.

Received a Team Achievement Award, an Individual Achievement Award, and 4 Spot Awards in recognition of my commitment.

• Raytheon/Tampa, FL Aug 2013 - Dec 2013 - Co-Op WALDO (Wireless Application in Locating Dangers through Obstacles)

Developed a Wi-Fi radio positioning system using C, C#, Python, RaspberryPi, Excel, and off-the-shelf hardware in a multi-disciplinary project provided and supervised by Raytheon in USF's capstone design (senior project) course capable of detecting movement and position within a room following Agile Scrum & Waterfall software development methodologies. WALDO ranked 2nd place in USF's department of electrical engineering's annual poster competition.

64Labs/Tampa, FL May 2013 - July 2013 - Internship ClipGet (Data Mining, Data Persistence, & Automation Solution) Developed both front and back-end using HTTP, JSON, Javascript, Nodejs, MongoDB, Mongoosejs, HTML5, CSS3, and AppFog PaaS for a data mining solution which scrapes LinkedIn user and company profile data and automatically fills HTML forms within the Insightly small business CRM (Customer Relationship Management) tool via a custom built web overlay interface, increasing overall productivity of management.

• B & M Flooring Inc/Clearwater, FL Dec 2007 - Jan 2008 - Volunteer

Web Developer/Installation Technician

Software Engineer GSP GDTS NCL FIS

Developed business website in WordPress CMS (Content Management System). Configured WordPress integration with online Google services (mail, maps, photos, docs).

ADDITIONAL EXPERIENCE

• Database Design/Tampa, FL Sep 2012 - Nov 2012 - Academic Project

Developed both front and back-end using HTTP, JSON, Javascript, Nodejs, MongoDB, Mongoosejs, HTML5, CSS3, and AppFog PaaS in a Turntable.fm smart bot which takes advantage of a highly scalable key-value database for storing user and song statistics as well as administrative configuration settings for USF's Database Design final project. The bot provides management, statistics, 3rd party communication, and fun features by moderating Turntable.fm rooms, playing music, and interacting with other users in-room with trivia, conditional statements, and out-room via social-media (Twitter).

• WCSC/Tampa, FL Aug 2011 - 2013 - Security Organization

Participated in multiple CTF (Capture the Flag) cyber-security competitions as well as sponsored local CTF's, weekly-presentations, workshops, challenges, and other events for novice members. WCSC has ranked both nationally and internationally in big name CTF's such as DEFCON, CSAW, and more.

• YES SECME/Clearwater, FL (Certificate) Sep 2002 - Apr 2003 - STEM Program Participated in the Youth Engineering Society, a pre-college STEM program sponsored by SECME (Southeastern Consortium of Minorities in Engineering) which provided the opportunity to design, build, and compete alongside a team in the FIRST® national robotics competition.

SKILLS

Languages Platforms	Typescript, Javascript, Java, Clojure, Scala, Python, TerraformHCL, Ruby, C, C++, Bash, Zsh, HTML, CSS, VimScript, Verilog AWS, Azure, Cloudera, Kubernetes, Docker, RHEL, CentOS, Linux, Unix, Mac, Windows, VMWare, VirtualBox, Cygwin, Rasbian, Debian, KDE, Gnome
Frameworks	Hadoop, JavaEE, EJB, JTA, JPA, CDI, Maven, Spring, Hibernate, Drools, Kie, Jira, Confluence, Stash, git, ClearCase BitBucket, Bamboo, Jenkins, RedMine, SAFeScrumXP, Eclipse, Intellij, .NET, MonoDevelop, VisualStudio, NetBeans, MVC/MVW, Expressjs, Angularjs, DataTables, JQuery, ReactJs
Databases	DynamoDB, Redshift, Datomic, SQL, Postgresql, NoSQL, MongoDB, Mongoosejs
Servers	NodeJs, Jetty, JBoss, Wildfly, Tomahawk, Glassfish
Networking	TCP/IP, UDP, SSH, ftp, Wireshark, nmap, scp, winscp, xming
Architecture	Lambda, x86, 68k, MIPS, PicoBlaze
Communications	GraphQL, GRPC, SOAP, ReST, JMS, RS-232, SPI, PS/2, 802.11, OFDM, I2C, RFC4627/ECMA-404, Ethernet, USB
Graphics	DrawlO, PlantUML, C4Model, GraphViz, Pillow, tk, Gtk, Gtk#, yEd, Maya, Blender, Photoshop, Sony Vegas, Illustrator, Flash
Audio	Propellerhead Reason, Ableton Live, Audacity
FPGA Design	Spartan, Vertex, Xilinx ISE, PicoBlaze ISA
EDA IC Design	CMOS-VLS IC Design, Cadence Virutoso, Synopsys Explorer, Logisim, Electric, LTspice, hspice, ISim
Software	OllyDbg, GDB, IDA Pro, Microsoft Office (Word/Excel/Powerpoint/Access)
Other	TS/SCI, English, Polish, Spanish, Chinese, Patois, Calligraphy

EDUCATION

• University of South Florida/Tampa, FL 2008-2013 BSc Computer Engineering & BSc Computer Science GPA 3.41

AFFILIATIONS

- IEEE Florida West Coast Chapter (mg@ieee.org)
- Whitehatters Computer Security Club (www.whitehatters.org)
- Phi Eta Sigma·Mortar Board·NSLS·NSHSS

AWARDS & CERTIFICATES

- AWS Certified Solutions Architect Associate
- AWS Certified Cloud Practitioner
- edX Verified Certificate for Blockchain Technology
- OpsCode Chef Certificate of Awesome (Chef Fundamentals Workshop) (2008)
- Scaled Agile Academy SAFe ScrumXP Certified
- YES SECME Certificate of Completion
- Raytheon Team Achievement Award "In recognition of my ongoing commitment to outstanding job performance."
- Raytheon Individual Achievement Award "Developed automated software deployments filling a critical need on the program."
- Raytheon Spot Award "Took fantastic initiative to ensure that Sprint 1 tasks were finished on time."
- Raytheon Spot Award "For staying late to accommodate a last-minute metric report need."
- Raytheon Spot Award "For taking the time and energy to teach me."
- Raytheon Spot Award "Support for Ozone deployment and configuration greatly added to the success of the Integration effort with Layer 7."
- Golden Rule Award

ttfmBot (turntable.fm Bot)

FIRST® Robotics League Competition

Whitehatters Computer Security Club www.whitehatters.org