

Background

Experience Summary

Extensive application software development experience

I imagine, architect, design, prototype, develop, test, deploy, support, and maintain applications. These applications have included internal corporate tools/applications, and products for external customers. The scope has encompassed small scripts and macros, group level applications, enterprise application systems, Microsoft Windows features, a global network traffic control system, enterprise application log data aggregation/alerting, and cloud data processing. My current focus is application/tools development based mostly in Microsoft C#/.NET. and Amazon Web Services (AWS).

Senior DevOps Engineer

[SAP Concur](#)
Bellevue, WA, USA

Developed software applications and solutions

(Jul 2022 – present)

- Developed software for Identity and Access Management - Governance Risk and Compliance.
- Key skills applied were [C#/.NET](#), [Amazon Web Services \(AWS\)](#), [web API](#) execution.
- Maintained an AWS data processing pipeline leveraging C# [Lambda functions](#), [DynamoDB](#) storage.
- Maintained a [WPF](#) desktop GUI that displays data described above.
- The automation I provided significantly improved the work accomplished by my coworkers, saving them significant efforts and time performing their ongoing tasks.
- Developed automation applications working with [Jira](#), [Okta](#), [ServiceNow](#), and [Azure AD web APIs](#).
- Continually innovated, reimagined solutions, invented new solutions, and improved the applications I developed.

Software Dev Consultant

[Murphy & Associates](#)
Kirkland, WA, USA

Developed software applications and solutions

(Jan 2021 – Jul 2022)

- Developed software for Identity and Access Management - Governance Risk and Compliance at [SAP Concur](#).
- Key skills applied were [C#/.NET](#), [Amazon Web Services \(AWS\)](#), [web API](#) execution.
- Conceived, developed, and delivered an AWS report data processing pipeline leveraging C# [Lambda functions](#), [Simple Queue Service](#), and [DynamoDB](#) storage.
- Conceived, developed, and delivered a [WPF](#) desktop GUI that displays data described above.
- The automation I provided significantly improved the work accomplished by my coworkers, saving them significant efforts and time performing their ongoing tasks.
- Developed automation applications working with [Jira](#), [Okta](#), [ServiceNow](#), and [Azure AD web APIs](#).

Sr Software Developer

[Plex Systems](#)
Troy, MI, USA

Developed DevOps software applications and solutions

(Jul 2017 – Dec 2020)

- Plex Systems provided Manufacturing [ERP](#) and [MES](#) SaaS Solutions.
- Member of the DevOps team within the Cloud Operations organization, providing applications and tooling to improve the productivity and experiences of Plex product developers.
- As a part of a [CI/CD](#) modernization initiative, I helped develop a system called Deployment Source of Truth. This system offered a single web page showing the currently deployed versions for all Plex subsystems, across multiple tiers: dev, test, int, prod. It also offered information about recent [Azure DevOps](#) deployments for each system, including log data showing successes and failures.
- For Deployment Source of Truth, I developed a data processing pipeline with Azure to collect and send data from [Azure](#) to a [neo4j](#) data store via a [GraphQL Web API](#). I wrote HTTP-triggered [Azure functions](#) that stored [blob data](#), then inserted [queue messages](#) pointing to the blobs. A C# [.NET Core](#) console application then polled that queue to initiate reading the JSON blobs, extracting select data, then sending it to [GraphQL](#) with HTTP calls.
- Developed [Azure DevOps pipeline](#) automation to build and deploy the code described above.
- Developed monitoring and alerting within [Microsoft Azure](#). Authored [Kusto queries](#) for alerting and reporting. Created [Logic Apps](#) that created then emailed daily reports. Developed [C#/.NET](#) utilities to promote alert components for releases. Developed C# Azure [Functions](#) to enable alert integration with [OpsGenie](#) via [web API](#).
- Performed system administration in creating/maintaining an [Elasticsearch](#)-based system that collected application log data for analysis and alerting. This solution employed the [Elastic Cloud Enterprise](#) offering, including an Elasticsearch store, [Logstash](#) data ingestion, and [Kibana](#) visualization. Authored Logstash data processing to shape data for efficient querying.

Software Engineer

Microsoft
Redmond, WA, USA

Developed features for Windows Universal Store Core Engineering

(Jun 1993 – Jul 2017)

- Last role was developing Windows features for controlling network bandwidth consumption originating from [Windows Updates](#) and [Universal Windows Platform app](#) updates, assuring smooth delivery of the updates, as well as major Windows releases to consumers world-wide.

- Before that was DevOps work for Windows Update, developing features for Microsoft.com, developing IT applications, testing for Word, and developing applications on a Sales Operations team.
- Most recent key skills used were [C#/.NET](#), [SQL Server](#), and [SQLCLR](#).

Software Engineer

[bLoyal](#)
Redmond, WA, USA

Developed cloud-based data processing and reporting (Feb 2017 – May 2017)

- [bLoyal](#) was a customer loyalty program service provider, hosted entirely with [Microsoft Azure](#).
- Worked with the company founder to develop a log viewer system that aggregated [JSON](#) log data sent to an [Event Hub](#), performed some data transformations, then sent the data to [Azure Monitor Log Analytics](#) for querying. An [Azure Stream Analytics](#) job was leveraged to pull data from the Event Hub, then a custom [WebJob](#) service transformed the [Azure blob data](#) before sending it to Log Analytics. The result was highly searchable, centralized log data, instead of numerous scattered individual log files, enabling faster data analysis.
- Developed a reporting solution using [U-SQL](#) to query data in [SQL Azure](#), writing data to a [Data Lake](#) file, which then was viewed via [PowerBI](#). This solution helped bLoyal collect monthly billing data.

Programmer Analyst

[Boeing](#)
Renton, WA, USA

Architected, designed, and coded IBM mainframe applications (1984 – 1993)

- My last position at Boeing was in Executive Offices Computing, an IT organization providing Windows-based application software for commercial airline customers and internal Customer Engineers.
- I developed a database application to provide airline customers information they needed on the status of their airplanes being manufactured by Boeing. Dial-up FTP communication was used to distribute data world-wide. This application greatly helped airline customers by providing daily updates instead of monthly paper reports.
- Before that was many years of [IBM mainframe](#) application development, providing software used to report monthly financial statements for Boeing's commercial division. I developed database applications using [COBOL](#), [DB2](#), and [IMS](#).

Education

[Coursera](#)
[online](#)
[City University](#)
[Bellevue, WA, USA](#)
[Green River Community College](#)
[Auburn, WA, USA](#)
[Boeing Computer Services](#)
[Tukwila, WA, USA](#)

Preparation and further evolving my career in software applications development.

[Machine Learning \(Stanford\)](#), July, 2013.

Bachelor of Science in Computer Information Systems, 1991.

Associate of Applied Science in Electronics Technology, 1983.

Business Programmer Certificate, 1984. Learned COBOL and IMS.