SUNIT S. CARPENTER, MSC

Principal Data Scientist & Solutions Architect

Henderson, Nevada

Telephone: (305) 753-5289 | E-mail: sunitc@microsoft.com

PROFESSIONAL SUMMARY

Accomplished Principal Data Scientist and Microsoft Solutions Architect with 25+ years of experience delivering data-driven solutions across enterprise software, government, and defense sectors. Proven expertise in machine learning, statistical analysis, and transforming complex business challenges into actionable insights through advanced analytics. Demonstrated success in customer-facing consulting, project delivery, and building scalable data science solutions that drive business impact. Deep Microsoft ecosystem knowledge with extensive SharePoint, Azure, and cloud computing experience.

CORE COMPETENCIES

Data Science & Analytics: Machine Learning, Statistical Modeling, Predictive Analytics, Big Data Processing, Experimental Design

Programming & Tools: Python, R, SQL, C#, PyTorch, TensorFlow, Keras, Hadoop, Spark, Azure ML Studio

Microsoft Technologies: SharePoint, Azure Cognitive Services, Azure SQL, Power BI, .NET, Office 365

Business Impact: Customer-Facing Consulting, Project Management, Stakeholder

Communication, Solution Architecture

Specialized Skills: Records Management, Document Classification, Anomaly Detection,

Automated Content Analysis

PROFESSIONAL EXPERIENCE

MICROSOFT CORPORATION | SEPTEMBER 1999 - PRESENT

DOMAIN DELIVERY ARCHITECT | Ft. Lauderdale, FL | *March 2019 – Present*

- **Lead data-driven solution delivery** for enterprise clients, applying statistical techniques and machine learning models to solve complex business problems
- Manage end-to-end project delivery including data analysis, predictive modeling, and statistical reporting for customer-facing initiatives

- Analyze large-scale structured and unstructured datasets to identify trends, optimize
 performance, and drive strategic decision-making
- Collaborate with cross-functional teams including product management, engineering, and business stakeholders to translate business requirements into data science solutions
- Deliver customer impact through advanced analytics, resulting in measurable improvements in system performance and user experience

PRINCIPAL CONSULTANT | Ft. Lauderdale, FL | January 2012 - February 2019

- Architected and delivered data-intensive applications for non-profit grant management system serving NYC Comptroller's office
- Applied statistical analysis and predictive modeling to optimize alumni collaboration platform for MIT Sloan School of Business
- Managed project budgets and timelines while ensuring on-time delivery of complex data science initiatives
- Developed advanced analytics solutions that improved decision-making processes for educational institutions

SENIOR CONSULTANT II | Ft. Lauderdale, FL | January 2008 – January 2012

- Built world's largest education portal platform (at the time) leveraging big data analytics for Miami-Dade County Public Schools
- **Implemented machine learning models** for student performance prediction and educational outcome optimization
- Created data-driven public safety solutions supporting Super Bowl 2010 security operations with Miami-Dade Police Department
- Delivered measurable business impact through advanced analytics and statistical modeling across multiple large-scale projects

SENIOR CONSULTANT I | Ft. Lauderdale, FL | *January 2006 – January 2008*

- Developed predictive analytics platforms for Pennsylvania Attorney General office collaboration systems
- Applied statistical techniques to optimize student-teacher interaction patterns and educational outcomes
- Built machine learning solutions for law enforcement search and discovery systems with Orange County Sheriff's Department

CONSULTANT II | Los Angeles, CA | *January 2004 – December 2006*

- **Implemented large-scale data processing systems** for Puerto Rico eGovernment initiative serving millions of citizens
- Optimized performance analytics for Accenture.com portal launch using advanced statistical methods
- Managed structured and unstructured data across multiple government service platforms

CONSULTANT I | Milwaukee, WI | January 2002 – January 2004

 Applied data science techniques to optimize BestBuy.com eCommerce platform, improving product catalog and checkout analytics

- Developed real-time analytics solutions for Korea Telecom's 2002 World Cup broadcasting platform using Microsoft Media Services
- Delivered customer-facing solutions that enhanced user experience through data-driven recommendations

UNITED STATES DEPARTMENT OF DEFENSE, US SOUTHERN COMMAND | FEBRUARY 2013 – PRESENT

PRINCIPAL CONSULTANT AND DATA SCIENTIST

- Lead machine learning initiatives leveraging Azure Cognitive Services to automatically classify and sort millions of classified documents
- Develop anomaly detection models using advanced statistical techniques to identify unauthorized web server access patterns
- **Implement automated content analysis** using natural language processing and machine learning for metadata tagging systems
- Drive data-driven decision making for accountability, contracts management, and identity management applications
- Successfully migrated multiple on-premises systems to Microsoft Azure Cloud using data science best practices for optimization

THE WHITE HOUSE, WASHINGTON, DC | AUGUST 2015 – PRESENT

PRINCIPAL DATA SCIENTIST AND ARCHITECT

- Lead data science initiatives for SharePoint records management solutions supporting
 White House Communications Agency
- Optimize Presidential Travel Portal using predictive analytics and statistical modeling for POTUS and VIP travel operations
- **Develop automated machine learning solutions** for records management compliance and schedule change detection
- Apply experimental design principles to improve government operational efficiency through data-driven insights

EDUCATION

UNIVERSITY OF CALIFORNIA – UC BERKELEY | 2022 Master of Science – Data Science and Machine Learning

MARQUETTE UNIVERSITY, MILWAUKEE, WISCONSIN | 1999 Master of Science – Electrical Engineering

MARQUETTE UNIVERSITY, MILWAUKEE, WISCONSIN | 1994 Bachelor of Science – Biomedical Engineering

CERTIFICATIONS

- Top Secret with Sensitive Compartmented Information (TS/SCI) Clearance | 2012 Present
- White House Clearance Yankee White | 2015 Present
- Microsoft Certified Azure Architect | 2015
- Microsoft Certified Solutions Developer | 2007
- Microsoft Certified Technology Specialist SharePoint | 2007

KEY ACHIEVEMENTS

- **US Southern Command Security Division** Built innovative machine learning solution detecting security breaches by Red Team (2015)
- **US Southern Command** Developed award-winning automated records management solution using advanced analytics (2015)
- Microsoft Circle of Excellence Award Presented by Steve Ballmer, CEO for outstanding data science contributions (2007)
- Multiple Microsoft Awards Outstanding contributions in customer service and datadriven solution delivery (1999-Present)

TECHNICAL EXPERTISE

Programming Languages: Python, R, SQL, C#, C/C++, PowerShell, Visual Basic

Machine Learning Frameworks: PyTorch, TensorFlow, Keras, Scikit-Learn, Azure ML Studio

Big Data Technologies: Hadoop, Spark, MapReduce, Azure Data Factory

Statistical Tools: R Studio, Jupyter, VS Code, Power BI, Tableau

Cloud Platforms: Microsoft Azure, Azure Cognitive Services, Azure SQL Database

Microsoft Stack: SharePoint, Office 365, .NET, SQL Server, BizTalk Server