

YOON-SUK CHANG

British Columbia, Canada V3K 5T4

Tel: [778.987.4144](tel:778.987.4144)

Email: trustuu@gmail.com

LinkedIn: www.linkedin.com/in/jamesyschang

Web site: james.biocloud.pro

Yoon-Suk Chang, James Chang, James YS Chang, YS Chang all are the same person.

SOFTWARE ENGINEER

Develop High-Performance Solutions to Optimize Efficiency, Customer Experience & Business Growth

Results-driven professional with extensive experience in software development, system architecture and cloud services. Skilled at modernizing legacy systems, designing scalable APIs and leading seamless migrations. Known for effectively bridging gap between software development and infrastructure management to foster innovation, improve performance and ensure reliability in enterprise environments.

- **Software Development & Engineering**
- **System & Database Architecture**
- **API Design & Integration**
- **Scrum / Agile Methodologies**
- **Cloud & On-Premise Migrations**
- **Team Leadership**
- **Provisioning & Automation**
- **IT Service Management & Support**
- **Data Modeling**
- **Proficient in English (Business-Level) and Korean**

TECHNICAL SKILLS

- **Software Development & Architecture:** Expert in C# (.NET Core, ASP.NET, WCF, REST API & MVC); Experienced in Angular, Next.js, React & React Native; Database Design with SQL Server, Google Firebase; Version Control: GitHub & Bitbucket, Python, LangChain, RAG (Retrieval-Augmented Generation)
- **Infrastructure & Systems Engineering:** Windows Server Administration, Active Directory (50,000+ Users), SQL Server (Clustering, Mirroring, High Availability) & PowerShell Scripting
- **Cloud & Collaboration Tools:** Microsoft Azure (Office 365, Azure AD & Migration), Microsoft Exchange Server (2003 - 2019, DAG & Clustering), Microsoft SharePoint (2003 - 2013 & Multi-Tenancy) & Hosted Messaging & Collaboration (HMC 3.5 & 4.5)

PROFESSIONAL EXPERIENCE

Company: [NTIRETY](http://NTIRETY.com),

Location: Vancouver, BC

Title: Software Engineer, Engineering Team

Working Period: **2022 - 2025**

Developed and maintained high-performance backend and frontend solutions to streamline customer onboarding, service management and system integrations. Led database management, designed scalable APIs and collaborated with cross-functional teams to ensure smooth software development and deployment within Agile environment.

- Developed provisioning engine using C# and SQL Server, optimizing customer onboarding and reducing manual processes.
- Built customer management portal with Angular, enabling real-time server and service monitoring.
- Designed and implemented RESTful API, improving interoperability between internal and external systems.
- Project: Customer System Management Portal
 - This portal is designed for internal employees to manage all customer systems. It is built using Angular and integrates with various backend RESTful APIs.
 - Repository: GitHub, Team Foundation Server (TFS) for version control.
 - Agile Framework: Actively participated in Agile Scrum ceremonies (Sprint Planning, Daily Stand-ups, and Retrospectives) to ensure timely delivery of project milestones
 - Language: Angular

- Project: Provisioning System Engine
 - The provisioning system serves as the core engine for provisioning customer systems, including virtual machines, load balancers, firewalls, and more. This engine is seamlessly integrated with the backend RESTful APIs of various systems, such as VMware ESXi, BigFix, and Salesforce CPQ & Billing.
 - The Provisioning Engine consists of a build process, tasks, and task data. Each process is composed of multiple tasks, with the flexibility to modify the build steps as needed. In case of an error at any step, the process can be resumed without starting from the beginning. MSMQ is utilized to push the next task in the sequence.
 - Repository: GitHub, GitLab, and Team Foundation Server (TFS) for version control.
 - Agile Framework: Actively participated in Agile Scrum ceremonies (Sprint Planning, Daily Stand-ups, and Retrospectives) to ensure timely delivery of project milestones
 - ORM: Entity Framework
 - Language: C#

Company: [NTIRETY](#),

Location: Vancouver, BC

Title: Senior Windows System Architect, Managed and Cloud Group

Working Period: **2021 - 2022**

Managed and optimized Microsoft-based enterprise IT environments, including Office 365, Azure, Exchange, Active Directory, SharePoint and SQL Server. Provided advanced troubleshooting, system administration and disaster recovery support.

- Led Office 365 and Azure AD migration, improving cloud integration and authentication.
- Administered Microsoft Exchange Messaging System, ensuring seamless email communication.
- Enhanced Active Directory and SharePoint management, enhancing security and accessibility.
- Resolved high-priority system issues through efficient ticketing and escalation procedures.
- Contributed to disaster recovery planning and testing, strengthening business continuity.

Company: [HOSTWAY CORPORATION](#),

Location: Vancouver, BC

Title: Senior System Architect and Sr. Software Developer, Advanced Products Group

Working Period: **2014 - 2021**

Led modernization of enterprise cloud services by upgrading legacy web services, designing provisioning APIs and optimizing Microsoft Exchange, SharePoint and Active Directory systems.

- Project: Upgrade Hosted Messaging and Collaboration Provisioning System to new version.
 - Developed Exchange 2013 API using C#, REST API and WCF services, enhancing automation and efficiency.
- Project: Developed Exchange 2010 transport agent.
 - Exchange 2010 transport agent for sender based routing utilizing C#, WCF
 - Optimized and maximized delivery performance utilizing WCF service to cache routing information.
 - Ensuring careful development of Transport Agent not to disrupt mail delivery performance to over 50,000 mailboxes.
- Project: Tire 2 support management portal.
 - Modernized Tier 2 support applications using C#, ASP.NET Core and Angular, improving service and product management.
- Led Exchange migration projects, including Exchange 2003 to 2007, Exchange 2007 to 2010 and Hostway-to-Intermedia mailbox migrations, ensuring seamless transitions and minimal service disruption.
- Executed large-scale infrastructure migrations, relocating Exchange, SharePoint and Active Directory from Chicago to Tampa.

Company: [HOSTWAY CORPORATION](#),

Location: Vancouver, BC

Title: Senior System Architect and Collaboration Service Manager, Advanced Products Group

Working Period: **2011 - 2014**

Managed team of system engineers to operate and maintain collaboration services, including Exchange, SharePoint and Blackberry platforms.

- Project: Upgrade Hosted Messaging and Collaboration Provisioning System to new version.
 - Led Exchange 2010 and SharePoint 2010 shared service project, designing multi-tenant architecture with DAG geo-cluster and RBAC-based ECP customization.
 - Developed provisioning APIs using C#, WCF and REST API, automating service provisioning across Exchange, SharePoint and Blackberry platforms.
 - Built Tier 2 support applications with C#, ASP.NET and PowerShell, streamlining service and product management.
- Oversaw day-to-day operations and system maintenance, ensuring high availability and performance of collaboration services.

- Enhanced service provisioning efficiency through custom API integrations with billing and frontend site control applications.

Company: **HOSTWAY CORPORATION**,

Location: Vancouver, BC

Title: System Architect, Advanced Products Group

Working Period: **2007 - 2010**

Designed and implemented provisioning and migration solutions for hosted collaboration services, focusing on Active Directory synchronization, Exchange migrations and data archiving.

- Project: Hosted Messaging and Collaboration Provisioning System
 - Developed Provisioning API using C# as web service, streamlining service automation.
 - System to be provisioned: Active Directory, Exchange, Sharepoint
- Led implementation of Hosted Active Directory Sync service, integrating customer Active Directory environments using Microsoft IIFP (Identity Integration Feature Pack).
- Designed and executed migration process and API for Exchange 2003 to Exchange 2007, ensuring seamless transition.
- Launched archiving service integrated with Global Relay Partner Service, improving compliance and data retention.

PROFESSIONAL EXPERIENCE

AI Projects

- Project: Document GPT
 - This application is designed to process and analyze personal documents, leveraging advanced language models to generate responses. It is built using LangChain, Python, and Streamlit, providing an efficient and interactive platform for document reading and response generation.
 - This App is built based on Map Reduce, RAG (Retrieval-Augmented Generation)

ADDITIONAL RELEVANT EXPERIENCE

Company: **MICROSOFT CORPORATION**,

Location: Seoul, Korea

Title: Solution Specialist, Unified Communication in Enterprise & Partner Group

Delivered telecommunications industry solutions.

- Consulting and providing business value and technical guidance for Microsoft Unified communications. The solution consisted of integrating Exchange & Office Communications Server.
- Build up UC business scenario and local partner for integration with Nortel, CISCO, Avaya, Alcatel, Ericsson, Samsung & LG
- Consulting and providing HMC (Hosted Messaging & Collaboration) and EVS (Enhanced Voice Service using Sylantro) business scenario and technical guide.
- Delivery of Industry Solution to customers with Microsoft Platform as solutions specialist in Communication industry.

Company: **MICROSOFT CORPORATION**,

Location: Seoul, Korea

Title: Technology Specialist, Enterprise & Partner Group

- Provides Exchange, SharePoint and SQL Server technical guidance to customers in the technology adoption process and act as technical or business resource for broad and complex issues on enterprise accounts.
- Proactively works to circumvent roadblocks to adoption
- Customer Scenario Examples
 - Groupware & Portal Project Proposal & Architecture Guide for LG Insurance Company using Exchange 2000 for messaging, Local Approval solution for approval system & Plumtree for portal.
 - Groupware Project Proposal & Architecture Guide for Dongbu Insurance Company using Exchange 2000.
 - Messaging Project Architecture guide for Samsung Tesco Co, Ltd using Exchange 2003.

Company: **DAELIM INFORMATION & TELECOMMUNICATION CO., LTD.**,

Location: Seoul, Korea

Title: Project Architecture Leader and Senior Programmer, Knowledge Management System (KMS) Solution Team

Consulted and developed solutions for customers onsite.

- Project Support through Architecture Design & System Troubleshooting(July, 2001 – December, 2001)
 - Groupware & Approval Project Architecture Design for Hyundai Motor based on Exchange 2000 and SQL Server 2000; Hyundai Motor is the biggest motor company in Korea, User numbers are over 40,000
 - Groupware Project Architecture Design for Hanjin Shipping Company based on Exchange Server 2000 & SQL Server 2000.
- ShinHan Bank Project (February 2001 – June, 2001)
 - Analyzing Shinhan Bank requirement and designing exchange 2000 architecture for their messaging system. Customizing Exchange OWA.
- LG Securities Project (October, 2000 – January, 2001)
 - Analyzing LG Securities Approval Process and designing system architecture. Implementing process using workflow solution with ASP, Visual Basic on IIS 5.0.

Company: **DAELIM INFORMATION & TELECOMMUNICATION CO., LTD.,**

Location: Seoul, Korea

Title: Architect and Senior Programmer, KMS R&D Team

Led and created workflow product.

- Migration of homegrown workflow solution named “SIGMA Workflow” based on Exchange 5.5 to SQL Server 2000 using ASP on IIS, Visual Basic. Re-architecture SIGMA Workflow Solution from message based workflow to database workflow.
- Developing homegrown workflow solution named “SIGMA Workflow” based on Microsoft Exchange 5.5 with Visual C++, Visual Basic, ASP which adheres to WfMC Standard, Designed on UML using Rational Rose

Company: **DAELIM INFORMATION & TELECOMMUNICATION CO., LTD.,**

Location: Seoul, Korea

Title: Programmer, Engineering Project Team

Developed Procurement Management Control System.

- Developing PMCS (Procurement Management Control System) based on Web with ASP, The technology which is Component Based like DCOM and ActiveX with Visual Basic 6.0.
- Analyzing the procurement business rule of Daelim Engineering Company, Designing relational database model based on IDEF 0(Integration Definition For Information Modeling) and IDEF 1X(Integration Definition For Function Modeling), Coding with Delphi 3.0
- Making Construction Material Control System Programs that manipulate large data set with Visual C++ and Oracle Pro*C pre-compiler to improve access speed.

EDUCATION & CERTIFICATIONS

- **Bachelor of Science (BS)**, Mathematics, Minor in Computer Science, Han Nam University Daejeon, Korea
- Microsoft Certified: Azure Solutions Architect Expert, 2023
- AZ-305: Designing Microsoft Azure Infrastructure Solution
- AZ-303: Microsoft Azure Architect Technologies
- Microsoft Certified IT Professional (MCITP) - Windows Server, 2008
- Microsoft Certified Technology Specialist (MCTS) - Exchange Server 2010, Active Directory, Network Infrastructure
- MCP - Web and Windows Application Development (VB.NET, .NET Framework, SQL Server)
- View Full Microsoft Certifications: <https://learn.microsoft.com/en-us/users/jamesyschang-9046/transcript/73j9rhw636161j?tab=credentials-tab&source=docs>