











VIRTUAL DB2 USER GROUP

NEWSLETTER 9 | APRIL 2024

Virtual Db2 User Group Presentation

Enhancing Db2 Schema Management Through Automation

Toine Michielse is a solutions architect for *Broadcom*. In March, Toine presented the detailed session *A day in the life of Db2 for zOS schema*, emphasizing the need for modernization in mainframe interactions.

From the beginning of his presentation, when he referenced Bob Dylan's song *The Times They Are A-Changin*, Toine underscored the need for adapting to new technologies and methodologies in the mainframe world. He discusses the traditional approach to schema development and highlights the shift towards agile methodologies, leading to more frequent iterations in the development cycle. Toine emphasizes the importance of automation and integration of DevOps tools like Git, Jenkins, and Ansible for optimizing the development process and reducing the burden on scarce resources like skilled DBAs.

Process orchestration (Jenkins)

• Function: automated process execution

• Jenkins is open source, widely used, distributed architecture, off platform

• Repeatable actions can be easily executed

• "the butler" getting tasks done according to your order

• Known for pipelines consisting of one or more consecutive steps (stages)

• Highly extendable. Large selection of extensions available

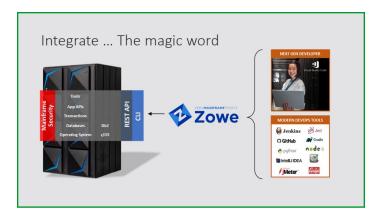
• Strong integration with

• Git(hub)

• ServiceNow, Jira, Email, Slack etc., ...

Using detailed pipeline charts, Toine explored schema management and how it can benefit organizations in terms of efficiency, productivity, and collaboration between developers and DBAs.

The traditional approach to Db2 schema management often involved manual interventions, lengthy design sessions, and frequent back-and-forth interactions between developers and DBAs. This process, while essential for ensuring accuracy and consistency in schema design, could be time-consuming and prone to errors. However, by leveraging automation tools such as Jenkins, Ansible, and Zowe, organizations can revolutionize their schema management practices.



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NEXT VIRTUAL MEETING | May 21, 2024

Can Db2 for z/OS be hacked?

In an era where cybersecurity threats loom large, safeguarding your Db2 for z/OS system is paramount. This session delves into the vulnerabilities that might be inherent in Db2 environments and provides actionable insights to fortify your defenses.

The presenter opens with a resounding affirmation: "Can Db2 be hacked? Yes, sure it can." However, the answer doesn't stop there; it's contingent on the adequacy of security measures in place. This comprehensive exploration aims to equip attendees with a deeper understanding of potential breaches and proactive strategies to mitigate risks.



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Enhancing Db2 Schema Management Through AutomationContinued

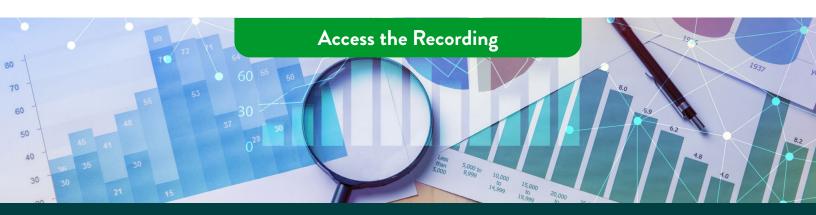
Automation enables developers to self-provision schema changes, execute pre-change tests, and deploy schema modifications with minimal manual intervention. By integrating source code management systems like Git, developers can easily track changes to the schema, collaborate effectively, and ensure version control across different environments. This streamlined approach not only accelerates the development process but also reduces the dependency on DBAs for routine schema alterations.

One of the key benefits of automating Db2 schema management is the seamless integration of tasks across the development lifecycle. Developers can initiate schema changes, run tests, and deploy modifications through automated pipelines, reducing the need for manual intervention and enhancing the overall efficiency of the process. This approach fosters a collaborative environment where developers and DBAs can work in tandem to ensure

the stability and performance of the database schema.

Furthermore, automation empowers DBAs to focus on high-value tasks such as performance tuning, optimization, and strategic planning, rather than being bogged down by routine schema management activities. By automating test executions, schema deployments, and performance testing, organizations can improve the reliability and scalability of their Db2 environments, leading to enhanced productivity and operational excellence.

In conclusion, Toine Michielse's presentation sheds light on how modern tools and methodologies can streamline schema development processes, enhance productivity, and adapt to the changing demands of the mainframe industry. With automation at the forefront, organizations can unlock new levels of agility, productivity, and innovation in their Db2



















About the Virtual Db2 User Group

The Virtual Db2 user group is an independently-operated vendor-neutral site run by and for the mainframe Db2 user community. This is a mainframe Db2 information website, not in any way related to, sponsored, or approved by IBM, which is the legitimate owner of the trademark, and any use of the mark in the URL or the body of the site is for information, education, and opinion expression purposes. The Virtual Db2 user group was established as a way for individuals using IBM's Db2 for z/OS database to exchange information, learn new techniques, and advance their skills with the product. Anyone with an interest in Db2 for z/OS is welcome to join the Virtual Db2 user group and share in the knowledge exchange.

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