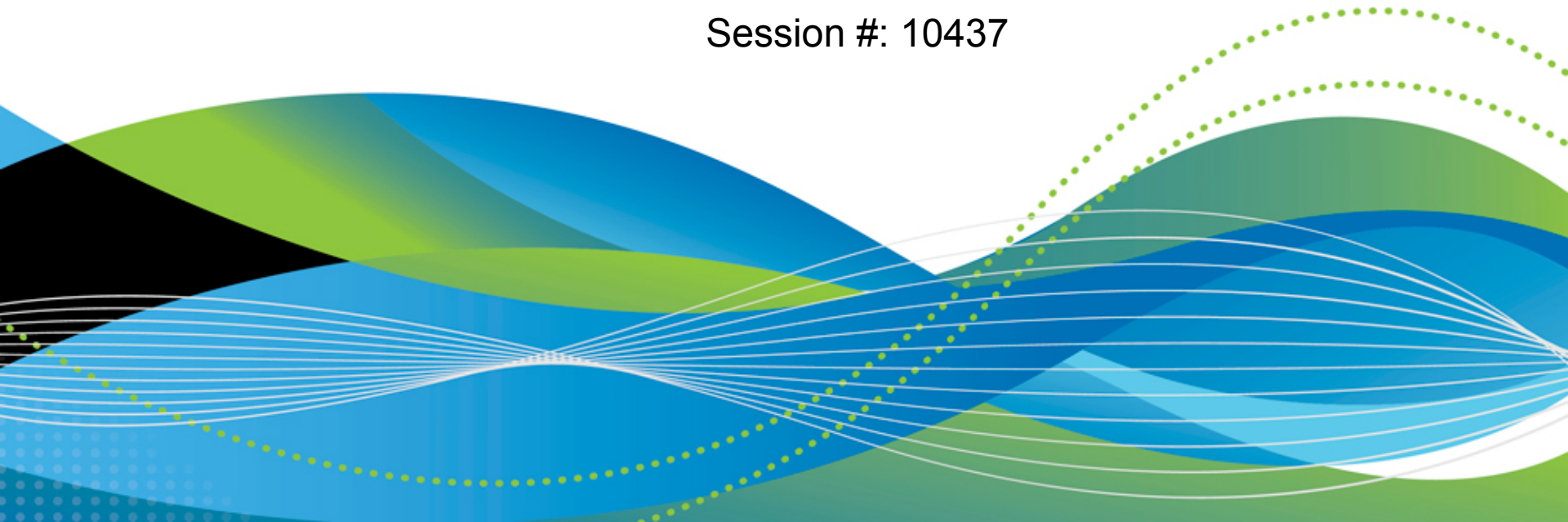# A System z Developer's Journey Through the Application Lifecycle

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IBM

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Session #: 10437

Disclaimer

Scenario

JK Enterprises has a business need to provide to make a quick update to an existing application and work on a web front end

IT scenario is:

- Establish a requirement

- Break the requirement into working tasks, plan and assign them

- Execute on the tasks defined ensuring a level of quality before promoting it to the next stage

- Promote the changes to final test

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Products to be demonstrated

Collaborative Lifecycle Management (CLM)
- **Rational Team Concert (RTC)**
- **Rational Requirements Composer (RRC)**
- Rational Quality Manager

Rational Developer for System z (RDz)

Rational Developer for System z Unit Test (RDz UT)

Rational Team Concert: Workbench for Collaborative Lifecycle Management

A robust, extensible solution for analysts, developers and quality professionals

Rational Developer for System z
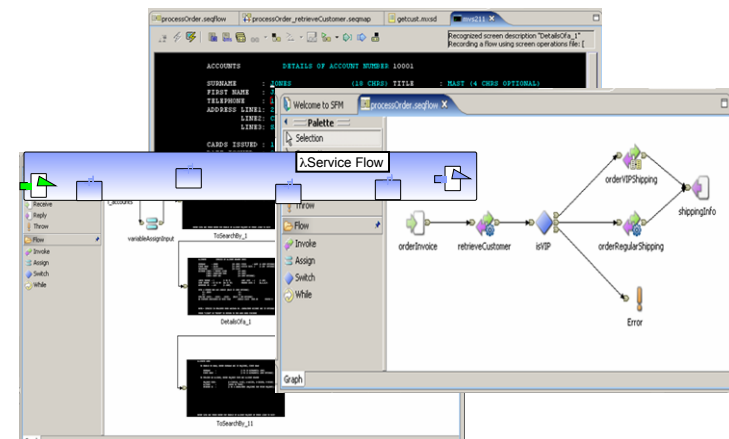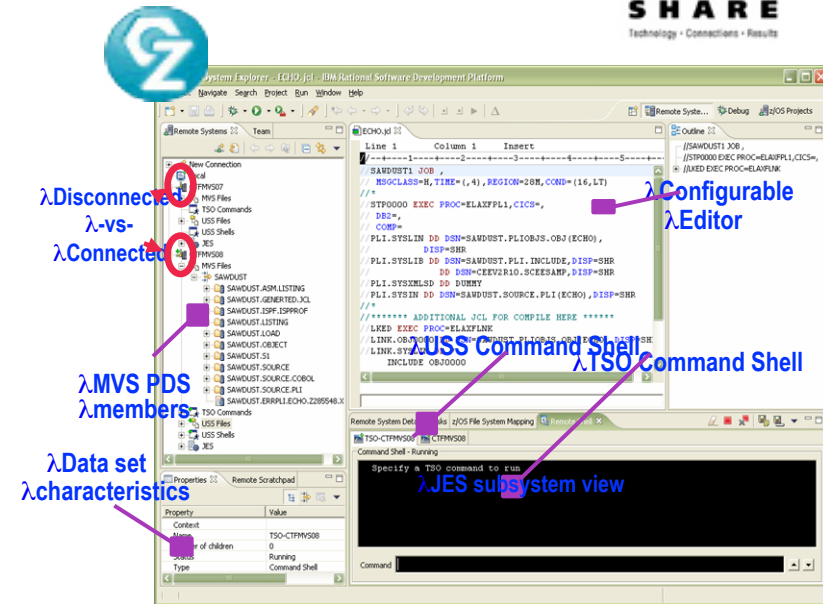
▶ **What is RDz**
- Eclipse-based IDE speeding modern composite (SOA) application development

▶ **RDz supports Enterprise Modernization**
- Supports common IDE for COBOL, PL/I, C, C++, HLASM, Java, EGL and web services
- Transforms UML to COBOL source code
- Provides interactive access to z/OS for development, debug, job generation, submission, monitoring, command execution
- Supports new and existing runtimes (CICS, IMS, Batch, USS, DB2 SP, WAS)

▶ **RDz supports SOA**
- Enables CICS and IMS applications for web services and SOA
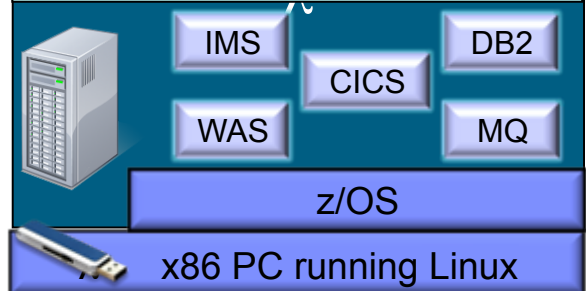- Supports for J2EE, JCA, XML, web services

Using RDz Unit Test Feature
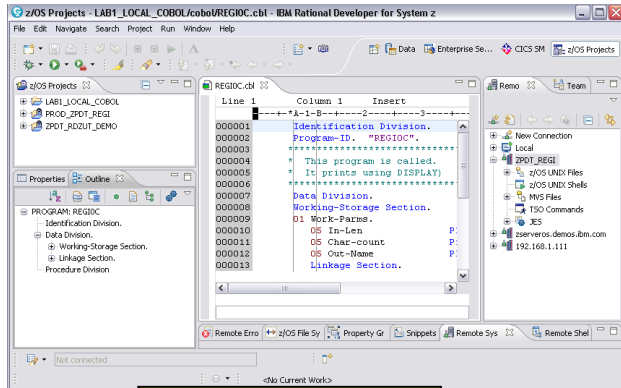
COBOL, PL/I, C++, Java, EGL, Batch, Assembler, Debug Tool

IMS

DB2

CICS

WAS

MQ

z/OS

x86 PC running Linux

RDz Client

RDz Unit Test (RDz UT)

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RDz UT machine specifications

- **Underlying Linux requirement**
  - Red Hat Enterprise Linux 5.3 (RHEL 5.3) – 64-bit
  - OpenSUSE 10.3, 11.0, and 11.1 – 64-bit

- **Base machine must have:**
  - Processor
    - RDz-UT Standard - Minimum practical configuration is 2.4 Ghz Core 2 Duo
    - RDz-UT Specialty - Minimum practical configuration is 2.0 Ghz i5 / i7 4 core
  - RAM
    - 3 GB minimum
    - Recommended is 1 GB for base Linux + 2 GB per processor core enabled for RDz-UT
  - Disk space
    - 20 GB for base Linux / zPDT install
    - 50-120 GB for z/OS install
  - Network
    - 100MB / 1GB Ethernet adapter (shared by Linux and z/OS)
    - Wireless (OK for Linux, not recommended for z/OS)
  - USB
    - Required for 1091 hardware key

ADCD 1.11s Software Products Licensed for Use with RDZ-UT V.8.0.1

- z/OS Version 1 Release 11
- IBM Ported Tools for z/OS 1.14
- IBM Print Services Facility for z/OS V4.2
- IBM REXX/370 Compiler & IBM Library for REXX/370
- IBM AFP(TM) Font Collection for VSE
- IBM Enterprise COBOL for z/OS V4.2
- IBM XML Toolkit for z/OS V1.10
- IBM 31-bit SDK for z/OS, Java 2 Technology Edition V5.0
- IBM 64-bit SDK for z/OS, Java 2 Technology Edition V5.0
- IBM 31-bit SDK for z/OS, Java Technology Edition, V6
- IBM 64-bit SDK for z/OS, Java Technology Edition, V6
- IBM Debug Tool for z/OS V9.1
- IBM Enterprise PL/I for z/OS V3.8
- IBM Tivoli NetView for z/OS V5.3
- IBM z/OS Management Facility V1.10
- IBM Rational Developer for System z V7.5 (Remote System Explorer Component)

- IBM DB2 for z/OS V9.1

- IBM DB2 Administration Tool for z/OS V7.2
- IBM DB2 Object Comparison Tool for z/OS V7.2
- IBM DB2 Accessories Suite for z/OS V1.1
- IBM CICS Transaction Server for z/OS V4.1
- IBM Information Management System (IMS) Version 11.1.0
- IBM IMS Queue Control Facility for z/OS V2.1
- IBM IMS High Performance Change Accumulation Utility for z/OS V1.4
- IBM IMS High Performance Image Copy for z/OS V4.1.0
- IBM IMS(TM) Database Control Suite for z/OS V3.2
- IBM IMS Library Integrity Utilities for z/OS V2.1
- IBM WebSphere Application Server for z/OS V7.0
- IBM Tivoli Workload Scheduler for z/OS V8.5.0

- IBM WebSphere MQ for z/OS V7.0.0

* Custom software stacks my be available at additional cost

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