



IBM Software Group: CICS Product Portfolio

IBM CICS Transaction Gateway Version 6.0

Part 2: Technical Value

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www.ibm.com/cics/ctg

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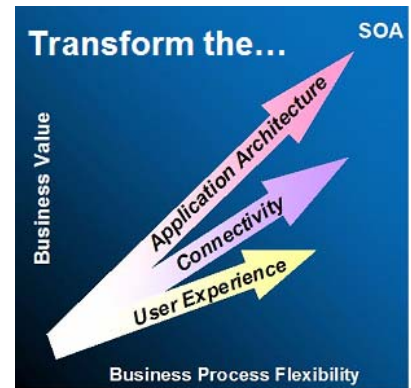
Agenda

- **Application Transformation**
- **Direct Connection or Web Service into CICS?**
- **What is the CICS Transaction Gateway?**
- **Why use the JCA?**
- **Flexible Configuration**
- **3 Key Characteristics of the CICS TG**
- **A Simple, Easy to Implement Solution**
- **Enhancements in four Key Customer Value Areas**
- **Comprehensive Tooling**
- **Summary**
- **Further Resources**

Duration: Approx 15 Minutes

Application Transformation

- **Focus on Reducing:**
 - Cost
 - Risk
 - Time to Market
- **Focus on Increasing:**
 - Application Reuse
 - Employee Productivity



Transform applications
for use in mixed workloads.

Reduce risk and cost.

Direct Connection or Web Service into CICS?

- Tightly coupled and loosely coupled connectivity solutions coexist to fully exploit the agility of an on demand environment
- The difference between Direct Connection and Web Service depends on whether the presentation applications are directly bound to the business logic.

Direct Connection

- High QoS Today
- Mature technologies
- Existing application interfaces
- Few application/system level changes required
- Good where application has fewer reusable purposes



Web Services




- QoS improving via standards
- Emerging technologies
- Web Services interface
- Some application/system level changes required
- Good where application has many reusable purposes

Exploit an appropriate set of complementary technologies.

Fully integrate your CICS systems.

What is the CICS Transaction Gateway?

CICS Transaction Gateway provides three core capabilities:

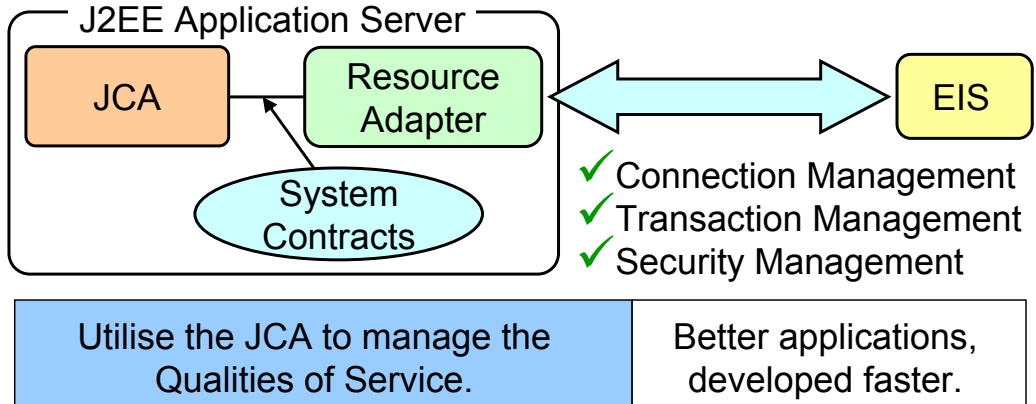
 <p>Plumbing</p> <p><i>J2EE connector into CICS</i></p> <ul style="list-style-type: none"> High performing and scalable inbound connector to CICS applications Provides connectors to COMMAREA and 3270-based CICS applications 	 <p>Interfaces</p> <p><i>Java and non-Java API's</i></p> <ul style="list-style-type: none"> Standard JCA interface provides best Qualities of Service Base Java, C, C++, COBOL and COM interfaces are supported but stabilized 	 <p>Integration</p> <p><i>WebSphere, CICS and others</i></p> <ul style="list-style-type: none"> All supported CICS releases 3 versions of WebSphere Application Server across 7 different platforms 5 SNA servers (AIX, Windows, Linux on zSeries)
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Supported connectivity from
WebSphere to all CICS servers.

Integrate all your
CICS assets.

Why use the JCA?

- **JCA provides two key advantages:**
 - Standard programming interface to all Enterprise Information Systems (EIS)
 - Delegated management of Connections, Transactions and Security



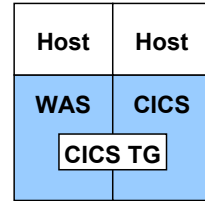
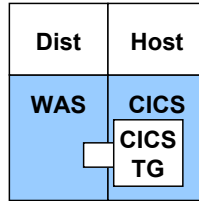
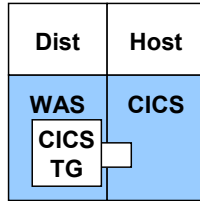
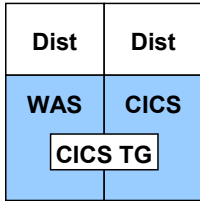
Flexible Configuration

CICS Transaction Gateway runs on:

- z/OS
- Linux (Intel, zSeries)
- UNIX (AIX, HP-UX, Solaris)
- Windows

Providing access to:

- CICS TS (z/OS, OS/390, VSE, iSeries)
- TXSeries CICS (AIX, HP-UX, Solaris, Windows)
- CICS on Linux – Coming 2005!

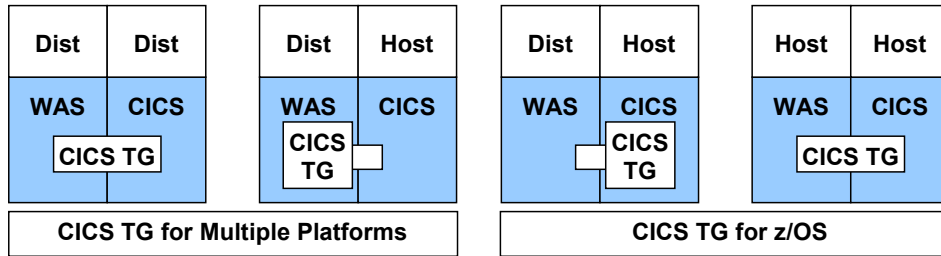


Flexibility to support most application architectures.

IBM middleware from end to end.

Flexible Configuration

- CICS Transaction Gateway has two implementations
- You can use either or both, depending on your requirements
- Further QoS comparison in Whitepaper on ibm.com/cics/ctg



Good ←———— Qualities of Service —————→ Best

Choice of platform based on application requirements.	z/OS provides best QoS.
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3 Key Characteristics of the CICS TG

- **Very popular CICS connectivity method, because:**
 - **High performing**
 - 1,000+ TPS with optimised data handling
 - **Secure**
 - SSL implementation and good integration with CICS
 - **Scalable**
 - Multi-Threaded technology and load balancing capabilities
- **Improvements in each of these three key areas in V6.0**

Provides high performing, secure and scalable access to CICS.

Production proven over many years.

A simple, easy to implement solution

- **Popular with System Programmers and Application Developers**
 - **Ease of System Programming**
 - Requires minimal changes to CICS and usually no changes to existing CICS applications
 - Provides simple, familiar mechanisms with which to configure and manage your gateway
 - **Ease of Application Development**
 - Implements the industry standard JCA (J2EE Connector Architecture) interface
 - JCA provides delegated management of Transactions, Connections and Security

Requires minimal or no changes to CICS systems and applications.

Ease of implementation.

Enhancements in CICS TG V6.0 have focused on four key technical value areas:

1. Qualities of Service

- Performance enhancements through optimization of the product and via exploitation of the latest J2EE and Linux standards.
- Considerable Availability and Scalability enhancement on our flagship z/OS platform.

2. Systems Management

- Improved Administration of the gateway through a more functional interface, better aligned with the native operating system.
- Problem Determination and Management have been enhanced through better recording and control of system information.

Enhanced Performance, Availability,
Scalability and Management.

More power &
More control.

Enhancements in CICS TG V6.0 have focused on four key technical value areas:

3. **Security**

- Support for the Industry leading SSL protocol enables fine tuned control of your network security.
- Exploitation of the advanced z/OS security features provides a faster and more comprehensive security solution.

4. **Ease of Use**

- New, industry standard installation vastly simplifies the process of installing, migrating and applying maintenance.
- Redesigned and searchable Eclipse-based information center provides a greatly improved interface for online documentation.

Advanced security capabilities,
simpler product deployment

Better security,
Less complexity.

Comprehensive Tooling



Rational. software

WebSphere. software

The IBM Software Development Platform is a comprehensive set of tools that forms a complete and modular solution for building software in an on demand world.



WebSphere Studio

- Asset Analyzer
- Application Developer Integration Edition
- Enterprise Developer
- Application Monitor

CICS Tools

IBM @server Tools

The IBM Software
Development Platform.

A complete
IBM solution.

Summary

Middleware is Everywhere.

Can you see it?

- CICS Transaction Gateway is a high performing, scalable and easy to use connector into all CICS servers.
- Flexible deployment options provides a solution to support most architectures, and all connectivity to all CICS servers.
- Exploiting both Direct Connections and Web Services into CICS allows you to fully integrate your CICS systems.
- JCA is standards based connectivity that provides managed delegation of security, transactions and connections.
- CICS TG V6.0 has enhancements in 4 major customer value areas:
 - Qualities of Service
 - Systems Management
 - Security
 - Ease of use



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Further Resources

This presentation is 1 in a series of 3. Please see also:

CICS Transaction Gateway V6.0: Part 1 – Business Value

CICS Transaction Gateway V6.0: Part 3 – Latest Enhancements

- **Much more information can be found online:**
 - CICS: www.ibm.com/cics
 - CICS Transaction Gateway: www.ibm.com/cics/ctg
 - IBM Software Development Platform: www.ibm.com/developerworks/platform
- **Of particular interest on the CICS Library www.ibm.com/cics/library**
 - Whitepapers
 - Redbooks
- **Be sure to check BOTH announcement letters www.ibm.com/common/ssi**
 - CICS Transaction Gateway for z/OS V6.0, 30th November 2004, US letter 204-283
 - CICS Transaction Gateway for Multiplatforms V6.0, 30th November 2004, US letter 204-284

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