

Moderniser votre patrimoine applicatif avec IBM Rational Asset Analyzer et IBM WebSphere Business Rules for z/OS



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IBM solutions for Enterprise Modernization

Optimizing applications, people, team and infrastructure investments



- **Increase flexibility** by revitalizing existing application portfolios
- **Boost productivity** and accelerate innovation with modern skills
- **Maximize business agility** by bridging organizational silos
- **Increase system utilization** by leveraging hardware capabilities



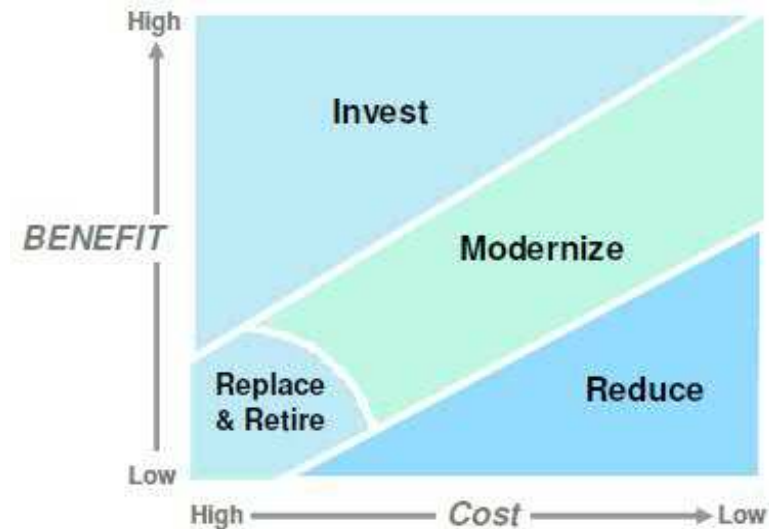
Rational Software Delivery Platform

powered by



- Establish a **consolidated view** of business priorities, applications and infrastructure to drive strategic portfolio transformation
- Identify problems and opportunities to **reduce maintenance costs** that are ruining your IT budget
- Build a **roadmap for transformation**, setting the course to:
 - Remove high cost, low business value applications
 - Modernize applications with high value
 - Invest in critical business areas that are under supported

Total Economic Impact Assessment Methodology



Source: Phil Murphy, Principal Analyst, Forrester Research, March 2009.

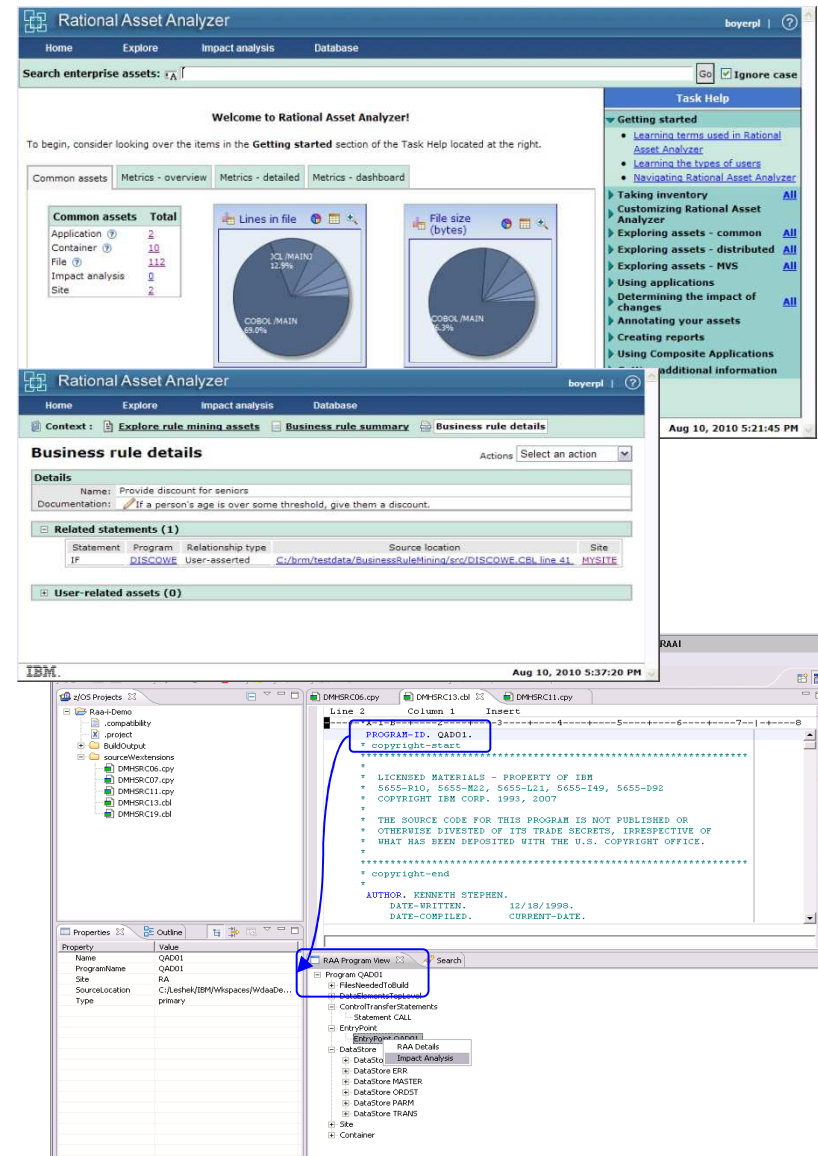
“... enterprise planning enables us to better visualize and compare our current environment with our future goals and visualize the journey between the two.”

Dave Keifer
Enterprise Architect
Christiana Care Health System

What is Asset Analyzer?



- **An application understanding tool for effective development and maintenance cross platform efforts**
- Solution for inventory and static analysis of new projects or maintenance efforts
 - Cover heterogeneous types of software artifacts
 - Support for z/OS and enterprise-wide software applications
 - Proven enterprise technology that can run on or off z/OS
- Instant, interactive delivery of high value information to people and processes
 - Powerful Custom Query feature allows to extend the GUI
 - Browser-based and RDz/Eclipse-based user interfaces
 - Documented database schema and import file format
 - RESTful interfaces for programmatic access to the data
- Helps accelerate the discovery and analysis phases
 - Program-collected and human-augmented knowledge
 - Highly structured (proven) scalable model
 - Relationships among the artifacts
 - Metrics related to the IT artifacts in the enterprise
- Assists in the development and test phases
 - Identify impacts across the enterprise
 - identify areas to test
 - Reduce risk and improving test coverage



Business need: Business application “decision making” needs to adapt to changes in the marketplace, in time to make a difference

Application Development drivers:

Cost savings

- More effective application development & maintenance with less business risk

- Consolidation/Restructure of existing applications, saving hardware & resources

Changing ratio of source inventory to development skills

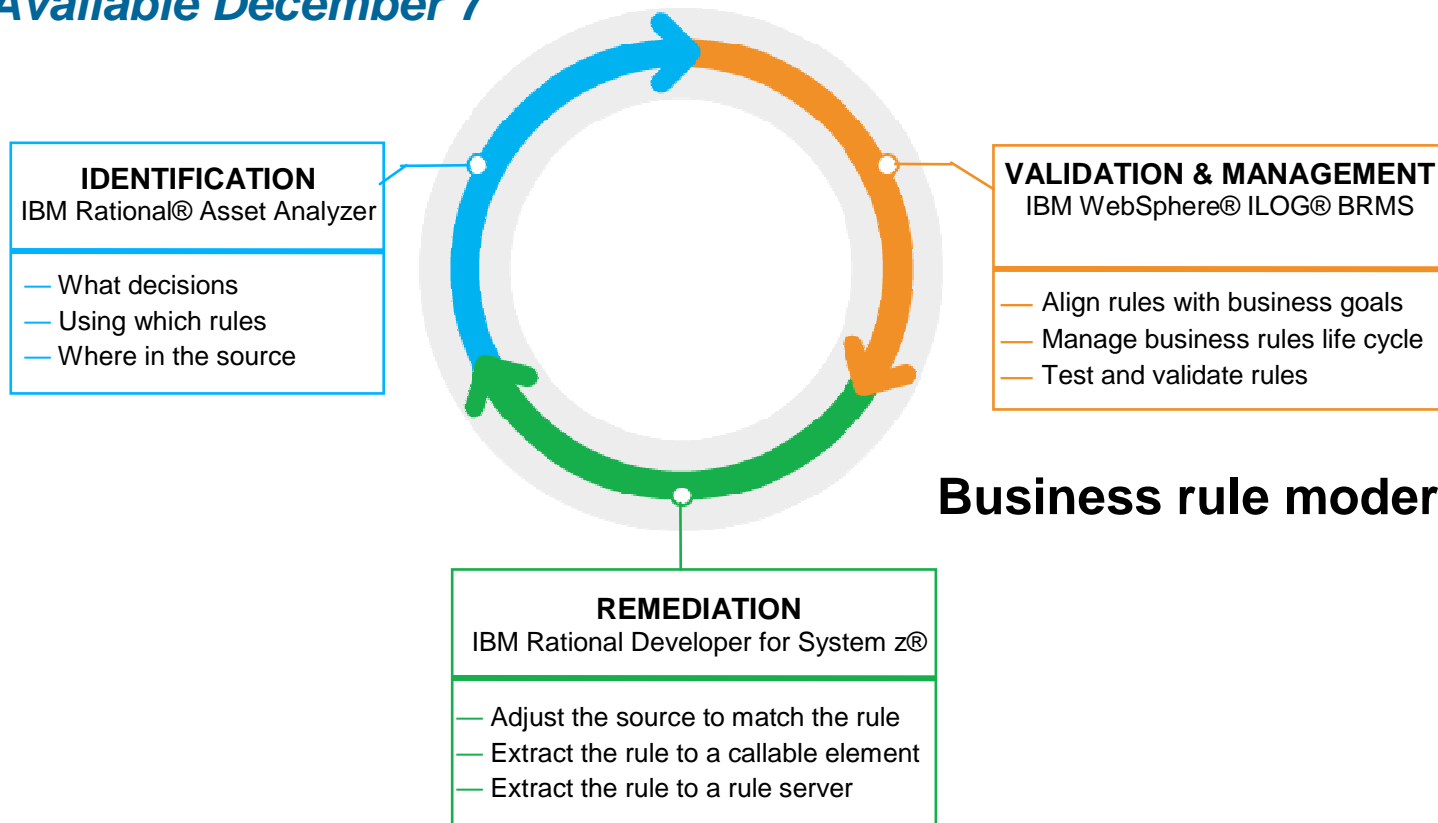
- Forcing need for formal processes with an on line electronic repository

- Be able to react to changes requested by business in days, not months

Business Rule Modernization: Applying technology and process to gain increased “decision making” agility for business applications



Available December 7



Business rule modernization

Delivering...

The essentials for business rule mining of existing software assets enhancing the ability to capture, maintain and take advantage of application knowledge that can provide insight into an application's structure and its interactions with business data.

Source scan scoped by vocabulary

- Imported from ILOG JRules or defined by the client in RAA
- Maps business terms to application terms
- Focused effort for faster time to value

Identify candidate business rules

- Locate relevant code segments using terms
- Tie in relevant data elements
- Construct candidate rules mapped to code segments

Capture candidate rules using ILOG technologies

- Unstructured
- Structured

```

31. 003100
32. 003200     IF FT
33. 003300         COMPUTE CUST-DISC-PCT = F1 + F2
34. 003400     ELSE
35. 003500         DISPLAY "NO DISCOUNT".
36. 003600
37. 003700     GOBACK.
38. 003800/
39. 003900 100-FACTOR2.
40. 004000
41. 004100     IF C-AGE > 55
42. 004200         COMP
43. 004300     ELSE
44. 004400         SET
        
```

Relate to a Business Rule

Relate the IF Statement to a business rule.

Business rule:

The statement has the following data elements with related terms and term properties:

Data element	Term or term property
C-AGE	age

Add a Business Rule

Name of the business rule:

Documentation (optional):

Rational Asset Analyzer boyerpl | ?

Home Explore Impact analysis Database

Context: [Explore rule mining assets](#) [Business rule summary](#) [Business rule details](#)

Business rule details Actions:

Details

Name:
 Documentation:

Related statements (1)

Statement	Program	Relationship type	Source location	Site
IF	DISCOWE	User-asserted	C:/brm/testdata/BusinessRuleMining/src/DISCOWE.CBL line 41	MYSITE

User-related assets (0)

Aug 10, 2010 5:37:20 PM

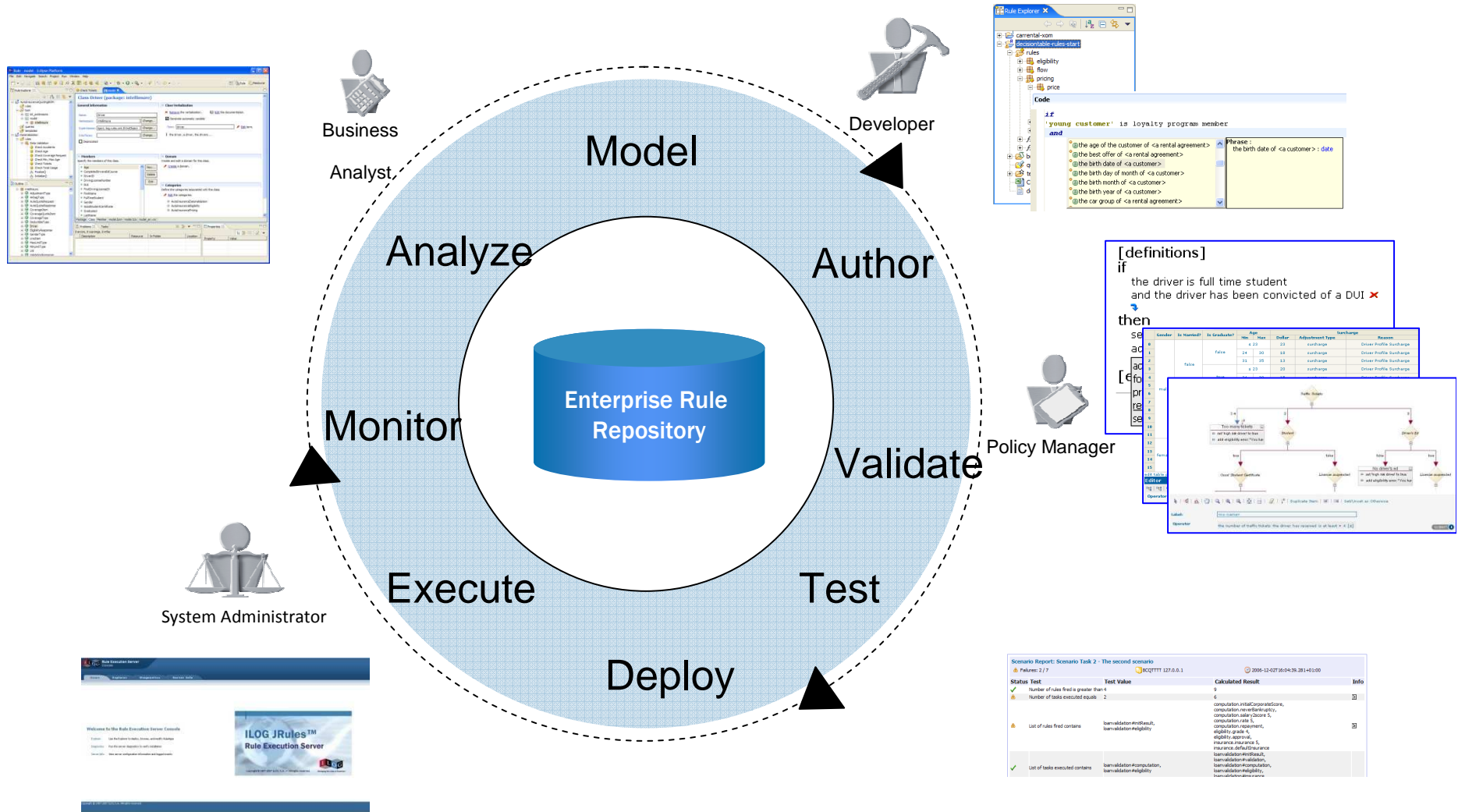
Validation

- Reconciling what the source code does with what the business wants
- Drive an objective discussion and agreement between Business and IT using ILOG JRules
- Adjust the rule definitions in ILOG to conform to the agreement
- Execution with the core business applications running on System z

Management

- On-going process of keeping the source in sync with business policy
- Business rules updates should be handled via the ILOG technologies
- Approved changes will drive source code remediation

Provides complete functionality and tooling to fully maintain and manage an organization's business rules through the complete business rule life cycle by multiple roles.



Bring the source code into compliance with business rule decisions

Assess the complexity of the effort

- a) Small changes or the rules do not change frequently
- b) Need to modularize the rule code but constrained by performance requirements
- c) Need to move rule management to the business teams

Select the compliance approach based on the complexity

- a) Adjust the source code
- b) Extract the rule execution code into a callable module
- c) Extract the rule execution code and replace it with calls to a Rule Server

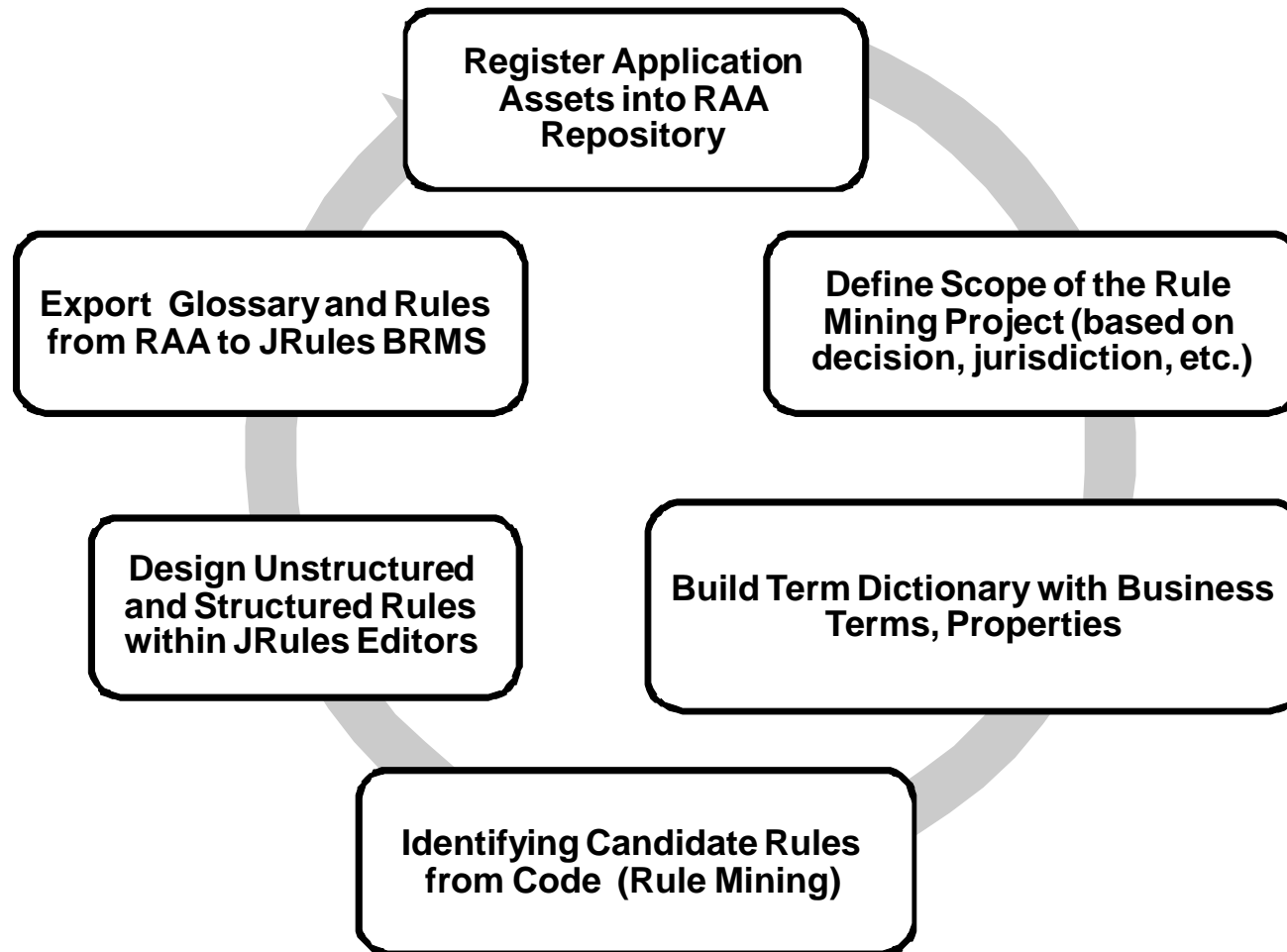
- The IT community wants answers to:
 - ▶ "How do I maximize what I have?"
 - ▶ "How do I get from here to there?"

- Top driver's determining the Solution
 - ▶ Access the business value
 - ▶ Reduce application maintenance costs
 - ▶ Avoid cost of replacement
 - ▶ Increase innovation and productivity

- Recommended Rule Mining Project Characteristics
 - ▶ Start Small – Defined Scope

 - ▶ Rule Mining by:
 - Business decision
 - Function
 - Jurisdiction
 - Output Field(s)
 - Input Field(s)





- **Agility**
 - Business managers held back by long system change waiting periods, often measured in months
 - **Usage of IT resources**
 - Typically, 40-50% of IT resources are deployed on application maintenance
 - **Consistency**
 - Business logic reuse is impossible across applications, enterprise consistency suffers
 - **Transparency**
 - Inability for managers and users to understand or trust the systems they depend upon, reducing competitiveness, efficiency and quality of customer service
 - **Auditability**
 - Difficult to track what decisions were made and why
- **Agility**
 - Change request implemented in a matter of hours or days
 - **Usage of IT resources**
 - Changes can be enacted by business organizations
 - **Consistency**
 - Rule services can be reused across channel and organization
 - **Transparency**
 - Business rules are accessible to anybody; what you see is what you get – traceability
 - **Auditability**
 - Built-in auditability at management time and at run time



