Introducing IBM Rational Systems Developer V6.0.1: UML-based, model-driven development for software products and systems development

Overview

Systems development is becoming increasingly more complex. At the same time, developers are expected to deliver capabilities faster and more reliably than ever. To better cope with these challenges, developers need more flexibility from their development tools.

The Eclipse open-source platform provides the standards and supporting technology for providing more flexibility than possible with traditional tools built on proprietary platforms.

IBM Rational Systems Developer is an integrated design and construction product built on top of Eclipse. It leverages all of the power of Eclipse and includes plug-ins that enable software architects and model-driven developers to create well-architected C++ and Java™ J2SE applications leveraging Version 2 of the Unified Modeling Language (UML 2).

For more information on IBM Rational products, visit

http://www.ibm.com/software/rational

For more information about the IBM Passport Advantage® program, visit

http://www.ibm.com/software/passportadvantage

Key prerequisites

Refer to the Hardware requirements and Software requirements sections.

Availability date

January 31, 2006

At a glance

IBM Rational Systems Developer lets you:

- Migrate from other proprietary development tools into the open-source world of Eclipse
- Apply model-driven development for Java, C++, and CORBA-based applications using a commonly supported Eclipse-based modeling tool
- Automate currently manual forms of modeling for better scalability and repeatability
- Provide extensions to the tool environment via your own customizations and from third-party plug-ins
- Migrate IBM Rational Rose® XDE® models to an Eclipse-based development environment
- Integrate with other facets of the software lifecycle via the IBM Rational Software Development Platform
Description of features and benefits for IBM Rational Systems Developer V6.0.1

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<tr>
<th>Feature</th>
<th>Benefit</th>
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<tr>
<td>UML 2.0 modeling support for analysis and design using Use Case, Class, Sequence, Activity, Composite Structure, State Machine, Communication, Component, Object and Deployment diagrams.</td>
<td>UML 2.0 allows you to capture and communicate all aspects of an application architecture using a standard notation that is recognized by many different stakeholders.</td>
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<td>Simplified diagramming using free-form diagrams, topic diagrams, and browse diagrams.</td>
<td>Simplifies the usage of UML notation for design, documentation, communication, and understanding design elements captured in UML models and application artifacts in the development workspace.</td>
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<td>Visual modeling with content-assist.</td>
<td>Action bars, connection handles, and CTRL-SPACE are used to guide a user through the activity of creating well-formed models.</td>
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<td>Apply and author patterns and transforms.</td>
<td>Allows organizations to capture and promote &quot;recipes.&quot;</td>
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<td>UML Class diagram editing for CORBA objects.</td>
<td>Uses UML notation to provide abstract views of CORBA objects to simplify the development and understanding of applications requiring this technology.</td>
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<tr>
<td>UML Sequence diagram editing for Java, C++.</td>
<td>Model application behavioral interactions using UML 2.0 sequence diagrams.</td>
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<tr>
<td>UML Class diagram editing for C++.</td>
<td>Use UML class diagrams to provide abstract views of C++ classes to simplify the development and understanding of new and existing applications.</td>
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<tr>
<td>Uses transformations to generate Java, C++, or CORBA IDL code.</td>
<td>Automate the repeatable task of generating code from design models. Transformations can be customized to tailor code generation patterns to an organization's needs.</td>
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<td>Asset Browser for accessing reusable assets.</td>
<td>Supports OMG Reusable Asset Specification and supports users in browsing repositories containing reusable assets. Repositories can be structured so that assets can be found easily.</td>
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<td>Establish traceability links from requirements through implementation.</td>
<td>Assist users in querying design models for traceability relationships from requirements (in IBM Rational RequisitePro(R)) to analysis/design elements found in models, and to Java code.</td>
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</table>
Automatically detect patterns and anti-patterns (such as, design, OO, structural, and system) in Java code. Automatically mine application code to identify and graphically render application patterns to assist with understanding or refactoring an existing application.

Template based rules for monitoring and enforcing application structure. An application is ultimately reflected in its running code. Facilitate enforcing and monitoring an application’s architecture as it evolves.

Enterprise class IDE powered by Eclipse technology. Adapt and extend your development environment with Eclipse-based plug-ins that match your needs.

Team support with multi-model support, compare merge, and SCM integrations with IBM Rational ClearCase® and IBM Rational ClearQuest®. Provides all the capabilities required to teams and distributed teams in designing and developing applications.

Automated tools for coding standards enforcement; component testing of Java. Improves code quality.

C/C++ development environment with syntax highlighting editor and customizable build and debugger framework. Users can develop their C/C++ applications in the same environment that is used for developing with other languages like Java, CORBA, and XML.

Open API to support customizing and extending the modeling environment. UML profile creation and editing to customize the properties stored in UML models. Organizations can develop plug-ins to customize the analysis and design tools for their environment and process. Supports the creation of an ecosystem allowing vendors to develop integrations.

Generate HTML, PDF, and XML reports from UML designs. Create reports and documentation that can be reviewed by team members or other stakeholders.

Generate Javadoc with detailed design diagrams. Augment Javadoc reporting capabilities with the ability to integrate UML detailed design diagrams into a Javadoc. Diagrams can be automatically generated and integrated into Javadoc, or the user has the option of creating custom diagrams and using Javadoc tags to insert them in Javadoc output.

Scripting support with Java. Create lightweight utilities/extensions to customize a user’s development environment.

IBM Rational Systems Developer is the migration target offering for the qualifying products listed below.

- IBM Rational Rose XDE Developer for Java
- IBM Rational Rose XDE Developer Plus
- IBM Rational Rose Developer for UNIX®

Customers who hold an entitlement to a qualifying product are authorized to access the media and downloads for the IBM Rational Systems Developer product, and to use the IBM Rational Systems Developer product on a supported basis. Customers need not convert (migrate) their current entitlement into an IBM Rational Systems Developer entitlement in order to access and use IBM Rational Systems Developer. Their ability to do this does not mean they have been given an additional entitlement to IBM Rational Systems Developer. The customer continues to own just one entitlement, for example, their entitlement to the qualifying product.

These customers can also request that their entitlement to the qualifying product be migrated (converted) into an entitlement to IBM Rational Systems Developer. These
migrations will be initiated upon customer request only. Barring customer requests for migration, maintenance renewal letters will continue to quote the current qualifying product until such time as the qualifying product reaches its End of Sales date. Once entitlement has been migrated to IBM Rational Systems Developer, the customer can no longer access the media or downloads for the qualifying product. However the customer can continue to use the qualifying product on a supported basis — based upon the qualifying product software images that the customer already has in hand — until the qualifying product reaches its End of Service date.

**Competitive trade-up offers**

- Aonix StP, Ameos
- Borland C++ BuilderX
- Borland Together (Architect, Developer, Designer editions)
- Borland Enterprise Studio for C++
- I-Logix Rhapsody
- No Magic, Inc. — MagicDraw UML (Professional and Enterprise)
- Microsoft Viseo
- Oracle Designer, JDeveloper (paying customers only, must show CDs or other evidence of purchase)
- Popkin Software System Architect
- Telelogic TAU

**Section 508 of the U.S. Rehabilitation Act**

Rational Systems Developer is capable as of January 31, 2006, when used in accordance with associated IBM documentation, of satisfying the applicable requirements of Section 508 of the Rehabilitation Act, provided that any assistive technology used with the product properly interoperates with it. A U.S. Section 508 Voluntary Product Accessibility Template (VPAT) can be requested via IBM’s Web site at


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UNIX is a registered trademark of the Open Company in the United States and other countries.

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Offering Information

Product information is available via the Offering Information Web site

http://www.ibm.com/common/ssi

Also, visit the Passport Advantage® Web site

http://www.ibm.com/software/passportadvantage

Publications

No publications are shipped with this product.

The IBM Publications Center

http://www.ibm.com/shop/publications/order

The Publications Center is a worldwide central repository for IBM product publications and marketing material with a catalog of 70,000 items. Extensive search facilities are provided. Payment options for orders are via credit card (in the U.S.) or customer number for 20 countries. A large number of publications are available online in various file formats, and they can all be downloaded by all countries free of charge.

News of many publications may be subscribed to via Mysupport.


Technical information

Hardware requirements

- Intel® Pentium® 4
- 1.4 GHz processor, or higher
- 512 MB RAM required; more memory generally improves responsiveness
- Swap space: 2 x physical memory
- 600 x 800 x 256-color video resolution, or higher; high color or true color recommended
- Microsoft™ mouse or compatible pointing device
- Disk space to install: 1.1 GB

Software requirements

- One of the following operating systems:
  - Microsoft Windows™ — Windows 2000 Professional (SP4)
  - Microsoft Windows — Windows XP Professional (SP 1 or 2)
  - Linux™ — Red Hat Enterprise Linux Workstation Version 3.0
  - Linux — SUSE Linux Desktop Version 9 (SP1)

- Web browser:
  - Windows — You will need a Web browser to view the readme files and the installation guide.
  - Windows — To view certain tours and tutorials that are included with the online help you will require the Flash Player, V6.65 or later.
  - Linux — You will need Mozilla V1.4 or greater to view the readme files and the installation guide.
  - Linux — To view certain tours and tutorials that are included with the online help you will require the Flash Player, V6.69 or later.

- TCP/IP installed and configured

Planning information

Software Maintenance, previously referred to as Software Subscription and Technical Support, is included in the PassportAdvantage Agreement. Installation and technical support is provided by the Software Maintenance offering of the IBM International Passport Advantage Agreement. This fee service enhances customer productivity, with voice and electronic access into IBM support organizations.

Packaging: The Rational® Systems Developer media package (BT01UML) contains the following packaged as a single unit:

- IBM Rational Systems Developer Windows V6.0.1 CDs
- IBM Rational Systems Developer Linux V6.0.1 CDs

Security, auditability, and control

The customer is responsible for evaluation, selection, and implementation of security features, administrative procedures, and appropriate controls in application systems and communication facilities.
**Ordering information**

This product is only available via Passport Advantage. It is not available as shrinkwrap.

**Product information**

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<th>Licensed function title</th>
<th>Product group</th>
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<td>IBM Rational Systems Developer</td>
<td>Design and Construction</td>
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<td>5724-M10</td>
<td>Floating User(s)</td>
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**Charge metrics definitions**

**Authorized User**: An Authorized User (User) is one and only one individual, machine, program, or device with a specific identity (ID) within or outside your enterprise.

A Proof of Entitlement (PoE) is evidence of your authorization to use a program and is required for each user accessing the program or any component, application, feature, function, or capability thereof, either directly or indirectly, through any means on behalf of the user in any manner.

The program may be installed on one or more computers, and accessed by multiple users, provided that a user authorization has been obtained for each individual user.

1. Users have unique specific identity and IDs cannot be shared.
2. An ID may establish one or more connections and count as a single User.
3. An ID may only be reassigned for the long-term replacement of personnel, machine, program, or device.

**Floating User**: A Floating User license is a license for a single software product that can be shared among multiple team members.

**Passport Advantage program licenses**

**Rational Systems Developer**

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<tr>
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<td>D57E6LL</td>
</tr>
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**Passport Advantage customer: media pack entitlement details**

Customers with active maintenance or subscription for the products listed are entitled to receive the corresponding media pack.

**Rational Systems Developer V6.0.1**

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**Terms and conditions**

This product is only available via Passport Advantage. It is not available as shrinkwrap.

**Licensing**: IBM International Program License Agreement. PoE are required for all authorized use.
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This software license includes Software Maintenance, previously referred to as Software Subscription and Technical Support.

License information (LI) form number

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On or near the planned availability date, the LI will be available for review on the IBM Software License Agreement Web site


Limited warranty applies: Yes

Warranty: This program includes a warranty for one year from acquisition from IBM or an authorized IBM Business Partner. For one year from acquisition of the program, this warranty provides the customer with access to databases containing program information and FAQs, including any known fixes to defects, which the customer can download or otherwise obtain and install.

Program technical support: Technical support of a program product will be available for a minimum of three years from the general availability date, as long as your Software Maintenance is in effect. This technical support allows you to obtain assistance (via telephone or electronic means) from IBM for product-specific, task-oriented questions regarding the installation and operation of the program product. Software Maintenance also provides you with access to updates, releases, and versions of the program. Customers will be notified, via announcement letter, of discontinuance of support with 12 months’ notice. If you require additional technical support from IBM, including an extension of support beyond the discontinuance date, contact your IBM representative or IBM Business Partner. This extension may be available for a fee.

Money-back guarantee: If for any reason you are dissatisfied with the program and you are the original licensee, return it within 30 days from the invoice date, to the party (either IBM or its reseller) from whom you acquired it, for a refund.

For programs acquired under the IBM International Passport Advantage offering, this term applies only to your first acquisition of the program.

Copy and use on home/portable computer: Yes

Volume orders (IVO): Yes

Passport Advantage applies: Yes and through the Passport Advantage Web site at

http://www.ibm.com/software/passportadvantage

iSeries™ Software Maintenance applies: No

IBM Electronic Services

IBM Global Services has transformed its delivery of hardware and software support services to put you on the road to higher systems availability. IBM Electronic Services is a Web-enabled solution that provides you with an exclusive, no-additional-charge enhancement to the service and support available on the IBM eServer® platform. These services provide the opportunity for greater system availability due to faster problem resolution and preemptive monitoring. IBM Electronic Services is comprised of two separate but complementary elements: IBM Electronic Services news page and IBM Electronic Service Agent™.

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http://www.ibm.com/support/electronic

Prices

Passport Advantage
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Business Partner information
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