# R:BASE X and R:BASE X Enterprise

100 Reasons to Upgrade





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by R:BASE Technologies, Inc.

Welcome to R:BASE X (Version 10)!

This document details the 100 most popular and powerful enhancements added to R:BASE X and R:BASE X Enterprise.

R:BASE X (Version 10) is the sleek new relational database environment intended to offer next-generation development and connectivity to database administrators. Many added R:BASE features bring forth powerful means to further streamline data management. R:BASE X (Version 10) also takes a big and very fundamental step of extended character support, geared towards even more versatile world-wide use.

The clean and sophisticated styling of R:BASE X, paired with the built-in database engine that has paved the foundation of stability and reliable convenience, provides a brand-new value on R:BASE's database and application adaptive content development.

### R:BASE X and R:BASE X Enterprise - 100 Reasons To Upgrade

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First Edition

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- Unicode extended character support
- New BIGINT data type, which is a 64-bit integer R:BASE X Enterprise only
- 3. Supported navigation of file system paths (and file names) with Unicode characters
- 4. New SMALLINT data type, which is a 16-bit integer R:BASE X Enterprise only
- 5. New **BOOLEAN** data type **R:BASE X Enterprise** only
- 6. New "Segoe UI" font implemented system wide to blend well with recent Windows releases
- 7. Includes 64-bit ODBC Driver for 64-bit application access R:BASE X Enterprise only
- New Database Explorer Navigator, with left sided tabs, to only display menu options for the active module
- 9. New PRINT output format (XLSX) to create MS Excel Workbooks
- 10. New Data Browser/Editor "Update Query" menu option allowing users to modify the existing query, using the WHERE builder, within the Data Browser
- 11. New Database Explorer drop-down menu, to quickly jump to a desired module
- 12. New Explorer Appearance settings to customize the color schema of R:BASE and the Database Explorer areas
- 13. New **WIDETEXT** data type **R:BASE X Enterprise** only
- 14. New WIDENOTE data type R:BASE X Enterprise only
- 15. New Form/Report/Label Designer "Code" tab to easily review all EEP/Custom Action command syntax within the form
- 16. New **ON DISCONNECT/EXIT** commands to support running code when disconnecting from a database and closing an R:BASE session **R:BASE X Enterprise** only
- 17. New Form/Report/Label Designer EEP "History" tab to automatically save the form's EEP as a backup, when command syntax changes are made
- 18. Enhanced Form/Report/Label Designer Object List toolbar offering increased organization and navigation of available form controls
- 19. New Form Designer "Control List" utility to easily find and add available controls, with the help of the component filter, e.g. typing "button" reduces the list to only button-type controls
- 20. New import and export support for the JSON (JavaScript Object Notation) format
- 21. New Query Wizard automatic linking options for common field names or primary key/foreign key relationships
- 22. Added "EEPs" tab to the Object Inspector toolbar, providing direct access to all Entry/Exit Procedures for the selected control
- 23. New "Variable Link" enhancement that provides multiple variable-based mapped links for control properties
- 24. Added "Date/Time" column for Tables and Views providing the last structure change for each R:BASE X Enterprise only
- 25. Added Report/Label IntelligentMail bar code support
- 26. New **MIGRATE** command to convert databases to R:BASE X Enterprise from R:BASE eXtreme 9.5 (64)
- 27. New Report/Label Designer Control List utility, to easily find and add available controls, with the help of the component filter, e.g. typing "label" reduces the list to only label-type controls
- 28. Added Report/Label QR Code and DataMatrix bar code support
- 29. Added Watch Variable Breaks in the Trace Debugger, allowing the trace debugger to halt/break upon variable changes
- 30. Full support for fractional seconds (HH:MM:SS.SSS) for TIME and DATETIME data in the Data Browser and in database rebuilt processes
- 31. Expression Builder accept curly brace comments "{}" within expressions, to document the purpose/logic of the variable
- 32. New Data Designer "Column Name Template", providing a default value when adding new columns to tables
- 33. New "Run Selection" option in R:BASE Editor to run a highlighted block of code
- 34. New Excel 2003 PRINT/LBLPRINT report and label output type, XLS2003, to handle Unicode strings
- 35. Enhanced edit options for existing stored procedures to modify the source code, arguments, return value, and comment
- 36. Added Form Designer "Run Form (Live)" option to runs the form from the designer using live table data
- 37. Enhanced "Tab Order Settings" providing a separate "containers" panel, grouping controls by container-type objects
- 38. New Popup Menu support has been implemented for List View controls, to offer a right click popup menu to run procedures
- 39. Added R> Prompt Command History filter to limit the displayed commands, allowing users to easily locate a command previously used within a long Command History list

- 40. Integrated R:BASE database backup utility to backup one or more database, with options for automation
- 41. New "EEP Map" utility in Form/Report/Label Designers, to display all form EEPs in a single location
- 42. Added MODERN\_LOOK parameter for **DIALOG** command to use the modern look of recent Windows Aero releases
- 43. Preview WHERE Clause option in the Report/Label Designer allowing a WHERE Clause to be entered and applied to the preview results
- 44. Support for updatable cursors with BEFORE INSERT and BEFORE UPDATE triggers
- 45. New Form Designer alignment guidelines, which display when dragging/moving one or more selected objects, allowing easier placement of objects to align with existing objects
- 46. New "Custom Table Relationships" for multi-table forms and reports, providing Common Column Names, Primary Key/Foreign Key, and Custom table relationships
- 47. New **UTF8** operating condition to support Unicode characters for string function in applications and environments which will use higher character sets
- 48. Enhanced main title bar to include the full path where the connected database is located
- 49. New SysDialog internal plugin to create native dialog boxes with support for several buttons
- 50. Added "-BASE" command line parameter to initiate optimized Database Explorer settings for use in active server environments
- 51. New Variable Row Heights for Enhanced DB Grid controls
- 52. Enhanced Data Dictionary listing the Date/Time stamp for tables, views, forms, reports, and labels R:BASE X Enterprise only
- 53. Enhanced Data Dictionary listing the a table column name, data type and comment
- 54. New (separate) **PAGELOCK** operating condition, which specifies how R:BASE locks data in a multiuser environment based on the position of the row in the data file
- 55. Support to resize the Image List dimensions in .RBA application files, supporting images larger than 16x16 pixels
- 56. New **CHOOSE** command custom drawing options allow the displayed window to appear as a list view control
- 57. Enhanced stored procedure unload capabilities to create the .PRO source file, and a .RMD file with the same name containing the PUT command, with full parameters
- 58. Added R:BASE Editor "Trace" menu option to launch the Trace Debugger directly from the R:BASE Editor
- 59. Enhanced Report/Label Designer Expression Builder supporting Page Style, Column Header and Column Footer as options for variables to "Calculate On"
- 60. Enhanced R> Prompt "More output follows" dialog box to remain aside and non-modal, but prominent within the output console
- 61. Pop-up menu support for DB Memo and Variable Memo controls
- 62. Added Table Order option to over-ride the automatic selection-order of tables drawn into the Query Builder and Query Wizard
- 63. Increased query storage for the SELECT command in building views R:BASE X Enterprise only
- 64. New **RNDUP** function to return a number value rounded up to a specified number of digits
- 65. New (CVAL('TABLELOCKS')) function to return a delimited text string for all tables with a lock
- 66. Added Gateway sub-formats for the SQL Script export format; MSSQL, MySQL, InerBase/FireBird, Oracle, PostgreSQL, DB2, Informix, MS Access, SQLite
- 67. Added Scratch Pad utility to increase productivity during active development
- 68. Added **SELECT** Functions **PSTDEV** and **PVARIANCE** to support "population" standard deviation and "population" variance
- 69. EEP support in the Data Browser/Editor through the BROWSE and EDIT commands to launch a command file when a cell is clicked or double-clicked
- 70. Added RBTI System Variables supporting the ability to set the default directory, file name, and output type for the "Print to File" print dialog, before the dialog is launched
- 71. Added R:BASE Editor "Replace in All Files" option, to search and replace text strings in multiple files
- 72. Unicode support for extended characters Database Explorer comments
- Added Database Events for when disconnecting from the database and closing the R:BASE session -R:BASE X Enterprise only
- 74. Added option to display row numbers for tables, views, forms, reports, etc., with additional alignment settings
- 75. Added display of column comment descriptions and expressions within the status bar
- 76. Updated Table Privileges interface providing the **WITH GRANT OPTION**, allowing specified users to pass the granted table privileges to other users
- 77. Updated Table Privileges to allow multiple users to be provided with CREATE TABLE permissions
- 78. Added "Database Properties" reference, providing all general information regarding a database
- 79. Enhanced **COPY filespec** command to support combining of files
- 80. Database Explorer warning display of listed database files, informing users if a listed database is that of a version prior to R:BASE X R:BASE X Enterprise only

- 81. Added "Touch" utility to quickly update and save forms, reports, and labels when migrating between versions
- 82. DB/Variable Label rotation support for reports and labels
- 83. Enhanced Form Designer "Select Tables" dialog with Table Relation "One to Many" and "Many to Many" settings
- 84. New **FCONVERT** command to perform file conversions between ANSI, UTF-8, Unicode, and Base64 files
- 85. Added GATEWAY EXPORT format parameters for SQL compliant formats
- 86. New "Favorite Commands" utility at the R> Prompt to store and manage commonly used commands
- 87. Additional GATEWAY EXPORT parameters to control Unicode to ANSI conversions
- 88. New **CMPAUSE** operating condition (Cascade Modal Pause) determines whether to allow multiple visible PAUSE dialogs
- 89. Added Enhanced DB Grid functionality to change all (or multiple) column properties at once
- 90. New LVARIANCE function to return the variance for a list of values
- 91. New LSTDEV function to return the standard deviation for a list of values
- 92. New **LSUM** function to return the sum for a list of values
- 93. Enhanced File Sort options for the File List Box control, allowing the sort to be performed based on common fields
- 94. Added Character Case options for DB Memo and Variable Memo controls
- 95. Ability to modify the Default EEP assignment for form controls
- 96. Enhanced **SHOW VAR** command to allow sorting of variable output, with wild card support
- 97. Additional EEP events for nearly all form controls
- 98. A new system-wide application setting is available to specify if **DIALOG** boxes use the modern look of recent Windows Aero releases
- 99. Enhanced R:BASE Editor Structure Toolbar Settings allowing any R:BASE command to be added/ removed from the toolbar
- 100. Added support for Database Events with the SHOW command