

WEBSTER'S NEW WORLD™

COMPUTER DICTIONARY

TENTH EDITION

The Best Computer Dictionary Anywhere

Revised and updated

Contains extensive coverage of Internet and multimedia terms

Over 4,750 words, phrases, abbreviations, and acronyms

BRYAN PFAFFENBERGER

WEBSTER'S NEW WORLD™

COMPUTER DICTIONARY

10TH EDITION

By Bryan Pfaffenberger, Ph.D.



Webster's New World™ Computer Dictionary, 10th Edition

Copyright © 2003 by Wiley Publishing, Inc., Indianapolis, Indiana

Published by Wiley Publishing, Inc., Indianapolis, Indiana

Published simultaneously in Canada

No part of this publication may be reproduced, stored in a retrieval system or transmitted in any form or by any means, electronic, mechanical, photocopying, recording, scanning or otherwise, except as permitted under Sections 107 or 108 of the 1976 United States Copyright Act, without either the prior written permission of the Publisher, or authorization through payment of the appropriate per-copy fee to the Copyright Clearance Center, 222 Rosewood Drive, Danvers, MA 01923, (978) 750-8400, fax (978) 646-8700. Requests to the Publisher for permission should be addressed to the Legal Department, Wiley Publishing, Inc., 10475 Crosspoint Blvd., Indianapolis, IN 46256, (317) 572-3447, fax (317) 572-4447, E-mail: permcoordinator@wiley.com.

Trademarks: Wiley, the Wiley Publishing logo, Webster's New World, and the Webster's New World logo are trademarks or registered trademarks of Wiley Publishing, Inc., in the United States and other countries, and may not be used without written permission. All other trademarks are the property of their respective owners. Wiley Publishing, Inc., is not associated with any product or vendor mentioned in this book.

Limit of Liability/Disclaimer of Warranty: While the publisher and author have used their best efforts in preparing this book, they make no representations or warranties with respect to the accuracy or completeness of the contents of this book and specifically disclaim any implied warranties of merchantability or fitness for a particular purpose. No warranty may be created or extended by sales representatives or written sales materials. The advice and strategies contained herein may not be suitable for your situation. You should consult with a professional where appropriate. Neither the publisher nor author shall be liable for any loss of profit or any other commercial damages, including but not limited to special, incidental, consequential, or other damages.

For general information on our other products and services or to obtain technical support please contact our Customer Care Department within the U.S. at 800-762-2974, outside the U.S. at 317-572-3993 or fax 317-572-4002.

Wiley also publishes its books in a variety of electronic formats. Some content that appears in print may not be available in electronic books.

Library of Congress Cataloging-in-Publication Data is available from the publisher.

ISBN 978-0-7645-2478-3

Manufactured in the United States of America

10 9 8 7 6 5 4

goods and the accounting department writes checks. The reengineering strategy for this kind of setting may be to put computers in the receiving department so that the receiving staff can confirm what has been received and then write the checks on the spot. Experience in industry suggests that reengineering may fail if management ignores the need to enlist employee support for the significant and often threatening changes reengineering entails. See *software engineering*.

reflective liquid crystal display An LCD (liquid crystal display) with no edge-lighting or backlighting to enhance readability in bright-light conditions. Reflective LCDs are generally unsuitable for outdoor use.

reformat In operating systems, to repeat a formatting operation on a floppy or hard disk. In word processing or page layout programs, to change the arrangement of text elements on the page.

refresh To repeat the display or storage of data to keep it from fading or becoming lost. The monitor and random access memory (RAM) must be refreshed constantly.

refresh rate See *vertical refresh rate*.

REGEDIT A Microsoft Windows utility that enables knowledgeable users to edit the Registry directly. This should not be attempted by novices.

regexp See *regular expression*.

Regional Bell Operating Companies (RBOC) The regional telephone companies (Baby Bells) that were created as a result of the 1982 breakup of AT&T, which forced the former telephone monopoly to leave the local and regional telephone business.

register A memory location within a microprocessor, used to store values and external memory addresses while the microprocessor performs logical and arith-

metic operations on them. A larger number of registers enables a microprocessor to handle more information at one time.

register renaming A means of enabling software designed to run on x86 microprocessors, which can recognize only 8 registers, to use the 32 or more registers available in more advanced microprocessors with superscalar architecture. A microprocessor capable of register renaming differentiates between the registers an x86 program can address and the actual number of registers available, and will divert information sent to an occupied register to one that is not in use.

registration fee An amount of money that must be paid to the author of a piece of shareware to continue using it beyond the duration of the evaluation period.

Registry In Microsoft Windows, a hierarchically-structured database that provides programs a way to store configuration data, program file locations, and other information that is needed for the programs to execute correctly. The Registry replaces the text-based *.INI files used with Windows 3.1 applications. It is contained in two vital system files (user.dat and system.dat); if these files become corrupted and backups are not available, reinstallation is required. See *REGEDIT*.

regular expression (regexp) A notation system for describing text patterns in search and search-and-replace procedures. Originally developed for the text-processing tools included with the Unix operating system (such as awk and sed), regular expressions are now supported by numerous programming languages and applications. Although the notation is difficult to learn, it is much more powerful than the text searching options normally supplied with end-user applications or operating systems.

A regular expression contains ordinary characters as well as metacharacters, which

have special meaning. The following lists commonly used metacharacters:

.	Matches any single character.
\$	Matches the end of a line.
^	Matches the beginning of a line.
*	Matches zero or more repeated occurrences of the preceding character.
[]	Signals a bracketed expression, which matches any one of the characters within the brackets.
()	Signals a grouped expression (block).
	Inserts a logical OR operator.
+	Matches one or more occurrences of the preceding character or block.
?	Matches 0 or 1 occurrences of the preceding character or block.

Examples:

[a-z]	Matches any lower case letter.
[A-Z]	Matches any uppercase letter.
[a-c]	Matches <i>a</i> or <i>c</i> .
[warm cool]	Matches <i>warm</i> or <i>cool</i> .
[ch]?at	Matches <i>at</i> , <i>cat</i> , and <i>hat</i> .

Regular expressions are derived from various strands of mathematical theory, including automata and formal language

in a mathematical notation called regular sets. Unix co-author Ken Thompson incorporated this theory into several Unix utilities (most notably *grep*).

Reiser file system A journal file system for Linux that offers faster system starts, more efficient disk usage than the ext2 file system, faster access and retrieval times, and better recovery from system failures. See *ext2, journaled file system (JFS)*.

relational database A type of database constructed of multiple tables of data that are inter-related. Complex searches can be performed to view the data in many different ways. Opposite of flat file database. See *join, relational database management*.

relational database management An approach to database management, employed by Microsoft Access and other database management programs, in which data that is stored in two-dimensional data tables of columns and rows can be related if the tables have a common column or field. The term "relational" suggests the capability of this type of database software to relate two tables on the basis of this common field and to construct a new third table based on this relation. For example, suppose that a bookstore's database program stores one table listing customer names and customer numbers, and a second table listing customer numbers and the subjects of the books purchased by the customer with this number. By formulating a query, a user could produce a third, new table that lists the customer name and the subjects of the books purchased by this customer. The customer number provides the common field by which the two original tables can be related. See *join, relational database management system (RDBMS)*.

relational database management system (RDBMS) A relational database application, especially one that comes with all the necessary support programs, programming tools and documentation