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ReactOS Logo

[Open Source Reaction To Windows XP](#)

Maybe Vista is next on the list

Windows XP seems to have been among us for ages and, for those who have taken up computers only a few years ago, it may be perceived as the way to follow if you want to properly use a computer. Sure, this happens if you grow your computer skills in a Windows environment as there are other solutions on the market to choose from: Mac provides that clean and simple to handle environment, Linux makes available a myriad of distributions. I will stop to these two alternatives as they are the most spread OSs and benefit from the largest market share, for now.

But regardless of these two operating systems, Windows XP has risen above them and became the most popular OS of all times. But times are just beginning and it seems that there are parties wanting to combine all of XP's functionality, ease of use and adaptability to hardware, into one free of charge package. Makers and creators of ReactOS have taken upon themselves the task of building a Microsoft Windows XP compatible operating system. That is not to be confused with duplicating XP, as the ReactOS team try to develop a similar architecture that will permit the end user the utilization of ReactOS with the same ease as Windows XP.

This means the main goal is to make ReactOS so similar to Windows XP that complete binary compatibility is achieved with both applications and device drivers designed for windows NT and XP systems. The result would be an XP equivalent that is open source (anyone can modify it) so everybody can use it for free, no strings attached.

The project is presently in alpha stage, and, being a work in progress, there is no room for criticism. Based on Windows server 2003 architecture, ReactOS comes with a monolithic kernel which is yet able to load modules, having the Executive as the lowest layer (comprises everything that runs in kernel code: Hardware Abstraction Layer (HAL), Device Drivers, The Kernel and System services).

ReactOS aims at becoming an alternative to Windows XP by being able to run all XP native applications and taking care of hardware compatibility the same way as Microsoft's OS. However, ReactOS is not meant as a clone of XP but an open source alternative.

Installing the operating system is similar to installing Windows XP in many ways, but the process is much swifter in completion. You go through the same steps of copying the files and then getting to the setup part. The similarities go as far as the operation of choosing the primary partition and formatting it are almost identical. But there is no support for NTFS file system and you will have to go with FAT for now (NTFS is planned to be supported at some time as it is an important feature).

Although the looks are not the main concern at this point, it has to be mentioned that they resemble Windows 2000. However, I was much more interested in the way the new OS feels and moves rather than its panache. As you can see from the images, ReactOS takes a lot of Windows with it, trying to offer the end-user the familiarity of Windows but in a slightly different shell. The functional layout available in all Windows editions seems to have been mimicked with some success and even a non-skilled computer user could easily have his/her way through the interface.

Following Windows example, ReactOS comes with its own file manager called React Explorer, but there is no native web browser to use the moment all OS settings have been made. Nevertheless there is an alternative to browsing as the operating system offers the possibility of downloading certain tools from Internet & Network category (Firefox 1.5 and 2.0, mIRC, Miranda IM, Samba TNG and Thunderbird), Development, Games and some tools like [uTorrent](#) and [7-Zip](#)

But, unlike any Windows out there, ReactOS comes with its share of improvements designed to inject more flexibility into the operating system and permit the user greater control over the loaded tasks. ReactOS comes with a quadruple desktop with each instance functioning independently, meaning that Task Manager (yes, there is one available) will display only the apps available on the currently active desktop. You can move from one desktop to another with a single click and handle a much greater number of applications with the least effort.

Software compatibility does not seem to be an issue as Mozilla Firefox worked pretty good during our testing and besides some visual side effects that occurred due to some driver issues, there wasn't too much trouble. Sure, the fact that the operating system was run in a virtual machine also complicated things a bit.

Getting deeper into what ReactOS offers follows the same line of comfort, but the project's alpha stage is given away by areas that are not complete yet, like Network Connection which cannot be accessed, or screen resolution which cannot be adjusted in any way. However, these are but two of the incompleteness stage of ReactOS and all along the use of this XP future substitute you can also bump into driver incompatibility issues, software incompatibility or system crashes. These are but normal in such an early stage.

Nevertheless, considering that ReactOS started duplicating Windows from scratch, it has done an impressive job by now, creating an environment as similar as possible to Microsoft's operating system and preserving the ease of use as well as nags. My only

concern is duplicating driver compatibility which has drastically changed in Vista with the introduction of Windows Driver Foundation and the NT file system. Hopefully the team will succeed in taking all this effort to the realms of success and provide an open source alternative to XP.

All I can say is good luck with the project and may you overcome all obstacles, be they legal or programming related. I really wish to see the outcome of this project (although, to tell you the truth, I only see benefits for the members of the team as they learn a lot together and can later use it for other, "richer" projects) and hope to run a fully loaded ReactOS on my PC some day.