

By Jack Wallen

If you know Linux, you know there are tons of options on every level. To some, this might seem overwhelming at first. To others, it's all about possibility. The desktop is certainly not without options. In fact, the Linux desktop might very well be the area where there are the most options. But for a lot of users, desktop selection doesn't usually go beyond KDE or GNOME. With this article, I hope to help the average Linux user get beyond the standard fare.

1 Enlightenment

I have to confess I put this at the top of the list because it is my favorite Linux desktop. This desktop is all about being full of eye candy, while at the same time being lightweight and fast. Enlightenment was created by Carston Haitzler (Raster) in 1996. He created Enlightenment to be a lightweight window manager that didn't lack style. He succeeded (and then some).

Currently, Enlightenment is enjoying two releases: E16 and DR17. E16 is the current stable release and DR17 is the development release. The two releases are very different from one another. DR16 takes a far more minimalist approach to the desktop than DR17 does. Without Panels and Icons, the DR16 desktop is made up of three mouse menus (one for each button), an Iconbox (where windows are Iconified -- or minimized), a Pager (to switch between desktops), and the Dragbar (which allows you to have desktops layered on top of one another.)

The DR17 release removes the Iconbox and the Pager and adds Shelves, which are Panels that house application launchers, pagers, clocks, etc. Even with the creation of a more standard desktop, DR17 retains its uniqueness as well as its speed. If you're looking to give DR16 a try, you can install it via the standard Linux installation methods. Your best bet for DR17 is to give the gOS Rocket or the EliveCD distributions a try. And you should... it's that cool.

2 AfterStep

This is another of my favorite Linux desktops. Or at least it was back in early days of Linux. This desktop attracted me because it was one of the first (back around 1998) to use transparency. AfterStep was actually a fork of FVWM rebuilt to resemble the NeXTSTEP desktop. Like FVWM, AfterStep is light, quick, and can be as minimalist (or not) as you like. The main features of AfterStep are a mouse menu, Pager, Wharf (a dock-like applet), and the Winlist (a panel showing active applications). AfterStep is highly configurable via flat text files (so configuration requires getting to know the layout of configuration files.)

Currently AfterStep is enjoying the 2.2.8 release and is headed up by Sasha Vasko. One of the best aspects of AfterStep is the ability to granularly configure the look and feel. From timing of auto-raising windows to placement of titlebars (titlebars can be placed along a horizontal or vertical plane), AfterStep can be configured to a much higher level than most other window managers. You can install AfterStep your usual way. For example, in Mandriva, run the command `urpmi AfterStep` to install.

3 Fluxbox

Fluxbox is probably one of the lightest of the lightweight window managers for Linux. It's lightning fast and incredibly stable. Fluxbox shines in bringing new life to old hardware. And Fluxbox is a gift for those who prefer a minimalist approach to the desktop. Fluxbox is a fork of the Blackbox window manager and was created out of a need to add more features to Blackbox.

The Fluxbox desktop contains a mouse menu, a toolbar, and the Slit. The Slit is a small dock where self-contained applets reside. All basic configurations are handled via flat text configuration files. This manual configuration includes everything from the theme to the menu. To give you an idea of the size of the Fluxbox window manager, the rpm installation file is 1,196 KB. To put this into perspective, the KDE 4 install base is 644.2 MB.

Installing Fluxbox is simple. You can either search for Fluxbox in your graphical installation application (such as Synaptic or Yumex) or you can install via command line (for example: `urpmi fluxbox` in Mandriva.) If you're not into installing on your own, you can try the Ubuntu-based distribution, dedicated to Fluxbox, aptly named Fluxbuntu.

4 XFCE

XFCE is quietly gaining ground on the Linux desktop with help from Zonbu, Mythbuntu, Slackware, and Gentoo. It's another lightweight desktop that has a more traditional desktop approach, with icons, panels, start menus, and system trays. The XFCE desktop is far less configurable than many of its peers. XFCE was created to be very modular so you can install as much or as little as you want. XFCE is also separated into applications: XFWM (the XFCE window manager), Xfmedia (the XFCE media player), Orage (the XFCE calendaring application), and Thunar (the file management tool). It is interesting to note that Thunar is also now the file manager for Enlightenment DR17.

Installing XFCE is as simple as running `urpmi xfce` (in Mandriva) or opening up your graphical installation tool and searching for XFCE. If installing isn't for you, you can download a number of distributions (Gentoo and Slackware for example.) The Mythbuntu Media Center distribution also relies on XFCE for a desktop.

5 Compiz/Compiz Fusion

When you talk Compiz, you're talking full-blown, eye-popping 3D desktop goodness. Compiz/Compiz Fusion (they are actually two different projects) is the one desktop to install when 1) you have the hardware for it and 2) you REALLY want to impress your friends and family. Compiz is the original 3D Linux desktop. Compiz Fusion is a merging of Compiz and the now-defunct Beryl Project. Both of these projects mimic some of the features of Apple's OS X but take them to new places.

One of the most amazing features of Compiz and Compiz Fusion is the Cube. The Cube takes the flat Linux pager metaphor (the ability to have multiple desktops) and folds the desktops into a three dimensional cube. With a click of the middle mouse button the desktop cube zooms out and you can rotate the cube to the cube face you want to work on. Add to this the ability to make the cube (and everything on the desktop) translucent and you have a very impressive desktop.

Installing Compiz isn't for the faint of heart. It requires a number of pieces to be put together, a video card that supports AIGLX, and some patience. But the time and effort are very much rewarded with one of the coolest desktops to date. If you don't want to take the time to install, you can give the latest Mandriva or the latest OpenSuSE a go. With the right hardware, you should have a working 3D desktop upon installation.

6 IceWM

The developers of IceWM are proud of the fact that this lightweight window manager shares absolutely no code with any other window manager (written completely in C++). IceWM can be made compliant with GNOME and can use Imlib for graphics support. IceWM is a fairly straightforward window manager with few frills. The desktop is a panel, a start menu, a system tray, and a pager, and that's it. IceWM is as configurable as any standard window manager but doesn't boast the eye candy that Enlightenment or AfterStep does. But unlike Enlightenment DR16, IceWM does have a graphical control center for configurations. IceWM is easily installed via the command like (for example `yum install icewm` in Fedora).

7 Windowmaker

Another NeXT-based window manager, Windowmaker took what NeXT did right and did not add FVWM on top. Windowmaker is yet another lightweight, super-fast, highly stable Linux window manager. It takes a minimalist approach but does support most image formats, and it has sliding application menus that can be torn off and pinned. (You can break off a submenu and anchor it to the desktop, leaving it open until you manually close it.) All configuration changes happen in real time. Windowmaker does have a dock where applications can be launched, but it's not the shadowed, animated dock found in OS X.

Windowmaker can be installed via command line, as in *urpmi windowmaker* in Mandriva, or it can be found in the package administration tools, such as Synaptic.

8 Metacity

For one brief period, Metacity was the window manager used in the GNOME desktop. Eventually, Metacity broke out on its own. Created by Havoc Pennington (of Red Hat), Metacity uses the GTK+2 toolkit. Pennington has described Metacity as "intentionally boring" even without a logo. Metacity does not include numerous features. Instead, it glaringly boasts "good defaults." One would describe Metacity as a typical old school UNIX-like window manager. In fact, it's clean to the point of being almost sterile. But that doesn't mean it is without merit. Metacity is lightweight and fast. It is also very much a *NIX window manager, in that it can be installed in nearly all *NIX operating systems. Many distributions (such as Mandriva) install Metacity by default. If Metacity is not installed by default, it can be installed by command (such as *yum install metacity*) or it can be found in the package administration tool.

9 FVWM

FVWM was, at one time, the dominant window manager for the Linux operating system. In fact, my first exposure to Linux was the FVWM window manager, and I distinctly remember how like Windows 98 it was -- though not as "clean." FVWM has an interesting history. Robert Nation was the creator back in 1993. He was tired of the limitations of one of the only UNIX window managers, TWM, during his work with the DoD. Nation had already created the rxvt terminal emulator and decided to bundle FVWM with a release of rxvt. He handed FVWM over to another developer a year after its release. The current version of FVWM is 2.4.20, but interestingly enough, Nation's last release, 1.24r, will still compile and run on modern Linux distributions. FVWM has a number of derivatives, including AfterStep, Enlightenment, and Windowmaker. To install FVWM, just run *apt-get install fvwm* and accept the dependencies.

10 CDE

CDE isn't really a Linux desktop, but it deserves mention because it heavily influenced so many Linux desktops. CDE (Common Desktop Environment) was created by a collaboration between Sunsoft, HP, IBM, and USL (a collaboration called The Open Group) in 1993. This new desktop was based on HP Visual User Environment and was derived from the Motif Window Manager. For a long period, CDE was the standard UNIX desktop environment. But in 2001, it was briefly phased out in favor of GNOME (until GNOME's instability caused the return of CDE).

CDE is a fairly standard desktop consisting of a panel and start menu. Its biggest downfall is its antiquated UNIX-like look, lack of anti-alias font support, and confusing configuration. CDE is primarily a Solaris desktop but will install on AIX and HP-UX.

And there you have it: 10 Linux desktops (well, nine, really, plus one UNIX) that are all very different, very usable, and very available. You may be happy with your current desktop, but if you really are a fan of Linux, you owe it to yourself to try out one or more of the ones described here. There are plenty more Linux desktops; but these are the best alternatives. Give them a try and report back here to let us know your favorite.

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