



An Introduction to Open Source Software

Open Source Victoria, an industry-cluster funded by the Victorian government, has prepared the following material as an introduction to open source software and its applicability to Australian small-medium- enterprises.

Open source software (OSS) is now the first choice for sourcing cost-competitive business solutions. Over the past 15 years, open source software has established a solid reputation in the ICT (Information and Communication Technology) industry as business-grade production-ready software. In some sectors it has become the industry standard (e.g. web, Internet and computation servers, firewalls, scientific workstations etc.). Almost all major vendors, including Sun, IBM, Hewlett-Packard, Oracle, Novell, Dell, Intel, NEC, Motorola among them, support Linux and open source and are investing many billions in the platform.

The Advantage That is Open Source

Open source applications range in sophistication from the very basic to the super capable. All of them can be downloaded for zero cost. A significant portion can be deployed and be ready for action within a few clicks of the mouse. Although some perhaps, need access to IT-savvy staff. Professional assistance may be required in the case of installing or modifying major software.

Lowest Cost of Operation

All businesses should use the most cost-effective tools to perform their operational tasks. In most circumstances, open source software offers the most cost-effective solution for business needs. The following document provides an analysis of a number of purchase and operational cost scenarios which show why open source is often the better choice:

http://www.cyber.com.au/about/linux_vs_windows_tco_comparison.pdf

Besides reducing the expense of owning computer technology, open source offers a number of innate strengths that businesses need to be aware of when contemplating a software solution:

Zero License Costs

Commercial entities involved in open source software make their money from services, NOT licenses. You can download the software at no charge. If you prefer, you can buy the same software on manufactured CDs or in boxed sets. Individuals and companies are allowed to charge money for distributing this open source software, but because of strong competition, most only charge the cost of the distribution media plus postage and a little extra. You can install the software on as many computers as needed, no licensing hassles! Reuse as often as you like, redistribute as widely as you like.

Better Security

Open source platforms are designed from the ground up with security in mind and embedded in the architecture. The community of developers is on constant guard for any potential threats, often filling-in possible breaches before any damage is done. Open source platforms like Linux do not suffer from the add-ware, spy-ware or key-logger problems that plague the mainstream platform daily. There are 10,000 times more viruses, worms and other malware targeting the prevailing commercial operating system than there are for Linux. Linux users do not need to bother with the hassle and expense of running anti-virus programs. Few have ever been hit by a virus infestation, even after running Linux for years.

Flexibility

Open source offers a large choice of tools for most common business tasks. Hence better fit for individual needs. Also many open source solutions are available on multiple platforms (Windows, Linux, Mac, Unix). Add to that the important fact that open source solutions commonly excel at being interoperable with other technologies. Put together, this makes open source applications the most flexible available today.

Open Systems

Open source is licensed in such a way as to guaranty access to the source code and permission to change that code as desired. Having these freedoms establishes an economic model which greatly reduces scenarios where users are locked into one vendor's products, which often constitutes a serious business risk with proprietary software. By avoiding being locked into one vendor and becoming totally dependant on that vendor, businesses gain pricing negotiation leverage. As mentioned above, in the open source world open standards generally apply across the board (open file types, open communication protocols etc.). Businesses therefore enjoy the benefit of increased interoperability between competing or complimenting systems, further increasing their negotiation positions with their suppliers.

Easily Customisable

In some cases, businesses need special extensions to the base software platforms which are available. Because open source solutions are provided with source code, businesses can readily hire local programmers to make minor changes to those applications.

NOTE: In this document, we have taken pains to ensure that references to commercial

vendors have been removed. If you feel that having this information included will be a benefit to your constituents, Open Source Victoria is happy to provide this information.

Australian Government and Open Source

The Australian government also recognises the merits of open source software and has commissioned a study called "A Guide to Open Source Software for Australian Government Agencies":

<http://www.sourceit.gov.au/sourceit/oss>

While the guide covers the issues as they face government agencies, we feel that many of the points are relevant to SMEs as well.

Hence we feel that open source can offer your constituency a vast array of appropriate solutions, often with clear cost, security and flexibility advantages. In the following, we ask you to seriously consider the exciting possibilities available.

Due to the vast number of open source solutions available, it is often hard for newcomers to know where to begin. As an introduction to open source we present a number of common, business-grade, solutions. As there are over 100,000 open source applications, this is merely a taste of the enormous potential waiting to be discovered by small to medium size business enterprises:

Common Desktop Productivity Tools

We will outline a handful of common open source desktop applications that are available for the main business platforms in the market today: Windows, Mac, Linux.

Office Suites

OpenOffice.org

<http://www.openoffice.org/>

A full-featured office suite which is as powerful as Microsoft Office, yet totally free. Includes a word processor (Writer), spreadsheet (called Calc), slideshow presentation manager (Impress), drawing program (Draw), database application (Base) and a mathematical equation editor (Math). Because it's open source, OpenOffice.org can be copied freely and installed on as many computers as needed. No licensing hassles! It is a sizable download from the openoffice.org website, or you can purchase a copy on CD for a nominal sum from a local supplier.

OpenOffice is a multi-platform (Windows, Linux...), multi-lingual office suite. You are able to save and read documents written in other suites, like Microsoft Office.

Note: OpenOffice.org 2.0 is presently in beta trials, so we recommend you download and use version 1.1.5 for production use, however 2.0 shows you where the application is headed.

Word Processing

AbiWord

<http://www.abiword.org>

Compact, fast, reliable and free. Highly recommended for those who need simple yet capable word processing.

Web Browsers

Firefox

<http://getfirefox.com/>

“Beware of spyware. If you can, use the Firefox browser.” - USA Today

“Better than Internet Explorer by leaps and bounds.” - FORBES

Firefox, the best web browser on the Internet today for its unique combination of speed, security and convenience. Like no other browser in existence today, an award winning smart browser, powerful and feature-laden. Firefox keeps your computer safe from malicious spyware by not loading harmful ActiveX controls. A comprehensive set of privacy tools keep your on-line activity your business.

Email Client

Thunderbird

<http://www.mozilla.org/products/thunderbird/>

Thunderbird, a highly customizable, secure, feature packed, e-mail client. Its core architecture designed to be hostile to virus incursions. Advanced tools for junk mail detection in particular and message filtering in general allow for speedier more efficient reading/writing of mail.

Internet Suite

Mozilla

<http://www.mozilla.org/products/mozilla1.x/>

Mozilla offers an all in one integrated suite of Internet applications: web-browser, advanced e-mail and newsgroup client, IRC chat client, and HTML editing made simple.

Instant Messenger

Gaim

<http://gaim.sourceforge.net/>

Most users have friends that use different instant messaging clients to their own. Rather than operating multiple IM clients, why not use Gaim?

Gaim is a multi-protocol instant messaging (IM) client for Linux, BSD, Mac OS X, and Windows. It is compatible with AIM and ICQ (Oscar protocol), MSN Messenger, Yahoo!, IRC, Jabber, Gadu-Gadu, SILC, GroupWise Messenger, and Zephyr networks. Other instant messaging clients may be free as well, but most are not as flexible as Gaim.

Jabber

<http://www.jabber.org/>

If you want to have instant messaging for your business but can't trust using public instant servers, then you can install the Jabber instant messaging server instead. Jabber makes it possible to install your own IM server within your office.

Generally speaking for personal/home use Gaim is recommended; for industrial strength applications, Jabber.

Linux desktop

<http://www.ubuntulinux.org/>

While Linux is well known as a business server platform, it can also be used in many PC desktop situations. Linux is commonly distributed together with a massive aggregation of applications. In most instances, Linux comes bundled with over a thousand separate application packages. Office productivity tools, knowledge management tools, groupware applications, networking software, communications tools, multimedia & graphics packages... All are easy to install off the Linux installation CDs, are fully integrated into the operating system and come with plenty of help documentation.

Server Applications

Linux

<http://linux.com/>

Linux is the most popular server on the Internet and is becoming the most popular server in the industry. Linux excels at email-servers, file-servers, SQL database servers, print-servers, web-servers, application servers and security servers. With zero licensing costs and a solid reputation for stability and reliability, it is not surprising that Linux is the server platform of choice in many organisations.

Groupware

The term Groupware refers to software that enables group collaboration over a network. Shared authoring tools, online forums, electronic whiteboards... Basically the kind of technologies that increase collaboration at a distance. The following represent only a drop in the ocean in terms of open source groupware.

Group-Office

<http://www.group-office.com>

The community version is sufficiently mature and feature rich to satisfy most SMEs. We have been successfully deploying it on client sites with email server back-end as a complete Intranet/Internet office/email solution.

PHProjekt

<http://phprojekt.com>

An advanced groupware/project management tool. Current version 5.0 should satisfy the needs of most business enterprises, even large ones.

Content Management Systems (CMS)

Content Management Systems allow you to operate a professional appearance on your website. The following three links will give you an idea of the caliber of the content management systems (CMS) that are open source.

Mambo

<http://www.mamboserver.com/>

Probably the best all-round content management system for small-medium business. Mambo is a feature full industrial strength CMS, yet relatively simple to use. It's also developed right here in Melbourne by an Australian open source development firm. Lots of useful addons (literally dozens, in various categories) make Mambo into a truly versatile tool.

Typo3

<http://www.typo3.com/>

Typo3 is a powerful CMS which has been around for a long time. Ready to deploy out-of-the-box, user friendly and intuitive. But Typo3 also delivers a base platform for more heavy-duty CMS deployments, offering developers an elaborate platform with hundreds of plug-ins and over 1600 pages of references and tutorials.

Plone

<http://www.plone.org>

Plone is ideal as an Intranet and extranet server, as a document publishing system, a portal server and as a groupware tool for collaboration between separately located entities.

Customer Relationship Management

All businesses need a way to track their relationships with their clients. As a parting sweetener we recommend that you have a look at the following excellent open source Customer Relationship Management (CRM) solution:

SugarCRM

<http://www.sugarcrm.com/>

SugarCRM is a suite of business automation tools for managing your marketing, sales and customer service operations. From leads to contacts, opportunities to cases, the Sugar Suite helps you track and gain insight into your customers.

Summary

So there is a lot out there. New open source software solutions are being added every day and the existing ones are improving weekly, filling the gaps in some fields, taking the initiative in some others. There is certainly a vigorous presence in most important areas of business software. It is important to understand the particular strengths that the communitarian and open philosophy of the open source paradigm imparts to its productions. In many respects SMEs are the ideal client since most of the software is written for them, bringing cutting edge communications/management technologies, previously the exclusive prerogative of large corporations, to the average Australian business.

Recommended Links

Over 100,000 open source applications are available at no cost here.

<http://sourceforge.net/>

<http://freshmeat.net/>

If you are interested in more information, or have some further questions, we are more than happy to discuss this further; or any other issue that may arise.

Wishing you all the best,

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