

....CPS BULLETIN....

The Newsletter of CPS Actuaries and Computer Programming & Systems, Inc.

Volume 7, Issue 4

April 2007

Introduction

This issue of **CPS Bulletin** leads off with an article about Vista, the new Microsoft Operating System. There has been so much interest in the system by our clients that we have done some testing of the system and compared our conclusions with those of other experts to make sure we give our clients and friends the best advice when we council restraint in upgrading to Vista. In addition, we will be happy to hear our readers' Vista experiences, in particular to hear whether or not you agree with our determination.

We recently carried out mortality studies for some of our clients in conjunction with the introduction of new plans using the 2001 CSO Table and we discovered some with surprising results. We decided to review our knowledge of factors affecting mortality and our second article in this issue shares some of the more interesting information we found.

We hope that you enjoy receiving this newsletter. If you have any comments or suggestions on how we can improve **CPS Bulletin**, please contact us by visiting our company web site at www.cpsincorp.com ❖

It Is A New Vista Out There

The new Microsoft operating system ("OS") called Vista has been out for a few months and it requires a special effort to buy a new computer that does not use the Vista OS. So should you upgrade to Vista?

Vista was a major effort by Microsoft. It is said that it took 10,000 Microsoft employees 5 years to write the new system, which works out to an investment in the region of \$5-\$10 billion. The major motivations for the new system were (1) to make the system more secure, (2) to improve the search function - all of us know how frustrating it was to search all of your hard drive for a file or a keyword without being able to narrow the search to specific directories or other locations, (3) to provide an updated, modern face to the computer using the advances in graphics and other software, and (4) improve overall reliability and stability (less rebooting).

The product works pretty much the same way as Windows XP but Vista is much prettier than previous versions of Windows. Its icons look better, windows have translucent borders, and items in the taskbar and in folders can display little previews of what they contain. Security is supposedly vastly better; there are some new included programs; and fast, universal search is now built in. There are hundreds of other, smaller, improvements and additions throughout the system, including parental controls, better home networking and even a slicker version of Solitaire.

Vista now has rapid, universal, built-in search. The main search box is contained at the bottom of the Start menu, and works well. Other search boxes appear in every open window. You can also save searches as virtual folders, which will keep collecting files that meet the search criteria.

Reliability goes hand-in hand with security. Stricter internal security policies make it harder for processes to misbehave. The new reliability and performance monitor

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is way ahead of anything XP has to offer when it comes to diagnosing system problems and tweaking performance. One security feature is a secure boot-up process that helps prevent someone from gaining access to your data if your PC is lost or stolen.

Significantly, Vista Home Premium includes capabilities for turning your PC into an all-in-one home entertainment center. Windows Media Center in Vista provides new ways to enjoy music, photos, and DVD movies. You can record and watch your favorite TV shows (even HDTV) and access new kinds of online entertainment content. You will also be able to connect Vista Home Premium to your Microsoft Xbox 360 to extend your Media Center experience to multiple rooms in your home.

There are several versions of the Vista OS. The 3 main ones being Home Basic, Home Premium and Ultimate. Even if you buy the Home Premium or Ultimate editions, Vista will revert to the Home Basic features if it detects that your machine is not powerful enough to run the new user interface. The entry-level Home Basic edition omits many of the new features of Windows Vista: notably the new 3D-accelerated desktop, along with all its transparency and live thumbnail effects.

However, there are some big downsides to this new version of Windows.

Hardware: To get the full benefits of Vista, especially the new look and user interface, which is called Aero, you will probably want a new computer since Vista requires lots of memory. The hundreds of new features jammed into Vista (such as basic photo-editing capabilities for easy touchup jobs or launching a slide show with just a single click) have made it a prime example of software bloat. The vast majority of existing PCs will not be able to use all of Vista's features without major hardware upgrades. They may be able to run a stripped-down Vista version, and even then it may run slowly. Microsoft offers a free, downloadable Upgrade Advisor program that can tell you how ready your XP machine is. The advisor is available at: www.microsoft.com/windowsvista/getready/upgradeadvisor.

Even though Microsoft says that Home Basic can run on a PC with half a gigabyte of memory (RAM) and that Premium and Ultimate will work on a PC with one

gigabyte of memory, experts strongly advise at least doubling those numbers!

Security: One visible security feature asks for your permission before you do potentially dangerous tasks, such as installing new software. This is good, but this system does not necessarily require you to type in a password, so a stranger or a child using your PC could grant permission for something you yourself might not allow.

Despite all the new security advances, even Microsoft admits that additional security software will be needed.

Vista's greatest security concerns have yet to come since hackers have not had much time to study the new system and test its weaknesses. One security company says that its analysts have so far found five ways to bypass Vista's User Account Control ("UAC"), the system of user privileges that can be used to restrict users' administrative rights, and that hackers will certainly find more security holes. Many experts say that UAC will be so annoying that users will disable it. Moreover, Symantec has claimed that PatchGuard (a system designed to protect the Vista kernel) is hurting security vendors more than it was hurting hackers

Software: Makers of Windows software and hardware have thus far failed to update their products to work smoothly, or to work at all, with Vista.

On balance we recommend that if you do not have to buy a new computer right now, don't! Vista is simply not ready for the big time just yet. Microsoft will no doubt upgrade the system, software writers will rewrite their applications for Vista, security software will be modified, but all this will take time – six months at the very least.

If you absolutely have to buy a computer now, you may wish to buy a higher end business class machine. This will have two advantages. One is that you will be able to get such a machine with Windows XP rather than Vista. Second, when the time is ripe to upgrade to Vista you will have a computer with more than the minimum configuration to run Vista Home Basic or preferably Vista Home Premium.

If you wish to buy a Windows PC, CPS will be pleased to assist you in selecting an optimal configuration for your computer. ❖

Musings on Mortality

The 2001 CSO Table will become mandatory beginning January 1, 2009 for all new issues. A lot has happened to mortality since the 1980 CSO Table was adopted and this article will provide some general information regarding the recent improvements in mortality.

How significant is mortality to insurers? For basic insurance contracts such as term and whole life insurance, mortality levels are very significant, especially at the higher ages. At normal rates of interest of 4-6%, mortality at age 60 is one fifth the importance of interest earned. By age 79, the two forces are about equal and by age 85, mortality is 2½ times as important. This means that for contracts that are likely to be issued at older ages (such as final expense), mortality levels are especially significant.

What are the principal factors affecting mortality rates?

A: Genetics:

DNA. It is currently believed that between one quarter and one-third of mortality is gene related, so that if the insured's immediate family exhibits longevity, the insured is more likely to also live longer.

Gender. Women on average live longer than men by about 6 years. No one is sure why this is so. Suggested factors are that (a) women often seek medical care sooner than men, (b) they have higher levels of "good" cholesterol, (c) under stress women's bodies release oxytocin (the bonding hormone) which encourages women to seek help for stress and forms a coping mechanism, and (d) women have lower suicide rates.

Race: Asians tend to live longer than whites who in turn live longer than blacks. The current difference in life expectancy at birth between blacks and whites remains substantial, 6.3 years for men and 4.5 years for women.

B: Secular factors:

Time: Mortality has been rapidly improving since the second world war. In 1945, the US life expectancy was 65.8 years; it is now (2005) 77.7 years, largely owing to reductions in cardio-vascular deaths.

Chronic conditions: From the 1970s on, new evidence has been emerging that chronic disease is partly rooted in infancy and childhood. Improved neo-natal care has helped in that lifespan increase.

Childhood: A Norwegian study of 227,000 people found that men who were under- or over-weight as teenagers have a greater chance of dying during adulthood than their ideally-weighted peers.

Socio economic status: The impact of socio-economic status on mortality has been observed many times in mortality research. Greater wealth tends to lead to better nutrition and better medical care, resulting in lower mortality.

C: Environmental Factors:

Tobacco smoking and alcohol consumption are generally accepted to significantly reduce longevity. However there are countries that appear to defy these factors. For example, Japan is a country with a high rate of tobacco consumption, yet has one of the highest life expectancies in the world (81.1 years). Similarly, France is noted for high alcohol consumption, yet has a life expectancy of 79.6 years.

Physical fitness: We all know that being physically fit will increase one's life expectancy. Typically, a loss of muscle mass, accompanied by a gain in fat mass, occurs with aging. Research has found that a person's physique can be improved by changing their "metabolic rate". Strength-training exercises can raise the metabolic rate by about 30-50 calories per day, and over the course of three months of appropriately designed strength training one can gain about 3 pounds of muscle, amounting to a total boost in the resting metabolic rate of 7%. Put another way, working out for "just" 1/2 hour a day can increase one's chances of reaching age 90 by up to 30%.

Diet and weight: So many books have been written on the subject that it would be banal to try and summarize these findings in a paragraph. The bottom line is that a healthy and sparse diet leads to a longer life span. For a superb treatise on the subject see "What Color is Your Diet" by David Heber, M.D., Ph.D.

An active mind: Learning new skills can lead to a longer life. These skills should be completely new to the individual to have the most impact, i.e., it is not sufficient for an actuary to study a new mathematics book, but learning to chop wood would do the trick.

Chores are good. The Nurses' Health Study, a 20+

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year-long study of over 80,000 women between the ages of 34 and 59, found that sedentary women who began to engage in heavy gardening or heavy housework significantly reduced the chances of premature death.

What of the Future?

The mainstream view on the future of longevity, such as the US Census Bureau, is that life expectancy in the USA will be in the mid-80s by 2050 (up from 77.7 in 2005) and will top out eventually in the low 90s, barring major scientific advances that can change the rate of human aging itself. However, recent increases in the rates of lifestyle diseases, such as diabetes, hypertension, and heart disease, may drastically slow or reverse the trend toward increasing life expectancy in the developed world.

Since 1840 life expectancy has risen linearly for men and women, albeit more slowly for men. For women the increase has been almost three months/year

In light of this steady increase without any sign of a cap, will the biblical lifespan of 120 years be proved right or will our grandchildren live to 150? Let's hope we all stay healthy enough to find out.

About CPS

CPS Actuaries and Computer Programming & Systems, Inc.

CPS is an independent company with over 40 years of client service. We offer a wide range of computer and actuarial services, including the following:

- Actuarial valuations
- Annual and quarterly statement preparation
- Policy administration software
- NAIC compliant illustration software
- Web site hosting, instant messaging, and e-mail
- Design, install and maintain local and wide area networks
- Hardware & software installation and upgrades

For more information regarding our services, please call us at **203-324-9203**, or visit our web site at www.cpsincorp.com ❖

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Regulatory Update

New York Disaster Recovery Plan ("DRP")

Those NY-licensed insurers who have managed to recover from the NY liquidity and severe mortality events filings (which were due on May 1st) can now take a short breather before filing information regarding your Disaster Recovery and Business Continuity Plans with NY.

This filing must show how you intend to provide policyholders, claimants and beneficiaries with the assistance they will need to (a) maintain coverage, (b) seek assistance from the company, (c) file claims, and (d) obtain loans and other policyholder services in a disaster situation that affects them. The filing is due by June 1st each year. Your response should be sent to DRP@ins.state.ny.us and requires a nil return in the event of no change in your DRP.

The department issued new guidance on April 16th to show the issues that should be covered. A template is available at <http://www.ins.state.ny.us/dprcldoc.htm>.

Illinois speeds up new policy form approval.

Illinois has joined (with effect from March 1, 2007) the list of states that have been making it easier for insurers to bring products to market.

If you have submitted any policy forms to Illinois in the past year, you will have noted a white postcard acknowledgement of your filing. Illinois will still review all filings but now, provided you had elected the optional certification filing procedure, you may go ahead with marketing your product once you have that card. Of course, changes may be required once the Department has reviewed the filing in full. ❖

Interest Rate Monitor

The following are some key interest rate benchmarks:

<i>Benchmark</i>	<i>Current</i>	<i>3 Months Ago</i>	<i>1 Year Ago</i>
Fed Funds	5.25%	5.25%	4.75%
Prime Rate	8.25%	8.25%	7.75%
30 yr mortg	5.77%	5.89%	6.15%

Source: www.bloomberg.com as of April 30, 2007.