

Tips for Combating Spam and Spyware

L. Weider – NBGLCS Instructional technology

Spam – Unwanted junk e-mail sent by marketers and spyware specialists. It is far more than a simple annoyance and may actually create security risks for your computer. This is especially true of Window (PC) platform computers. One advantage to the Mac platform is that there are very few issues here other than the annoyance of unwanted mail. The Mac market share is too small to warrant the development of malicious Mac code.

Spammers send huge amounts of e-mail and receive payment for a positive response which means an e-mail was opened. Besides being annoying spam can contain viruses and malware (described in the spyware section that follows).

Understanding how spammers operate:

- Spammers use tracking software to determine if e-mail has been opened, deleted or forwarded to another person. An example is “read receipt”. Outlook and some other e-mail applications provide the option to deny read receipts which thwarts the spammer's ability to know what you did with it.
- Many people set up their e-mail to display in HTML which enables color, images and a more sophisticated look. However, the page code may contain a “web bug” or image which is invisible to the user but would send a positive response to the spammer who then knows he has viable e-mail and sells the e-mail address to a validated list. If you forward a message to someone else, the spammer can then sell that e-mail address too. HTML coded pages can also be set up so that if you click anywhere on the page you are taken to a malicious site containing malware. It is better to read e-mail as text only.
- Just because it looks real doesn't make it so! Logos and images from authentic businesses can easily be duplicated and used in “phishing” e-mail to get personal and account information from the recipient. A quick call to a business can confirm authenticity.
- Spammers often send their mail from servers outside the country to hide the source. They can also use software that forges header information so that their e-mail can not be traced.

Tips to diminish or avoid spam:

- Use a free e-mail service to create a junk e-mail account. Use this e-mail for rebates, Internet purchases, friends who are prone to sending chain email and every little humorous tidbit that comes down the pike etc. This enables you to keep your business and/or private e-mail accounts hidden from spammer's roaming eyes. (Yahoo, Google's GMail, Hotmail & Lycos get the highest scores from techies)
- Don't open e-mail or attachments from those you do not know. Simply delete.
- Set your e-mail account for read only text (if available) instead of HTML to prevent positive responses to spammers that would result in increased spam.
- Turn off read receipts in your e-mail account if available.
- Do not click links in e-mail or click on unsubscribe options. This could result in positive responses to the spammer that would result in increased spam.
- If you are using Outlook on a PC learn about its vulnerabilities and do not use the "Preview panel" feature because it records as an open positive response.
- Keep your software up to date and seek out security patches regularly.
- Use an anti-virus software package and keep it up to date to protect against latest virus.

Spyware – A generic term for many different types of software. Some are malicious and some are helpful. Spyware categories are listed below.

Cookies & Usage trackers can be helpful for users and can increase productivity by storing passwords and user preferences. However, if they silently track your use of documents and web sites they may be considered malicious. Read a site's policies to determine how they are using the information gathered.

Adware – Similar to usage trackers but may also produce ad popups resulting from your use of preferences, sites visited etc. The concern here is that when popups are displayed on your computer the remote computer (housing the ad) logs your IP address and other information about you. (Such as software you use, when you are most likely to be on-line, your personal interests etc.)

Malware – The most serious spyware which is designed to invade your computer, take control of software applications and can even take steps to prevent you from removing it.

How do you know if you have a problem?

You will know you have issues with malicious spyware when you discover you have uncontrollable popup windows, a new toolbar (Browser Help Object [aka BHO])shows up in your browser window, your browser home page has been changed, you are unable to change your browser options, or your computer is dialing out to international numbers that charge high call rates.

This can happen because Microsoft's Internet Explorer and Outlook Express have many vulnerabilities and security flaws. Spyware can be set to load every time you start the computer so that even if you thought you deleted it ... it returns. It can also be hidden in Microsoft's security system so you can't find or access it.

How can you limit or eliminate spyware?

If you own a PC a better web browser choice is Mozilla Firefox. It is a free download at <http://www.mozilla.org/products/firefox/>

Experts suggest that you check your computer's local ports, task manager and more to locate, diagnose and remove spyware. However, this gets very technical. Consider the following software tools that will do the work of cleaning up your computer with little knowledge needed on your part.

- Install Service Pack 2 (SP2) if your operating system is Windows XP. It takes steps to block pop-up ads and provides more security for your computer.
<http://www.microsoft.com/windowsxp/sp2/default.mspx>
<http://www.microsoft.com/athome/security/protect/windowsxp/choose.mspx>
- "Norton Anti-Virus" is a software tool that can find and delete virus and adware threats. It may be purchased in any office supply store.
- "Spybot Search and Destroy" is a free software application used to track and remove spyware and adware. This software is easy to use and may be downloaded from <http://www.safer-networking.org/en/download/>

- Microsoft has recently released "Microsoft Antispyware" software which will search for and delete spyware. It is a beta product that is being tested but it is receiving high marks for techies so far. I am currently trying it. It may be downloaded at

<http://www.microsoft.com/athome/security/spyware/software/default.mspx>