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# Introduction

**Why Backup?**

Every day individuals, businesses, and organizations lose their precious files due to a drive failure, inadvertent deletion, or other unwanted action or event. The result is a great deal of stress, anxiety, and in the case of businesses, lost revenue.

The computer hard drive that stores all your data has moving parts, and in time your hard drive will wear out and fail. It's just a matter of when. You need to keep a copy of all your important data somewhere else.

Apart from hard drive failure, there are many other likely scenarios that may result in the loss of your valuable files like power failures and spikes, or system and file corruption due to viruses, worms, or other malicious attacks.

# The First Steps

You need to store a copy of all your important files in a different location to where your computer is situated. It's not a great deal of use having the copy of your files on your external hard drive which is constantly plugged into your computer. A thief won't leave your additional drive for you to recover your lost files, a fire or flood won't distinguish between your computer and your external drive. At the very least, keep your copy in a different location in your home. If possible, keep your backup copy in an entirely different building.

Some choose to backup their data onto remote servers via File Transfer Protocol (FTP) or by other means. Others use the services of off-site backup over the Internet. Be mindful however that your data is your responsibility. The moment you transfer that data to a third party to keep safe, new risks involving the potential compromise of that services' availability and security arise.

In addition to your pictures, videos, music, Microsoft ® Office documents, spreadsheets, databases, Internet Explorer Favorites and/or Firefox bookmarks, emails etc, you'll also want to keep a copy of all the programs you use so that if necessary they may be easily reinstalled at a later date. It would be advisable therefore to copy any new programs you download and install them from the Internet in a special folder that gets backed up as part of your backup routine. One especially important program to backup is the program you use for the backup procedure itself. You'll also need to save the serial number for this program and others in a secure yet memorable location so you can restore your backup to the original location at a later date should you need to.

If you use your computer for business purposes you will also need to backup all the information from your financial software, inventory control, customer databases, and other specialist business files.

# How Much Is Your Information Worth?

The most valuable asset of any organization is data. Loss of data results in a significant loss of revenue. While the importance of data is based on its value to an organization, effort spent to create it, the costs involved and often the significance of the data/information is not realized until it is temporarily or permanently unavailable. Organizations have realized that the investment required to provide information protection is far less than the cost derived from the lack of information availability, accessibility or recoverability.

In a research or a business organization, where valuable data is widespread across each computer in use, there are vast considerations for securing data and making sure it is available to all the appropriate members of the organization across branches or departments situated in various geographies. With high-speed Internet access available, most top-level management and research staff prefer anytime access to their data to ease decision-making.

# What choices of hardware do I have for backing up my information ?

There are many different types of media that you may choose to backup onto, and each has their own advantages and disadvantages. The first thing you'll have to work out is what suits your particular circumstance.

It's generally a good idea to choose media that allows you to backup all the data you wish to without having to 'span' the backup. For example, you may need many CDRs to backup all your information. The problem with this kind of backup is that it requires your intervention to replace the new media as each disk is required. A backup that can automatically run without your intervention will save you a great deal of time over the long run. An external USB hard drive for example can plug straight into a computer and provide an instant large capacity space for your backups.

If you're a personal computer user the most immediate medium you're probably going to consider is to backup to CDR/W or DVDR/W, however these mediums are also less stable over longer periods of time than you might realize. For pure convenience there's nothing easier than making relatively small capacity backups to a USB memory stick that you can easily plug in, and then transfer to another location. If you're a business withexisting backup procedures, you may be using tape backup (which can be sensitive to heat, magnetism etc), or you may be implementing a removable hard disk procedure.

Whatever you choose make sure your chosen media is easy to use, requires as little intervention as possible, and can easily be scheduled.

# Blank Writeable CD, DVD and Blu- Ray Disc solutions

Saving files to a CD:

1) you need a writable CD drive in your computer  
2) you need a CD that is writable, i.e. either a blank CD-R (a CD which is recordable only once) or a CD-RW (a re-writable CD) for saving your files, not a read-only CD-R that has already been written.

1. Create a document in the application of your choice (Microsoft Word, WordPerfect etc.) and save it to My Documents.  
2. Close your file.  
3. Insert a CD to be recorded into the CD drive, e.g. drive ( E: ).  
4. Select My Documents from the application menu.  
5. Click on your file and select File > Send To > CD Drive ( E: ).  
6. Click on the arrow beside the drop-down menu that displays My Documents and select Drive E.  
7. Select File > Write these files to CD.  
8. When writing is complete, eject your CD from the drive.

If you just want to backup your data and video files to DVD-R disc as data dvd, you can use RZ Free DVD Burner, it's free and easy to use, it can directly burn any files or folders to any dvd disc(DVD+R, DVD-R, DVD-RW, DVD+RW, DVD-R DL, DVD+R DL, etc) as data dvd for backup , such as directly burn data and video files to a DVD-R disc as data dvd. Use any program which can burn your data to DVD or CD

# Blu-ray Disc for Data

**How does the capacity of a Blu-ray Disc compare to other media?**A Blu-ray Disc can hold up to 50 gigabytes of data. This compares to about 10 recordable DVDs (or 5 double-layer DVDs), or around 70 recordable CDs. As a result, Blu-ray Disc is the ideal, cost-effective, removable storage medium for the storage of large amounts of data and video.

**What kind of data can be stored on a Blu-ray Disc?**Any form of data available on a PC can be stored to a Blu-ray Disc, including text documents, images, video and audio files. Using the appropriate software or operating support, a Blu-ray Disc can offer the functionality of a large removable hard disk drive.

**Can I record video to a Blu-ray Disc using a PC?**Yes. Using the appropriate software, you can edit standard or High Definition video (for example from a camcorder) and then record it to a Blu-ray Disc. When recorded in the Blu-ray Disc video format, the end result can be played in a Blu-ray Disc player connected to a TV.

**What choices of software do I have for backing up my information ?**

**Windows backup software**

* [Genie Backup Manager](http://www.backup-software-reviews.com/review-genie-backup-manager.htm)
* [NTI BackupNow!](http://www.backup-software-reviews.com/review-nti-backnow%21.htm)
* [NovaStor NovaBackup](http://www.backup-software-reviews.com/review-novabackup.htm)
* [Handy Backup](http://www.backup-software-reviews.com/review-handy-backup.htm)
* [Double Image](http://www.backup-software-reviews.com/review-double-image.htm)

# Different Solutions - The Best Solution For Backing Up Your Information

When it comes to preserving those memorable moments and those important files lurking around on your computer, there are a ton of ways to make sure they stick around, and don't disappear into the abyss of digital oblivion.

As a diehard addict of information, I know how frustrating it can be to lose data, especially when it's gone... **forever.** That's right-- one day your computer is running fine, and then poof, suddenly it's all gone. All those pictures from your last vacation, all the baby photos, the archived black-and-whites scanned from grandma's long-lost originals, the school reports, the important data your boss needs yesterday... all gone.

## Online Storage

## Offline Backup

* **External Hard Drives**
* **USB keys and SD Cards**
* **Discs**
* Hardcopy

# USB Flash Drive Solutions

## Solutions

## Data Preloading

We can preload presentations, product catalogues or any other promotional materials you desire.

## File Lock/Dual Zone

If you want to protect your data from deletion by the final user, you need a Flashbay Dual Zone Flash Drive.

## Pantone Matched Shells

Should you require a product in a precise colour not covered by our standard colour range (perhaps to match your brand guidelines), we can produce the product exactly to any Pantone® colour you specify.

## AutoRun Function

This feature allows your preloaded data such as a presentation to launch automatically when the user plugs the custom USB Flash Drive it into his computer.

## Volume Label

The 'volume label' is the name assigned to the Flash Drive when the disk is first formatted or created. We can customise this name on request.

# How Often To Do A Backup

If you are in charge of a network environment with mission critical data stored on your servers, then even nightly backups may not be enough. If, on the other hand, you are thinking about backing up the data on your home computer then the question becomes more complex. How much time do you spend working on your computer? How often does the information stored on the computer change?

If we are talking about a few e-mails and pictures of the grandchildren, then a weekly or even monthly [data backup](http://free-backup.info/backup-data--consolidation-some-data-backup-considerations.html) may be enough. If you are in the middle of a tax audit, then you will probably want something more often.

# Do You Do Regular Backups?

Fi[rst Look at Windows 7's Backup and Restore Center](http://lifehacker.com/5144757/first-look-at-windows-7s-backup-and-restore-center)

It may have been a while since you considered using Windows' built-in tools for backing up your data, but for the average user with media and crucial file needs, [Windows 7](http://lifehacker.com/tag/windows-7/)'s default backup features look promising.

Windows Vista was the first version of Windows to introduce a [consolidated Backup and Restore Center](http://www.microsoft.com/windows/windows-vista/features/backup.aspx), and Windows 7's own backup center builds on it.

# THE Final Step - Restore Data From A Backup

**Restore Files from Backup**

If you need to go back and restore a file from a backup click on Restore my files in the Backup and Restore Center. Now you can browse or search the most recent backup for a file or folder your missing. Next you can restore them back to the original location or choose a different spot then click Restore. Progress of the restoration will vary depending on the size of the data and location it’s restoring from.

# External Hard Drive Solutions

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| **[Portable** |

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| Hardcore Restoration Hard drive data recovery software programs play a major role in recovering hard drive data. You will find several vendors that offer these types of programs. Most will automatically create Glossary Link[backup](http://www.tech-faq.com/Glossary/Backup.html) copies of all your files and folders reducing the worry of potential data loss. A good hard drive data recovery program can recover all the important files or folders which vanish after partition loss, accidental format, file or directory deletion, software malfunction or even a virus attack. Whether you accidentally delete the files or your computer crashes, data recovery software can locate the lost files and recover them from your hard drive.  The main contexts where hard drive data recovery software is found useful include:   * Missing file or directory * Formatted hard drive * Deleted file or directory * Unbootable hard drive * Inaccessible hard drive * Recovery of deleted files and folders on FAT and Glossary Link[NTFS](http://www.tech-faq.com/Glossary/NTFS.html) hard drive or partitions * Data recovery on damaged FAT and NTFS partitions * Damaged or corrupted partition table   A majority of hard drive data recovery software programs currently available are easy to install, user friendly, and are virtually self maintaining. However, it's a good idea to purchase these programs from a trusted software supplier.  Most software companies understand the consumer's need to be assured of value and ease of use, so if the data recovery software you selected has a trail offer, it may be a good idea to give it a test drive before you make a purchase. Physical Damage Most physical damage to a hard drive, such as failed motors or head crashes, cannot be repaired by typical computer users. Physical damage of a hard drive often results in some data loss and in most cases you may not be able to recover all the lost data. However, the physical damage can also result in the damage of the logical structures of the file system which prevents file system structures from being completely written to the hard drive.  If the hard drive has any physical damage, you need to seek a technical expert to assist in recovery or choose a data recovery company to recover as much data as possible. Most hard drive data recovery firms utilize the latest tools like magnetometers to retrieve the lost bits from the magnetic media. The recovered raw bits from the damaged hard drive are used to construct a new disk image, and the logical damage can be repaired. |  |

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