

unable to back up data for three days while the tape drive was repaired. Had he been using cloud-based backup, he could have restored his data immediately and wouldn't have been without backups for those three days.

The reason for the increased reliability of cloud services is simply a matter of scale. Most small businesses can't afford the redundancies needed to make their computer operations as reliable as possible. My friend's company can't afford to buy two tape drives so that an extra is available in case the main one fails.

By contrast, cloud services are usually provided by large companies such as Amazon, Google, Microsoft, and IBM. These companies have state-of-the-art data centers with multiple redundancies for their cloud services. Cloud storage may be kept on multiple servers so that if one server fails, others can take over the load. In some cases, these servers are in different data centers in different parts of the country. Thus, your data will still be available even in the event of a disaster that shuts down an entire data system.

- » **Hassle-free:** Face it, IT can be a hassle. With cloud-based services, you basically outsource the job of complex system maintenance chores, such as software upgrade, patches, hardware maintenance, backup, and so on. You get to consume the services while someone else takes care of making sure that the services run properly.
- » **Globally accessible:** One of the best things about cloud services is that they're available anywhere you have an Internet connection. Suppose that you have offices in five cities. Using traditional computing, each office would require its own servers, and you'd have to carefully design systems that allowed users in each of the offices to access shared data.

With cloud computing, each office simply connects to the Internet to access the cloud applications. Cloud-based applications are also great if your users are mobile because they can access the applications anywhere they can find an Internet connection.

## Detailing the Drawbacks of Cloud Computing

Although cloud computing has many advantages over traditional techniques, it isn't without its drawbacks. Here are some of the most significant roadblocks to adopting cloud computing:

- » **Entrenched applications:** Your organization may depend on entrenched applications that don't lend themselves especially well to cloud computing — or