

## Why network a home or business?

By [Fred W. Holzager](#)

### The world is getting smaller

People now travel great distances in shorter periods of time, live longer and, as a result, get to know more acquaintances and speak more often with their family and friends for less money. It's a great thing. Believe it or not, the same holds true in terms of your computer by means of networking.

Computers used to be considered "Islands of Information"—standalone sources of data. The only mode of file sharing was "*Sneaker-Net*" (put on your sneakers and race to another computer with a floppy holding a copy of the information needed). No true connectivity was established, although the information could be shared.

Today's computer networks are far more capable and affordable. It is no longer a requirement that you possess a capital budget surpassing that of your entire neighborhood's gross income. Now, networks are so reasonably priced that they are becoming a common occurrence in private residences and small businesses. Anyone can afford to implement them and share resources. Do you have a laser printer or DSL/Cable modem? Well, now it is possible to share them. Do you have a file that is too large to write to a floppy disk to "bring over" to another machine? No problem, just copy it across the network.

### Networking computers offers small & medium-sized businesses and families the possibilities to make cost-cutting measures at a low entry price.

You've just discovered that DSL (Digital Subscriber Line) is available in your area. You have grown tired of the tedious wait using a dial-up connection for Internet connectivity. You decide to "take the plunge" and spend the added amount necessary to "spring for it." The only issue, you get one connection for the price. How do you extend this resource? Without making a tremendous compromise on quality of service, you may be able to share this resource by putting it on the network. You may wonder how this is possible. Remember, you only paid for ONE connection to the internet on DSL. Well, if you introduce a router/switch into the mix, you may be able to connect all of the machines to the connected modem by virtue of a proxy.

The details on implementing this are not rocket science, but suffice it to say that this will enhance your internet experience by the number of computers you have connected to the network.

Another important benefit derived from a network is the ability to centralize your data and access control (security). Imagine that you have all of your critical business data stored on one machine (a server) where all of your employees may discreetly and remotely access their files. This allows for you to impose restrictions for access to the data (security), as well as have the data conveniently located for a single, central backup process. This is critical data, so you want to assure its availability. Furthermore, should you need to control its access in an immediate way (e.g., a disgruntled employee being

released), you may remove that person's access rights without "tipping him or her off" to your business decision.

## **New equipment prices and Return On Investment (ROI) make the decision to use a Client/Server Model a "No Brainer" for most businesses.**

The Client/Server ("C/S") model, briefly mentioned above, allows for the end user ("Client") to access the Server for the data. C/S provides for the company to share resources and maintain a stable working environment. By storing the data on a single machine, additional support may be implemented to assure the integrity and availability of the information stored on the server.

- The server may run a more capable and sophisticated server software, able to service multiple users simultaneously in a more efficient manner. One direct result of the multiple user access is group collaboration on projects.
- The server software provides ease of administration for the company's data access and resource management.
- The server may be connected to an uninterruptible power supply (UPS) which will guarantee that the server is not affected by a power surge, power drop or a blackout—furthermore, the UPS is typically supported by software which gracefully shuts down the server within a specified period of time after a blackout without adverse effects upon the data.
- The server may be stored in a relatively secure and inaccessible location to assure that it is not tampered with by unauthorized personnel or outsiders.
- The business may invest in a single, high capacity backup device to run regularly and support a single machine rather than back up an extensive number of workstations as part of a business continuance policy.
- The server can, in addition to the sharing access to files, enable the networked machines and users to "enjoy" other resources on the network such as printers, faxes, modems and high speed internet access (DSL or T1 lines).
- By virtue of running a network with a server, the users will then find that they can communicate more readily using messaging services and e-mail.

## **In Summary**

All-in-all, implementing a network can easily become a productivity booster for a company comprised of more than one member with only one workstation/computer. If you are still deliberating over the benefits of having a LAN (Local Area Network), consider what you do on a daily basis and ask yourself if it might work better given the aforementioned benefits. Your determination should include the cost/benefit aspect as well as the productivity gain. Then, if your assessment is to move forward with the installation of a LAN, give us a call and we can shed further insight into what is involved and help you realize the advantage of your new network.

If you have a question or would like to have a concept explained, please feel free to send an email to [support@tech4now.com](mailto:support@tech4now.com). If you feel you have an urgent issue that needs immediate attention, you may indicate that in your email or call us at (201) 797-5050 for service. Holzager Technology Services provides FREE technical articles on its website — <http://www.tech4now.com> under Articles.