

“\$US 66 billion WASTED on IT Assets”

1997 USA Survey of 1600 Companies

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What if the only asset I manage is my AIS?

1. IT tracking information still relevant
2. You may wish to pass this issue on, once read, to your IT section
3. Consider collaboration between Assets and IT sections
4. **Watch for the next issue, with special tips for AIS Managers**

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Sources of Inefficiencies in IT Spending

A study of 1600 companies in 1997 by Sentry Technology Group in the USA indicated that over 10% of total IT purchases 'can be described as inefficient spending... [on] underused equipment and software.' The survey showed that companies could be wasting a total of \$66b on inefficient IT spending.

1. Inappropriate Use

One of the reasons for this is that companies don't keep track of their assets, either their hardware or their software. For example, licenses are sometimes buried within older computers, which often descend down the corporate food chain to other users. For example, a computer purchased two years ago for an employee might have an associated database license attached to it. After a couple of years, the computer might be passed down to an administrative assistant. If the assistant doesn't need database access, that license is going unused and is a wasted asset.

2. Buying Too Much

Overbuying is another form of license mismanagement. If your organization buys a 100-user, concurrent license for an application, and only 50 users use it at any given time, you've just paid for twice as many licenses as you actually need.

Some organisations have found that software licenses have been added at one site without knowing about unused copies being warehoused at another. In some cases, they leased technology far longer than originally planned, continuing to make high-rate, month-to-month lease payments when purchasing the technology would have been more cost-effective.

3. Paying Too Much for What You Need

In addition to overbuying licenses, companies often overspend for them. Centralised procure-

ment can reduce unit costs – nor is it necessary to purchase all required software at the same time (infuriating some users who have to wait, or wasting money by purchasing ahead of time); it may be simply sufficient to establish sound buying arrangements with a few key companies.

4. Paying for What You Don't Need

If you have no easy way to verify whether vendors' invoices are honouring the terms and conditions of license agreements, you may unwittingly be paying for hardware that is no longer on the floor.

5. Knowing When and What to Upgrade

When dealing with vendors, knowing what IT assets you already have and which ones you actually use enables a more rational buying decision. Say you have purchased 150 licenses for Access. When an Access upgrade is released, the vendor may call you and say it's time to upgrade those 150 licenses. If you don't know how your company uses Access, you may just stay the course and purchase those licenses. However, if you've kept track of your organization's Access usage, you may realize that not all 150 licenses are being used. Maybe your company is regularly using only 100 of those licenses. With this information, you can make an accurate purchasing decision and avoid purchasing 50 unneeded licenses.

6. Failure to re-use and recycle

When machines reach the end of their life cycle, you could redeploy associated software licenses to workstations that are still in use. Also, you could reclaim usable hard disks and RAM, as well as other peripheral devices such as NICs and internal modems. By doing so, your company won't have to spend more money purchasing these items for computers that need them.

Without a good assessment management system in place, you might not be able to detect these "hidden" assets in an old computer. As a result, you may end up wasting money by purchasing redundant IT assets such as RAM or software licenses."

IT Asset Tracking—What you need to know

1. Where Are Your Assets?

Can you list what IT assets your organization owns? While such devices as computers, servers, and routers are obvious assets, many others are overlooked, leading to redundant spending and mismanagement.

Perhaps the single biggest investment is tied to your computers—both client workstations and servers. Of course, each computer you own is an asset you need to be aware of, but you also need to account for the other assets linked to each computer. For example, computer memory, including RAM and hard disks, is an asset, as is the computer's processor. In addition, any peripheral device attached to or installed in the computer, such as a CD-ROM drive, modem, or NIC, is an asset.

Aside from a computer's hardware, the software running on each machine is another asset you need to account for. This includes the operating system software, the applications you've bought and installed on the machine, upgrades, any in-house developed applications running on the machine, and so on.

Your network infrastructure also contains a multitude of assets, including printers, hubs, routers, switches, and cabling. Depending on your network environment, the list can go on and on.

2. What Else is An Asset?

While physical assets are fairly obvious to understand and identify, other assets are not. For example, software licenses, hardware and software warranties, maintenance and support contracts, and outsourcing deals all represent money your organization has spent to build and run its IT infrastructure.

To this list you can add any IT equipment your

organization leases, the data lines for your WAN and remote access services, and any Internet service you purchase. Because you've invested money in these items and they are going to provide service over a number of years, you ought to consider them IT assets.

3. Valuing your computer.

Companies mismanage their IT assets in several ways, says Lee Chase, Business Editor at Network Magazine. "One of the most common has to do with how companies value and use their computers. For instance, each computer in a company represents a dollar value, but in many cases this value isn't necessarily the mere purchase price.

When a company first purchases a set of computers, each computer costs a fixed amount. However, if you follow the computer through its life cycle in an organization, you see that the amount of the investment usually changes. For example, after the IS department receives a purchased set of computers, computer support usually configures the machines with the appropriate settings to work in the company's network environment. IS also installs software and any other peripheral devices users need. So, as you can see, the computers have already increased in value.

In addition, not all computers receive the same setup. For example, the ones headed for the accounting department receive the appropriate financial software and database front ends, while the remaining systems are outfitted with general applications such as an e-mail client, a word processing program, a browser, and so on. Obviously, each set of computers now has a different value, depending on what software is used.

The value of these computers may change again when they receive new peripherals, such as a faster modem, or additional RAM and software upgrades.

If your company neglects to track the assets that have been added to each computer, it may underestimate the computer's real value and not receive a full return on its investment.

Is Managing IT assets the same as Managing Fixed Assets?

Larry Shoup, President Janus Technologies, says no.

“Many IT executives, once they recognize that they are spending too much on IT assets, assume that managing their IT asset portfolio is just like tracking fixed assets. However, if they analyze the problem in more detail, they discover that this is a flawed assumption. In fact, the process for managing IT assets involves a different set of considerations because the issues surrounding hardware and software "ownership" are very different. For example:

- Software is licensed, not owned. Its usage is constrained by license terms and conditions. Most fixed assets do not have such restrictions to consider.
- IT assets are acquired on a corporate scale through negotiated deals that are documented in sometimes complicated legal contracts.
- Invoices for ongoing maintenance and service have no accompanying physical deliverables.
- Many software and hardware assets have interdependencies that determine what components are part of a standard configuration, how those components are priced, and who to call for support.
- Today's IT assets have ever-shortening deployment lifecycles and are subject to greater turnover as organizations find compelling reasons to implement replacement technology.
- Compliance with the original terms and conditions of software and hardware licenses is often complicated by the high rate of vendor and product consolidation in the IT industry.

Together, these factors increase the complexity of hardware and software ownership. This increased complexity, in turn, increases the risk that organizations will lose money unless they give careful thought to the way they choose to manage the IT assets in their corporate technology portfolio.”

Why special tracking software? Can't A Spreadsheet do?

Larry Shoup also argues that in-house spreadsheet systems are NOT the answer (but bear in mind that his company produces specialty software for IT asset management)

“For large-scale asset management initiatives, spreadsheets have inherent limitations:

- As they fill with data, spreadsheets quickly become cumbersome to use and difficult to maintain. When the contents of the spreadsheet are incomplete, the information becomes inaccurate for budgeting, forecasting, and invoice verification purposes.
- Organizations usually must create multiple spreadsheets—one for hardware, one for software, and one for each computing platform. This forces managers to enter redundant information and increases the risk of having inconsistent data.
- Efforts to locate critical information in a spreadsheet can be crippled when there are multiple spellings for a vendor or product name (for example, IBM, I.B.M., and IBM Corporation).
- In addition, many managers that opt to use home-grown spreadsheets as asset management tools overlook the less-obvious ownership issues that are unique to licensed technology and make it much more difficult to track:
- Spreadsheets provide no way to track interdependencies and no history of past transactions.
- Spreadsheets have no mechanisms for warning of important decision deadlines that are approaching.
- Spreadsheets provide no features to help record and analyze the terms and conditions found in hardcopy license agreements.”

How to get started

Where to start

Start in your receiving room with new equipment. (The reason for starting with new equipment is that machines have life cycles within the organisation and you don't want to waste time marking equipment that is already on its way out of the door.)

How Much Information To Collect

This is up to you. The more information you keep on each item the more analysis you can perform (asset performance, utilisation, location, maintenance costs, history, etc).

But unless you actually DO the analysis and use it to determine your decision making, you might as well forget it.

Remember: nearly every organisation collects more information than it uses – and wastes money in the process.

Asset Item or Expense?

With rapid expiry dates, some IT elements may be worth treating as expense items rather than assets

– but before deciding to take this shortcut (which may be strongly advocated by your accountant!) consider what linkages this element has to others. It may be that tracking is worthwhile in the larger context.

Best Practice Recommendations

Lee Chase Business Editor, Network Magazine, recommends

“To manage and reduce your organisation's total cost of IT ownership you can buy all the asset management technology you want, but without the appropriate policies and practices in place, you'll never reach your goal. Here are three asset management practices you should adopt in your organization.

- (1) **Consistent acquisition** – Standardising on a finite set of hardware and software lets you minimise the number of variables you introduce into your IT environment, making it easier to manage, support and evaluate your equipment.
- (2) **Consistent configuration** – Make sure you configure your equipment and software consistently. Similarly consistent acquisition reduces the number of variables in your operating environment and makes management and support easier and less costly.
- (3) **Consistent management** – As problems appear in your IT environment, prioritise them and place those causing the biggest financial hits at the top of the list. That way, when you resolve these problems, you can realise more immediate financial returns (and look like a star in the process). Then move on to smaller problems. Make sure you apply these solutions to similar set-ups within the organisation.”

Further Reading (and sources for this issue):

1. www.summitline.com/tech-trends/papers/Janus2.html
2. www.networkmagazine.com/magazine/tutorial/management/9805tut.htm
3. www.networkmagazine.com/magazine/tutorial/management/9807tut.htm

Software will become the major strategic management focus —taking over from hardware

- Trends in IT

The following industry trends confirm what managers in legacy environments have already learned and what managers in client/server organizations are now facing—that managing the ownership of licensed software assets is the most strategic area of focus in any asset management initiative. Considered together, these trends reveal why correctly managing the cost of licensed software yields such a substantial return on investment.

Trend—Rapid obsolescence of hardware

Trend—Every year, the price/performance ratio of hardware continues to improve.

Trend—Demand for software will continue to increase

because there are just two ways that users can use the increasingly powerful machines on their desktops: (1) by running a larger number of applications or (2) by running more complex applications.

Trend - Greater Supplier Complexity.

Industry consolidation will continue as product vendors pursue mergers and acquisitions. Hardware and software contracts will be transferred to new owners, products will be re-named, and pricing and license administration practices will be changed with little advance notice. Increasing vendor invoice discrepancies will require tighter scrutiny.

Trend—License agreements and cost structures associated with large-scale software purchases are becoming more varied and complex.

Trend—Longer term commitments.

Demand by large purchasers for lower prices are being met by vendors offering multi-year license contracts, with lower up-front purchase price in return for a financial commitment in subsequent years, structured as a lease or as an annual maintenance contract, or as some other form of agreement.

Trend—'Within System' Tracking

In the future, users are likely to see the deployment management tasks of automated software distribution, inventory tracking, and electronic metering handled more by the operating system and hardware—and less by third-party products.

Next Issue:

Your AIS—it's care and feeding!

(Special tips for asset information system managers)

Tip of the Week: Good asset practice pays off for Playford

Playford City Council had concerns with what was considered to be ‘too high’ a level of depreciation. A review of their economic life assumptions using technical information from the council’s own records supported the ‘gut feel’. The council discovered that *as long as* it continued the good practice of maintaining a quality road surface, the underlying pavement structure was protected and would last far longer than the nominal 40 years assigned to it on the books. Consideration of the integrated nature of infrastructure assets, such as roads, made the council aware that what is done on one part of the asset affects performance of all other parts. And as a result of this realisation it was able to extend the life of road structures out to 100 years with a marked effect in decreasing recorded depreciation. Leigh Hall (08 8254 0103) has the full story.

How many ways can depreciation be *mis*-recorded?

If the asset is ‘fully depreciated’ but is still in use, we have depreciated too much. Conversely, if the asset is routinely being replaced with positive values still in the books (not being ‘salvage value’) then we have not depreciated enough.

Economic life

- A common mistake is to assign the life of the longest living component to the total asset (comprised of many components with shorter renewal periods), eg assuming a house has an economic life of 100 years because the foundations will generally last that long. (A weighted average should be used).
- Estimating the economic life from the age of the oldest assets of the type still in use, is another mistake. We may have pipes that are still operational after 110 years but that does not mean that the economic life of pipes is 110+ years. The economic life figure we need to apply for depreciation is not the life of the longest living element of the class but rather the average life of the class, which may be only 80-100 years.
- Another common problem is assuming that because, say, we are now designing roads to last for 60 years that all existing roads (with different design parameters and different usage patterns) will last as long. The ‘class average’ economic life will vary with different age cohorts.

Asset category

Assigning an asset to an inappropriate asset category is another major cause of faulty depreciation recording. Eg including earthworks (which do not depreciate) in road pavement figures.

Asset value

Apply straight-line depreciation to a WDRV and you will grossly understate your depreciation. Market values are market estimates of WDRV and so the same applies here. The correct valuation for depreciation is Total Replacement Value. A number of agencies no longer retain TRV and try to use WDRV and/or Market Value for purposes of calculating the annual depreciation cost. This is wrong. Frequent revaluations will re-establish the correct asset value – but will still leave you with under-costed depreciation (or asset consumption).

More?

What else can be added to this list?

INTERNATIONAL ASSET MANAGEMENT COMPETITIONS 2000

Asset Management in Developing Countries (South East Asia/Pacific)

First Entry in the “Review Category”

Don't Miss Out!—Entries Close July 30th 2000

The object of the review was to establish the scope for asset management to improve benefits gained from World Bank loans (and, by extension, to all capital investment in developing countries). The focus is on municipal infrastructure.

“Asset management practices in a number of developing countries were examined as part of the study including Thailand, Laos, Cambodia, Vietnam, Fiji and India. The study found that there has generally been a pre-occupation with either creating new infrastructure, or with rehabilitating existing infrastructure, which has deteriorated due to years of conflict or lack of funds. Examples of this are the 27 km Madurai bypass road in Tamil Nadu, India and the National Highways Maintenance Upgrading Program in Laos respectively. Only basic asset registers exist, if at all, and the quality and extent of data is generally patchy in the developing countries mentioned.

There are examples of specific asset management activities being initiated such as the introduction of road asset management information systems, development of asset inventories, and the preparation of long-term capital development plans and investment programs.

However the study found no evidence of an integrated asset management approach being taken, even where municipal infrastructure is largely in place, such as Bangkok, Thailand.

In all cases, specific asset management improvement projects were being funded by external agencies such as the World Bank and Asian Development bank. The sustainability of some projects, however, could be at risk due to:

- Lack of an overall life-cycle (long term) management framework for the asset portfolio involved;

- A short or medium term financial interest by investors without ongoing measurement of performance and incentives to ensure that good management skills and practices are retained and improved into the future;
- Projects delivering too much too soon without a vision of how the outputs complement the wider picture of ‘appropriate asset management’ for the organisation.”

The entry was submitted by Tony Urquhart and Warwick Busch of Worley Consulting.

What I like about it is:

- It arranges its examples within an analytical framework
- It draws conclusions and provides suggestions for corrective action.

6 Categories—Choose Yours!

1. Best Examples of Sound Practice
2. Best Examples of Innovation in Asset Management
3. Best Idea for Application or Further Development in Asset Management
4. Best Review or “State of the Art” Summary of some aspect of Asset Management
5. Best Consultancy Project
6. Best New Product or Service

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