

# Is Corporate Insourcing of Print on the Rise?

By  
**Patricia Sorce, Ph.D**  
Administrative Chair,  
School of Print Media

**Brett Daly**  
MBA Student,  
College of Business  
Rochester Institute of Technology

A Research Monograph of the  
Printing Industry Center at RIT

December 2004

No. PICRM-2004-09



# Is Corporate Insourcing of Print on the Rise?

---

By  
Patricia Sorce, Ph.D.  
Administrative Chair, School of Print Media

Brett Daly  
MBA Student, College of Business

Rochester Institute of Technology



A Research Monograph of the  
Printing Industry Center at RIT  
Rochester, NY  
December 2004

# With Thanks

---

The research agenda of the Printing Industry Center at RIT and the publication of research findings are supported by the following organizations:



# Table of Contents

Executive Summary.....	2
Introduction .....	3
Outsourcing in the U.S. ....	4
Strategic Drivers.....	5
Business Process Outsourcing .....	6
Sourcing of Corporate Printing Services.....	8
Method and Results .....	9
Discussion.....	13
Next Steps .....	13
References .....	15
Appendix A: Summary Survey Results.....	17
Appendix B: Profiles of Document Outsourcing Firms .....	21
IKON.....	21
Xerox Corporation .....	24
The Standard Register Company.....	26
Bowne & Co., Inc. ....	29
Pitney Bowes.....	33
Appendix C: Other Document Outsourcing and Document Management Services .....	37

# Executive Summary

---

What is the balance between the “make” and the “buy” decision for corporate document production services? In a Printing Industry Center report from 2003, 43% of marketing executives, often the document creators, reported that they were increasing the amount of printing in-house for collateral materials. The research objective of this exploratory study is to gain insight into the document processing and printing sourcing decisions in firms. A total of 44 print buyers completed the survey. The profile of the respondents indicated that they represented a broad range of firms, from financial services to manufacturing. A majority purchased over \$500,000 in printing annually for their firms.

The primary results of the study were:

- Just over one-third of the respondents (38%) reported that they had an in-plant printing operation. Of the 15 respondents who had in-plant print shops, five (one-third) reported that they expected a change in strategy that will affect the in-plant print shop in the future. Of these five, only one expected that the entire in-house printing activity would be outsourced externally.
- The ratio of jobs printed externally versus internally based on the average was 2:1 (67% external versus 33% internal). This ratio has changed for about 29% of the firms. Of the eleven who said the ratio has changed, nearly all reported that their internal printing had increased.
- Just about one-quarter (24%) of the respondents indicated that their firm had a document management strategy “as it relates to print buying or in-house printing.”
- Just over one-third reported that they have hired outside firms to manage their document production. Of the 16 that had, nearly all reported that they used a commercial printer, and a large majority use mail service providers. The main functions that these vendors manage are mailing and fulfillment.



# Introduction

The decision to buy (outsource) or make (insource) has been a historically important one for senior management. Companies are making sourcing decisions guided by the management dictum of “Do what you do the best and outsource the rest.” Business functions that do not add direct value to the core functions of the company are being outsourced.

In 1989, Kodak became the first major corporation in the United States to outsource its internal information technology (IT) function to IBM in a 10-year, \$500 million contract, in order to focus more on its core competencies and realize cost reduction benefits. With Kodak’s landmark decision, outsourcing became a common practice among mid-size and large organizations.

Now, the numbers are much higher. Recent outsourcing deals by DuPont, Xerox Corporation and J.P. Morgan involve billions of dollars. In 1997, DuPont signed a \$4 billion outsourcing contract with CSC & Accenture. Even Microsoft Corporation is outsourcing some of its computing services in a three-year contract with Entex Information Services, Inc. The New York based Entex will oversee the management and operation of Microsoft’s more than 16,000 computers and computer networks around the globe.

Today, outsourcing has become a standard practice across every industry sector. Two major changes in outsourcing trends have been observed. Outsourcing has gained popularity among small companies, and companies are seeking to outsource more services that now fall under the umbrella term of Business Process Outsourcing (BPO). In 2001, U.S. firms were forecasted to spend over \$318 billion on BPO, up from \$100 billion in 1996 (“Why is Outsourcing So Popular?,” 1999).

Companies are outsourcing business functions like human resources, customer service, logistics, and administration, which includes document processing. Growth in all these non-IT sectors has gained tremendous momentum. For example, it is estimated that human resources outsourcing will double in the coming year. But IT still accounts for a major chunk of the outsourcing pie. IT represented 28% of all the outsourcing activities in the U.S. in 2001, up from 20% in 2000 (Casale, 2001).

The purpose of this research is to understand the document process outsourcing industry. This question was suggested by our Printing Industry Center research finding in 2003, where 43% of marketing executives surveyed reported that their firms were increasing the amount of in-house printing of collateral materials given the new printing technologies (Pellow, Sorce, Frey, & Banis, 2003). This result was counter to the prediction that outsourcing business processes, including document processing, is on the rise. In this research, we will review the outsourcing trends in the U.S., in total, and with particular focus on two areas: IT and document processing. We will also assess the strategic drivers that lead to the decision to outsource printing and document processing within a firm. Following the literature review, we will present the findings of an exploratory research study, designed to gain insight on how firms decide to outsource printing and document management services.

## OUTSOURCING IN THE U.S.

A review of the publicly available secondary research conducted on outsourcing trends reveals that there is a wide range of estimates regarding the size and growth rate of outsourcing in the U.S. and the world (Table 1). The Outsourcing Institute's 2000 Index shows that outsourcing spending accelerated rapidly between 1997 and 2000, from \$85 billion to \$342 billion (Figure 1).

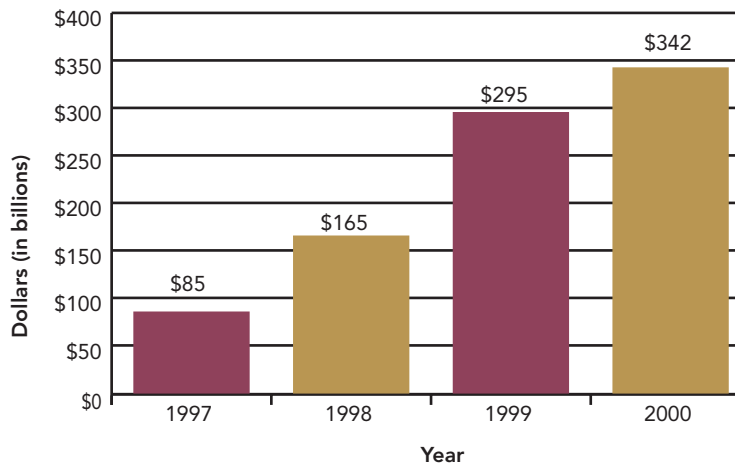


Figure 1. Total U.S. Outsourcing (Casale, 2000)

The IT outsourcing figures worldwide grew from \$349.6 billion in 2002 to \$380 billion in 2003 (Perez, 2004). For the U.S., the Stamford, Connecticut-based Gartner research firm reported \$93.8 billion in 2000 spending and estimated it would grow to \$159.6 billion in 2002. However, a more conservative estimate from the Outsourcing Institute for 2001 indicates that the U.S. IT outsourcing market reached about \$89 billion (Casale, 2001). And in another study, it was predicted that U.S. IT outsourcing would reach \$110 billion by 2003 (INPUT, 2001). In a survey conducted by Gartner in 2000, 56% of the respondents reported that they planned to increase their IT outsourcing budgets.

Companies are outsourcing a wide range of IT functions. The major IT outsourced functions are (Outsourcing Institute, 2003):

- Maintenance/repair
- Training
- Applications development
- Consulting and reengineering
- Mainframe data centers.

	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005
<b>Total Outsourcing</b>										
USA (OI)		\$ 85 B		\$295 B	\$342 B					
<b>IT Outsourcing</b>										
Worldwide (IDC)							\$349.6 B	\$380 B (8.7%)		
Worldwide (Gartner)								\$176.8 B		
USA IT (Dataquest)					\$93.8 B	\$101.6 B	\$159.6 B			
USA (OI)					\$56 B	\$89 B				
INPUT								\$110 B		
<b>Business Process Outsourcing</b>										
Worldwide					\$119.4 B					\$234 B
USA Offshore (Gartner)								\$1.3 B	\$3.0 B	
<b>Administrative</b>										
Document (CAPV)							\$29.6 B	\$30.4 B (2.6%)	\$31.4 B (3.2%)	\$32.6 B (3.7%)

Note: all italic figures are projections based on estimated trends by citations. Numbers in parentheses are annual growth rate.

Table 1. Outsourcing Statistics



## STRATEGIC DRIVERS

Today outsourcing continues to be a strategic consideration for more and more business functions. According to the Sixth Annual Outsourcing Index (Gamble, 2003) released in late 2003, the top ten reasons why companies outsource are listed in Table 2.

Benefits such as cost and improved focus are top reasons, but access to world-class capabilities, accelerated reengineering, and shared business risks have fueled the growth of outsourcing in the past decade.

Outsourcing is not a panacea, and in some situations it can give rise to more problems than it is expected to resolve. Problems like loss of control, reduced flexibility, questionable cost savings, and being held hostage by the outsourcing vendor are very common complaints. In the past, many outsourcing initiatives have failed to meet objectives. Lately, companies like Dell Computers have made efforts to scale back their outsourced operations to improve customer service (Gamble, 2003). Going along with that trend, about 2% of companies are cutting down on outsourcing and bringing back some of their

Reason	2002	2003
Cost	54%	55%
Improve focus	55%	55%
Gain access to world-class resources	36%	37%
Free up company resources	38%	36%
Lack of internal resources	25%	24%
Accelerate reengineering	20%	18%
Reduce time to market	18%	16%
Take advantage of offshore	12%	15%
Share risks	12%	14%
Function difficult to manage	10%	11%

Table 2. 10 Top Reasons for Outsourcing (Gamble, 2003)

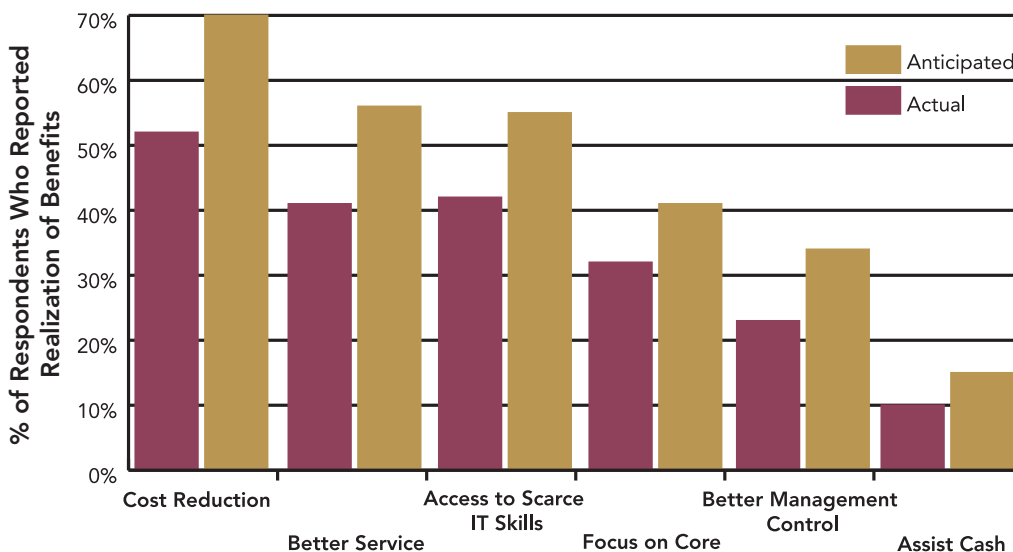


Figure 2. Anticipated vs Actual Benefits from IT Outsourcing (Lacity & Willcocks, 1998)

outsourced operations. In another study released by the Outsourcing Institute together with Dun & Bradstreet, 10% of companies reported planning to decrease their outsourcing expenditures.

Outsourcing is often viewed optimistically because the media reports deals just when the outsourcing arrangements are announced, and benefits reported then are expected and not actual. In a study by Mary Lacity & Group involving more than 90 case studies and 130 decisions in the U.S. and Europe, it was found that only 52% of cost savings benefits were realized in contrast to an anticipated 70% (Figure 2). Similarly, for all other benefits, the realization was below the anticipated levels (Lacity & Willcocks, 1998).

The gap between actual and expected levels of benefits is but one problem. A second is the negative image which outsourcing has developed due to internal job losses that follow outsourcing contracts. Despite these concerns, outsourcing has achieved a surprising growth rate due to increased competition and a lack of internal resources.

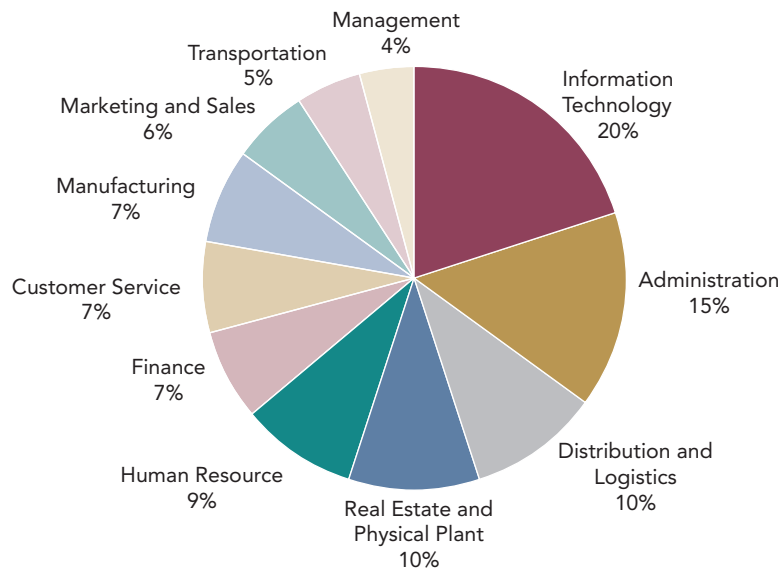


Figure 3. Outsourced Functions of U.S. Firms in 2000 (Casale, 2000)

## BUSINESS PROCESS OUTSOURCING

The changing focus of companies towards outsourcing has increased the number of business functions outsourced. As mentioned earlier, companies are outsourcing functions that do not add direct value to their core business functions. According to Figure 3, in 2000, IT represented 20% of all outsourcing activities, leading all other business functions. Among other top outsourced functions were administration (15%), distribution and logistics (10%), real estate and physical plant (10%), and human resources (10%) (Casale, 2000). In estimating the relative proportion of firms that outsource these functions, the 2003 Outsourcing Institute survey of 1,911 firms revealed that 52% of 1,911 outsourced IT, 35% outsourced administrative services, 24% outsourced human resources, and 22% outsourced logistics (Gamble, 2003).

Document management is a part of the “administrative services” category of Business Process Outsourcing. Estimates vary widely about the size of this market. In a 2004 investment report, it was estimated that only a small proportion of the \$13 billion that U.S. companies spent on imaging and document management services was outsourced (“U.S. Imaging,” 2004). International Data Corporation (IDC) predicts that the U.S. imaging and document management outsourcing market will experience strong growth over the next five years (“U.S. Imaging,” 2004). Growth is spurred by the adoption of document, imaging, and content technologies, along with the need for document and imaging management within particular vertical segments. There are unique characteristics to the insurance, finance, health care, and manufacturing vertical markets. Forms and documents are a critical part of the document workflow in healthcare for the foreseeable future. Those in manufacturing and insurance are most interested in decentralized scanning. Finally, the IDC considers finance, healthcare, and insurance to be the best targets for paper to digital conversion. This led the IDC to forecast a 19.7% compound annual growth rate through 2007 (“U.S. Imaging,” 2004).

However, CAP Ventures estimates the size of the document process outsourcing market at \$30 billion. They divide the market into three categories: facilities management (\$6.6 billion in 2002), statement printing (\$2.5 billion in 2002), and contracted print services (\$20 billion in 2002). Based on CAP Ventures estimates, the compound annual growth rate (CAGR) is predicted to be 3.4% between 2002-2007. Facilities management is predicted to have the greatest growth at 4.1%, followed by contracted print services at 3.6%, with statement printing relatively flat at 1.0% (CAP Ventures, 2004, July).

Two case studies illustrate the benefits of outsourcing document management. Dental HMO Atlantic Dental used to perform printing and fulfillment internally (Rodgers, 2003). In an effort to focus on their strengths, they decided to outsource those non-core operations. The company chose the Jerome Group of Missouri to meet its document management needs. The Jerome Group utilizes DocuCentrix, a web-based document management and production system, which provides services ranging from document creation to fulfillment.

Atlantic Dental mails approximately 20,000 pieces per month. These mailings are made up of a wide variety of items, including ID cards, benefits guides, and customized brochures. After company representatives sat down with a programmer and described their needs, it took another 30 days to get up and running with the service. From those discussions, a tailored system was designed for submitting requests for documents. Atlantic Dental reports that its printed pieces have increased in quality, while costs have decreased by 40% in printing and production, and another 30% in postage (Rodgers, 2003).

Our second case study involves Hallmark Netherlands (Meyers, 2003). The company prints over 1,000 invoices, checks, purchase requests, purchase orders, statements, and packing slips on a daily basis. Formerly, this Hallmark subsidiary used a dot-matrix printer that was fed expensive pre-printed forms. These forms cost about \$0.60 to \$0.70 and had to be purchased in groups of one thousand. Customers often wanted multiple copies, which

multiplied costs, and jams hindered productivity. To make matters worse, when a form was revised, all of the old forms had to be discarded.

Hallmark turned to Create!form to solve its problems. This forms-management solution could be implemented with an enterprise resource planning (ERP) system. The total installation took a month, with the configuration of printers and fully configuring the software requiring the most time. An IT employee created the forms during this time period. The Create!form setup allows the software to reside on both the server and the printer. The program grabs files that are being sent to the printer knowing they are from Create!form. It then parses and formats the data, and proceeds to distribute it in a pre-established form. Create!archive was also implemented by Hallmark and handles document distribution and archiving.

The program cost Hallmark Netherlands just under \$10,000. The cost savings came from the use of A-4 sized paper rather than forms, the elimination of the waste of obsolete pre-printed forms, and the time savings for changing forms. This program has made the forms printing process significantly more efficient (Meyers, 2003).

As more and more businesses outsource non-core operations to focus on their primary area of business, many firms in the printing industry have developed new or refocused existing business service offerings. Companies such as IBM, Xerox, Standard Register, Pitney Bowes, Bowne, and IKON offer document management and facilities management services to take advantage of this demand. The value proposition is that they can offer the client firm the same or better quality service for less or equal money, while allowing the firm to focus its resources on its own core business. Profiles of the major vendors in this market are presented in Appendix B. The data from the annual reports of these firms show that only Pitney Bowes and IBM have increased their revenues over the last five years.

## SOURCING OF CORPORATE PRINTING SERVICES

Firms can organize to achieve their printing in many ways. First, they can make their own by buying printing and copying equipment and doing the work in-house. This is often done in an in-plant print shop. A majority of in-plant print sites provide offset printing (82.4%), copying and digital printing (92.1%), prepress (83%), and design services (69.3%) (Anonymous, 2004). About half also provide mailing services (50%). These shops can either be managed by a dedicated internal staff or by another firm (called facilities management). CAP Ventures estimated that only 4% of in-plant shops are managed by an external facilities management service (Corr, 2004). In another CAP Ventures report (1999) of 200 corporate print customers, less than one-third (31%) of the companies interviewed had an external firm manage some or all of their document production. The functions that the external firm managed were: in-plant or central copy department (56%), copier maintenance (39%), data center printing (26%), mail processing (18%), desktop printer maintenance (18%), forms (13%), and management information systems (MIS) (12%).

The in-plant print shop is increasingly targeted by facilities management firms who are able to emphasize the strategic benefits of outsourcing. These firms are able to bring more up-to-date technology and a broader business

process systems view as benefits to the host firm. Document creation and management involves not only production using a variety of print technologies, but also the internal storage, retrieval and distribution systems necessary to link corporate users spread around a building or the world.

What is the balance between the “make” and the “buy” decision for corporate document production services? In a Printing Industry Center report from 2003, 43% of marketing executives, often the document creators, reported that they were increasing the amount of printing in-house for collateral materials. The research objective of this exploratory study is to gain insight into the document processing and printing sourcing decisions in firms. A survey of print buyers was designed to address the following research objectives:

1. What is the ratio of jobs printed internally versus externally?
2. Does the firm have a document management strategy? Is it related to an overall outsourcing strategy?
3. What is the current use of outsourcing of print services? What type of firm is providing the service? For what functions?
4. What is the predicted future of your in-plant print shop?

# Method and Results

## METHOD

Print buyers who subscribed to an online print-buying newsletter sponsored by Dana Consulting comprised the sampling frame. Only professional print buyers were asked to complete the online survey. A total of 44 print buyers completed the survey. The profile of the respondents indicated that they represented a broad range of firms from financial services to manufacturing (Table 2). A majority purchased over \$500,000 in printing annually for their firms (Table 3).

About one-third (31%) of the respondents were members of their firm's procurement department, and 18% were members of the in-plant print shop.

	Frequency
Financial services	6
Retail	3
Business or consulting services (e.g., advertising agencies)	13
Pharmaceuticals	1
Education or not-for-profits	6
Manufacturing	5
Publishing	5
Other	2
Total	41
Missing	3
	44

Table 2. Industry Profile of Respondents

	Frequency	Percent
Less than \$50,000	3	7.14
\$51,000 - \$100,000	3	7.14
\$101,000 - \$500,000	9	21.43
\$501,000 - \$1,000,000	8	19.05
\$1,100,000 - \$5,000,000	15	35.71
\$5.1 million or over	4	9.52
Missing	2	—
Total	44	100.00

Table 3. Annual Print Purchases of Respondents

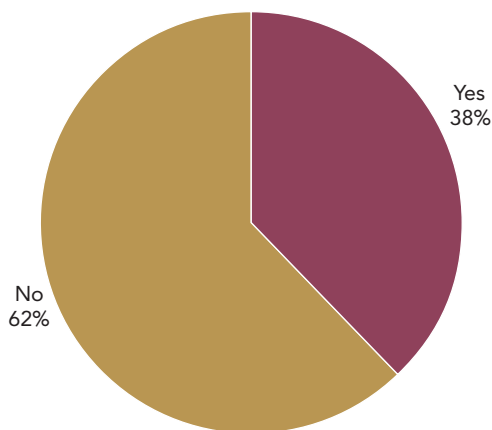


Figure 4. Do you have an in-plant printing operation?

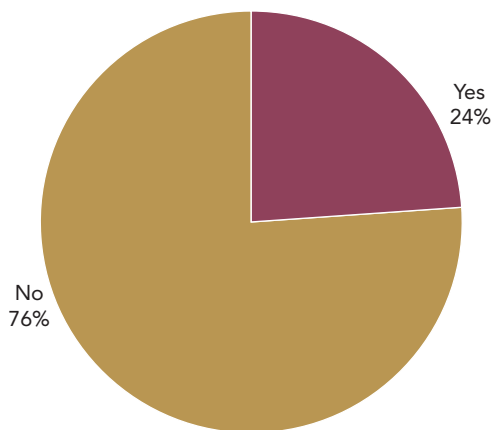


Figure 5. Do you have a document management strategy?

## RESULTS

### Objective 1

**What is the ratio of jobs printed internally versus externally? How has this changed over time?**

Just over one-third of the respondents (38%) reported that they had an in-plant printing operation (Figure 4). An in-plant printing operation was defined as “a production printing facility that is a staffed environment, which primarily prints the work of others within the same organization.”

The ratio of jobs printed externally versus internally was 2:1 (mean values). That is, approximately 70% of the jobs were printed externally and 30% were printed internally.

This ratio has changed for about 29% of the firms. Of the eleven who said yes, this ratio has changed, nearly all reported that their internal printing had *increased*.

### Objective 2

**Does the firm have a document management strategy? Is it related to an overall outsourcing strategy?**

Just about one-quarter (24%) of the respondents indicated that their firm had a document management strategy “as it relates to print buying or in-house printing” (Figure 5). These were distributed evenly among the industries represented in the sample.

Of the  $n = 10$  that responded “yes,” seven reported that it was developed based on an internal assessment and two reported that they had used external consultants. Three out of the 10 reported that it was a part of an overall business process outsourcing strategy of the firm. When asked if their balance of internal versus external print sourcing had changed, four of the 10 indicated “yes.” Of the four, all reported that internal printing had increased.



### Objective 3

**What is the current use of outsourcing of print services? What type of firm is providing the service? For what functions?**

As shown in Figure 6, just over one-third reported that they have hired outside firms to manage their document production (n=16).

Of the 16 that said “yes,” nearly all reported that they used commercial printers and a large majority use mail service providers. Half reported that the functions that these vendors manage are mailing and fulfillment (Table 4).

### Objective 4

**What is the predicted future of your in-plant print shop?**

Of the 15 respondents who had in-plant print shops, five (one-third) reported that they expected a change in strategy that will affect the in-plant print shop in the future. Of these five, only one expected that the entire in-house printing activity would be outsourced externally.

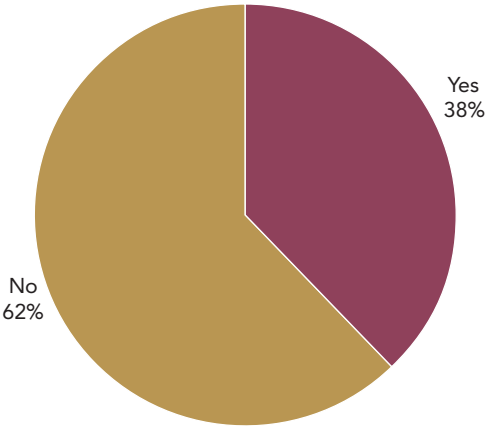


Figure 6. Outside firms to outsource/manage document production?

Outsource Firm Type	Number (out of total 16; multiple responses accepted)
Commercial printer	13
Print broker	5
Office equipment dealer	3
Equipment manufacturer	2
Advertising agency	4
Mail service provider	10

Function	Number (out of total 16; multiple responses accepted)
In-plant or copy center management	6
Copier maintenance	5
Data center printing	2
Mail processing	8
Desktop printer maintenance	2
Forms or statement printing	6
Fulfillment	8

Table 4. Outsource Firm Type and Function



# Discussion

To summarize, the primary results of the study were:

- Just over one-third of the respondents (38%) reported that they had an in-plant printing operation. Of the 15 respondents who had in-plant print shops, five (one-third) reported that they expected a change in strategy that will affect the in-plant print shop in the future. Of these five, only one expected that the entire in-house printing activity would be outsourced externally.
- The ratio of jobs printed externally versus internally based on the average was 2:1 (67% external versus 33% internal). This ratio has changed for about 29% of the firms. Of the eleven who said that the ratio had changed, nearly all reported that their internal printing had *increased*.
- Just about one-quarter (24%) of the respondents indicated that their firm had a document management strategy “as it relates to print buying or in-house printing.”
- Just over one-third reported that they have hired outside firms to manage their document production. Of the 16 that said “yes,” nearly all reported that they used a commercial printer, and a large majority use mail service providers. The main functions that these vendors manage are mailing and fulfillment.

Is insourcing of print on the rise? According to our small sample, the answer is “yes.” While most report that the number of jobs printed

externally exceeds those printed internally by a 2:1 ratio, for those that had experienced a change, almost all said their amount of internal printing had increased. In addition, of the few that had in-house print shops, only one expected that the printing function would be entirely outsourced in the next year. The remainder expected it to stay the same or increase.

Though our sample is small, some of the results are consistent with other research conducted by trade and industry consulting groups. We found that 24% of our respondents had a document management strategy. This is consistent with the results reported by a CAP Ventures 2003 study in which 30% had “mandated processes for purchase of print and paper.” In addition, about one-third of our respondents reported that they have hired outside firms to manage their document production. This is consistent with the 1999 CAP Ventures response of 31% of surveyed print buyers. On the other hand, the 1999 CAP Ventures study identified copy center or in-plant management as the top area of outsourcing, while we found that mailing and fulfillment that were the top functions. We are unable to determine whether this has changed or is a result of the small sample size and large error variance. However, it is consistent with the robust growth in revenue of one document management firm that specializes in mailing, Pitney Bowes.

## NEXT STEPS

Clearly, the size of the sample for this exploratory study was very small. The next priority is to refine our questions and capture a larger respondent pool. One emerging area is the question of sourcing of print in the context of outsourcing to domestic or international suppliers. With the current wave of offshor-

# Discussion

ing, it is logical to question to what degree the domestic printing industry will be impacted. According to the latest U.S. Department of Commerce data, it appears that the domestic printing industry is already being affected, based purely on import and export data.

Figure 7 shows consistent import growth through 2001, while export growth has been flat, and began declining around the economic downturn. With the import/export ratio appearing to be turning negative in the U.S., we wonder what is causing this phenomenon.

Based on discussions with industry experts, some trends are emerging. Ray Prince of the Graphic Arts Technical Foundation (GATF) is seeing more outsourcing of non-time-sensitive printing. Additionally, many printers are setting up networks of print service providers to allow

printing to occur at the location closest to the demand (Ray Prince, personal communication, January 14, 2004). In another example, Berlitz generally produces initial runs of jobs in the U.S. or Europe. They then shift production to China once they have perfected the run, where costs are cut in half (Svetlana Kirpichenko, personal communication, January 16, 2004).

This information leads to several areas of potential future research. Specifically, the degree to which offshore outsourcing is occurring needs to be determined, along with the printing segments that are being impacted. As a working assumption, offshoring of print will occur with more labor-intensive jobs that are less time-sensitive (Laseter, 2004). The degree to which, if at all, this is occurring in the U.S. printing industry needs to be determined with industry-based research.

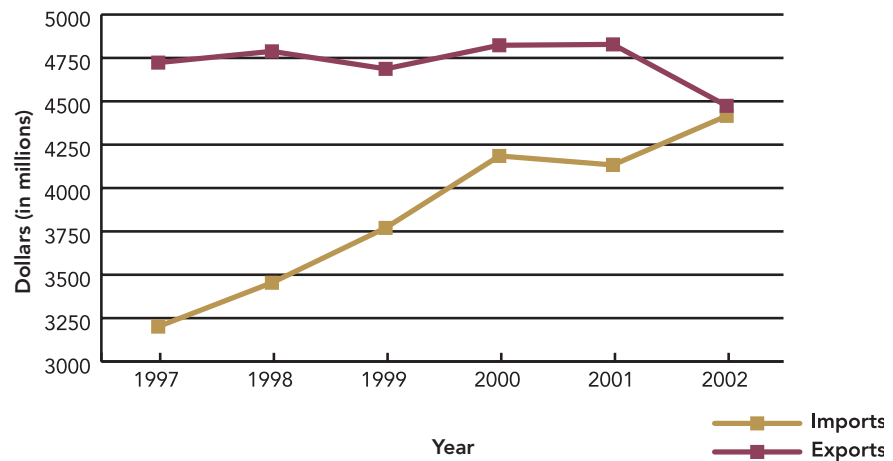


Figure 7. U.S. Printing Export-Import (U.S. Department of Commerce, n.d.)

# References

- Anonymous. (2004, October). In-plant market at a glance. *In-Plant Graphics*, 54(10), 32-33.
- Business process outsourcing to grow 65%*. (2004, May 5). Retrieved August 2004 from <http://www.in-sourced.com/article/articleview/1778/1/1>
- Caldwell, B., De Souza, R., Goodness, E., Silliman, R., & Young, A. (2004, March 9). *IT outsourcing market forecast: Worldwide, 2002-2007*. Retrieved August 2004 from Gartner Web site: [http://www3.gartner.com/DisplayDocument?ref=g\\_search&id=427115](http://www3.gartner.com/DisplayDocument?ref=g_search&id=427115)
- CAP Ventures. (1999). *The corporate print customer*. Norwell, MA: Author.
- CAP Ventures. (2003, September). *The new corporate print customer: A profile of a market in transition*. Weymouth, MA: Author.
- CAP Ventures. (2004, July). *Document outsourcing in focus market report: 2003-2004*. Weymouth, MA: Author.
- CAP Ventures. (2004, August). *Corporate print services: The in-plant printing opportunity*. Weymouth, MA: Author.
- Casale, F. (2000). *2000 outsourcing index*. Retrieved July 2004 from The Outsourcing Institute Web site: [http://www.outsourcing.com/content.asp?page=02i/articles/intelligence/OI\\_Index.pdf](http://www.outsourcing.com/content.asp?page=02i/articles/intelligence/OI_Index.pdf)
- Casale, F. (2001). *IT index 2001*. Retrieved July 2004 from The Outsourcing Institute Web site: [http://www.outsourcing.com/content.asp?page=02i/other/\\_sungard/it\\_index.htm](http://www.outsourcing.com/content.asp?page=02i/other/_sungard/it_index.htm)
- Cheng, M., & Jau, W. (2003, December 4). *Outsourcing in Asia*. Retrieved August 2004 from <http://www.fundsupermart.com/main/research/viewHTMLPrint.tpl?articleNo=1174>
- Corr, Charlie. (2004, June 24). *Best practices—Insights from corporate print services: The in-plant printing opportunity study*. Slides from a presentation at the 2004 International Publishing Management Association conference.
- Gamble, R. (2003, Winter). *The sixth annual outsourcing index*. Retrieved June 2004 from The Outsourcing Institute Web site: <http://www.outsourcing.com/content.asp?page=02i/other/oe/q403/buyers-spend.html>
- INPUT. *IT outsourcing market forecast: 1998-2003*. (2001). Washington, DC: Author.
- Lacity, M., & Willcocks, L. (1998). An empirical investigation of information technology sourcing practices: Lessons from experience. *MIS Quarterly*, 22(3), 363-408. Retrieved August 24, 2004, from ABI/INFORM Global database.

## References

---

- Laseter, T. (2004, Fall). When offshoring isn't a sure thing. *Strategy & Business*. Retrieved September 24, 2004, from <http://www.strategy-business.com/press/article/04303?pg=0>
- Meyers, J. (2003, Jan/Feb). Automating forms at Hallmark. *E-Doc*, 17(1), 56-57.
- Outsourcing Institute. (2003). *Top ten outsourcing survey*. Retrieved June 2004 from [http://www.outsourcing.com/content.asp?page=01v/articles/intelligence/oi\\_top\\_ten\\_survey.html](http://www.outsourcing.com/content.asp?page=01v/articles/intelligence/oi_top_ten_survey.html)
- Pellow, B., Sorce, P., Frey, F., & Banis, H. (2003). *Marketing communications demand creation: Marketing executive study* (PICRM-2003-06). Rochester, NY: Rochester Institute of Technology, Printing Industry Center. Retrieved July 2004 from <http://print.rit.edu/pubs/picrm200306.pdf>
- Perez, J., (2004, April 13). ICD: Revenue rises for largest IT services vendors. *IDG News Service*. Retrieved August 2004 from <http://www.nwfusion.com/cgi-bin/mailto/x.cgi>
- Rodgers, J. (2003, October). Atlantic Dental outsources document management. *Insurance & Technology*, 23(10), 23.
- An uptick in the IT outsourcing market. (2001, December 19). *DM Review*. Retrieved August 2004 from [http://www.dmreview.com/article\\_sub.cfm?articleId=4445](http://www.dmreview.com/article_sub.cfm?articleId=4445)
- U.S. Department of Commerce: Bureau of the Census; International Trade Administration. (n.d.). *Printing* (NAICS 32311). Retrieved September 24, 2004, from [http://www.ita.doc.gov/td/industry/otea/industry\\_sector/tables\\_naics/32311.htm](http://www.ita.doc.gov/td/industry/otea/industry_sector/tables_naics/32311.htm)
- U.S. imaging and document outsourcing market to grow nearly 20 percent. (2004, March 8), *Oil and Gas Investor's A&D Watch*, 2(9), 1.
- Why is outsourcing so popular? New survey shows business leaders are spending more on outsourcing. (1999, March 30). *PR Newswire*. Retrieved September 2, 2004, from ProQuest Newsstand database.



# Appendix A: Summary Survey Results

## QUESTIONS N=44

### Part 1—Background Information

<b>1. How long have you been a print buyer?</b>		<b>N=42</b>
Less than 1 year		0%
1 to less than 3 years		9.5%
3 to less than 5 years		9.5%
5 to less than 10 years		31.0%
10 or more years		50.0%
<b>2. Approximately how much printing do you currently purchase annually?</b>		<b>N=42</b>
Less than \$50,000		7.1%
\$51,000 - \$100,000		7.1%
\$101,000 - \$500,000		21.4%
\$501,000 - \$1,000,000		19.1%
\$1,100,000 - \$5,000,000		35.7%
Over \$5,100,000		9.5%
<b>3. What industry describes your firm?</b>		<b>N=41</b>
Financial services		14.6%
Retail		7.3%
Business or consulting services		31.7%
Pharmaceuticals		2.4%
Education or not-for-profit		14.6%
Manufacturing		12.2%
Publishing		12.2%
Other		4.9%
<b>4. What is your highest level of education (non-print related)?</b>		<b>N=42</b>
Vocational school		4.8%
High school		16.7%
Some college		47.6%
College graduate		4.8%
Some graduate work		26.2%
Graduate degree		4.8%

## Part 2—Document Management & Sourcing Strategy

5. Does your organization have an articulated document management strategy as it relates to print buying and/or in-house printing? N=42	
Yes	23.8%
No	76.2%
5a. (If yes) How was this strategy developed? N=44	
External consulting services	4.5%
Internal assessment	15.9%
Other	2.3%
5b. When was the strategy created (to the best of your knowledge)? N=10	
Average years ago	4.5
5c. If created over 2 years ago, has your document management strategy been reviewed recently? N=7	
Yes	85.7%
No	14.3%
5d. Is it part of an overall business process outsourcing effort in your firm? N=10	
Yes	30.0%
No	70.0%
6. Let's define an in-plant printing operation as "a production printing facility that is a staffed environment, which primarily prints the work of others within the same organization." Using this definition, does your firm have an in-plant printing operation that would include copiers, offset, and/or inkjet printing devices? N=40	
Yes	37.5%
No	62.5%
6a. (If yes) Do you anticipate that your strategy will change in the next 12 months regarding your in-house print facility? N=16	
Yes	31.3%
No	68.7%
6b. What is the anticipated nature of the change? (Check only one.) N=8	
The entire in-house print shop will be outsourced.	12.5%
The in-house print shop will close and all print activities will be outsourced.	37.5%
Other	50.0%
6c. What business factors are driving this change? (Check all that apply.) N=44	
Cost factors	13.6%
Quality issues	6.8%
Capital investment issues	6.8%
Turn-around time	13.6%
Additional service requirements	6.8%
Use of specialized substrates	0%
Other	4.5%

<b>7. Are you an employee of your organization's in-plant printing operation? N=38</b>	
Yes	18.4%
No	81.6%
<b>8. Are you a member of your organization's procurement department? N=39</b>	
Yes	30.8%
No	69.2%
<b>9. Has your organization hired outside firms to outsource or manage any or all of your firm's document production? N=42</b>	
Yes	38.1%
No	61.9%
<b>9a. If yes, what types of firms provide this service to you? (Check all that apply.) N=44</b>	
Commercial printer	29.5%
Print brokerage firm	11.4%
Office equipment dealer	6.8%
Printer or copier equipment manufacturer	4.5%
Advertising agency	9.1%
Mailing services provider	22.7%
<b>9b. If yes, what function(s) do these outside firms manage? (Check all that apply.) N=44</b>	
In-plant or centralized copy center	13.6%
Copier maintenance	11.4%
Data center printing	4.5%
Mail processing	18.2%
Desktop printer maintenance	4.5%
Forms or statement printing	13.6%
Fulfillment	18.2%
<b>10. What, in your estimate, is the percent of jobs you print internally versus those you have printed by outside businesses (externally)?</b>	
% of jobs printed internally	33.3% (N=35)
% of jobs using an outside/external services provider	71.1% (N=37)
Average number of outside print service providers	8.3 (N=39)
<b>11. Has the balance (comparative percentages) of jobs printed internally versus externally changed in the last few years? N=38</b>	
Yes	29.0%
No	71.0%

# Appendix A

11a1. (If yes) Internal printing has:		N=12
Increased		83.3%
Decreased		0%
Stayed the same		16.7%
11a2. (If yes) External/outsourced printing has:		N=11
Increased		18.2%
Decreased		72.7%
Stayed the same		9.1%
11b. Is this change of concern to you?		N=13
Yes		30.4%
No		69.6%
12. In the last 3 years, has the number of print purchasers with your organization...?		N=41
Remained the same		68.3%
Increased		12.2%
Decreased		19.5%

# Appendix B: Profiles of Document Outsourcing Firms

## IKON

### Background

Previously known as the Alco Standard Corporation, IKON Office Solutions, Inc., got its present name in January 1997. The company is successor to a business incorporated in 1928. In the 1960s the company existed as a holding company, operating in a variety of industries such as glass, steel, food service, aerospace, and paper and office products. After going through a number of divestitures, in September 1992 the company became highly focused on the distribution of paper and office products. It achieved revenues of \$4.1 billion in fiscal 1995-1996.

Today, IKON is the world's largest independent channel for document management systems and services, with revenues of \$4.7 billion in fiscal 2003. The company is a leading provider of products and services that help clients achieve better document management, providing total office solutions including copier and printing systems, computer networking, print-on-demand services, copy center management, hardware and software product interfaces, and electronic file conversion. IKON has locations in the U.S., Canada, Mexico, the United Kingdom, France, Germany, Ireland and Denmark. Its market base is segmented into IKON North America (INA) and IKON Europe (IE). Canon, Ricoh, and Hewlett-Packard are key suppliers for IKON's equipment needs, which accounts for about one-third of total revenue. Equipment sales in turn provide a profitable and constant demand for services, consumables, and equipment financing, resulting in the remaining two-thirds of the revenue.

IOS Capital, a wholly-owned subsidiary of IKON, provided lease financing to customers and had a lease receivable portfolio of over \$3.4 billion in fiscal 2003. However, in March of 2004, IKON entered into an agreement with GE Commercial Finance, making GE the company's preferred lease-financing source in the U.S. and Canada.

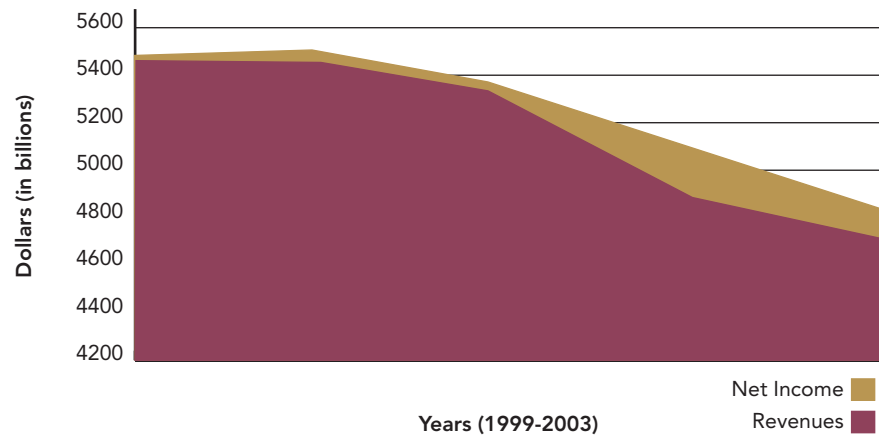
### Financials

Despite the trend of decreasing revenues, the company has constantly reported an increase in net income. The debt to equity ratios increased in 2002 from 1.1 to 1.2, but the same year was also marked by a very significant increase in net income. The net income increased from 2001 levels of \$15.2 million to \$150.3 million in 2002. The company went through a phase of downsizing its human resources and select businesses and locations to further strengthen its organizational structure.

Year	Revenues (millions)	Net Income (millions)
1999	\$5462.3	\$33.8
2000	5485.9	29.1
2001	5359.0	15.2
2002	4929.5	150.3
2003	4710.9	116.0

Annual Revenues and Net Income

## Appendix B



Revenues and Net Income

### Services

With a team of 7,000 service professionals worldwide and supplier partnerships with companies like Canon, Ricoh, and Hewlett-Packard, IKON offers a broad portfolio of document management services, including:

1. Outsourcing and professional services
2. On-site mail room and copy management
3. Fleet management
4. Off-site digital printing solutions
5. Customized workflow and imaging application development
6. Leasing financial services

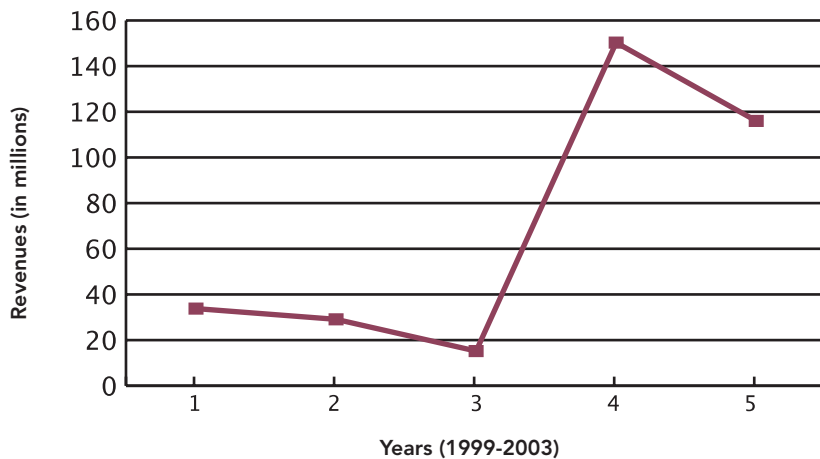
With just 10% of the current U.S. market share and increasing acceptance of digital technology in the office equipment market, IKON has many opportunities for expansion.

### Strategy

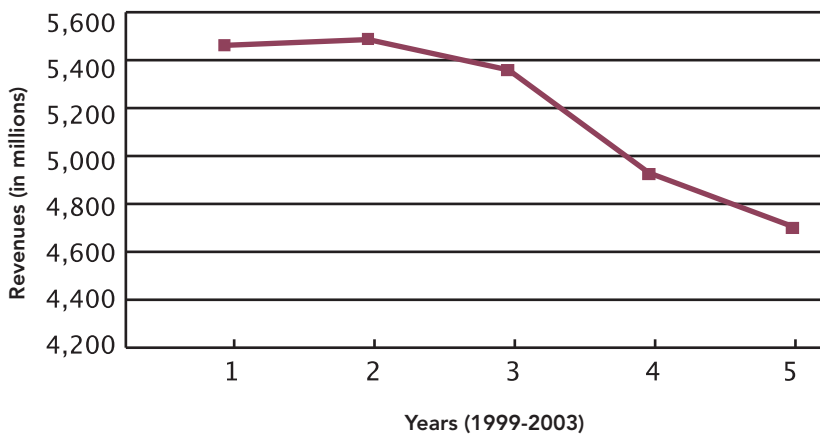
IKON acquired businesses aggressively from 1994 through 1998, which could be looked at as the first phase of its business expansion. Beginning in fiscal 1999, IKON ceased making any new acquisitions, and focused on integrating acquired companies to achieve more efficiency and cohesion in the organization. The recent years have seen the following changes in the business:

1. **Business division integration.** In fiscal 1999, IKON created two large operating units named IKON North America (INA) and IKON Europe (IE). IKON management has focused intensively on the growth of INA and IE, while also discouraging the sales of lower margin technology services, including both hardware and software. As a result, higher revenues-to-net-sales ratios were realized. Other operations that flourished in the past years are Business Imaging Services (electronic file conversion) and Sysinct (e-business development).
2. **Operations integration and enhancement.** There has also been much centralization and consolidation of various of operational functions. Centralized supply chain functions helped IKON achieve better supplier relations, price optimization, and inventory management processes. The sales coverage model was redefined to align the salespersons with the right opportunity, and a high degree of sales analysis was achieved through a more efficient and focused process with new CRM software. The accounting functions were consolidated into two shared service centers, and 25 customer service centers were consolidated into three centers in the U.S. and one in Canada. The IKON Six Sigma program was launched by Mr. Matthew J. Espe, chairman and CEO of IKON, to keep pace with the dynamically





Net Income



Revenues

changing needs of the organization. On the customer side, [www.IKONsupplies.com](http://www.IKONsupplies.com) was launched to provide a single source for a broad array of office consumables and supplies.

- Product transition.** The rapid transition of office equipment from analog to digital is reflected in the fact that digital products comprised 95% of all the copier equipment that IKON distributed in fiscal 2002, up from 33% in 1998. The company has successfully expanded into higher-volume production and color technologies. As mentioned earlier, IKON has moved from low-margin hardware placements to higher-value services and equipment: not as much emphasis has been placed on the lower-end equipment segment (up to 69 pages per minute or ppm), while greater opportunities have been realized in the high-end segment (70-91+ ppm), due to a greater volume of copies and services required in the high-end segment.

## Sources

- IKON annual reports 1999-2003
- [www.ikon.com](http://www.ikon.com)

## XEROX CORPORATION

### Background

Xerox began as a part of The Haloid Company. In 1948, Haloid trademarked the word Xerox for its new copiers. Due to the success of their copiers, the company went on to change its name to Xerox Corporation in 1961. The success of the Xerox 914, the first automatic office copier to use regular paper, solidified the decision.

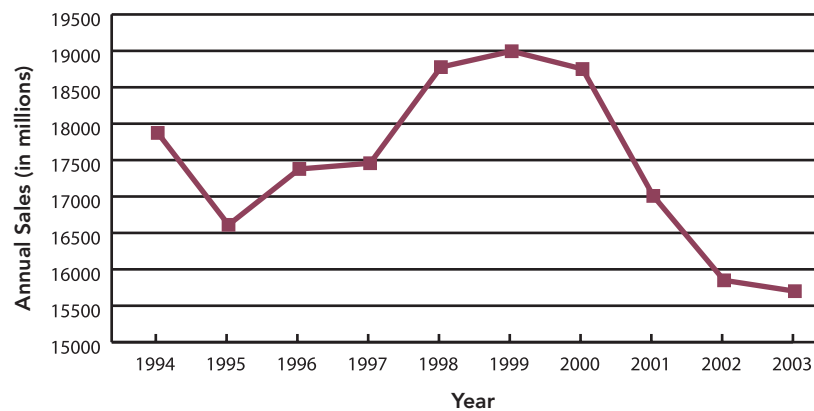
Today, Xerox focuses on three primary areas: high-end production environments, networked offices from small to large, and services. Xerox has rebounded from recent financial woes to become consistently profitable. Improved business services and customer service have helped Xerox get back on track.

### Financials

Despite a trend of decreasing revenue, the company returned to profitability in 2002, and that has since been sustained.

Year	Annual Sales (millions)	Annual Net Income (millions)
2003	\$15700	\$360
2002	15849	91
2001	17008	(94)
2000	18751	(273)
1999	18995	844
1998	18777	395
1997	17457	1452
1996	17378	1206
1995	16611	(472)
1994	17873	794

Annual Sales and Net Income



Net Income

## Product Lines/Divisions

When examined by division, the office market continues to be dominant, though Xerox has increased emphasis on the production environment (the iGen3 is an example).

Division	Percent of Sales (2003)
Office	49%
Production	29%
Developing Markets	10%
Other	12%

When examined by area, services and outsourcing are significantly more important than the previous breakdown would lead one to believe. Services, outsourcing, and rentals account for 49% of sales.

Area	Percent of Sales
Services, outsourcing & rentals	49%
Product sales	45%
Finance income	6%

## Divisional Breakdown

### Production

Xerox provides monochrome and color systems for three main customer environments: production publishing, transaction printing, and enterprise-wide printing. Xerox manufactures a complete family of monochrome production publishing systems ranging from 65 to 180 impressions per minute (ipm). In addition, Xerox continues to support analog devices installed at customer locations. Xerox provides products and services that can scan, view, manage, and produce documents, as well as a variety of pre-press and post-press options to meet customer demands.

### Office

Xerox's office division serves global, national, and small- to medium-sized commercial customers, as well as government, education, and other public sector customers. Office systems and services—which encompass monochrome devices at speeds up to 90 ppm and color devices up to 40 ppm, including Xerox's family of CopyCentre, WorkCentre, and WorkCentre Pro digital multifunction systems; DocuColor printer/copiers; color laser, LED (light emitting diode), solid ink and monochrome laser desktop printers; digital copiers; light-lens copiers; and facsimile products.

### DMO

Developing Markets Organization includes marketing, direct sales, distributors and service operations for Xerox products, supplies and services in Latin America, the Middle East, India, Eurasia, Russia, and Africa. In countries with developing economies, the DMO division manages the Xerox business through operating companies, subsidiaries, joint ventures, product distributors, affiliates, concessionaires, resellers, and dealers. DMO operations are managed as a separate division due to the political and economic volatility and unique nature of its markets.

### Other

The Other division includes revenue from paper and other substrates, wide format systems, consulting services, and a segment called Small Office / Home Office (SOHO), in this segment, Xerox sells cut-sheet paper to its customers. Xerox also provides other document processing products, including devices designed to reproduce large engineering and architectural drawings up to 3x4 feet.

## Sources:

- Hoovers Online Member Database
- Mergent Online Member Database
- Xerox.com

## THE STANDARD REGISTER COMPANY

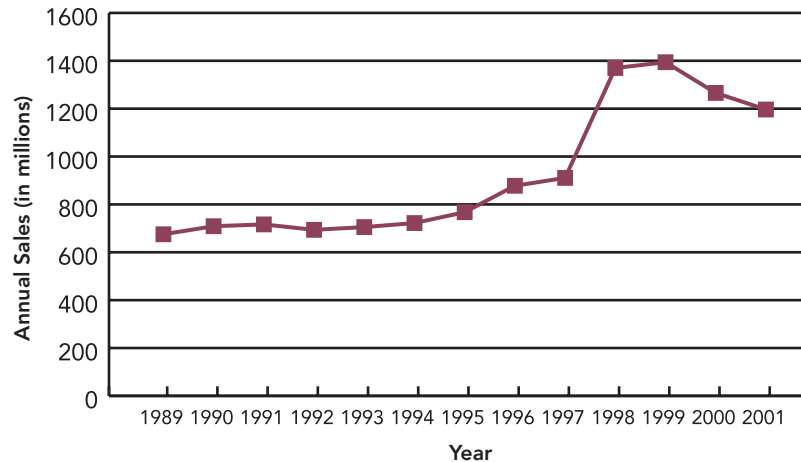
### Background

John Q. Sherman founded Standard Register in 1912 in Dayton, OH. The organization later introduced the autographic register, which became the standard for paper feeding. Standard Register showed its competence in process innovation when it unveiled Paper Simplification during the 1940s, a formula that allowed production workers to become more efficient at their jobs. Continuous improvement programs would continue to be a substantial portion of their business, as they allowed the company to differentiate itself on something more than just business forms.

The organization went public in 1956. In 1983, Standard Register entered the print-on-demand arena with its first Stanfast center, which was the start of its nationwide digital print network. In 1996, the organization began trading on the NYSE. Signifying a significant change in strategy, the organization changed its focus to being a “strategic thought leader” in 2002, focusing on various consulting services. This is allowing Standard Register to adapt to changing times in the printing industry.

### Financials

Despite a trend of decreasing revenue, the company returned to profitability in 2002.



### Net Income

Year	Annual Sales (millions)	Annual Net Income (millions)
2002	\$1028.1	\$32.6
2001	1196.4	(49.3)
2000	1265.8	(29.2)
1999	1394.0	70.9
1998	1369.9	59.6
1997	910.8	66.9
1996	877.8	63.2
1995	767.5	767.5
1994	722.1	722.1
1993	705.2	705.2
1992	693.7	693.7
1991	716.4	716.4
1990	708.9	708.9
1989	675.2	38.1

Annual Sales and Net Income

## Key Acquisitions/Sales

- 1986—Acquired business forms division from Burroughs Corporation.
- 1989—Acquired Advanced Medical Systems.
- 1997—Acquired UARCO, Inc., adding variable digital color capability to its portfolio.
- 1999—Sold Communicolor promotional direct mail operation to R.R. Donnelley and Sons for \$98 million.
- 2002—Acquired Insystems (Toronto, ON), which provides document automation software to financial services firms.
- 2002—Acquired consulting services and a print-on-demand operation from PrintPlant for \$10 million.

## Product Lines/Divisions

Standard Register sells primarily to the health care and financial industries, offering on-demand printing in 22 centers (Stanfast). SMARTworks, while making up a small percentage of sales, has some of the company's more unique products and services. This e-procurement platform manages paper documents, and can identify documents that can be converted into electronic form. This division also produces cards for electronic transactions.

## Document Management

Division	Percent of Sales
Document Management	76%
Label Solutions	12%
Fulfillment Services	11%
SMARTworks	1%

- Commercial printing and binding
- Document audit and analysis services
- Document warehousing and distribution services
- Document-handling systems
- Paper and e-forms design and output
- Print-on-demand (Stanfast printing centers)
- Secure documents (e.g., checks)
- Workflow consulting

## Label Solutions

- Automatic identification and data-collection systems
- Form/label combinations (hospital patient wristbands, specimen labels, and other forms printed at one time)
- Label systems
- Labels (pressure-sensitive, bar code, and other)
- Software and system integration

## Fulfillment Services

- Billing and statements
- CD-ROM archiving
- Cross-selling programs (profile-based)
- Customer information cards, kits, packages, and policies
- Internet/electronic documents
- Marketing communications

# Appendix B

---

## **SMARTworks**

- e-procurement and e-catalog products
- Usage/order tracking systems
- Internet-based design tools
- Print-management tools

## **Sources**

- Hoovers Online Member Database
- Mergent Online Member Database
- StandardRegister.com

## BOWNE & CO. INC.

### Background

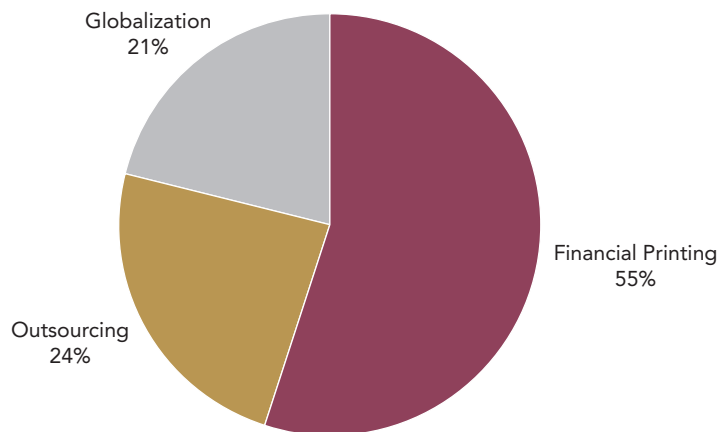
Bowne & Co., Inc., is headquartered in New York and known as the world's number one printing firm specializing in financial documents such as prospectuses, company reports, and other legal documents. The company caters to the high volume mailing needs of its customers. Bowne & Co. is ranked 600 in the S&P index.

Founder Robert Bowne established this business in 1775, dealing in office and printing stationery. The company was incorporated in 1909, and went public in 1968. In the 1930s, all public companies were required to issue prospectuses and annual reports to shareholders and Bowne experienced major growth as a result. Since then the company has survived various ups and downs, and today leads the world of financial printing.

The company undertook some serious acquisitions in late 1990s to reduce its dependence on the cyclic financial printing business. The acquisitions proved to be very profitable until the capital market crashed in the late 1990s. Today Bowne & Co. operates in various segments, providing financial printing, digital printing, business process outsourcing (BPO) services, and a broad range of globalization/localization services. The company has about 100 offices, manufacturing facilities and affiliations around the globe. With its current infrastructure in place, Bowne & Co. plans to evolve into a global document and information management solution provider.

The company operates the following divisions:

1. **Bowne Financial Print:** all financial printing such as equity and debt issuances, mergers and acquisitions and other mission-critical document services offered to customers. Some of the common services are language translations, electronic document filing, document composition, and document security.
2. **Bowne Enterprise Solutions (BES):** services involved in sending personalized and customized communications to customers of a company.
3. **Bowne Business Solutions (BBS):** services involved in outsourcing a company's presentation, word processing, desktop publishing, IT management, litigation support, and office document needs.
4. **Bowne Global Solutions (BGS):** services involved in globalization and localization needs of a company. BGS is a leading provider of comprehensive translations, localizations, technical writing and interpretation services.

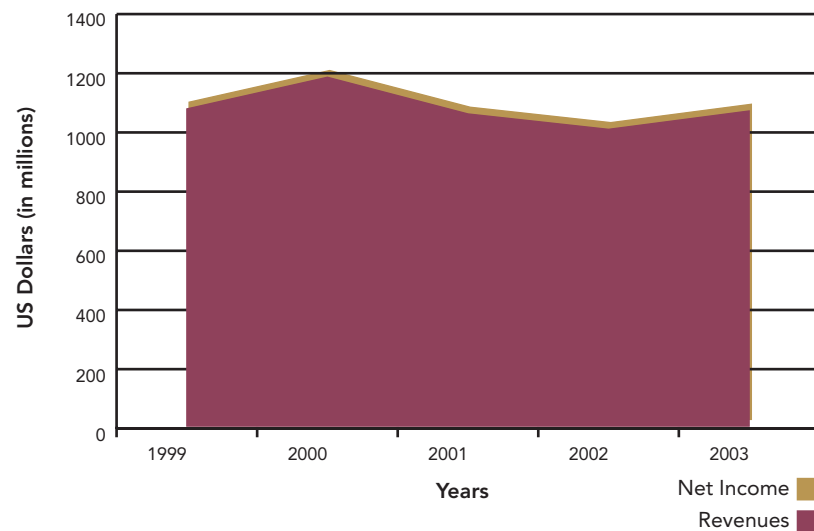


Types of Services in 2003

## Financials

Bowne & Co. has gone through a very rough phase in the past few years. Revenues increased to record levels in fiscal 2000, but the following year. A net income loss of \$7.7 million was registered in 2001. Revenues continued to decline in 2002, but increased in fiscal 2003, coupled with a net income loss of \$9.1 million.

The decrease in net income, however, did not affect the faith of investors, reflected in the company's share price, which reached \$17.90 in 2004, the highest level since the company joined the NYSE in July 1999.



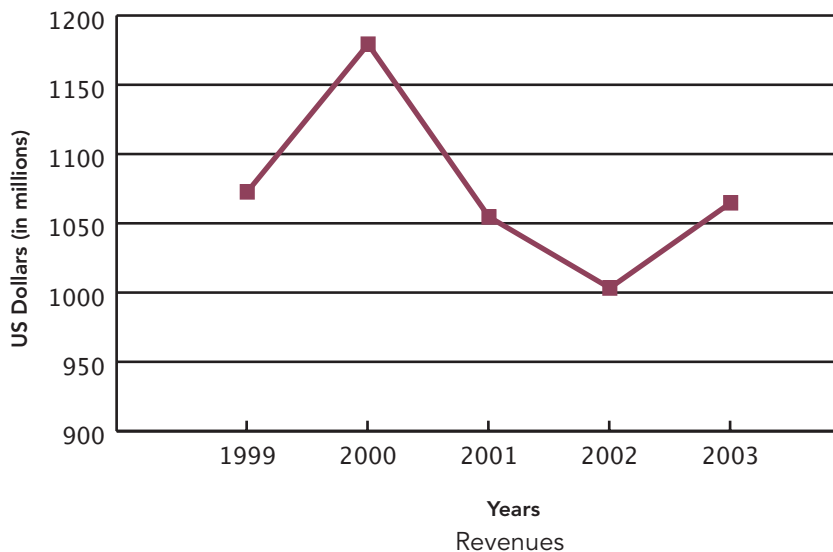
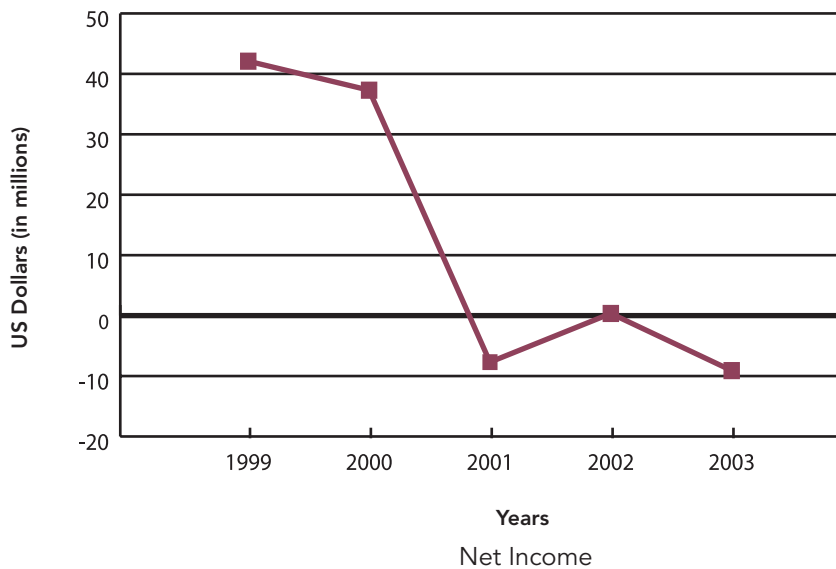
Revenues and Net Income

Year	Revenues (millions)	Net Income (millions)
1999	\$1072.7	\$42.1
2000	1179.3	37.3
2001	1054.6	-7.7
2002	1003.3	0.355
2003	1064.8	-9.1

Annual Revenues and Net Income

Robert M. Johnson, president and CEO, aggressively pursues cost reduction throughout the company. The company reduced its staff by about 9.5% and closed down many small offices and inefficient plants. The company spent \$12.4 million in restructuring the financial printing segment and achieved a \$120 million reduction in total annual fixed costs. With the latest acquisitions now integrated to add to revenues, the company should achieve better financial performance in the years to come.





## History of Acquisitions—1997 to 2002

- 1997: Acquired five companies involved in software localization (adapting software from one nation for use in another) and created Bowne Global Solutions.
- 1997: Acquired Internet Factory, a provider of online commerce software to further strengthen its Global Solutions network.
- 1997: Bought United Media, an outsourcing firm, to boost its outsourcing operations.
- 1998: Acquired Internet financing company QuadraVision and information outsourcing firm Donnelley Enterprise Solutions to continue to expand its global and Internet presence.
- Bought Japan's Technical Core and Datalink.
- Bought Spain's Mapora Books.

# Appendix B

---

- 2000: Consolidated its web consulting units into a new business unit called Immersant. Immersant was closed the following year due to a 75% decrease in revenues.
- 2001: Bought Mendez, a translation software company, to expand its financial printing and global solutions segment.
- 2002: Acquired DecisionQuest, a legal research firm.

## Sources

- [www.bowne.com](http://www.bowne.com)
- Bowne Annual Reports 2001-2003
- Hoovers online—[wally.rit.edu](http://wally.rit.edu)

## PITNEY BOWES

### Background

In 1912, Walter Bowes bought Universal Stamping Machine, a company that manufactured stamp canceling machines. Arthur Pitney joined Bowes in 1920 after he had developed a postage-metering machine. The company was named Pitney Bowes and developed into a large leasing and service vendor for mailing equipment and services.

Because of increased competition in the 1960s, the company diversified its operations into printing equipment, pricing and inventory control equipment, and credit and ID card products. Pitney Bowes suffered its first major loss in 1973, but didn't lose focus and actually continued to expand its operations.

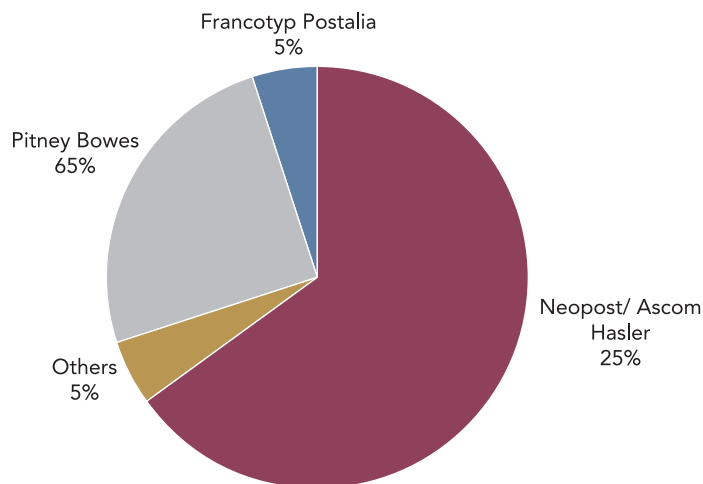
With a successful background in mail meter leasing, the company began to lease airplanes and barges in the early 1980s. The company introduced postage by phone and fax machines in 1981. Later, Pitney Bowes sold off most of its acquired non-core businesses. Non-office equipment leasing was taken over by GATX, allowing Pitney Bowes to concentrate on its core operations.

Today, Pitney Bowes is the world's largest producer of postage meters, and also deals in office equipment and services to assist offices around the globe in managing their mailing systems. The company has the largest number of meters installed in the U.S., UK and, Canada. In 2003, Pitney Bowes accounted for more than two-thirds of the nation's mailing meters. The company has over 1400 customer locations and serves about 50% of Fortune 100 companies. Its customer base of over 2 million worldwide includes about 865,000 small business customers. The company has gained 10,000 new small business customers since the beginning of 2002. With more than 20 million small businesses in the U.S., there are clearly more opportunities.

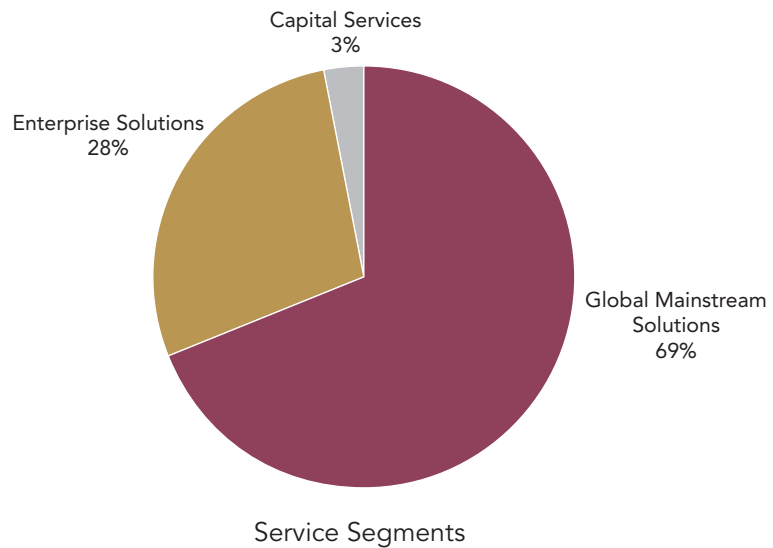
### Services

With a relatively constant number of total employees (32,500 thousand), the company offers a very wide portfolio of services, operating within three industry segments:

1. **Global Mainstream Solutions:** including revenues from sales, rentals and financing of mailing equipments and related supplies. This also includes mail services, postal payment solutions and software.
2. **Enterprise Solutions:** document messaging technologies (sales, servicing and financing of bulk mailing systems and sorting and inserting equipments) and management services (management operations for advanced mailing, reprographics, document management and other printing equipment and software).
3. **Capital Services:** financing and other fee-based services. This segment caters to different commercial and industrial markets in the U.S.



Global Installed Meters



## Recent Acquisitions

- 2000: sold its mortgage service business, Atlantic Mortgage & Investments Corporation, for about \$290 million.
- 2001: bought the international operations of Bell & Howell's Mail and Messaging Technology division for \$51 million.
- 2001: acquired Danka Services International, Danka Business System's outsourcing unit, for \$290 million.
- 2001: received \$400 million in settlement from a 1995 patent infringement suit against Hewlett-Packard.
- 2001: acquired Fimalac's mail system subsidiary, Secap.
- 2001: segmented its copier and fax businesses into another company named Imagistics International.
- 2002: acquired privately-held PSI Group, a leading provider of mail pre-sort services, for about \$130 million.
- 2003: acquired DDD Company, a government outsourcing service provider, for about \$50 million. The company is now named Pitney Bowes Government Solutions.
- 2004: acquired International Mail Express (IMEX) for \$29 million.
- 2004: acquired Group 1 Software for about \$321 million.

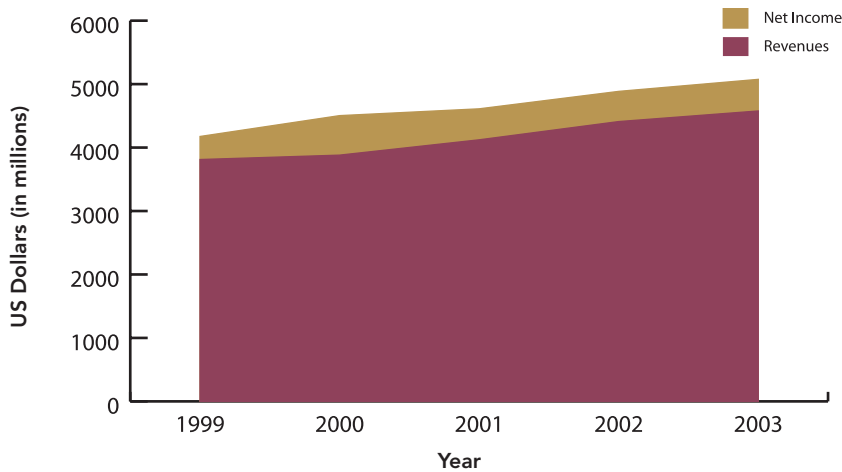
## Recent Agreements

- EBay—Pitney Bowes handles the website's Internet postage service, making postage easier for online sellers.
- DST Output—One of the largest mailers in U.S., DST Output uses PB in presort mail before it reaches the U.S. Postal Service.

- **TSYS**—A leading payment service company, TSYS mails approximately 34 million monthly bank statements a year. Pitney Bowes helped the company to track the current status of the payments that are mailed back.
- **RIBA**—The Royal Institute of British Architects handles a daily mail volume of more than 1,500 pieces for its 32,000 employees. Pitney Bowes helped the company to achieve faster employee mail account updates, and faster distribution and collection of mail to and from employees.
- **Jersey Post**—Pitney Bowes helped Jersey Post to achieve high levels of customization and personalization in its online and on paper outgoing mail.

## Financials

In fiscal year 2003, a 25% increase in share price and a 3% dividend yield added to a total return of 28% to the shareholders. In 2003, the revenue grew by 4%, down from the 7% increase in 2002. What contributed to the increasing stock price with decreasing revenues? First, favorable currency rates contributed about 3% to the company's growth. Second, Pitney Bowes international operations registered a 15% growth, compared to only 1% growth in U.S. operations. The stock price and the revenues were also affected positively by previous acquisitions of the PSI Group and DDD company. With the global economy improving every quarter, the company revenues expected to go up further.

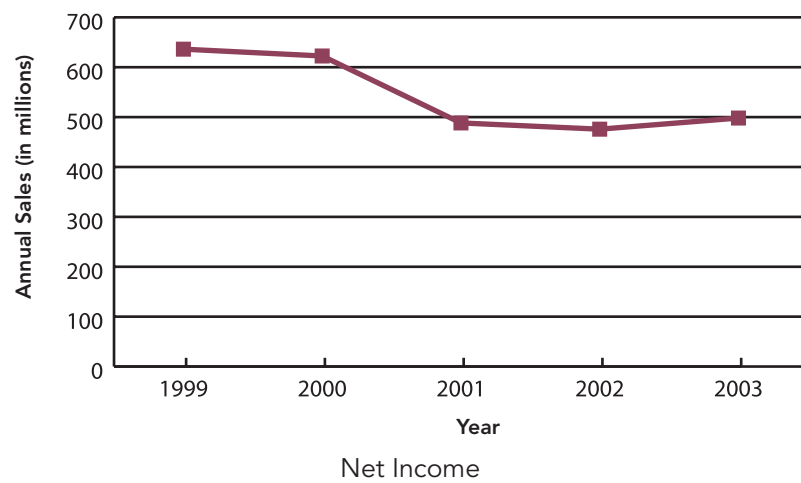
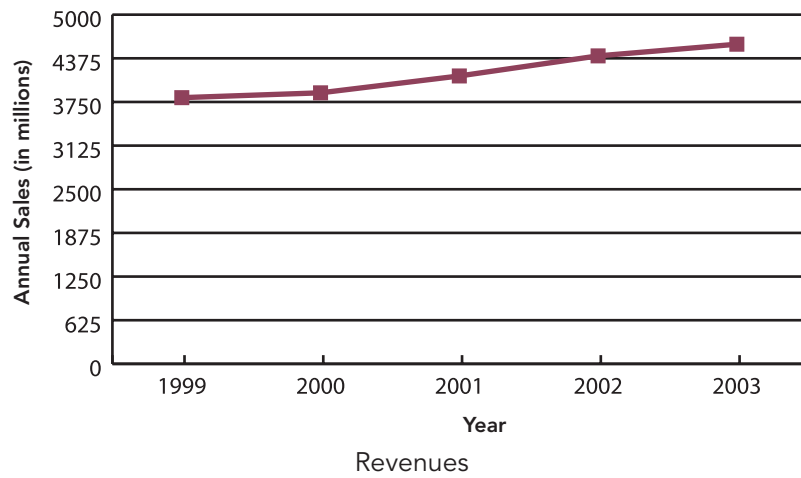


Revenues and Net Income

Year	Revenues (millions)	Net Income (millions)
1999	\$3811.6	\$636.2
2000	3880.9	622.5
2001	4122.4	488.3
2002	4409.8	475.8
2003	4576.9	498.1

Annual Revenues and Net Income

# Appendix B



## Sources

- Hoovers online—wally.rit.edu
- www.pb.bom
- Pitney Bowes Annual Reports

# Appendix C: Other Document Outsourcing and Document Management Services

## Document Outsourcing

- **Oce:** <http://www.oce.com/en/inout/building/default.htm>

## Document Management Services:

- **EDS:** [http://www.eds.com/services\\_offerings/so\\_bpm\\_docu\\_manage.shtml](http://www.eds.com/services_offerings/so_bpm_docu_manage.shtml)
- **FedEx Kinko's:** <http://www.fedex.com/us/officeprint/commsols/whyfedexkinkos/>
- **American Document Management:** <http://www.amdoc.com/>  
Comments: Focuses on the legal field as a niche, has 3 locations with \$6.8 million in revenue.
- **Lanier Outsourcing (A Ricoh Company):** <http://www.lanier.com/page.php/outsourcing>  
Hoover's Recap: Lanier Worldwide wants to spread the joys of office equipment around the globe. The company (spun off from communications equipment maker Harris Corporation in 1999) supplies businesses with office equipment, including copiers, fax machines, and printers. Its Lanier Professional Services subsidiary offers such services as reprographics, consulting, systems integration, and facilities management. The company also offers document management software for specific industries, including real estate and health care. Founded in 1934, Lanier became a subsidiary of Japanese office machine maker Ricoh when it was acquired in 2001.
- **ACS Healthcare Claims and Document Management:**  
<http://www.acs-inc.com/healthcare/services/claims.html>









Rochester Institute of Technology  
College of Imaging Arts and Sciences  
55 Lomb Memorial Drive  
Rochester, NY 14623  
Phone: (585) 475-2733  
<http://print.rit.edu>