BURTON GRAD ASSOCIATES, INC.
101 POST ROAD EAST
WESTPORT, CONNECTICUT 06880
(203) 222-8718 FAX: (203) 222-8728
E-MAIL: BURTGRAD@AOL.COM

Date: October 27, 1999

To: John Blaine

From: Burton Grad

Subject: Valuation of o.tel.o Products Acquisition by ISG

Enclosed are two final copies of the Valuation Report for ISG's o.tel.o products acquisition from April 30, 1998. I have kept the August 15, 1998 date on the report since the valuation procedures were those used prior to the SEC's 9/98 changes.

I have also enclosed an invoice for this project. I did not previously bill you for the work done in 1998 since I had not delivered a finished report.

If you have any questions, please call me.

Enclosures
5136

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Sterling Commerce, Inc.
4600 Lakehurst Court
Dublin, OH 43017-0760

Attention: John Blaine

Invoice #2942

October 27, 1999

Project #: 263-7

INVOICE

Project: Valuation Report on Acquired o.tel.o Intangible Assets

***Consulting Services*: February 1998 - October 1999**

Burton Grad	5 days @ $2,500/day		$12,500.00
Elizabeth Virgo	1.5 days @ $1,500/day		2,250.00
		Total Fees	**$14,750.00**
		Total Invoice	**$14,750.00**

Please Pay This Invoice Within 15 Days of Receipt

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August 15, 1998

Mr. John Blaine
Sterling Commerce, Inc.
4600 Lakehurst Court
P. O. Box 8000
Dublin, Ohio 43016-2000

Dear John:

At your request, Burton Grad Associates, Inc. (BGAI) has determined the valuation for the software products, the in-process technologies and the other intangible assets obtained as part of the acquisition of certain assets from o.tel.o, a German-based telecommunications company. These values will assist Sterling Commerce, Inc. (SCI) and its Interface Software Group (ISG) in the allocation of the total acquisition costs to the intangible assets which were part of the purchase completed as of May 1, 1998.

The enclosed report provides the detailed processes and calculations used to value the acquired o.tel.o software products which will be marketed by SCI/ISG and those research and development technologies which were in process at o.tel.o prior to the acquisition and that SCI/ISG will complete and market. It also shows how the other intangible assets were valued (employees, customer relations, etc.).

The analysis and recommendations in this valuation report are based on a careful examination of materials provided by SCI/ISG and o.tel.o, including business plans provided by SCI/ISG and interviews with selected SCI/ISG and o.tel.o executives. However, the customer and financial materials provided have not been independently verified.

The definitions, methodology and logic used, as well as the results obtained, are all described in this report. The enclosed appendices provide additional information supporting the BGAI valuation recommendations for the software products, the in-process technologies and the other intangibles acquired.

This report uses the value as of March 31, 1998 as a sufficiently close approximation for the value at the actual closing which was May 1, 1998. Based on information from SCI/ISG and o.tel.o, no business changes occurred between April 1, 1998 and the May 1, 1998 closing date which would have significantly changed the valuations.

Sincerely,

Burton Grad

Enclosure
BG:3751a

Valuation Report on Intangible o.tel.o Assets

as of April 30, 1998

Prepared for:

Interface Software Group
Sterling Commerce, Inc.
4600 Lakehurst Court
P. O. Box 8000
Dublin, Ohio 43016-2000

Prepared by:

Burton Grad Associates, Inc.
101 Post Road East
Westport, Connecticut 06880

Burton Grad
Elizabeth Virgo

Date:

August 15, 1998

Table of Contents

EXECUTIVE SUMMARY

At your request, Burton Grad Associates, Inc. (BGAI) has appraised the value of the o.tel.o intangible assets as of April 30, 1998. The purpose of this appraisal is to provide a formal valuation of the fair market value of the various acquired intangible assets which can then be used to allocate the total asset acquisition cost.

o.tel.o provides EDI and communications related software products as well as a wide range of telecommunications services. While o.tel.o currently markets and provides various products and services, only the Tiger and TeleTiger products and related professional services are of business interest to Sterling Commerce, Inc. (SCI) and its Interface Software Group (ISG).

BGAI has primarily used projected cash flow-based methodologies in the product and IPR&D valuations. This valuation method is commonly applied to appraising the product and technology assets of software products and information services operations. The other generally accepted valuation methods (market-based valuation and reconstruction cost) are not applicable to this particular asset acquisition. Selected other methods were used for the other intangibles.

BGAI has valued the software product assets based on the net present value of the projected cash flow over a four and one-half year forecast period; this includes revenues from the present o.tel.o customer base and from projected new customers for currently available products and for related maintenance and services. BGAI has also valued the acquired IPR&D technologies which will be necessary and essential to deliver the new SCI/ISG product and its related services. Again, a net present value-based approach has been used to establish the recommended value of the technologies.

Based on these analyses, BGAI believes that the fair market value allocation of the o.tel.o intangible acquisition cost of $3,648,000 as of April 30, 1998 is:

o.tel.o Software Products	$437,000	to be amortized over 54 months from date of acquisition
o.tel.o IPR&D Technologies	$1,674,000	to be written off as of the acquisition date per FAS2 rules

The value of the other intangibles equals the difference between the net intangibles acquisition costs (after balance sheet adjustments for tangible assets and liabilities) and the sum of the values of the o.tel.o software products and technologies.

	Value	Amortization
Trained Employees	$543,000	over 7 years
Customer Base	810,000	over 7 years
Going Concern/Goodwill	184,000	over 7 years
Total Other Intangibles	**$1,537,000**	

SECTION I. Objectives and Work Plan

Sterling Commerce, Inc. (SCI) and its Interface Software Group (ISG) wishes to have an independent valuation performed, using commonly accepted valuation techniques, of the value of the products, in-process R&D technologies and the other intangible assets which SCI/ISG is acquiring from o.tel.o Communications GmbH & Co. (o.tel.o). SCI/ISG wishes to determine the value of these assets as a basis for allocating the asset purchase price.

At SCI/ISG's request, Burton Grad Associates, Inc. (BGAI) has performed a valuation study of the o.tel.o intangible assets as of April 30, 1998. BGAI has used commonly accepted valuation techniques and its extensive experience in valuing computer software and services companies to determine the current value of these o.tel.o assets. The professional profile for Burton Grad is included as Appendix A-1 and the profile for Eliabeth Virgo is included as Appendix A-2.

Work Plan

BGAI has performed the valuation study following these steps:

1. Identified and collected materials from o.tel.o and SCI/ISG which provided the basis for the valuation study. A list of the materials requested is shown in Attachment B-1.

2. BGAI examined these materials and conducted on-site and telephone interviews with selected o.tel.o and SCI/ISG executives and managers to obtain information not available from the source materials. A list of the SCI contacts interviewed is shown in Appendix B-2.

3. BGAI selected appropriate valuation methodologies (net present value of projected cash flow and others) and analyzed o.tel.o and ISG materials, BGAI interview notes and relevant external materials in order to construct the valuation models needed.

4. For these models, key valuation factors were determined including expected economic life, NPV factors, projected tax rates, etc. Using these factors, the recommended fair market value of the acquired intangible assets was determined.

5. A final report was then delivered after ensuring that all information was accurate and complete and that the assumptions, logic and calculations were clear to the SCI/ISG executives. The final report included appropriate appendices.

SECTION II. Description of o.tel.o Business

A. History

o.tel.o is a large German telecommunications corporation with offices throughout Germany. It wants to divest the business unit that markets, sells and supports DOS and UNIX Electronic Document Interchange (EDI) software to better focus on its core voice/data business. o.tel.o had previously decided to resell the GENTRAN product line into their customer base, but now it wishes to narrow its focus.

The business was originally called Lion Software. Lion had been acquired by Vebacom, the telecom subsidiary of Veba GmbH, as part of a move by Veba into telecommunication systems. In turn, o.tel.o was a new joint venture, set up by Vebacom and RWE, another large German industrial combine, to address the newly deregulated German telecom market.

o.tel.o has a software installed base of approximately 750 customers, of whom only 275 are currently on active maintenance. Some of the other 475 other customers are still using o.tel.o's products and regularly paying for o.tel.o's consulting services to provide mapping, integration and related activities. The low ongoing maintenance percentage reflects o.tel.o's lack of strategic attention to the user base, much of which was obtained through one or more prior acquisitions. Approximately 20% of the customers use UNIX, the rest are DOS based. All the customers are in Germany, but some have installed systems in their offices in Austria and Switzerland.

o.tel.o had gross revenues for this business unit for 1997 of approximately $2.3 million, omitting hardware sales and maintenance and non-product related consulting. Of that, approximately $500,000 was software maintenance and optional premium services, while the remaining amounts were new or add-on sales (around $600,000) and consulting revenue ($1,200,000).

B. Products and Services

o.tel.o offers the following products (see Appendix C-1 for technical positioning):

- The core product, Tiger, provides a suite of EDI facilities. It was originally developed about ten years ago as a MS/DOS product, and then reconstructed for UNIX about five years ago. There is currently no NT version.

- A range of Communications Utilities providing both physical communications and EDI services. Almost all of these are resold third-party products.

- A new product, TeleTiger, currently in development, is an application module within the SAP/R3 environment. It will, therefore, run on any SAP/R3 platform (under UNIX, AS400, or NT, and on any hardware). There is no R2 version. TeleTiger has been programmed by a third-party software house, HPC, using the SAP language ADAP/4. It needs to interface with an EDI environment, such as Tiger or GENTRAN in order to do useful work. Appendix C-2 provides an extensive description of TeleTiger.

o.tel.o maintains the existing products themselves, but has had a third-party software house write the new product; however, for the new product, it still uses its own personnel for detailed design, testing and implementation of that software.

These products are supported by a range of services, often packaged into a single deal with the software sale:

- Consultancy in the use of EDI and its application in the customer business
- Systems Integration with both the customer's existing upstream systems and the downstream communications facilities. It is rare for customers to undertake this latter piece themselves.
- Training for which there is a dedicated manager and a packaged course, either at o.tel.o's premises or on site. This is usually a standard part of each deal.
- Customer Service via a telephone help desk. Again, this is packaged and contracted.
- In addition, o.tel.o already resells Sterling Commerce GENTRAN for the NT market.

C. Organization and Personnel

There were 31 full-time employees in the business unit as follows:

- 18 implementation services, consulting, product specifications personnel
- 5 customer support (level 1, 2) people
- 4 software integration, QA and communications specialists
- 3 sales technical support reps
- 1 sales rep

Key Employees -- The acting manager of the unit will be a key employee for SCI. There are 4-5 other supervisory level personnel that would be classified as key.

The development personnel have experience in system integration with SAP, X.400 communications, European communications and EDI standards, and UNIX and DOS. Several of the above personnel have recently been to Microsoft NT training as well as SCI product training as part of the o.tel.o reseller roll-out of Gentran:Server.

D. Market and Competition

German Translation Software Market-- o.tel.o's market share is substantial. The competitors are Actis and Seeburger. The telco billing market tied to SAP is unique, and there are no obvious competitors

E. Operations

Sales Approach – o.tel.o sells its software products through a direct sales force with standard price lists for software, support and services.

Customer Support Services – includes software updates and help desk telephone access. o.tel.o offers premium support services from a menu of options, generating significant revenue from those offerings.

- **Consulting Services**: include mapping assistance, on-site integration and implementation assistance and electronic commerce consulting.

- **Alliances**: o.tel.o has active alliances with SAP and Isocor. o.tel.o uses a third-party software house to write new EDI software. This company is named HPC and is located in Mannheim, Germany and has other operating locations.

F. Customer Base

o.tel.o's customer base of around 750 breaks down as follows:

DOS on Maintenance	DOS not on Maintenance	UNIX on Maintenance	UNIX not on Maintenance
240	337	33	140

o.tel.o reports that their customer base is largely happy, and that they are not experiencing any major support issues with any of the products.

G. Financials

Appendix C-3 shows the results of these specific o.tel.o operations during 1997. Since this was not an identified business unit for o.tel.o., the revenues and direct costs had to be reconstructed; many of the expenses are shared with other operations of o.tel.o so that the historic cost data is unreliable for the time periods covered.

Revenues for the software products business in 1997 totaled approximately $2.3 million after eliminating hardware and unrelated communications consulting.

SECTION III. Description of ISG Strategic and Operational Business Plans for o.tel.o Products and Technologies

A. Current ISG Business Description

ISG is a leading U. S. and global provider of EDI translation software marketing under the GENTRAN product line name.

B. Strategic Plans

The principal reasons why ISG acquired the o.tel.o EDI operations are:

1. The additional 750 o.tel.o customers can be added to ISG's current German user base, be supported profitably and can be upgraded to GENTRAN software within three years.

2. The in-process R&D focused on building TeleTiger opens up a whole new application market for ISG which should increase SCI and ISG visibility in addition to increasing revenues and operating income.

3. The ISG German market share is increased significantly.

4. ISG gains valuable German employees, especially in the consulting and implementation services areas.

5. The customer base may also require other ISG EDI products, including use of ISG's NT server product, which ISG can fulfill from day one.

ISG plans call for creating a Dusseldorf-based support/transition group consisting of current o.tel.o personnel. The reporting structure, integration with ISG German operations, and longer term development and marketing plans are being further developed as part of the SCI FY99 Budget and Strategy.

ISG will have an ongoing partnership with o.tel.o covering several areas:

1. o.tel.o will retain certain customers to act as general contractor and billing agent, so ISG will set up the procedures to assure that it works well for both sides, allowing free access to those customers for ISG's continuing sales efforts.

2. ISG sales reps will receive referrals from o.tel.o's core business sales reps.

3. ISG sales reps can refer leads to o.tel.o's core business sales reps.

4. o.tel.o represents a major telco with European expansion plans, so strategic discussions between the two companies regarding communications standards, Internet plans, etc. will be of ongoing benefit to SCI.

C. Relevant ISG GENTRAN Products

Two of the ISG products provide essentially the same functions as the o.tel.o Tiger products, but the Tiger products have some different interfaces and protocols unique to the German marketplace.

ISG has not been in the market/functional area covered by the future o.tel.o product called TeleTiger.

D. Plans for Tiger Customers

ISG plans to expand its EDI products position in the German marketplace through supporting the Tiger customers for the next three to five years while migrating them to the GENTRAN product line in a timely manner, so as not to lose current customers. ISG plans to have a strong alliance relationship with o.tel.o, maintaining the present Tiger customer base and selling the replacement GENTRAN products to the o.tel.o customer base.

To do this, ISG intends to:

1. Make Tiger Y2K compliant

2. Provide limited enhancements to keep Tiger competitive for its prospects and for o.tel.o's current customers

3. Continue maintenance and support for the Tiger customers, while trying to get many of the inactive customers to start paying maintenance fees again. The low maintenance revenues reflect o.tel.o's lack of attention to the user base.

4. Make new sales of Tiger where GENTRAN products do not fit

5. Provide conversion aids to migrate Tiger customers to GENTRAN products

E. Specific Plans for TeleTiger Product

The following items describe ISG's plans to exploit the in-process R&D technology underlying TeleTiger by releasing TeleTiger in Germany and then producing and supporting the product for other markets:

1. Marketing and Sales
   - Launch in Germany
   - Aggressive German sales plans
   - Launch and sell in France, U.K., Italy and other European countries
   - Launch and sell in U.S./Canada
   - Launch and sell in Asia and other international locations

2. Development
   - Complete and improve the interfaces and protocols
   - Complete functions/features to ensure market superiority
   - Modify functions to serve needs in other countries

3. Maintenance and Support
   - Maintain products in a professional, timely manner
   - 7 x 24 customer service with German speaking capability

4. Related Professional Services
   - Provide needed services to assist in planning and installation, along with training of customer personnel
   - Perform selected conversion and interface services

F. Sterling Financial Projections for o.tel.o and Related ISG Products

The specific assumptions and plans used by BGAI to produce Tiger revenue and operating income projections are shown in Section V.

The specific assumptions and plans used to produce TeleTiger revenue and operating income projections as a basis for the technology valuation are shown in Section VI.

In both cases, BGAI has examined ISG financial projections to assist in determining its own assumptions.

SECTION IV. Valuation Methodologies

The general asset valuation process for acquired intangible assets (after deducting the value of the tangible assets less liabilities) is:

1. Determine valuation of those intangible assets (current products, non-compete agreements) to be capitalized and amortized over their economic life

2. Determine valuation of incomplete/in-process research and development projects to be written off at acquisition

3. Subtract the sum of the results contained in steps 1 and 2 from the total acquisition costs for the intangible assets and specifically allocate the remainder to other intangible assets for capitalization and amortization.

This valuation of the intangible assets relates primarily to current Software Products in #1 and Technologies for future use in #2.

There are three principal valuation techniques which can be used for valuing the intangible assets of computer software and services companies (such as products and technologies):

- **Valuation of Projected Operating Profit Stream**

  What would an independent buyer pay for the projected profit stream from the assets to produce a fair rate of return on the investment, considering the risk involved? Valuation is based on revenue, cost and profit projections using revenue history, competitive position, market opportunities and realistic profitability expectations.

- **Resale Value of the Assets**

  What would an independent buyer pay for similar products and other assets based on current market values and recent acquisitions? Valuation is based on: comparable private and public asset acquisitions; price/earnings and price/revenue ratios of public companies in comparable businesses. These values need to have appropriate adjustments for special circumstances and balance sheet tangible values.

- **Reconstruction Costs**

  What would a third party have to pay to reconstruct equivalent products or technologies given reasonable technical skills and market knowledge? Valuation is based on design concept, number and size of programs, complexity of programs, languages and operating systems used. The actual costs incurred to acquire or develop the products and technologies is considered along with estimated reconstruction costs. Other implied costs due to market timing, product quality, etc. are also considered.

Each of these methods has to be used with appropriate consideration of business history, future risk, market direction, product and service quality and balance sheet elements. In each case, there are specific procedures to be followed so as to produce consistent valuations.

A. Software Products Valuation

Usually, neither reconstruction cost nor comparable company market value provides an appropriate valuation methodology for the value of the current products acquired.

Therefore, for software products, BGAI usually computes the net present value of the projected operating income stream over the expected economic life of the specific products which the Seller was marketing as of the acquisition date and which the Buyer expects to continue to market and support.

There are four primary steps in determining the net present value of the projected profit to be earned by sales and recurring revenues from the current products to be marketed.

1. Establish the Available Market Opportunity

Information is collected regarding the market opportunities for these types of products with consideration of prospective growth and competition on different platforms for various functions and markets. Competitive and technology factors are also considered.

2. Prepare Product Unit Forecasts and Estimate Revenue

Using management information and financial records as a basis, the sales history for the available products is examined. From this work, a profile of each product is built and used as a basis for BGAI forecasting. To produce realistic future sales projections, this is overlaid with the data derived from the market opportunity analysis and specific Buyer marketing plans.

3. Project Operating Costs and Pre-Tax Operating Profits

Seller, Buyer and industry historic operating costs are analyzed to project future costs. This yields a projected operating profit stream.

4. Determine Economic Life and Compute Net Present Value

The NPV calculations are based on the use of a predetermined discount rate, adjusted to the investment being made at the midpoint of each year. The figure selected is based on the level of risk in the BGAI forecasts; it does not necessarily reflect the company's historic/projected rate of return on investment, nor the cost of money as of the acquisition date, but does take both of these factors into consideration.

The marketable economic life for each product is determined, based on the market opportunity, sales history and experience, product currency, competition, expected technological developments and Buyer strategy. We believe that a 54-month life is realistic for the principal acquired o.tel.o product (Tiger).

The effective tax rates for international profits have been projected by ISG financial management at 34% .

The NPV calculations are made based on projected cash flow after tax adjustment over the economic life of the products. A straight line (or revenue-ratio) amortization method can be used for each product, based on its marketable economic life and its operating income pattern. Section V and its related Appendices shows this product valuation process in detail.

B. Acquired Technologies Valuation

Whether particular acquired technologies which are included in the new products can be expensed as in-process research and development depends on the intended use by the acquirer and whether technological feasibility has already been demonstrated for the future products which will incorporate these technologies per FAS86 rules. The technology values are not limited to the actual cost of development to date, but should reflect the value to the acquirer for the acquirer's intended uses.

BGAI analyzes the planned future products to determine if they meet the FAS86 technology feasibility rules for capitalization. If not, the value must be written off at the acquisition date because of FAS2 rules on not capitalizing in-process research and development costs.

The primary method used for valuing acquired technologies intended for future use is a projected cash flow-based valuation using the projected operating income for the new products. Neither comparable market value nor even reconstruction costs are particularly useful in this situation.

The projected operating income stream approach requires identification of the specific future products to be produced and marketed using the acquired technologies; a projection is then made of the revenues, costs and profits from these future products. The net present value of the resulting operating income stream is calculated over a realistic economic life to produce the valuation figures. The valuation procedure is similar to that described in Section IV A.

1. Establish the available market opportunity
2. Prepare product forecasts and estimate revenue
3. Project operating costs and pretax operating income
4. Determine economic life and compute net present value

The figures for the NPV discount rate are determined for the technologies considering in each case the special business risks. The effective tax rates are 37% for North American profits and 34% for International profits. We are using ten years as the marketable economic life for the planned future products using the acquired technologies.

Section VI and its associated appendices show the process and calculations for the new products.

C. Risk Levels in BGAI Forecasts for Acquired Products and Technologies

BGAI's practice is to prepare its own revenue forecasts and cost projections for each current product and for each qualified in-process and planned product, rather than use the assumptions and projections prepared by the acquirer of the assets (buyer).

The intangibles valuations for the acquired products and technologies used 15% as the after-tax discount rate on the current product and 20% on the new product. The forecasted revenue and operations costs were projected at this level of risk, using conservative business assumptions. In preparing its revenue forecasts and projected operating costs, BGAI has carefully considered, for each in-process and planned project, its stage of completion, complexity of work completed, difficulty of completing the work in a timely fashion, technological uncertainties, and any other relevant factors which would increase the risk to successful technical completion.

D. Determining Core Technologies Contributions Versus In-Process Technologies Contributions

The SEC states that the value of core technologies can only be claimed for those products which currently contain those technologies. If a new product will directly reuse previously released programs, and there are no significant technical risks in this reuse, then the value of the contributions of this core technology would have to be excluded from the value of the acquired technologies.

If a new product just uses the same or similar functionality as that in an existing released product, but it has to be rearchitected, restructured, redesigned, reprogrammed and retested, then this does not appear to constitute reuse of core technology, but rather should be considered part of in-process R&D work and treated accordingly for valuation and FAS2 write off.

With this background, BGAI has determined whether any acquired Tiger or other o.tel.o released technologies will be used in TeleTiger. Based on explicit representations from o.tel.o, ISG technical management and from BGAI's own due diligence review, BGAI believes that there is no such reuse. Therefore, there are no core technologies to be considered in determining the TeleTiger technology valuation.

E. Other Intangible Assets

The principal other intangible assets acquired are:

- trained personnel
- established customer base (i.e., customer relations)
- other developed technologies

The remaining elements of infrastructure, name recognition, channel relationships, business procedures, etc. are of only limited value to SCI, since SCI already has these capabilities and will integrate the o.tel.o going concern elements into the Interface Systems Group (ISG).

The valuation procedure used for other intangibles is described in detail in Section VII. A life of seven years has been used because of the rapid rate of change in the EDI business.

SECTION V. Valuation of Software Products Acquired from o.tel.o

A. Tactical and Strategic Plans for o.tel.o Products

ISG will continue to make limited new and upgrade sales of Tiger and plans to increase Tiger maintenance revenue from customers o.tel.o has not pursued actively for maintenance contracts. ISG will migrate the current users to the appropriate Gentran product relatively quickly; we assume it will take up to three years for this migration. The Communications Utilities will not be marketed or supported. Therefore, the rest of the product valuation only relates to Tiger in the DOS and UNIX marketplace.

B. Valuation Procedure

Based on historic and planning information from o.tel.o and SCI/ISG documents, as well as from interviews and industry analyses, BGAI has constructed its own revenue and cost projections covering the Tiger product line over the 4 ½ fiscal years starting April 1, 1998.

From the operating income cash flow projections, BGAI has determined the net present value for this product.

The net present value has been used as the basis for the BGAI value assessment of the current Tiger products.

The valuation procedure followed is described in Section IV-A.

C. General Information and Assumptions for Tiger Products

- Tiger had only 273 installed customers as of 12/31/97 who were on active maintenance agreements.
- Tiger is not yet Y2K compatible. We have assumed that SCI/ISG will fund the remaining Y2K development, testing (including certification), fixing of bugs and distribution of new disks incorporating Y2K changes and bug fixes.
- SCI/ISG does not plan to sell Tiger/DOS to additional customers after FY 1998. Instead, it will try to migrate these customers to GENTRAN:Director; using appropriate conversion tools.
- SCI will continue to sell and support Tiger/Unix for three to five years, migrating these customers to the GENTRAN:Server product during these years.
- We will omit any hardware sales and hardware maintenance revenues (and costs) for Tiger
- We will omit amortization, interest and taxes and deal only with operating costs.

D. Revenue Assumptions

The following are the primary assumptions used in forecasting the future revenue for the current Tiger products:

	Tiger/ DOS	Tiger/ Unix
New Sales units – CY1997	60	24
New Sales Price – FY1998	10K	30K
Installed Units on Maintenance	240	33
Maintenance Fee/Unit – FY98	1.0k	2.3k
Product Related Professional Services – CY97	400k	800k
Maintenance Erosion – 1998-2002	20% → 80%	20% → 80%

E. Revenue Forecasts

Using the assumptions stated above, BGAI expects new sales to continue in 2HFY98 and through FY99, but then to drop in FY00 and disappear in FY01. Similarly, add-ons and upgrades will continue, although at a slower pace, through FY00 and then collapse. Any growth customer will be migrated to the appropriate GENTRAN product. Only those who are satisfied with their current status will stay with Tiger in FY01 and FY02.

Services will only be associated with new sales and, given SCI's lack of strong interest in European professional services, will be at a low rate per unit sales.

Maintenance erosion will be high starting in FY00, primarily because of migration to GENTRAN products.

Appendix D, Table 11, shows the assumptions and calculations for the Tiger revenue forecasts. The expected total revenue for 2HFY98-FY02 will be:

	Revenue ($000)
2HFY98	$1,050
FY99	1,082
FY00	836
FY01	156
FY02	31
Total	**$3,156**

F. Cost Assumptions and Calculations

The costs are based on SCI's European experience:

	International
Cost of Revenues	.10
Marketing, Sales and Support	.35 → .20
Research and Development	.20 → .10
G&A	.15
Total	.80 → .55

The costs are calculated in Appendix D, Table 21. The total costs for 2HFY98-FY02 are $1,651,000, leaving a pre-tax operating income of $808,000.

G. Net Present Value Calculations

Assumptions:

- **Tax Rate:** International: 34%
- **Discount Rate:** 15%

The calculations are shown in Appendix D, Table 31. The results are:

	Net Present Value ($000)
2HFY98	$134
FY99	150
FY00	121
FY01	26
FY02	5
Total	**437**

We recommend that SCI capitalize the Tiger product at $437,000 and amortize it on a straight line (or revenue ratio) basis over 54 months.

SECTION VI. Valuation of In-Process Technologies to be Acquired from o.tel.o

A. Qualifications for Technology Write-off

The operative rule is that the value of acquired technologies which will be used in future products must be written off as of the date of acquisition if the products which will incorporate these technologies have not yet passed the technological feasibility tests and the market valuation tests specified in FAS86 (and the acquiring company's capitalization practices). This write-off is required by FAS2 for in-process R&D costs.

The methodology to be used for valuation of the technologies is the NPV of the projected operating income from the identified future products which will incorporate these acquired technologies. The procedure described in Section IV-B is implemented in this Section. The second method (reconstruction cost), which is sometimes used to confirm the NPV-based valuation, has not been deemed appropriate to use in this situation.

One of the primary purposes for the purchase of the o.tel.o assets by SCI/ISG was to obtain the SAP-related TeleTiger technologies being developed by o.tel.o. As of the planned acquisition date, o.tel.o had produced an initial version of the planned product. This pre-release version incorporates special technologies (developed by o.tel.o) for providing detailed telephone billing and accounting information for a wide range of SAP customers.

While o.tel.o has previously offered to sell this pre-release product (with only one customer so far), the principal objective has been to find a beta test or pre-launch customer in order to determine whether the product, as now constituted, will be able to be installed on a reasonable time and cost basis. In addition, o.tel.o wanted to determine what significant changes, modifications and enhancements would be needed to make TeleTiger a marketable product with sufficient functionality and satisfactory performance.

In BGAI's judgment, even though a working prototype exists, TeleTiger would not yet pass the FAS86 tests for capitalization since it cannot yet demonstrate technical feasibility or that sufficient revenue would be obtained to cover the R&D costs and the required distribution and support costs. Therefore, we will treat the TeleTiger technologies as work-in-process R&D and recommend writing off the projected value as of the date of acquisition under FAS2 rules.

In addition to the current pre-release version of TeleTiger which is aimed specifically at the German market, SCI/ISG intends to modify the product (interfaces, protocols, reports, documentation, etc.) to be marketable throughout Europe, in North America and in other international locations.

The various versions of TeleTiger will each require some separate design and implementation work in order to effectively use the TeleTiger technologies. Clearly, none of these new versions has yet met FAS86 technical (or market value) criteria. Therefore, all of the Net Present Value of the after-tax operating income from worldwide TeleTiger offerings will need to be written off as of the acquisition date, under FAS2 rules, as work-in-process R&D.

The calculations will be made separately for International and North America based on certain general and product-specific assumptions.

B. Assumptions

There are only a few general assumptions regarding the TeleTiger products:

1. TeleTiger will be sold as a standalone product to current o.tel.o and SCI/ISG customers in Germany and then to new prospects in Europe, the United States and finally in the rest of the world.

2. We will omit hardware sales and hardware maintenance revenues (and costs) for all future products.

3. We will omit amortization, interest and taxes and only use operating costs.

4. A tax rate of 37% will be used for expected federal and state taxes for North American operating income and 34% for international taxes on non-U.S. operating income.

5. A discount rate of 20% will be used; this is an after-tax rate and reflects both development and forecast risks.

In addition to these general assumptions, there are a number of assumptions specific to the individual markets. These assumptions are summarized below and have been used in the revenue, cost and NPV calculations.

TeleTiger

	North America	International
Prices:		
Software License/unit	$25k	$25k
Maintenance Fee	18%	18%
Professional Services	50%	50%
Cost Ratios:		
Cost of Revenues	.10	.10
Sales, Marketing and Support	.40 → .25	.40 → .25
Research & Development	.25 → .10	.25 → .10
G&A	.15	.15
Tax Rate	37%	34%
Discount Rate	20%	20%
Available Dates	1QFY00	Germany: 1QFY99 Europe: 3QFY99 Asia: 3QFY00

C. TeleTiger Revenue Calculations

The current SCI/ISG plan is to start selling TeleTiger for general release in Germany in October 1998 with phased releases in 3Q99 (Europe), 1Q00 (North America) and 3Q00 (Asia). The forecasts are separated between International and North America.

The revenue forecast for TeleTiger is shown in Appendix E, Tables 11 and 12, for the fiscal years 1999 through 2008. This assumes a ten-year forecast after the first version of the product is available. However, there would be no new customer sales after FY2005. The total worldwide revenue over those ten years for new and add-on product licenses, maintenance fees and installation services is $24,151,000.

D. TeleTiger Costs

Cost computations are shown in Appendix E, Table 21, with operating expenses at 90% of revenues in FY1999 for International and FY2000 for North America, going down to 60% by FY2006-2008.

As a result, the pre-tax operating income for TeleTiger is projected as $6,523,000 which averages 27% of the forecast revenues. Remember, the operating costs exclude amortization, interest and taxes.

E. Net Present Value Calculations

The net present value calculations are shown in Appendix E, Table 31, taking into consideration North American federal and state taxes and International tax rates; the net present value factors are based on a 20% discount rate, half-year adjusted (e.g., revenues are assumed to be earned evenly throughout the year).

The following table summarizes the results of the NPV calculations performed in Appendix E, Table 31:

TeleTiger Technologies NPV Calculations

Fiscal Years ($000)	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	1999-2008 Total
North America	0	12	44	94	90	101	62	36	23	13	476
International	30	110	148	219	205	190	119	89	57	31	1198
Total	30	122	191	313	295	291	181	125	80	45	1674

The resulting NPV of the projected operating income for TeleTiger for FY1999-2008 is $1,674,000.

One other factor which must be considered is whether there are any core technologies from previously released products which are included in the new product. While the name TeleTiger is similar to the name Tiger which o.tel.o has used for its EDI product, the two products are totally unrelated. TeleTiger was a brand new effort initiated by o.tel.o to tap the SAP marketplace in an area (telephone billing) related to o.tel.o's main business: telephone service. Therefore, there does not need to be any adjustment for core technologies.

Following the FAS86 technical and market value rules on capitalization of software products and the FAS2 rules regarding in-process R&D costs, BGAI believes that the acquired TeleTiger technologies should not be capitalized and must be expensed as of the date of acquisition.

Based on these conclusions, SCI/ISG should write off $1,674,000 as of the date of acquisition as the projected value of the TeleTiger IPR&D technologies.

SECTION VII. Valuation of Other Intangible Assets

In acquiring o.tel.o, SCI/ISG had five principal business goals:

1. Acquiring the current o.tel.o products to pick up some new sales as well as maintenance revenues from Tiger.

2. Acquiring the o.tel.o technologies specifically related to TeleTiger so that ISG could have a special application capability.

3. Acquiring some trained technical staff and sales/marketing people to enable ISG to enter this market more rapidly, effectively and efficiently

4. Acquiring o.tel.o's customer base which should provide additional buyers for current and future ISG product offerings

5. Acquiring some going concern recognition and goodwill from o.tel.o

In valuing each of these primary intangible assets one must be especially careful to identify the value as of the acquisition date and to avoid double counting the same benefit:

- Item 1 refers to the value of the existing o.tel.o products as of the acquisition date. This was the Tiger product which was valued in Section V.

- Item 2 (IPR&D Technologies) has been valued in Section VI; there are no core technologies contributions.

- Item 3 (assembled work force) refers to the costs avoided by ISG by acquiring the trained staff. All retained employees will be considered. These cost savings do not overlap other benefits.

- Item 4 (Customer Base) has its principal value in providing the potential for the Tiger customers to purchase other ISG products.

- Item 5 is a potpourri of all of the other intangible assets acquired by ISG from o.tel.o. This category includes name recognition, going concern practices and procedures, operational locations, channel and partnership relations, etc. The value of these will be the residual value from the acquisition costs incurred less all other tangible and intangible assets.

A. Assembled Work Force

Acquisition of trained personnel provides a direct benefit to the acquiring company since it avoids the costs of recruiting, training and bringing these employees to their full level of productivity.

SCI expected to retain only 22 of o.tel.o's employees. BGAI's determination of the value of these avoided employee costs is $823,000. This saving occurs principally because SCI does not have to try to recreate an organization to maintain, support and sell the o.tel.o products. The savings after-tax adjustment is $543,000 which should be amortized over a seven-year period representing the useful life of the acquired staff. Appendix F-1 provides the details of these calculations.

B. Customer Base and Professional Services

The acquired o.tel.o customer base was expected to be of some direct benefit to ISG. Acquiring a new customer is an expensive marketing and sales process, but once a company has served a customer, the customer is far more apt to buy additional products than a non-customer.

Appendix F-2 analyzes the acquired o.tel.o customer base and identifies which ISG products would benefit from having these companies as ISG customers.

The analysis in Appendix F-2, page 1, shows the mix of the then current o.tel.o customers (DOS/UNIX, active/inactive) and estimates what percentage of each category would buy the identified ISG products.

Prices, upgrade ratios, maintenance factors, services percentages and operating margin assumptions are shown for the ISG products in Appendix F-2, page 2. Appendix G shows the calculations; the total NPV for the relevant products is summarized below:

ISG Product	Net Present Value
Gentran:Director	$297,000
Gentran:Server	513,000
Total	**$810,000**

The estimates were made using a seven-year forecast. Based on ISG experience, many customers will continue to use the product and stay on maintenance, particularly those that license relatively late in the sales cycle.

The value of the o.tel.o customer base in buying other ISG products has been calculated at $810,000 which should be amortized over a seven-year period.

C. Other Technologies

o.tel.o has been developing advanced technologies for its key products and markets for a number of years. However, at the time of the acquisition, ISG could not identify any technologies other than those used for TeleTiger for which it had specific future use. Since the value of these in-process technologies was calculated in Section VI and since there were no core technologies used in TeleTiger, there is no other technologies value.

D. Going Concern and Goodwill Valuation

In addition to the other intangibles itemized in this Section, there are some other going concern and goodwill values which need to be considered in the total valuation process. These items cannot be valued individually so are only assessed as a group. Appendix F-3 provides the reasoning and quantification of the going concern and goodwill values. The result is a valuation of $184,000 which should be amortized over only a seven-year period because of the rapid rate of change in the EDI industry.

E. Summary of Other Intangibles Valuation

These four elements constitute the whole of the value of the other intangibles. The life expectancy of these are as shown below:

Other Intangibles	Value	Amortizable Life
Trained Personnel	$543,000	7 years
Customer Base for other ISG products	810,000	7 years
Core Technologies	-0-	--
Going Concern and Goodwill	184,000	7 years
Total	**$1,537,000**	**--**

BGAI believes that the other intangibles value of $1,537,000 realistically represents the value of all of these acquired elements and that it should be allocated and amortized as shown above.

SECTION VIII. Recommendations on Allocation of Value to Acquired o.tel.o Assets

A. Products

The following table summarizes the results of the NPV assessment of the o.tel.o Tiger product:

Summary - Tiger Product NPV Calculations

Fiscal Years ($000)	2HFY 1998	1999	2000	2001	2002	FY 1998-2002 Total
Tiger	134	150	121	26	5	437

Based on the analysis and calculations shown in Section V and Appendix D, BGAI recommends that SCI/ISG capitalize the acquired Tiger product at $437,000 and then amortize it over the 54 months following the date of acquisition. This value is entirely international.

B. Technologies

The following table summarizes the results of the NPV assessment of the o.tel.o in-process R&D technologies as they will be incorporated in the new SCI/ISG product. Based on the analyses and calculations shown in Sections VI, BGAI recommends that SCI/ISG allocate the o.tel.o asset purchase price related to the acquired o.tel.o TeleTiger technologies as follows:

Summary - TeleTiger Technologies NPV Calculations

Fiscal Year ($000)	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	1999-2008 Total
North America	0	12	44	94	90	101	62	36	23	13	476
International	30	110	148	219	205	190	119	89	57	31	1198
Total	30	122	191	313	295	291	181	125	80	45	1674

We have used the NPV-based valuation of the TeleTiger technologies. These figures appear reasonable based on the scope, complexity and timeliness of the available o.tel.o technologies.

BGAI recommends that SCI/ISG use $1,674,000 as the value of the in-process technologies acquired as part of the o.tel.o asset acquisition. This value should be written off as of the date of acquisition under FAS2 rules.

C. Other Intangibles

The goodwill value has been calculated using the remainder method. This was done by starting with the total purchase price plus all other acquisition costs. The adjusted net value of any tangible assets less the tangible liabilities is then deducted from the full acquisition cost. The balance represents the acquisition cost for the intangible assets. The product and technologies valuations are subtracted from the intangible acquisition costs. The remainder is the other intangibles which needs to be capitalized and amortized over an appropriate economic life.

The following calculations were used to determine the total purchase price and the value remaining for the other intangible assets:

	($000)
Asset Purchase Price	$2,926
Acquisition Costs (preliminary)	200
Total Acquisition Cost	3,126
Less: Adjusted Tangible Assets minus Liabilities	(522)
Product Valuation	437
Technologies Valuation	1,674
Other Intangibles	**$1,537**

In Section VII the total valuation of the other o.tel.o intangible assets to be allocated was shown as $1,537,000, principally comprised of trained personnel, customer base for other ISG products and going concern/goodwill value. These other intangibles should be amortized as shown below:

Other Intangibles	Value	Amortizable Life
Trained Personnel	$543,000	7 years
Customer Base and Professional Services	810,000	7 years
Other Technologies	-0-	--
Going Concern and Goodwill	184,000	7 years
Total	**$1,537,000**	

The sum of all of these intangible assets matches the purchase price plus other acquisition costs less the net value of tangible assets less tangible liabilities.

Burton Grad

Professional Summary

Burton Grad, President of Burton Grad Associates, Inc. (BGAI), has a long record of significant contributions to the computer software and services industry. He has experience both as a user and developer of application and systems products and as consultant, innovator, businessman and leader in the computer software and services industry.

Since 1978 he has been a consultant to companies providing software products, software professional services, processing services and other computer software and services offerings:

- Strategic planning, management and organizational consulting, and product analysis, evaluation and review
- Company and product acquisition studies including due diligence and valuation for financial capitalization and write-off purposes
- Planning, assessment and analysis of business operations including quality and productivity measurements

Work is performed personally or with the assistance of experienced specialists in market analysis, customer services, systems programs and industry applications on mainframe and departmental computers as well as on client/server and personal computer systems.

This is a partial list from the more than 175 BGAI clients:

Broadview Associates
Budgeting Technology, Inc.
CIBER, Inc.
DA Consulting Group
Decision Consultants, Inc.
Discount Investment Corporation
Elron Software, Inc.
Geocapital Partners
Grace Consulting and Technologies
i2 Technologies, Inc
Infosafe
Keane, Inc.
Mediware, Inc.
Platinum Technology
SPSS, Inc.
Sterling Commerce, Inc.
Sterling Software, Inc.
TSI International

Work Achievements

Burton Grad Associates, Inc. (1978 - Present)

* Strategic planning, management and organizational consulting, and product analysis, assessment and review

* Company, product and technology valuation studies for financial, tax, capitalization and acquisition purposes

* Due diligence studies on acquisitions of computer software/services companies

* Business assessment studies and implementation projects for product strategy, development, quality management and customer service

Customer Care, Inc. (1992 - 1996)

* Published ***CustomerCare Newsletter*** and ***CustomerCare Survey*** directed at software companies' customer services activities: support, documentation, training and product-related consulting

* Provided consulting on customer service processes, and training for customer service personnel

Heights Information Technology Service (1979 - 1983)

* Performed professional services for applications and systems development
* Used professionals on a remote, work at home basis with effective project management

International Business Machines Corporation (1960 - 1978)

* Definition, design and implementation of application development systems strategy resulting in release of IBM's development management systems
* Development of application programs for every major industry

* Establishment of joint planning and programming development with European operations
* Announcement, development and initial support of CICS
* Management of application development for small business and process control systems

* Responsibility for the production, release and maintenance of almost 200 programs
* Conception of approach to and programs for text processing and office automation systems
* Development and expansion of computer based training systems

* Development of management science and scientific programs
* Participation in the structuring and unbundling of IBM program products
* Creation of the Study Organization Plan for specifying and designing application systems

General Electric Company (1949 - 1960)

* Programming of the first commercial computer (Univac I in Louisville)
* Development of discrete simulation techniques for manufacturing planning and control
* Invention of decision tables

* Study of automated factory design and implementation
* Initiation and use of advanced techniques for production, inventory and quality control

Other Professional Activities

1972-1996 **ITAA**

* Computer Software and Services Trade Association

* President, Treasurer and Board member of American Software Association Division of ITAA

* Member of ITAA Board

* Chair and member of various committees (Industry Relations, Software Capitalization, Software Openness, Technology Information Services, Quality Management)

* Executive Committee of Information Technology Foundation (Project Office)

1968 and 1979 Principal author of ***Management Systems***, published by Holt, Rinehart and Winston. Used for colleges and businesses for computer application system methodology and design.

1950-Present Speaker and chair at conferences and workshops and contributor to professional journals on various information technology subjects including decision tables, quality control, systems engineering and software capitalization.

Burton Grad Associates, Inc.
101 Post Road East
Westport, Connecticut 06880
(203)222-8718
(203) 222-8728 FAX

EDUCATION

1949	Bachelor of Management Engineering Rensselaer Polytechnic Institute Troy, New York

POSITION HISTORY

1978-Present	**Burton Grad Associates, Inc.**, Founder and President Consultants to computer software and services companies
1992-1996	**CustomerCare, Inc.** Chairman Publisher and Consultants for software company customer services
1978-1984	**Heights Information Technology Services, Inc.,** Founder and President Professional software services
1960-1978	**International Business Machines Corporation** Consultant - IBM Research Lab Director of Development - Data Processing Division (DPD) Manager - Development Services and Scientific Application Programs (DPD) Manager - Technical and Scientific Development (DPD)
1949-1960	**General Electric Company** Consultant - Advanced Application and Systems Development, Production Control Services Manager - Production Control Operation - Large Steam Turbine Division Manufacturing Training Program

Elizabeth Virgo

4, Browning House, 19-21 Formosa Street
London W92JS, England

Telephone/Fax: 0171 289 2570
elizabeth_m_virgo@evirgo.freeserve.co.uk

PROFESSIONAL SUMMARY

Overview

Elizabeth Virgo has extensive experience in providing financially-oriented consulting services for companies in the computer software industry:

- Profit improvement, budgeting and cash flow planning
- Financial planning and controls
- Management information systems
- Positioning for merger and acquisition
- Due diligence studies
- Assistance to companies in financial difficulties

Typical Assignments

- Instituted a cash flow analysis and control system which enabled an undercapitalized software products company to accomplish its objectives until financing was obtained and thereafter
- Instituted an inventory control system for a computer system company to minimize cash investment
- Developed a budget and established a budgeting process for use thereafter for a publishing company specializing in the software industry
- Designed and guided the implementation of a management information system for a company in the software industry
- Assisted in changing from cash to accrual accounting and instituted additional financial systems and a management information system to enable it to continue its expansion
- Participated in a number of due diligence studies on behalf of companies acquiring software companies
- Performed product valuation studies for tax accounting purposes
- Performed market and product evaluation and validation of opportunities for various software applications

Clients Include

Motorola
AGS Computers, Inc.
Sterling Software, Inc.
IBM Corporation
International Computer Programs, Inc.
Pictureware

Education and Associations

- B.A. (Hons) Economics from Manchester University (England) specializing in statistics
- Member of the United Kingdom Market Research Society
- Member of the United Kingdom Long-Range Planning Society
- Completed courses on critical path analysis, PERT, corporate planning and selected O.R. techniques
- Regular attendee at meetings of the Computer Software and Services Trade Association (ITAA): participant in software capitalization presentation and preparation of published guidelines

Information Requested

1. List of principal o.tel.o customers for preceding three years and the revenues from each of these accounts for each year
2. Financial statements for o.tel.o for the preceding 15 months
3. Effective ISG (SCI) tax rate (federal and state) for budget purposes as of the valuation date
4. Current cost of money for ISG (SCI)
5. Current organization chart for o.tel.o, with number of employees by function
6. ISG business and strategic plans for o.tel.o including planned products, types of services, pricing, development projects, etc.
7. Marketing materials for current o.tel.o offerings and services
8. List, description, size and market share of principal competitors
9. ISG acquisition analysis materials for o.tel.o
10. ISG sales and support plan for acquired o.tel.o products
11. ISG marketing plan for maintaining and increasing o.tel.o customers
12. Analysis of o.tel.o installed base including installation dates, maintenance status, platforms
13. Technical analysis of o.tel.o products and in-process development activities in terms of both application and system functionality
14. ISG technical plans for utilizing and incorporating acquired o.tel.o technologies in future (or enhanced) ISG products

Interviews Conducted

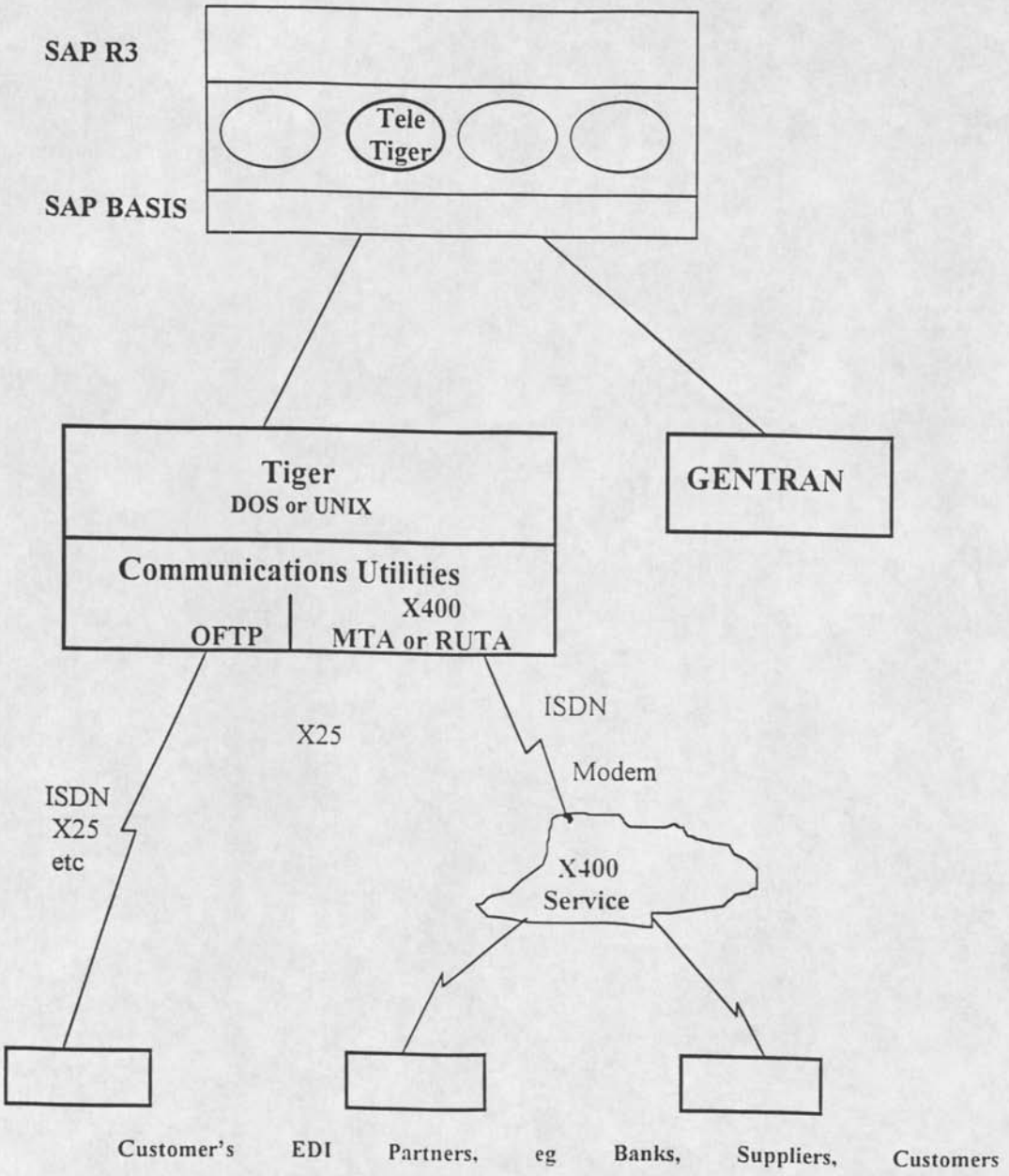
John Blaine

Pat Davis

Randy Harvey

Figure 2

PRODUCT POSITIONING



Product Description: This is a vertical solution for optimizing the management and validation process of telco bills. The genesis for this product is based on an old DOS solution provided by Lion. This system called ELFE is in place at roughly 40 customers and provided limited capability in reviewing and validating telco bills. The Tele Tiger system is based on the evolving INET document standard, a subset of EDIFACT. The market need being addressed is the current inability of SAP to provide automated or on-line viewing/validation of detailed telco bills, no method for splitting the cost within the CO module, and no on-line method to manage telco contracts and master data. In many instances this type of validation and review is done by reading through the paper bills or is not done at all. The developed system is integrated into the SAP environment.

Target Market: This market, as defined by o.tel.o, is all R/3 sites in Germany (728 NT, 2350 UNIX) and eventually throughout Europe and the U.S. They do not break down the opportunities anymore than this level. An obvious requirement is that a prospect's telco provider supports the INET standard. The current INET billing document is in review and not fully approved. Only 3 of 5 telcos in Germany (DT AG, Mannesmann D2, & E-Plus E1) can provide electronic bills. Interestingly enough, not even o.tel.o provides these bills.

Competition: The main competitors for this product run standalone solutions based on DOS, Windows and NT. The main competitor, Bodo Peters has an FTP process for the IDOC structures to be accepted within SAP Another competitor is Com Control.

Positioning: It appears that o.tel.o was going to use this vertical solution as the lead in to not only solving a particular niche need but also as a way to sell more Tiger EDI Gateway software and messaging services. This solution is dependent on having an EDI solution that can process the INET billing document and a fairly secured messaging pipe. According to C Weber, being a part of o.tel.o had proven a negative as none of the other telcos were particularly interested in partnering and the fact that o.tel.o did not support the INET document was also viewed as detrimental.

Pricing: The pricing model very much reflects the services approach to the business. The view is to sell the complete solution, message services, EDI and bill validation & management. Outlined below is a rough pricing model reviewed by Astrid Lambert, the product manager.

Tele Tiger Pricing Matrix

Component	Price in $	Details
Tele Tiger SW	25,200	
Installation (required service)	2,240	2 days
IDOC customizing/booking	2,688	2 days mandatory
Project Mgmt	2,688	2 days to define project
Training	4,032	3 days
Total Tele Tiger SW & Services	**36,848**	This is base does not include a services package for all the admin set-up & any mapping
Yearly Tele Tiger Support	20% SW	Yearly support
Tiger on UNIX SW	9,740	SW & training
Installation	2,240	
Total EDI Gateway for Tele Tiger	11,980	Does not include IDOC mapping or testing
Support	15% of SW	
X.400 P7 Connection SW	1,008	
Installation of RUA	1,120	
Monthly ADMD charges		

This pricing model does not include what appears to be a significant client services opportunity in IDOC customization and control data set-up and configuration. According to Astrid this client services effort could be anywhere from 2 to 15 days.

Prospects: The current list of prospects is limited to BMW and 4-5 internal Veba subsidiaries. This is primarily due to BMW's insistence they keep from fully marketing the product until BMW has it up and running. They have told roughly 20 customers about the product and say they are very interested. BMW has assisted in the funding of building the product with a 100,000,00 DM investment.

Product Features: The product, over time, is intended to provide the following features:

Functional Capability	Release	Telco Ready	Required E Doc Now
Receive telco bill electronically (INET)	1.0	Some	Yes
Ability to manually validate bills for: - Is pricing correct - Are accounts still active	1.0	N/A	N/A
Ability to split cost information for loading into the CO module of SAP	1.0	N/A	N/A
Reporting capability via data exchange with desktop tools such as Excel.	1.0	N/A	N/A
Electronic management of master contracts from telco, includes E-doucment for receiving contract info	2.0	No	No
Integration with in house phone system for matching billed traffic versus actual traffic reported	2.0	N/A	N/A
Workflow integration with SAP	2.0	N/A	N/A
Electronic management of telco pricing catalogs for circuit, line, phone, etc.	2.0	No	No
Ability to send electronic orders and notices to telcos.	2.0	No	No
User exits	2.0	N/A	N/A

Development History & Approach: An external software house, HPC, performs all current development. This company was picked due to their extensive experience with SAP development and some prior relationships. The entire project for release 1.0 is based on a fixed contract that HPC has already exceeded in terms of price and time. HPC has been working on the project for roughly 1 year. BMW has participated in the requirements definition. Much of the product functionality is dependent on new INET documents and the general acceptance of these documents by the Telcos. The system is written in ABAP/4 and runs within a SAP environment. The system is stated to be in prototype stage with 95% of the release 1.0 work complete. Final QA testing is being done by o.tel.o. Their initial customer is BMW who contributed 100.000 DM to the project and will serve as a test site. Once the release is certified and turned over to o.tel.o HPC only has a 6-week commitment on bug fixes. There is no support contract in place at this point in time. HPC has requested to be a reseller. They were also interested in reselling rights in the U.S. They have roughly 30 people working in the States and 50 in Germany.

An independent consultant, Jurgen Liersch, has been contracted to assist in QA and overall product review. O.tel.o had planned to contract Jurgen for about 10 days a month to assist with the next release. Currently, 2 developers within o.tel.o are involved in this project. Friedhelm bar is the overall project coordinator and tester and is supported by Alfons Meisenfelder.

Organizational Requirements: Significant skills and infrastructure are required to support this type of application. The sales model is a real application solution sale with knowledge required not only about SAP but also telco billing, EC, and potentially messaging. This knowledge would be required at both a sales and a pre-sales support level. To effectively market this type of product, knowledgeable Marcom resources would be required as well as someone working a strong partnership with SAP to get their name behind this product. Within support, client services and development, knowledge will be required for the SAP environment, how to install components, ABAP/4 programming, IDOC processing, table access to the SAP databases, Tele Tiger processing, and EC. An SAP environment for testing and troubleshooting will be required as well as an ABAP/4 development environment.
Issues: Should SCI sell, market and support this type of product.

Strengths	Weaknesses
• Understand EC and IDOC process • Good Project management skills for managing this type of project.	• No SAP experience • No true application sales model, etc • No ABAP/4 development experience • No support, development infrastructure for this type appl.
Opportunities	**Threats**
• Differentiates us from competition in the eyes of SAP as well as in the eyes of SAP prospects. • Use as a lead position in selling traditional products • Gives us a true vertical solution to experiment with	• Cost to support becomes unbearable • Diverts/distracts us from core business activities.

Issue: Is there a true market for this type of application?
Recommendation: We need to find out fast.

o.tel.o Software-Related Revenues

CY 1997 Reconstruction Revenues ($000)*	
New Software Sales	
DOS	588
UNIX	0
Maintenance	
DOS	214
UNIX	277
Consulting and Services	1,222
Total	**2,301**

* Ignores all hardware and general consulting revenues

	A	B	C	D	E	F	H
1							
2			Tiger -- Revenues (International)				11
3			Projected				
4	($000)	2HFY98	FY99	FY00	FY01	FY02	Total 1998-2002
5							
6	**New Product Licenses**						
7	New license rate		1.50	.75	.00	.00	
8	New license revenue	350	525	394	0	0	1269
9							
10	**Add-ons/Upgrades**						
11	Add-on rate		.25	.25	.00	.00	
12	Add-on revenue	100	80	64	0	0	244
13							
14	**Services**						
15	Services rate		.15	.15	.15	.15	
16	Services revenue	400	48	39	20	4	511
17							
18	**Maintenance Revenue**	200	429	340	136	27	1132
19							
20	**Total Revenue**	1050	1082	836	156	31	3156
21							
22							
23	Previous year maintenance		400	429	340	136	
24	Retention rate		.8	.6	.4	.2	
25	Remaining maintenance		320	257	136	27	740
26	New + add-on license revenue		605	458	0	0	
27	Maintenance/license rate		.18	.18	.18	.18	
28	Conversion rate		1.0	1.0	1.0	1.0	
29	New license maintenance revenue		109	82	0	0	191
30	**Total Maintenance**	200	429	340	136	27	1132
31							
32							
33							
34							
35							
36							
37							
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	A	B	C	D	E	F	H
51							
52	**Costs for Tiger -- (International)**						**21**
53							
54		**Projected**					
55	**($000)**	**2HFY98**	**FY99**	**FY00**	**FY01**	**FY02**	**Total 1998 2002**
56							
57	**International**						
58	Revenues	1050	1082	836	156	31	3156
59							
60	Cost of revenues rate	.10	.10	.10	.10	.10	
61	cost	105	108	84	16	3	316
62	Marketing and sales rate	.35	.35	.30	.25	.20	
63	cost	368	379	251	39	6	
64	R and D rate	.20	.15	.15	.10	.10	
65	cost	210	162	125	16	3	517
66	G and A rate	.15	.15	.15	.15	.15	
67	cost	158	162	125	23	5	473
68	**Total Costs -- International**	840	811	586	94	17	1651
69	**Cost/Revenue Ratio**	.80	.75	.70	.60	.55	
70							
71							
72							
73							
74							
75							
76							
77							
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	A	B	C	D	E	F	H
101	**Net Present Value -- Tiger (International)**						31
102							
103	($000)	2HFY98	FY99	FY00	FY01	FY02	Total 1998-2002
104	**Tiger -- International**						
105	Revenue	1050	1082	836	156	31	3156
106	Operating Income Ratio	.20	.25	.30	.40	.45	
107	Operating Income	210	270	251	63	14	808
108	Tax Rate	.34	.34	.34	.34	.34	
109	Operating Income After Tax	139	179	166	41	9	533
110	NPV Factors	.967	.841	.731	.636	.553	
111	NPV	134	150	121	26	5	437
112							
113	Discount Rate - International	0.15					
114							
115							
116							
117							
118							
119							
120							
121							
122							
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124							
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	A	B	C	D	E	F	G	H	I	J	K	L
1	**Revenues for TeleTiger (North America)**											11
2												
3		**Projected Fiscal Year**										
4	**($000)**	**1999**	**2000**	**2001**	**2002**	**2003**	**2004**	**2005**	**2006**	**2007**	**2008**	**Total 1999-2008**
5												
6	**New Customer Sales**											
7	New Sales Units	0	6	12	24	24	24	12	0	0	0	102
8	Price/Unit	25	25	25	25	25	25	25	25	25	25	
9	New License Revenue	0	150	300	600	600	600	300	0	0	0	2550
10												
11	**Add-on Sales**											
12	Add-on Growth Rate	.55	.55	.55	.55	.55	.55	.55	.55	.55	.55	
13	Add-on Revenue	0	0	14	41	94	146	187	188	145	95	910
14												
15	**Services**											
16	Services Rate	.50	.50	.50	.50	.50	.50	.50	.50	.50	.50	
17	Services Revenue	0	75	150	300	300	300	150	0	0	0	1275
18												
19	**Maintenance Revenue**	0	27	82	189	295	400	428	376	289	191	2277
20												
21	**Maintenance Calculations**											
22	Previous Year Maintenance	0	0	27	82	189	295	400	428	376	289	
23	Retention Rate	.95	.95	.95	.90	.90	.90	.85	.80	.70	.60	
24	Remaining Maintenance	0	0	26	74	170	266	340	342	263	174	1655
25	New License + Add-on Revenue	0	150	314	641	694	746	487	188	145	95	
26	Maintenance License Rate	.18	.18	.18	.18	.18	.18	.18	.18	.18	.18	
27	Initial Conversion Rate	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	
28	New Maintenance Revenue	0	27	57	115	125	134	88	34	26	17	623
29	Total Maintenance	0	27	82	189	295	400	428	376	289	191	2277
30												
31	**Total Revenue**	0	252	546	1130	1289	1446	1065	564	434	286	7012
32												
33												
34												
35												
36												
37												
38												
39												
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41												
42												
43												
44												
45												
46												
47												
48												
49												
50												

	M	N	O	P	Q	R	S	T	U	V	W	X
1	**Revenues for TeleTiger (International)**											12
2		**Projected Fiscal Year**										
3												
4	**($000)**	**1999**	**2000**	**2001**	**2002**	**2003**	**2004**	**2005**	**2006**	**2007**	**2008**	**Total 1999 - 2008**
5												
6	**New Customer Sales**											
7	New Sales Units	12	24	36	48	48	48	24	0	0	0	240
8	Price/Unit	25	25	25	25	25	25	25	25	25	25	
9	New License Revenue	300	600	900	1200	1200	1200	600	0	0	0	6000
10												
11	**Add-on Sales**											
12	Add-on Growth Rate	.55	.55	.55	.55	.55	.55	.55	.55	.55	.55	
13	Add-on Revenue	0	28	81	161	266	370	446	440	339	223	2354
14												
15	**Services**											
16	Services Rate	.50	.50	.50	.50	.50	.50	.50	.50	.50	.50	
17	Services Revenue	150	300	450	600	600	600	300	0	0	0	3000
18												
19	**Maintenance Revenue**	54	164	325	537	747	955	1000	879	676	446	5784
20												
21	**Maintenance Calculations**											
22	Previous Year Maintenance	0	54	164	325	537	747	955	1000	879	676	
23	Retention Rate	.95	.95	.90	.90	.90	.90	.85	.80	.70	.60	
24	Remaining Maintenance	0	51	148	292	483	672	812	800	616	406	4281
25	New License + Add-on Revenue	300	628	981	1361	1466	1570	1046	440	339	223	
26	Maintenance License Rate	.18	.18	.18	.18	.18	.18	.18	.18	.18	.18	
27	Initial Conversion Rate	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	
28	New Maintenance Revenue	54	113	177	245	264	283	188	79	61	40	1504
29	Total Maintenance	54	164	325	537	747	955	1000	879	676	446	5784
30												
31	**Total Revenue**	504	1093	1756	2498	2813	3125	2347	1319	1015	669	17139
32												
33												
34												
35												
36												
37												
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48												
49												
50												

	A	B	C	D	E	F	G	H	I	J	K	L
51	**Costs for TeleTiger (Worldwide)**											**21**
52												
53		**Projected Fiscal Year**										
54												
55	**($000)**	**1999**	**2000**	**2001**	**2002**	**2003**	**2004**	**2005**	**2006**	**2007**	**2008**	**Total 1999-2008**
56												
57	**North America**											
58	Revenues	0	252	546	1130	1289	1446	1065	564	434	286	7012
59												
60	Cost of revenues rate		.10	.10	.10	.10	.10	.10	.10	.10	.10	
61	cost		25	55	113	129	145	106	56	43	29	701
62	Marketing and sales rate		.40	.35	.35	.35	.30	.30	.25	.25	.25	
63	cost		101	191	395	451	434	319	141	109	72	2213
64	R and D rate		.25	.20	.15	.15	.15	.15	.10	.10	.10	
65	cost		63	109	169	193	217	160	56	43	29	1040
66	G and A rate		.15	.15	.15	.15	.15	.15	.15	.15	.15	
67	cost		38	82	169	193	217	160	85	65	43	1052
68	**Total Costs-North America**		227	437	847	967	1012	745	339	260	172	5006
69												
70	**Cost/Revenue Ratio - North America**		.90	.80	.75	.75	.70	.70	.60	.60	.60	
71												
72	**International**											
73	Revenue	504	1093	1756	2498	2813	3125	2347	1319	1015	669	17139
74												
75	Cost of revenues rate	.10	.10	.10	.10	.10	.10	.10	.10	.10	.10	
76	cost	50	109	176	250	281	312	235	132	102	67	1714
77	Marketing and sales rate	.40	.35	.35	.35	.35	.35	.35	.25	.25	.25	
78	cost	202	382	615	874	985	1094	821	330	254	167	5723
79	R and D rate	.25	.20	.20	.15	.15	.15	.15	.10	.10	.10	
80	cost	126	219	351	375	422	469	352	132	102	67	2613
81	G and A rate	.15	.15	.15	.15	.15	.15	.15	.15	.15	.15	0.25
82	cost	76	164	263	375	422	469	352	198	152	100	2571
83												
84	**Total Costs - International**	454	874	1405	1873	2110	2344	1760	792	609	402	12621
85												
86	**Cost/Revenue Ratio - Int'l**	.90	.80	.80	.75	.75	.75	.75	.60	.60	.60	
87												
88												
89												
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100												

	A	B	C	D	E	F	G	H	I	J	K	L
101	**Net Present Value -- TeleTiger**											31
102	**Projected Fiscal Year**											
103	**($000)**	**1999**	**2000**	**2001**	**2002**	**2003**	**2004**	**2005**	**2006**	**2007**	**2008**	**Total 1999-2008**
104	**TeleTiger (North America)**											
105	Revenue	0	252	546	1130	1289	1446	1065	564	434	286	7012
106	Operating Income Ratio	1.00	.10	.20	.25	.25	.30	.30	.40	.40	.40	
107	Operating Income	0	25	109	282	322	434	319	226	174	114	2006
108	Tax Rate	.37	.37	.37	.37	.37	.37	.37	.37	.37	.34	
109	Operating Income After Tax	0	16	69	178	203	273	201	142	109	76	1267
110	NPV Factors	.917	.764	.637	.530	.442	.368	.307	.256	.213	.178	
111	NPV	0	12	44	94	90	101	62	36	23	13	476
112												
113	Discount Rate - Americas	0.2										
114												
115												
116												
117												
118												
119												
120												
121												
122												
123												
124	**TeleTiger (International)**											
125	Revenue	504	1093	1756	2498	2813	3125	2347	1319	1015	669	17139
126	Operating Income Ratio	.10	.20	.20	.25	.25	.25	.25	.40	.40	.40	
127	Operating Income	50	219	351	624	703	781	587	528	406	268	4517
128	Tax Rate	.34	.34	.34	.34	.34	.34	.34	.34	.34	.34	
129	Operating Income After Tax	33	144	232	412	464	516	387	348	268	177	2981
130	NPV Factors	.917	.764	.637	.530	.442	.368	.307	.256	.213	.178	
131	NPV	30	110	148	219	205	190	119	89	57	31	1198
132												
133	Discount Rate - International	0.2										
134												
135												
136												
137												
138												
139												
140												
141												
142												
143	**Worldwide Summary**											
144	Revenue	504	1345	2302	3628	4102	4571	3411	1884	1449	956	24151
145	Operating income	50	244	460	907	1025	1215	906	753	580	382	6523
146	Operating Income after tax	33	160	301	590	667	789	588	490	377	252	4249
147	NPV	30	122	191	313	295	291	181	125	80	45	1674
148												
149												
150												

Assembled Work Force Valuation

Based on information provided by SCI, BGAI has computed the cost savings from acquiring and retaining 22 of the o.tel.o employees who were on board as of the date of acquisition. The other 102 employees either voluntarily or involuntarily transferred as of April 30, 1999 to o.tel.o or were retained temporarily for transition activities.

The table below summarizes the key factors for valuing the Assembled Work Force:

Employee Category	Number of Retained Employees	Average Annual Salary	Learning Period (months)	Recruiting Cost (% of Annual Salary)	% Usage of Recruiting
Executives/Managers	3	79,240	6	25	90
Sales/Marketing	2	96,611	5	25	90
Senior Technical	8	58,436	4	25	80
Other Technical	6	54,107	3	25	70
Customer Service/Support	3	48,532	4	25	70
Administrative	0				
Total	**22**				

The number of employees were those actually retained on the ISG payroll just after the acquisition date, grouped into logical categories.

The average annual salaries exclude benefits, which will be calculated as an additional 22% of salary.

Learning time is based on ISG experience in training comparable new hires.

Recruiting cost (from third-party recruiters) is based on a percentage of salary; the calculations are adjusted to take into consideration that some employees are directly hired, not obtained through outside recruiting firms. The expected percentage of personnel recruited through third parties is shown in the fifth column.

Training cost must also take into consideration the lost productivity from the employees who are needed to provide on-the-job training or formal classes for new employees. This is assumed to be 15% of an equivalent employee's time during the learning period.

Relocation expenses, in ISG European experience, have been needed in 50% of the cases for managerial, sales and technical employees. Where required, the amount paid averages $15,000 per technical and sales/marketing person and $30,000 for executive/managerial personnel. Customer service and administrative personnel are usually hired locally.

To determine the cost savings, BGAI followed these steps (all results are shown in the table below):

1. For each employee category, the productivity loss in training a new employee is calculated as the average monthly salary (plus benefits) times the number of employees in that category times 50% of the learning period (assuming a linear increase in productivity from start date through the end of the learning period).

2. For each employee category, the recruiting cost is calculated by multiplying the number of employees by the average recruiting cost percentage times the average annual salary by the percent of cases requiring use of recruiters.

3. For each employee category, the cost of having someone actually provide on-the-job training is determined by multiplying the number of employees in that category by the trainer cost, taken at equivalent salary plus benefits.

4. For each employee category, the relocation cost is determined by multiplying the number of employees in that category by the relocation cost times the percentage requiring relocation.

The following table summarizes the results from these key cost savings elements:

Employee Category	Productivity Loss ($000)	Recruiting Cost ($000)	Trainer Costs ($000)	Relocation Costs ($000)	Total ($000)
Executives/Managers	73	53	22	45	193
Sales/Marketing	49	43	15	15	122
Senior Technical	95	93	29	60	277
Other Technical	50	57	15	45	167
Customer Service/Support	30	25	9	0	64
Administrative	0				
Total	**297**	**271**	**90**	**165**	**823**

The total is $823,000 for the costs avoided by ISG by acquiring a portion of the assembled work force from o.tel.o. This figure must be adjusted to recognize that these savings are before taxes. Using the International tax rate of 34%, the value would be reduced to $543,000.

While there is normally a fairly high employee turnover in the computer software and services industry, ISG has had good experience in retaining its employees, particularly the more senior and more highly skilled individuals. Therefore, we would recommend amortizing the assembled work force value over a seven-year period, at the end of which time there would be less than 20% of the acquired employees still on the ISG payroll.

o.tel.o Customer Base and Crossover ISG Product Purchases Valuation

Based on historic customer base information provided by o.tel.o and strategic plans provided by ISG, BGAI has determined the net present value of the projected additional operating income which ISG can realistically expect to obtain from o.tel.o's existing customers because of their purchase of other ISG products (other products in the Gentran family).

ISG has just two Gentran products which would be of direct interest and value to the o.tel.o customers as of the date of acquisition: Gentran:Director for DOS customers and Gentran:Server for UNIX customers.

All of the acquired o.tel.o customers are potential buyers of these Gentran products. The table below shows the number of o.tel.o customers as of the date of acquisition subdivided between DOS and UNIX accounts and between active and inactive, and the expected percentage of these customers who would convert the Gentran products:

Crossover Buyer Analysis

	DOS		UNIX		Total	Total	Total
	Active	Inactive	Active	Inactive	DOS	UNIX	All
# of o.tel.o Customers as of Acquisition Date	240	337	33	140	577	173	750
% who will buy Gentran:Director/Server	50	10	75	15	--	--	--
# who will buy Gentran:Director/Server	120	34	25	21	154	46	200
Conversion Period	3 years	2 years	3 years	2 years	--	--	--

The o.tel.o customer base includes all International customers; there has been no adjustment downward since there is no overlap with ISG customers.

Most of o.tel.o Tiger customers are back level DOS users and will need to migrate to these Gentran products relatively rapidly. The UNIX customers will also migrate relatively quickly. The inactive (not on maintenance) customers are less likely to migrate than the active customers; those who do will convert over a shorter time.

The incremental o.tel.o customer figures have been used to determine the revenues calculated in Appendix G for Gentran. The other assumptions for Gentran are summarized below:

Gentran

Product Assumptions	Director	Server
Price/Unit ($000)	7	30
Add-on/Upgrade (%)	10	15
Maintenance Retention Rate	.90→.70	.95→.80
Maintenance Rate	.20	.20
Services for New Sale ($000)	2	15

All new customers will take maintenance for the first year. The operating income margins will stay at 25% over the seven-year valuation period.

The following assumptions were used in determining the net present value of the operating income:

- International tax rate – 34%
- Discount rate (after tax) – 15%

Appendix G, Tables 11, 21, 31 and 41, show these calculations for Gentran:Director and Gentran:Server.

The total values for Gentran are shown below:

($000)	Net Present Value
Gentran:Director	297
Gentran:Server	513
Total	**810**

ISG should be able to receive sufficient revenue and operating income from the crossover sales projected for the current o.tel.o customer base to justify a $810,000 valuation to be amortized over seven years.

Going Concern and Goodwill Valuation

The remainder of the acquired intangible assets from o.tel.o consists of items which are difficult to individually assess. These include name relationship, operational offices, partnership and channel relationships, going concern practices and procedures, etc.

The remaining unallocated acquisition cost is $184,000 which is determined by deducting the retained work force and customer base relations from the total value of other intangibles of $1,537,000.

These are considered medium life assets because of the volatility of the EDI business, so using a seven-year projected life is a reasonable basis for amortization.

Analysis of Acquisition Costs

Acquisition Costs ($000)	
Purchase Price	$2,926
Restructuring, Transition and Other Acquisition Costs (preliminary)	200
Total Acquisition Costs	**$3,126**
Tangible Assets/Liabilities	
Assets Less Liabilities Adjusted for Book Value Changes	($522)
Net Intangibles	**$3,648**
Intangibles	
Value of Products	$437
Value of Technologies	1,674
Value of Intangibles less Products and Technologies	**$1,537**
Other Intangibles	
Value of Retained Personnel	$543
Value of Customer Base	810
Remainder of Intangibles	**$184**
Goodwill/Going Concern Value	**$184**
Non-Allocated Acquisition Costs	**-0-**

	A	B	C	D	E	F	G	H	I
1	**Revenue Worksheet for GENTRAN (International)**								11
2									
3	**($000) Fiscal Year**	**1999**	**2000**	**2001**	**2002**	**2003**	**2004**	**2005**	**Total**
4									
5	**New Licenses**								
6	Unit License Fee - Director	7	7	7	7	7	7	7	
7	Unit License Fee - Server	30	30	30	30	30	30	30	
8									
9									
10	**Upgrades/Add-ons** <ratio to maint base>								
11	Director	.50	.50	.25	.25	.00	.00	.00	
12	Server	.75	.75	.50	.50	.25	.25	.00	
13									
14									
15	**Services** <ratio to new licenses>								
16	Director	.28	.28	.28	.28	.28	.28	.28	
17	Server	.50	.50	.50	.50	.50	.50	.50	
18									
19									
20	**Maintenance Calculation: Director**								
21	Previous Year Maintenance	0	80	159	206	173	138	111	
22	Retention Rate	.90	.90	.90	.80	.80	.80	.70	
23	Remaining Maintenance	0	72	143	165	138	111	78	706
24	New Licenses and New Upgrades	399	435	316	41	0	0	0	
25	Maintenance/License Price Ratio	.20	.20	.20	.20	.20	.20	.20	
26	Initial Maintenance Rate	1.0	1.0	1.0	1.0	1.0	1.0	1.0	
27	New License/Upgrade Maintenance	80	87	63	8	0	0	0	238
28	**Total Maintenance: Director - Revenue**	80	159	206	173	138	111	78	945
29									
30	**Maintenance Calculation: Server**								
31	Previous Year Maintenance	0	108	238	297	294	278	262	
32	Retention Rate	.95	.95	.95	.90	.90	.90	.80	
33	Remaining Maintenance	0	103	226	267	264	250	210	1320
34	New Licenses and New Upgrades	540	677	353	134	66	62	0	
35	Maintenance/License Price Ratio	.20	.20	.20	.20	.20	.20	.20	
36	Initial Maintenance Rate	1.0	1.0	1.0	1.0	1.0	1.0	1.0	
37	New License/Upgrade Maintenance	108	135	71	27	13	12	0	366
38	**Total Maintenance: Server - Revenue**	108	238	297	294	278	262	210	1686
39									
40									
41									
42									
43									
44									
45									
46									
47									
48									
49									
50									

	A	B	C	D	E	F	G	H	I
51	**Revenue Projections for GENTRAN (International)**								21
52									
53	**($000) Fiscal Year**	**1999**	**2000**	**2001**	**2002**	**2003**	**2004**	**2005**	**Total**
54									
55	**New Product Licenses**								
56	Director								
57	# of New Customers	57	57	40	0	0	0	0	154
58	Revenue - Licenses	399	399	280	0	0	0	0	1078
59	Cumulative Revenue - Licenses	399	798	1078	1078	1078	1078	1078	
60	Server								
61	# of New Customers	18	20	8	0	0	0	0	46
62	Revenue - Licenses	540	600	240	0	0	0	0	1380
63	Cumulative Revenue - Licenses	540	1140	1380	1380	1380	1380	1380	
64									
65									
66									
67									
68	**Total - New License Revenue**	939	999	520	0	0	0	0	2458
69									
70	**Upgrades/Add-ons - Revenue**								
71	Director	0	36	36	41	0	0	0	113
72	Server	0	77	113	134	66	62	0	452
73									
74	**Total Upgrade Revenue**	0	113	149	175	66	62	0	565
75	**Cumulative Total-Upgrade Revenues**	0	113	262	436	502	565	565	
76									
77	**Services - Revenue**								
78	Director	112	112	78	0	0	0	0	302
79	Server	270	300	120	0	0	0	0	690
80									
81	**Total Services Revenue**	382	412	198	0	0	0	0	992
82	**Cumulative Total-Services Revenues**	382	793	992	992	992	992	992	
83									
84									
85									
86	**Maintenance**								
87	Director	80	159	206	173	138	111	78	945
88	Server	108	238	297	294	278	262	210	1686
89									
90	**Total Maintenance**	188	397	503	467	416	373	287	2631
91									
92	**Total Revenues**								
93	Director	591	705	600	214	138	111	78	2437
94	Server	918	1215	770	427	344	325	210	4208
95									
96									
97	**Grand Total Revenue**	1509	1920	1370	642	482	436	287	6645
98									
99									
100									

	A		B	C	D	E	F	G	H	I
101										
102	**Costs for GENTRAN (International)**									**31**
103	**($000)**	**Fiscal Year**	**1999**	**2000**	**2001**	**2002**	**2003**	**2004**	**2005**	**Total**
104										
105										
106	Revenues		1509	1920	1370	642	482	436	287	6645
107										
108	Cost of revenues	rate	.15	.15	.15	.15	.15	.15	.15	
109		cost	226	288	205	96	72	65	43	997
110	Marketing and sales	rate	.30	.30	.30	.30	.30	.30	.30	
111		cost	453	576	411	192	145	131	86	1994
112	R and D	rate	.15	.15	.15	.15	.15	.15	.15	
113		cost	226	288	205	96	72	65	43	997
114	G and A	rate	.15	.15	.15	.15	.15	.15	.15	
115		cost	226	288	205	96	72	65	43	997
116	**Total Costs**		1131	1440	1027	481	362	327	216	4984
117										
118	**Cost/Revenue Ratio**		.75	.75	.75	.75	.75	.75	.75	.75
119										
120										
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149										
150										

	A	B	C	D	E	F	G	H	I
151	**Net Present Value -- GENTRAN (International)**								**41**
152									
153	**($000) Fiscal Year**	**1999**	**2000**	**2001**	**2002**	**2003**	**2004**	**2005**	**Total**
154	**GENTRAN**								
155	Revenue	1509	1920	1370	642	482	436	287	6645
156	Operating Income Ratio	.25	.25	.25	.25	.25	.25	.25	
157	Operating Income	377	480	342	160	121	109	72	1661
158	Tax Rate	.34	.34	.34	.34	.34	.34	.34	
159	Operating Income After Tax	249	317	226	106	80	72	47	1097
160	NPV Factors	.935	.813	.707	.615	.534	.465	.404	
161	NPV	233	258	160	65	43	33	19	810
162									
163	Discount Rate	.15							
164									
165									
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199									
200									

Roger

intangible acq. cost $3.3M

prod. 500 - low → 400K 3yr

technologies 1.810 → 1.6M write off

employees + customer base / 1.0M gw → 1.3M - 10yr

location

3.3M

Target figures
Product - 400K
Tech 1600K
GW 1300K
3300K

ck these figures with Blevins false

per Karen Dover

Acq costs	2926	- Purch Price
	200	- acq. costs
	3126	
	(522)	Assets - liab, adjusted
	3648	- Intangible value
	1220	IPRD write off
	730	Product cap
	1698	Goodwill cap
	3648	total Int. value

O. tel. O

1) complete copy of Acquisition Analysis Memo -
Valuation Model
Financial History for otelo opms

2) Customer Base
related to any SCI / ISG products

3) Retained personnel

4) TeleTiger projections -
revenue

5) what is new consulting and education

6) why no TeleTiger maintenance ?

- Pat Davis.
- ~~to~~ David Omeara
- Randy Harvey
- John Blaine

SCI / Roger

604-
293
5000

Weaver, Burgh, Harvey

3/3/98

Tiger — K-5 yrs. software

TeleTiger - Germany Tech or product / 6 yrs

TT - Bel

U.S. $3.x M + 200K avg cost - 260K fixed

37% tax rate

8.5% cost of money

70% R+D
20% Prod
10% G&W

System Integration

- DOS - cont. to sell for 6 mos.
- UNIX - sell for ____ yrs

Roger Valuation

per Ian Baugh

2/25/98

$5 800 000 dm

$520 000 dm – net tangibles
avg cost ≠ 200 K

tech –
product –

US$ 3.14 – intangible purchase price

customer contracts to Gmbh – value? good-will

Babaie
Shiflett } – Tech v. product allocation

minimize goodwill

---

per Baugh – proceed.

may want to split TI into Germany (product)
rest of world (Technology)

no punch of entity rights by US
all rev/profit goes to BV

- Hanvey – strategy – what plans
Wasen – financial history Roger
– projections

STERLING COMMERCE

FAX

To: Burt Grad
Company:
Phone: 203-222-8718
Fax: 203-222-8728
Number of pages: 3 (including cover)
Comments:

From: Karen Dover
Phone: 614-793-7124
Fax: 614-799-6310
Date: 10/22/99
Time: 5:07 pm

Burt,

Here is what I could get a hold of today. Hope this helps.

Karen

where is IP R+D write off - ? only 7 yrs for Goodwill -

Sterling Commerce, 4600 Lakehurst Court, P.O. Box 6000, Dublin, OH 43016-2000 614-793-7000 Fax 614-793-4040

($000)	Model Assumptions	Actual Results
Purchase Price:	2,000	2,926
Fees, Expenses, Restructuring	100	200
Total Purchase Price	2,100	3,126
Existing Net Equity	0	(522)
Purchased Software / Write-off	1,050	1,220
Transactions Type:	Asset Purchase	Asset Purchase

Useful Lives of Assets	Lives Model	$ Model	Lives Actual	$ Actual	1Q 99 Balance
Write up of Software	5	525	5	730	0
Non-Competes	N/A	0	N/A	0	0
New Goodwill	7	525	7	1,698	1,581

G.TELLO (CVG's Portion)

FX Rates

USD to NLG	1.8650
USD to DEM	1.6543
DEM to NLG	1.1270

	NLG		
Cash payments made			Recorded on CVG's domestic ledger.
Cash to Otello	3,362,274.11	DEM	2,982,980.40
			DEM to NLG fx
Travel and other direct costs paid in US	145,601.58	USD	78,070.55
Travel and other direct costs paid in Europe	252,635.88	Misc	
	3,760,511.57		
Cash payment to be made	1,983,520.00	DEM	1,760,000.00
			1,335,600 Customer contract holdback, 425,000 Purchase price adjustment, 900,000 LSOH holdback which is contingent and therefore not included for now.
Total Purchase Price	5,744,031.57		

Balance sheet or income statement	BS	IS	Approx USD IS amt
Entry 1 to record purchase of fixed assets in Germany and depreciation (DEM)			
Fixed assets	1,057,953.91		
Accrued liabilities	(19,246.50)		
VAT receivable	169,272.63		
Holdback (AP)	(1,207,960.04)		
Accumulated depreciation	(88,162.83)		
Depreciation expense		88,162.83	
NET	(88,162.83)	88,162.83	44,061.41
Entry 2 to record the remaining portion of holdback not recorded in Germany on entry 1 (DEM)			
This entry will be recorded in the NLG ledger in DEM	NLG amnt =	622,126.49	
Goodwill	552,019.86		
Holdback	(552,019.86)		
NET	0.00	0.00	
Entry 3 to record the additional costs recorded on CVG's Domestic ledger in USD			
This entry will be recorded in the NLG ledger in USD	NLG amnt =	145,601.58	
Goodwill	78,070.55		
I/C to CVG	(78,070.55)		
NET	0.00	0.00	

Entry 3 to write off 3 months of goodwill using a 7 year life

Total Goodwill in NLG

First cash payment	3,362,274.11			
Other exp already recorded in NLG	252,635.88			
Holdback not booked as fixed assets	622,126.49			
Other exp already recorded at CVG in USD	145,601.58			
Approximate Total Goodwill in NLG	4,382,638.06			
Accumulated amortization		(156,522.79)		
Amortization expense			156,522.79	
NET		(156,522.79)	156,522.79	83,026.43
			Total USD	128,007.84

Reconciliation in NLG

Purchase price from above	5,744,031.57
Amount recorded in NLG already	(3,614,909.99)
Amount to be recorded as Fixed assets in NLG	(1,361,393.51)
Holdback to be recorded as more GW	(622,126.49)
Amount to be recorded as GW from CVG	(145,601.58)
Net	(0.00)

Topside Journal Entry in USD

			Book in USD
Comp	Fixed Assets	639,517.57	640,000.00
	Goodwill	333,579.89	333,900.00
OCA	Vat Receivable	102,322.81	102,000.00
CL	Accrued liabilities	(11,634.23)	(11,900.00)
IC	Holdback payable	(1,063,694.09)	(1,064,000.00)
	Net	(105.05)	0.00

calc of Director portion of NPV

Total Rev	1509	1920	1370	882	482	436	287	6641
Director Rev	591	705	600	214	138	111	78	2437
NPV	233	258	160	65	43	33	19	810
Director NPV	91	95	70	17	12	8	5	298

used straight annual revenue ratio

$(2437/6645) \times 810 = 297$

calculation of ~~Otelo~~ Centura product sales from Otelo customer base. Total UNIX

	DOS Active	DOS Inactive	UNIX Active	UNIX Inactive	
# of customers	~~33~~ 240	337 ~~440~~	577 ~~773~~	33 ~~200~~	140 ~~339~~	173 ~~511~~
Conversion rate	~~50%~~ ~~80%~~	10 ~~20~~ %		75 ~~50~~ %	15 ~~25~~ %	
Conversion period	3 yrs	2 yrs		3 yrs	2 yrs	
Which # will convert	120 ~~144~~ ~~[illegible]~~	34 ~~44~~	154 ~~198~~	~~30~~ 25	~~35~~ ~~28~~ 21	~~53~~ 46
Conversion in 1st year	33	~~4840~~ ~~64~~ 50	17 ~~44~~	57 ~~68~~ ~~104~~	33	~~40~~ 8	50	~~44~~ 4 ~~28~~ 10	18 ~~28~~ ~~21~~
Conv in 2nd yr	33	4840 ~~64~~ 50	17 ~~44~~	57 ~~65~~ ~~104~~	33	9 ~~40~~	50	11 ~~64~~	20 ~~27~~ ~~23~~
Conv in 3rd year	33	40 ~~48~~ ~~64~~		40 ~~64~~	33	8 ~~40~~			8 ~~48~~ ~~8~~
		120	34	154		25		21	46

per Pat Davis

10/24/91

		Active	Inactive	
DOS -	over 3yrs	80%	25%	2yrs
UNIX -	over 3yrs	90%	25%	2yrs

DOS Centrum: Director $7K NSS 90% ren.
UNIX - Centrum: Server 40K NSS 95% ren

20% maint - ~~DOS/UNIX~~ Dir/Server

Service - UNIX $20K

Service - Director 2K

30% pretax margin

---

probably too aggressive w/ % conversion

---

make changes as marked:

Over Margin	Service		Active	Inactive	Price	Upgrade %
25% {	2K	DOS	50%	10%	7K	10% →
	15K	UNIX	75%	15%	30K	15% →

~~Upgrades~~
DOS
UNIX

Work paper
June 99

C3.

Brut Financials

C 3 is a bit tricky & not a Pig's Ear.

Sources Yan 3 pages of note (attached).

Revenues
- Service def^n
- Maintenance def^n.
- Acquisit memorandu (attached) — pag 3 suggests maint income $1/2 mill. Could some of this be H/W maint?
- see [redacted]
- Note acquisit memorandu is MISSING any of fin'l detail supposed to be in there. Could we get a more upto date copy?

Costs
- Any H/W costs still in?

EXECUTIVE OVERVIEW

This document is intended to recommend that Sterling Commerce acquire the EDI/EC business unit from Roger and integrate that business unit into the European operations of the Interchange Software Group.

Roger is a large German corporation with offices throughout Germany. They want to divest their business unit that markets, sells and supports DOS and UNIX EDI software to focus on their core voice/data business. They had previously decided to resell the GENTRAN product line into their customer base, but now wish to narrow their focus.

Roger has a software installed base of approximately 750 customers, of whom only 300 are currently on maintenance. The 450 other customers are still in active contact, regularly paying Roger's consulting services to provide mapping, integration, and related services. The low maintenance percentage reflects Roger's lack of strategic attention to the user base, which was obtained through at least one prior acquisition. Approximately 20% of the customers are UNIX, the rest are DOS based. The customers are in Germany, but some may have installed sites in their offices in Austria and Switzerland. Roger maintains the older software itself but outsources new development to a third party software house.

Roger's criteria for selling the business unit include:

- Correct financial value for the asset;
- Excellent treatment of Roger's customer base, including support, transition, and upgrade path;
- Positive PR to Roger's customers, shareholder community, and the marketplace that speaks of this as a "long term partnership".
- A speedy selling process to be completed in December so as to minimize employee loss and negative marketplace PR.

Roger considers Sterling Commerce capable of meeting all of the criteria. Roger's other option is to transfer the business unit internally, but they have stated that SCI is their favored option.

At a meeting between ISG and Roger management Nov 26-27, 1997, a Memorandum of Understanding was signed, which is attached here as Appendix A. A mutual NDA is also in place. Subsequent meetings were held December 9-12 to obtain information in a "pre due-diligence". Pat Davis, Gail Froelicher, and Esther McDowell attended all of the sessions.

Roger expects gross revenues for the business unit for 1997 of approximately $2.55 million. Of that, approximately $500,000 is software maintenance while the remaining amount is new sales and consulting revenue.

Source data for O.tel.o ~~operations~~ revenues is incomplete and not structured well by product and ~~as~~ functional activities.

To construct 1997 Calendar year revenue model various simplifications and assumptions were made:

- Used $2660K (4773KDM) as total CY 1997 revenues (1.8DM = 1 US$)
- Eliminated Hardware revenue of $270K (no Hdware maint)
- Assumed ~~Virtually all~~ most Software license revenue was from Tiger

Tiger/DOS	~~$1611K~~	
Tiger/UNIX		
Tiger/NT		
~~Corporate~~		
other -	$4	Com Util
Total	$546K	

- Assumed Software maintenance/services

Tiger/DOS	$181K	334K? what are SVCS
Tiger/UNIX		
Tiger/NT		
Total Tiger		
Com Util	544	

- Consulting Services -

product related - 40%	484 -	
messaging - 60%	725	
	1209	

Tiger Analysis - 1987

		(DM000)	
Revenue (US $000) ↓			any TT rev ? any ComUti/ rev ?
Software	545		
Consulting -	1207		any non EDI Consulting
Maint/Supt	543		any Hdware or ComUti Equip
~~Other~~	2295		
Hdware	269		
Other (ComUti?)	96		
	2660	4773	[1.8 DM = 1 US $]
Cost of Sales			
Soft	58	184	
Hdware/Other	—	445/6	
		555	
Expenses - Salaries	1406	2871	
~~Rent~~ [TeleTiger		~~2340~~ ?	~~HPC: other own staff~~
- deprec	248	446	
- Other	751	1352	Monthly rent
Overhead (o.tel.o)			where is HPC cost for TT ?

Ed Wasser

2/12/98

TIGER

	($000)	1997	
DOS Maint		98	123 open contracts
VMS "		83	36
ISOCOR/odex		19	17
Teletiger		5	15
Services		131	Lang Wese
Services		208	30-product (3 must 3-75%)
		544K	
Software		546K	
Services EDI		1200	40% prod 60% cons/message not in Value
		2300	
Hdcse Travel Exp.		355	(covered by Goodwill)
		2655	

Need to talk to:

at Rogen — TIGER Mktg
Teletiger Mktg

at ISG — Tiger Mktg Strategy
Comm Util "
Teletiger Strategy

Ck with Lou Baugh on who will own copyright on Tiger + TT

Hold

BURTON GRAD ASSOCIATES, INC.
101 POST ROAD EAST
WESTPORT, CONNECTICUT 06880
(203) 222-8718
(203) 222-8728 FAX
BURTGRAD@AOL.COM

7/12

Sterling Commerce, Inc.
4600 Lakehurst Court
Dublin, OH 43017-0760

Attention: John Blaine
Copy: Ed Waser

Invoice #2942

July 6, 1999

Project #: 263-7

INVOICE

Project: Valuation Report on Acquired o.tel.o Intangible Assets

Consulting Services:	February - August 1998		
Burton Grad	3.5 days @ $2,500/day		$8,750.00
Elizabeth Virgo	1.5 days @ $1,500/day		2,250.00
		Total Fees	**$11,000.00**
		Total Invoice	**$11,000.00**

NOT SENT

Please Pay This Invoice Within 15 Days of Receipt

614-793-5857

Questions for John Blaine re Roger Valuation

- Tax rates for U.S. Intl 5/98
  (was given 37% for both)

- need summary statement
  on acquisition costs, tangible assets,
  product valuation, IPR&D write-off,
  goodwill (emp, cust base, other)
  and core technologies if separated.

- who is contact to validate business
  assumptions + bus. plans

Charles Armstrong
614-791-5721

Karen Dover
614-793-7124

purchase price
acq. costs
net asset
products
tech (IP R+D)
goodwill 1.2M (9/30/98)

Pat Davis -
product

o. telo

Appendix
Section
VII

Appendix
I - 1

Subj: **otelo valuation data update**
Date: 7/6/99 1:04:34 PM Eastern Daylight Time
From: Cynthia_Picciano@stercomm.com (Cynthia Picciano)
To: BurtGrad@aol.com
CC: Patrick_Davis@stercomm.com (Patrick Davis)

File: Valuation assessment data.xls (28725 bytes)
DL Time (48000 bps): < 1 minute

Burt,

I have heard back from my European HR colleague and have updated the attached spreadsheet with the estimates for recruiting agency fees and cost of employee benefits.

(See attached file: Valuation assessment data.xls)

If you need anything else, or have any questions, please let me know.

Regards, Cynthia

———————— Headers ————————
Return-Path: <Cynthia_Picciano@stercomm.com>
Received: from aol.com (rly-yh01.mail.aol.com [172.18.147.33]) by air-yh05.mail.aol.com (v59.54) with SMTP; Tue, 06 Jul 1999 13:04:34 -0400
Received: from ns1.stercomm.com (ns1.stercomm.com [209.95.244.32]) by rly-yh01.mx.aol.com (vx) with SMTP; Tue, 06 Jul 1999 13:04:25 -0400
Received: from nuntius.stercomm.com (nuntius.stercomm.com [199.3.24.42]) by ns1.stercomm.com with ESMTP id NAA03420 for <BurtGrad@aol.com>; Tue, 6 Jul 1999 13:04:25 -0400 (EDT)
Received: from smtplink.isg.stercomm.com (smtplink.isg.stercomm.com [199.242.142.11]) by nuntius.stercomm.com with SMTP id NAA06145 for <BurtGrad@aol.com>; Tue, 6 Jul 1999 13:04:24 -0400 (EDT)
Received: by smtplink.isg.stercomm.com(Lotus SMTP MTA Internal build v4.6.2 (651.2 6-10-1998)) id 852567A6.005D9500 ; Tue, 6 Jul 1999 13:02:09 -0400
X-Lotus-FromDomain: DUBLIN-ISG
Return-Receipt-To: Cynthia_Picciano@stercomm.com
From: "Cynthia Picciano" <Cynthia_Picciano@stercomm.com>
To: BurtGrad@aol.com
cc: "Patrick Davis" <Patrick_Davis@stercomm.com>
Message-ID: <852567A6.005D9412.00@smtplink.isg.stercomm.com>
Date: Tue, 6 Jul 1999 13:02:47 -0400
Subject: otelo valuation data update
Mime-Version: 1.0
Content-type: multipart/mixed;
Boundary="0__=UvAi2ZG9yMDiH9ZFNYzwSnDIjMILjpJ5E63EXsIYTEQkb3Pe4srowneK"
Content-Disposition: inline

Sheet1

	A	B	C	D
1	**CATEGORIES**	**Number of otelo employees**	**Average Compensation (DM)**	**Average Compensation ($)**
2	Executives/managers	3	141500	$79,240
3	Sr. Technical	8	104350	$58,436
4	Jr. Technical	6	96620	$54,107.20
5	Sales & Marketing	2	172520	$96,611.20
6	Customer Service/Support	3	86664	$48,531.84
7	Administrative	0	0	$0
8				
9	Typical recruiting agency fee:	25% of total compensation		
10				
11	Average cost of employee benefits:	22.0%		

Sheet1

	E	F
1	Estimated recruiting through 3rd party	Estimated Learning Curve to be Fully Functional
2	90.0%	6 months
3	80.0%	4 months
4	70.0%	3 months
5	90.0%	5 months
6	70.0%	4 months
7	0	
8		
9		
10		
11		

VALUATION DATA

CATEGORIES	Number of otelo employees	Average Compensation (DM)	Average Compensation ($)	Estimated recruiting through 3rd party	Estimated Learning Curve to be Fully Functional
Executives/managers	3	141500	$79,240	90%	6 months
Sr. Technical	8	104350	$58,436	80%	4 months
Jr. Technical	6	96820	$54,107	70%	3 months
Sales & Marketing	2	172520	$96,611	90%	5 months
Customer Service/Support	3	86664	$48,532	70%	4 months
Administrative	0	0	$0	0	

Typical recruiting agency fee: 25% of total compensation

Average cost of employee benefits: 22%

O. tel. o

o.tel.o

Subj: **otelo valuation data**
Date: 7/1/99 10:59:54 PM Eastern Daylight Time
From: Cynthia_Picciano@stercomm.com (Cynthia Picciano)
To: BurtGrad@AOL.COM
CC: Patrick_Davis@stercomm.com (Patrick Davis)

File: Valuation assessment data.xls (27292 bytes)
DL Time (26400 bps): < 1 minute

Burt,

Attached is the majority of the information you have requested. I will try to contact a colleague in Germany tomorrow to obtain their input on the typical recruiting agency fee, and the rough estimate of employee benefits as a percentage of compensation. I will forward that to you by Tuesday next week.

(See attached file: Valuation assessment data.xls)

If there is anything missing here, or you have any questions, please let me know.

Cynthia

———— Headers ————
Return-Path: <Cynthia_Picciano@stercomm.com>
Received: from rly-yh05.mx.aol.com (rly-yh05.mail.aol.com [172.18.147.37]) by air-yh01.mail.aol.com (v59.54) with SMTP; Thu, 01 Jul 1999 22:59:54 -0400
Received: from ns1.stercomm.com (ns1.stercomm.com [209.95.244.32]) by rly-yh05.mx.aol.com (vx) with SMTP; Thu, 01 Jul 1999 22:59:38 -0400
Received: from nuntius.stercomm.com (nuntius.stercomm.com [199.3.24.42]) by ns1.stercomm.com with ESMTP id WAA17901 for <BurtGrad@aol.com>; Thu, 1 Jul 1999 22:59:38 -0400 (EDT)
Received: from smtplink.isg.stercomm.com (smtplink.isg.stercomm.com [199.242.142.11]) by nuntius.stercomm.com with SMTP id WAA08575 for <BurtGrad@aol.com>; Thu, 1 Jul 1999 22:59:37 -0400 (EDT)
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X-Lotus-FromDomain: DUBLIN-ISG
Return-Receipt-To: Cynthia_Picciano@stercomm.com
From: "Cynthia Picciano" <Cynthia_Picciano@stercomm.com>
To: BurtGrad@AOL.COM
cc: "Patrick Davis" <Patrick_Davis@stercomm.com>
Message-ID: <852567A2.00104918.00@smtplink.isg.stercomm.com>
Date: Thu, 1 Jul 1999 22:57:52 -0400
Subject: otelo valuation data
Mime-Version: 1.0
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Content-Disposition: inline

VALUATION DATA

CATEGORIES	Number of otelo employees	Average Compensation (DM)	Average Compensation ($)	Estimated recruiting through 3rd party	Estimated Learning Curve to be Fully Functional
Executives/managers	3	141500	$79,240	90%	6 months
Sr. Technical	8	104350	$58,436	80%	4 months
Jr. Technical	6	96620	$54,107	70%	3 months
Sales & Marketing	2	172520	$96,611	90%	5 months
Customer Service/Support	3	86664	$48,532	70%	4 months
Administrative	0	0	$0	0	

o.tel.o

Subj: **o.tel.o information**
Date: 6/28/99 7:14:38 PM Eastern Daylight Time
From: Patrick_Davis@stercomm.com (Patrick Davis)
To: Cynthia_Picciano@stercomm.com (Cynthia Picciano), burtgrad@aol.com

914-793-7178
~~el Jefes~~ -
~~793-4969~~

Cynthia–

Burt Grad, a consultant working on the valuation report for the o.tel.o acquisition, will be giving you a call for some information about the 24 employees who came as part of the acquisition, namely their function (e.g. developer, support, consultant,etc.) and compensation info.

Pat

———— Headers ————
Return-Path: <Patrick_Davis@stercomm.com>
Received: from rly-yg02.mx.aol.com (rly-yg02.mail.aol.com [172.18.147.2]) by air-yg02.mail.aol.com (v59.51) with SMTP; Mon, 28 Jun 1999 19:14:38 -0400
Received: from ns1.stercomm.com (ns1.stercomm.com [209.95.244.32]) by rly-yg02.mx.aol.com (vx) with SMTP; Mon, 28 Jun 1999 19:14:37 -0400
Received: from nuntius.stercomm.com (nuntius.stercomm.com [199.3.24.42]) by ns1.stercomm.com with ESMTP id TAA19252 for <burtgrad@aol.com>; Mon, 28 Jun 1999 19:14:36 -0400 (EDT)
Received: from smtplink.isg.stercomm.com (smtplink.isg.stercomm.com [199.242.142.11]) by nuntius.stercomm.com with SMTP id TAA02048 for <burtgrad@aol.com>; Mon, 28 Jun 1999 19:14:35 -0400 (EDT)
Received: by smtplink.isg.stercomm.com(Lotus SMTP MTA Internal build v4.6.2 (651.2 6-10-1998)) id 8525679E.007F8304 ; Mon, 28 Jun 1999 19:12:46 -0400
X-Lotus-FromDomain: DUBLIN-ISG
From: "Patrick Davis" <Patrick_Davis@stercomm.com>
To: "Cynthia Picciano" <Cynthia_Picciano@stercomm.com>, burtgrad@aol.com
Message-ID: <8525679E.007F8244.00@smtplink.isg.stercomm.com>
Date: Mon, 28 Jun 1999 19:19:08 -0400
Subject: o.tel.o information
Mime-Version: 1.0
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—o.tel.o.
— EC Group

BURTON GRAD ASSOCIATES, INC.
235 MARTLING AVENUE
TARRYTOWN, NEW YORK 10591
(914) 631-1129 FAX: (914) 631-1164
CC:MAIL BURTON GRAD@CORPORATE

Date: March 9, 1998

To: Randy Harvey

From: Burton Grad

Subject: Tiger Valuation

Please obtain the answers to the following questions:

1. As of 12/31/97, how many Tiger customers were on active maintenance?
   DOS - 123
   UNIX - 41
2. What Was the Annual Maintenance Revenue in 1997 from the Active Tiger Customers?
   DOS
   UNIX X
3. What price is being charged for annual maintenance in 1998?
   DOS $900/yr 991 > 98
   UNIX $2300/yr 2340 > 98
   52K for 3rd party
4. How many new Tiger Licenses were signed in 1997?
   DOS - 60
   UNIX - 24 > 84
5. What revenue did o.tel.o receive from new Tiger licenses in 1997?
   DOS
   UNIX 546K
6. What price is being charged for new licenses for Tiger in 1998?
   DOS - 10K
   UNIX - 30K
7. What was the revenue from consulting and services performed for Tiger customers related to installation or use of Tiger during 1997?
   DOS
   UNIX > $1.2M
8. What is the typical value of services associated with a new license for Tiger?
   DOS
   UNIX 3-30 days price/day =
9. How many of the Tiger maintenance customers in 1996 dropped maintenance during 1997? ?

per Randy H

3/6/98

no NT (sell continue)

few DOS new sales

new sales were UNIX

closing on 3.3V1C Maint/Serv revenue

Eliminate 60% of 1409 as messaging
- not product related

Total new 1997

- new sales
  - evolution/migration
  - maint
  - services

---

3 Key cust asked for 160K support

$/ 000

Roger Their Forecast

			CY 97	CY 98	FY 98 (7 mo.)	FY 99	FY 00	FY 01	FY 02
Tiger DOS	NSS		588	—	—	—	—	—	—
	Prof Servs		1222	906	521	425	283	170	57
	Maint		214	170	99	153	136	85	—
			2024	1076	620	578	419	255	57
Unix	NSS		—	475	328	738	1146	1517	1959
	Prof		—	403	274	635	968	1272	1653
	Maint		277	294	172	426	529	814	1228
			277	1182	774	1799	2643	3603	4840
Telecom	NSS		~~5~~	57	23	227	227	294	385
	Prof Servs		—	45	~~52~~ 18	181	181	236	308
	Maint		—	—	—	—	—	—	—
				102	41	408	408	530	693
Organ New Consult			—	294	170	680	872	1085	1294
Education			—	85	42	170	212	255	340
Check New Info			585	532		905	1313	1811	2344 ~~1811~~
TOTAL			2301	~~2759~~	1647	3635	4554	5728	7224

Sterling Commerce - ISG
FORECAST Revenues

(in thousands)	Exchange Rate	Cal 1997 USD	Cal 1998 USD	FY 1998 (7 months) USD	FY 1999 USD	FY 2000 USD	FY 2001 USD	FY 2002 USD	Price/ unit USD
NSS units									
DOS/UNIX Tiger									57
UNIX-Serv WB									28
UNIX-Serv MID									11
UNIX-Serv Single									6
UNIX-Serv WS									3
DOS-Serv WS/NT									2
DOS-DIR									11
Teletiger									
Total Units									
Education Units									
NSS $s									
DOS/UNIX Tiger	1.766	$ 588	$ -	$ -	$ -	$ -	$ -	$ -	$ -
UNIX-Serv WB		$ -	$ 57	$ 57	$ 170	$ 340	$ 453	$ 566	
UNIX-Serv MID		$ -	$ 170	$ 113	$ 227	$ 340	$ 453	$ 595	
UNIX-Serv Single		$ -	$ 125	$ 79	$ 170	$ 227	$ 294	$ 385	
UNIX-Serv WS		$ -	$ 91	$ 57	$ 113	$ 142	$ 187	$ 243	
DOS-Serv WS/NT		$ -	$ 34	$ 23	$ 42	$ 57	$ 74	$ 98	
DOS-DIR		$ -	$ -	$ -	$ 17	$ 42	$ 56	$ 73	
Teletiger		$ -	$ 57	$ 23	$ 227	$ 227	$ 294	$ 385	
Total Software		$ 588	$ 532	$ 351	$ 965	$ 1,373	$ 1,811	$ 2,344	
Consulting - Days									
DOS/UNIX Tiger									
UNIX-Serv WB									
UNIX-Serv MID									
UNIX-Serv Single									
UNIX-Serv WS									
DOS-Serv WS/NT									
DOS-DIR									
Teletiger									
Ongoing New consulting			906	521	425	283	170	57	
Education			294	212	850	1084	236	305	
			85	733	1275	181	1740	1634	
Total Billable Days			1285	151	181	1548	1746	1996	
Manpower @ 140ds/year			45	751	1456				
Manpower @ 110ds/year			1330						
DOS/UNIX Tiger		$ 1,222	$ 906	$ 521	$ 425	$ 283	$ 170	$ 57	
UNIX-Serv WB		$ -	$ 23	$ 29	$ 68	$ 136	$ 181	$ 227	
UNIX-Serv MID		$ -	$ 82	$ 54	$ 109	$ 163	$ 217	$ 285	
UNIX-Serv Single		$ -	$ 149	$ 95	$ 204	$ 272	$ 353	$ 462	
UNIX-Serv WS		$ -	$ 91	$ 57	$ 113	$ 142	$ 187	$ 243	
DOS-Serv WS/NT		$ -	$ 68	$ 45	$ 85	$ 113	$ 147	$ 193	
DOS-DIR		$ -	$ -	$ -	$ 57	$ 142	$ 187	$ 243	
Teletiger		$ -	$ 45	$ 18	$ 181	$ 181	$ 236	$ 308	
Ongoing New consulting		$ -	$ 294	$ 170	$ 680	$ 972	$ 1,089	$ 1,294	
Education		$ -	$ 85	$ 42	$ 170	$ 212	$ 255	$ 340	
Total Consulting Revenu		$ 1,222	$ 1,743	$ 1,025	$ 2,091	$ 2,516	$ 3,018	$ 3,652	
Maintenance									
UNIX Tiger		$ 64	$ 32	$ 19	$ 16	$ -	$ -	$ -	
UNIX Premium		$ 213	$ 227	$ 132	$ 283	$ 283	$ 368	$ 478	
DOS Tiger		$ 214	$ 170	$ 99	$ 153	$ 136	$ 85	$ -	
UNIX-Serv WB		$ -	$ 4	$ 2	$ 21	$ 59	$ 119	$ 236	
UNIX-Serv MID		$ -	$ 13	$ 7	$ 42	$ 76	$ 136	$ 214	
UNIX-Serv Single		$ -	$ 9	$ 5	$ 31	$ 54	$ 93	$ 144	
UNIX-Serv WS		$ -	$ 7	$ 4	$ 22	$ 36	$ 61	$ 93	
DOS-Serv WS/NT		$ -	$ 3	$ 2	$ 8	$ 14	$ 24	$ 37	
DOS-DIR		$ -	$ -	$ -	$ 1	$ 8	$ 13	$ 23	
Teletiger		$ -	$ -	$ -	$ -	$ -	$ -	$ -	
Total Maintenance Revenue		$ 492	$ 464	$ 271	$ 579	$ 665	$ 899	$ 1,228	
		$ -	$ -	$ -	$ -	$ -	$ -	$ -	
Teletiger internal		$ 193	$ -	$ -	$ -	$ -	$ -	$ -	
TOTAL REVENUES		$ 2,302	$ 2,740	$ 1,647	$ 3,635	$ 4,554	$ 5,728	$ 7,224	

STERLING COMMERCE

FAX COVER SHEET

24 Frank Lloyd Wright Drive, P.O. Box 305, Lobby B, Ann Arbor, MI 48106-0305
Phone Number: 313/930-3200 Fax Number: 313/930-3201

TO: BURT GRAD

COMPANY:

FAX #: (914) 631-1164

FROM: PAT DAVIS

DATE: 1/9/98

MESSAGE: BURT - Attached:

1) Acq ANALYSIS MEMO
2) Revenue projection spreadsheet
3) Updated technical DD list with RANDY's changes.

Pat

Sterling Commerce - ISG
FORECAST Revenues

(in thousands)	Cal 1997 DEM	Cal 1998 DEM	7 months FY 1998 DEM	FY 1999 DEM	FY 2000 DEM	FY 2001 DEM	FY 2002 DEM	Price /unit DEM
NSS units								
DOS/UNIX Tiger								
UNIX-Serv WB		1	1	3	6	8	10	100
UNIX-Serv MID		6	4	8	12	16	21	50
UNIX-Serv Single		11	7	15	20	26	34	20
UNIX-Serv WS		16	10	20	25	33	43	10
DOS-Serv WS/NT		12	8	15	20	26	34	5
DOS-DIR		0	0	10	25	33	43	3
Teletiger		5	2	20	20	26	34	20
Total Units		51	32	91	128	168	219	
Education Units		2	1	4	5	6	8	
NSS $s								
DOS/UNIX Tiger	1,039	0	0	0	0	0	0	
UNIX-Serv WB		100	100	300	600	800	1,000	
UNIX-Serv MID		300	200	400	600	800	1,050	
UNIX-Serv Single		220	140	300	400	520	680	
UNIX-Serv WS		160	100	200	250	330	430	
DOS-Serv WS/NT		60	40	75	100	130	170	
DOS-DIR		0	0	30	75	99	129	
Teletiger		100	40	400	400	520	680	
Total Software	1,039	940	620	1,705	2,425	3,196	4,139	
Consulting - Days								Days per unit
DOS/UNIX Tiger	1,079	800	460	375	250	150	50	NA
UNIX-Serv WB	0	20	20	60	120	160	200	20
UNIX-Serv MID	0	72	48	96	144	192	252	12
UNIX-Serv Single	0	132	84	180	240	312	408	12
UNIX-Serv WS	0	80	50	100	125	165	215	5
DOS-Serv WS/NT	0	60	40	75	100	130	170	5
DOS-DIR	0	0	0	50	125	165	215	5
Teletiger	0	40	16	160	160	208	272	8
Ongoing New consulting	0	250	150	600	770	958	1,143	
Education	0	8	4	16	20	24	32	4
								Days per year
Total Billable Days	1,079	1,472	872	1,712	2,054	2,464	2,957	
Manpower @ 130ds/yes	8	11	11	13	16	19	23	130
Manpower @ 110ds/yes	10	13	13	16	19	22	27	110
								Rate per Day DEM
DOS/UNIX Tiger	2,158	1,600	920	750	500	300	100	2
UNIX-Serv WB	0	40	40	120	240	320	400	2
UNIX-Serv MID	0	144	96	192	288	384	504	2
UNIX-Serv Single	0	264	168	360	480	624	816	2
UNIX-Serv WS	0	160	100	200	250	330	430	2
DOS-Serv WS/NT	0	120	80	150	200	260	340	2
DOS-DIR	0	0	0	100	250	330	430	2
Teletiger	0	80	32	320	320	416	544	2
Ongoing New consulting	0	520	300	1,200	1,540	1,916	2,286	2
Education	0	150	75	300	375	450	600	19
Total Consulting Reven	2,158	3,078	1,811	3,692	4,443	5,330	6,450	
Growth on Prior Year		143%		120%	120%	120%	121%	
Maintenance								
UNIX Tiger	113	57	33	28	0	0	0	
UNIX Premium	377	400	233	500	500	650	845	
DOS Tiger	378	300	175	270	240	150	0	
UNIX-Serv WB	0	8	4	38	105	210	420	
UNIX-Serv MID	0	23	13	75	135	240	379	
UNIX-Serv Single	0	17	10	56	96	165	255	
UNIX-Serv WS	0	12	7	39	64	107	164	
DOS-Serv WS/NT	0	5	3	15	25	42	65	
DOS-DIR	0	0	0	2	10	23	40	
Teletiger	0	0	0	0	0	0	0	
Total Maintenance Reve	868	820	478	1,022	1,175	1,587	2,168	
Teletiger internal	340							
TOTAL REVENUES	4,405	4,838	2,809	6,419	8,043	10,118	12,757	

Sterling Commerce - ISG
FORECAST Revenues

(in thousands)	Exchange Rate	Cal 1997 USD	Cal 1998 USD	7 months FY 1998 USD	FY 1999 USD	FY 2000 USD	FY 2001 USD	FY 2002 USD	Price/ unit USD
NSS units									
DOS/UNIX Tiger									
UNIX-Serv WB									57
UNIX-Serv MID									28
UNIX-Serv Single									11
UNIX-Serv WS									6
DOS-Serv WS/NT									3
DOS-DIR									2
Teletiger									11
Total Units									
Education Units									
NSS $s									
DOS/UNIX Tiger	1.766	$ 588	$ -	$ -	$ -	$ -	$ -	$ -	$ -
UNIX-Serv WB		$ -	$ 57	$ 57	$ 170	$ 340	$ 453	$ 566	
UNIX-Serv MID		$ -	$ 170	$ 113	$ 227	$ 340	$ 453	$ 566	
UNIX-Serv Single		$ -	$ 125	$ 79	$ 170	$ 227	$ 294	$ 385	
UNIX-Serv WS		$ -	$ 91	$ 57	$ 113	$ 142	$ 187	$ 243	
DOS-Serv WS/NT		$ -	$ 34	$ 23	$ 42	$ 57	$ 74	$ 96	
DOS-DIR		$ -	$ -	$ -	$ 17	$ 42	$ 56	$ 73	
Teletiger		$ -	$ 57	$ 23	$ 227	$ 227	$ 294	$ 385	
Total Software		$ 588	$ 532	$ 351	$ 905	$ 1,373	$ 1,811	$ 2,344	
Consulting - Days									
DOS/UNIX Tiger									
UNIX-Serv WB									
UNIX-Serv MID									
UNIX-Serv Single									
UNIX-Serv WS									
DOS-Serv WS/NT									
DOS-DIR									
Teletiger									
Ongoing New consulting									
Education									
Total Billable Days									
Manpower @ 140ds/year									
Manpower @ 110ds/year									
DOS/UNIX Tiger		$ 1,222	$ 906	$ 521	$ 425	$ 283	$ 170	$ 57	
UNIX-Serv WB		$ -	$ 23	$ 23	$ 68	$ 136	$ 181	$ 227	
UNIX-Serv MID		$ -	$ 82	$ 54	$ 109	$ 163	$ 217	$ 285	
UNIX-Serv Single		$ -	$ 149	$ 95	$ 204	$ 272	$ 353	$ 462	
UNIX-Serv WS		$ -	$ 91	$ 57	$ 113	$ 142	$ 187	$ 243	
DOS-Serv WS/NT		$ -	$ 68	$ 45	$ 85	$ 113	$ 147	$ 193	
DOS-DIR		$ -	$ -	$ -	$ 57	$ 142	$ 187	$ 243	
Teletiger		$ -	$ 45	$ 18	$ 181	$ 181	$ 236	$ 308	
Ongoing New consulting		$ -	$ 294	$ 170	$ 680	$ 872	$ 1,085	$ 1,294	
Education		$ -	$ 85	$ 42	$ 170	$ 212	$ 255	$ 340	
Total Consulting Revenu		$ 1,222	$ 1,743	$ 1,025	$ 2,091	$ 2,516	$ 3,018	$ 3,652	
Maintenance									
UNIX Tiger		$ 64	$ 32	$ 19	$ 16	$ -	$ -	$ -	
UNIX Premium		$ 213	$ 227	$ 132	$ 283	$ 283	$ 368	$ 478	
DOS Tiger		$ 214	$ 170	$ 99	$ 153	$ 136	$ 85	$ -	
UNIX-Serv WB		$ -	$ 4	$ 2	$ 21	$ 59	$ 119	$ 238	
UNIX-Serv MID		$ -	$ 13	$ 7	$ 42	$ 76	$ 136	$ 214	
UNIX-Serv Single		$ -	$ 9	$ 5	$ 31	$ 54	$ 93	$ 144	
UNIX-Serv WS		$ -	$ 7	$ 4	$ 22	$ 36	$ 61	$ 93	
DOS-Serv WS/NT		$ -	$ 3	$ 1	$ 8	$ 14	$ 24	$ 37	
DOS-DIR		$ -	$ -	$ -	$ 1	$ 6	$ 13	$ 23	
Teletiger		$ -	$ -	$ -	$ -	$ -	$ -	$ -	
Total Maintenance Revenue		$ 492	$ 464	$ 271	$ 579	$ 665	$ 899	$ 1,228	
		$ -	$ -	$ -	$ -	$ -	$ -	$ -	
Teletiger internal		$ 193	$ -	$ -	$ -	$ -	$ -	$ -	
TOTAL REVENUES		$ 2,302	$ 2,740	$ 1,647	$ 3,635	$ 4,554	$ 5,728	$ 7,224	

Soma Branches
3/9/98 notes

for fact
NI

Germany — TeleTiger — General Release 10/1/98.

Units	Year 1	12	Year 2	22	Year 3	36
Price $K	25.2	Use 30	assume 10/- annual discount.			
Servers	$12K per site					
Add'l servers	$5K to $30K (per site?).		50/- will run some additional services			
Maintenance	20% of list price starting at install date.					
Erosion	Low.	After 2nd year.				
Other info	"R/3 728 NT 2300 UNIX locations".					

Europe.

Release
6 months lag from UK
Intro for other Europe.

Size — Use 1/3 German

N. America

Release
1 yr delay — 10/1/99

Size — US/Canada 1/2 German

Note — INET must be replaced by ANS 811. Lots of sales reps

Intl/Japan

Release 10/1/00

Size — Use 1/5 German-level SAP.

use for Sect VI

SAP 7500 cust 13K R/3 installed 3/8/98 WW

Teletiger

General Release ~~GA~~ -- 10/1/98

- Germany.

by site

12 units 1st yr - 0.tel.0

22 units - 2nd

36 units -

price ~~$~~25.2 US$ assumed 30K (10% avg discount)

Services - Yang + project 12K/site

addl services ~~$~~5K. 30K

50% will use some addl

initialize system

build DB

more sophisticated flows

generate specialized reports

Maint - 20% of list price starting at install date.

low erosion rate - after 2nd yr

install cycle - short

Edifact format INET for tel bills

no SAP competition for telephone billing

R/3 72 NT 2300 UNIX location

~~DEC~~
ISG/Japan

3/9/98 ~~3/11/9~~

TT - Europe

User Interface to be localized

INET adoption rate in France, UK

6 months lag for France + UK
other Europe later

~~K~~

Rest of Europe = use 1/3 of German

TT - No. America

ANSI 811 input into IDOC must be changed made

hard to do better in US because of ~~DEC~~ ISG lack of ~~DEC~~ sales staff in US.

US/Can = 1/2 of German

INET must be replaced by ANSI 811

level of

1 yr delay 10/1/99.

TT - Intl/Japan

protocols release 10/1/00

1/5 of German level of SAP.

high devel costs –

20% devel

50% sales, mktg, support

15% G+A.

applications (not systems)

5–6 yrs

Peter looked at the latest piece of work, the "Design Tool/Productivi ... is written in Visual Basic, the server part in C. This has been e ... erb documentation (in German). There is reference to a third-party client ...

Appendix 1 provides detailed answers to the questions in the due dili...

7. Review of *TeleTiger* Development

7.1 As it did not prove possible to conduct a detailed code review of TeleTiger, the bulk of the second day was spent examining the history and status of its development, in considerable detail.

7.2 o.tel.o had identified a market need for a product of this type. The SAP installed base was growing rapidly, and o.tel.o had some experience with an old product (ELFE) which needed replacement. They decided they needed a development partner, with SAP experience.

7.3 HCP (Heck & Partner Consulting) were selected against another o.tel.o internal department. They are a medium sized German software house of some 70 people. They have another 10 to 20 in their US office in Foster City, California. They are independently owned, and have been established about 20 years; their core business is installing SAP R3 in customer sites. They are accredited by SAP, and seem to have a good reputation in the German market. Their main office is in Weinheim (near Mannheim, near Heidelberg) about 400km south of Dusseldorf, but they have local offices elsewhere in Germany. O.tel.o had not previously used HPC. HPC signed a non-disclosure agreement, and must return all materials to o.tel.o.

7.4 The basis for the development was a 58 page Requirements and Planning document, prepared by o.tel.o., setting out:

- architecture
- master and transaction data
- rules
- modules
- interfaces, both to SAP modules and to the EDI environment
- database design
- first test plan
- volumes
- base platform
- invoice checking and splitting rules
- status reporting

A fixed price contract was agreed, with milestone payments. (The third of these has just been paid.)

7.5 Development took place at HCP premises, starting about a year ago. The team consisted of four staff full-time, another four part-time, and a project manager. An o.tel.o development/QA expert, Friedhelm Bar, spent the bulk of his time for three months located with the development team, dealing with day-to-day communications and queries. All significant queries and answers were documented.

7.6 The development has been unsatisfactory in many regards, i.e., number of errors and consequent delays. Relations with HCP are sensitive, but still business like. O.tel.o has resisted the temptation to add or change the original specifications, in order to maintain stability during a difficult time, and to protect the fixed price.

7.7 There was a first preliminary delivery in April/May 1997, which o.tel.o used to start their QA testing. A second, complete delivery followed in August, 1997, which went into full QA testing.

7.8 There were about 20 test specifications, covering invoices, reports, idoc interfaces, etc. Each of these had a series of tests, about 100 in all, each with a one page test protocol giving the expected results. All of this was part of the original documentation passed on to HCP.

7.9 After extensive testing (of the August delivery), o.tel.o engaged an external independent consultant, Juergen Liersch, to review and report jointly to both parties. He is an expert in both SAP and EDI. O.tel.o describes him as excellent, and very hard-working. They would like to use him again, hopefully locking him into a long-term engagement. His report, dated October, lists:

- 7 absolutely critical (logic) errors
- 73 "look and feel" errors
- 19 functionality errors

These 99 errors are also itemized in a line-by-line listing, and each is documented by a two or three page note with screen shots, expected results, actual results, and commentary on the differences.

7.10 At the end of December 1997, 50 of these were still open. A new version has just been delivered, in which HCP claims to have fixed all but 3 or 4 errors. (This does not include many of the "look and feel" items which have been relegated to a future release.) O.tel.o is now starting an intensive two-week retesting program. They seem fairly confident that good progress is being made.

7.11 In parallel with the development and testing, the launch customer, BMW, is being set up. HCP also has some responsibilities here as a sub-contractor to o.tel.o. Indeed, any such BMW tasks at HPC are taking priority over development. Implementation has already slipped from November to February, but the customer seems understanding about this.

Mr Pat Davis / Cult Base

100 - need Gentuan - - -
upgrades, maint

Ed Wozer — 614-793-9146

Cynthia Picciano —
Pet Employee ✓

sold Talltiger

734
930
1871

original

Roger

Acquisition Analysis Memorandum

TABLE OF CONTENTS

EXECUTIVE OVERVIEW

This document is intended to recommend that Sterling Commerce acquire the EDI/EC business unit from Roger and integrate that business unit into the European operations of the Interchange Software Group.

Roger is a large German corporation with offices throughout Germany. They want to divest their business unit that markets, sells and supports DOS and UNIX EDI software to focus on their core voice/data business. They had previously decided to resell the GENTRAN product line into their customer base, but now wish to narrow their focus.

Roger has a software installed base of approximately 750 customers, of whom only 300 are currently on maintenance. The 450 other customers are still in active contact, regularly paying Roger's consulting services to provide mapping, integration, and related services. The low maintenance percentage reflects Roger's lack of strategic attention to the user base, which was obtained through at least one prior acquisition. Approximately 20% of the customers are UNIX, the rest are DOS based. The customers are in Germany, but some may have installed sites in their offices in Austria and Switzerland. Roger maintains the older software itself but outsources new development to a third party software house.

Roger's criteria for selling the business unit include:

- Correct financial value for the asset;
- Excellent treatment of Roger's customer base, including support, transition, and upgrade path;
- Positive PR to Roger's customers, shareholder community, and the marketplace that speaks of this as a "long term partnership".
- A speedy selling process to be completed in December so as to minimize employee loss and negative marketplace PR.

Roger considers Sterling Commerce capable of meeting all of the criteria. Roger's other option is to transfer the business unit internally, but they have stated that SCI is their favored option.

At a meeting between ISG and Roger management Nov 26-27, 1997, a Memorandum of Understanding was signed, which is attached here as Appendix A. A mutual NDA is also in place. Subsequent meetings were held December 9-12 to obtain information in a "pre due-diligence". Pat Davis, Gail Froelicher, and Esther McDowell attended all of the sessions.

Roger expects gross revenues for the business unit for 1997 of approximately $2.55 million. Of that, approximately $500,000 is software maintenance while the remaining amount is new sales and consulting revenue.

There are approximately 31 full time employees in the business unit as follows:

- 18 Implementation services, consulting, product specifications
- 5 Customer Support (level 1, 2)
- 4 Software integration, QA, and communications specialists
- 3 Sales technical support
- 1 Sales rep

Acquisition of Roger will benefit Sterling Commerce in several ways:

- Adds German market share to the ISG European customer base.
- Provides a customer base that is already primed to sell ISG upgrade UNIX and NT products into.
- Adds employees, especially implementation consultants, to a geographical area where ISG has openings and needs.
- Sends a continued message to the market that Sterling Commerce intends to be aggressive in the global electronic commerce business.

The opportunity for ISG is excellent. We are negotiating the deal with one of Roger's managing directors who is eager to see the successful conclusion.

Next Steps:

- Brad and Warner will determine final valuation parameters.
- The first draft of the letter of intent will be finalized with assistance from Baker & McKenzie(Frankfort).
- Brad will speak with Roger on Monday Dec 15 to set the stage for the meetings.
- Pat Davis and the Baker&McKenzie rep will meet with Roger Dec 17-19 with the goal of a signed Agreement by Dec 19.

COMPANY DESCRIPTION AND ORGANIZATION

Products and Services

Roger offers a desktop or UNIX solution to their customers getting started in the EDI world, including:

- EDI translation software
- training
- support
- consulting and implementation services
- 3rd party communications software

Roger maintains the existing product themselves, and has a 3rd party software house write new product, using its own personnel for design, testing, and implementation of that software.

The DOS product is due to be replaced by GENTRAN, and is in sunset mode. The UNIX product is in maintenance mode, and an evaluation will have to be done to determine a replacement strategy. Both products seem of good quality.

Roger has been developing a new product that links closely to SAP to provide telco billing handling for telco customers. The product includes a new SAP IDOC and links to GENTRAN. The product is due to go into a second level of beta testing in January. This product represents a possible "hidden gem" for us to extend and potentially roll out worldwide.

Customer Support Services include software updates and helpdesk phone access. Roger offers premium support services from a menu of options, generating significant revenue from those offerings.

Consulting Services include mapping assistance, onsite integration and implementation assistance, and electronic commerce consulting.

Sales Approach

Roger sells it's software products through direct sales. SCI has the pricelists for software and support and services.

Alliances

Roger has active alliances with SAP and Isocor.

Roger uses a 3rd party software house to write new EDI software. The company is named "HPC" and is located in Mannheim, Germany.

Key Employees

The acting manager of the unit will be a key employee for SCI. There are 4-5 other supervisor level personnel that we could classify as key. Gail will be determining the final lists early in the due diligence phase.

Roger's employees fall into these categories:

Category	Total	0-2 Years	2-5 Years	5+ Years
Consultants:				
EDI	10	3	4	3
Communications	4	1	2	1
SAP	4	0	1	3
Development	4	0	1	3
Pre-Sales	3	0	1	2
Customer Support	5	2	1	2
Sales	1	0	1	0
Total	31	6	11	14

The development personnel have experience in system integration with SAP, X.400 communications, European communications and EDI standards, and UNIX and DOS. Several of the above personnel have recently been to Microsoft NT training as well as SCI product training as part of the SCI reseller rollout.

The experience and knowledge of the employees will be of great help to our European operations in every job category.

From what we have experienced so far, the people appear to us to be of good quality and we believe will be a good fit within our culture and organization. Certainly Roger's upper management is of good quality.

MARKET TRENDS AND CUSTOMERS

German Translation software market:
Roger's market share is not yet calculated. The competitors are Actis and Seeburger.

Customers:
Roger's customer base of 750 breaks down as follows:

Unix on Maintenance	Unix not on Maintenance	DOS on Maintenance	DOS not on Maintenance
33	140	240	337

There are another 550 " inactive installations" that may be multiple sites within the same customer base, or historical sales where the customer is no longer actively using the product. The contact information for all those sites will come as part of the deal, so they represent additional opportunity for SCI.

Roger reports that their customer base is largely happy and they are not experiencing any major support issues with any of the products.

BUSINESS STRATEGY AND INTEGRATION PLAN

The recommendation to acquire Roger is based on four fundamental factors:

1. The additional 750 Roger customers can be added to ISG's current German user base, be supported profitably, and can upgrade to GENTRAN software as soon as possible.
2. Our German market share is increased (exact percentages to come).
3. ISG gains valuable German-based employees, especially in the consulting and implementation services areas.
4. The customer base will exhibit demand for larger products, including our NT server product, which ISG is poised to fulfill from day one.

Integration Plan
Preliminary plans would create a Dusseldorf based support/transition group consisting of current Roger personnel. Reporting structure, integration into ISG German management, and longer term plans will be developed by Gail Froelicher.

Ongoing Partnership
We will have an ongoing partnership with Roger covering several areas:

- Roger will retain certain customers to act as general contractor and billing agent, so we will set up the procedures to assure that works well for both sides, allowing free access to those customers for ISG's continuing sales efforts.
- ISG sales reps will receive referrals from Roger's core business sales reps.
- ISG sales reps can refer leads to Roger's core business sales reps.
- Roger represents a major telco with European expansion plans, so strategic discussions between our two companies regarding communications standards, Internet plans, etc. will be of great ongoing benefit.

KEY ISSUES AND OPEN ITEMS

1.) We mutually agree on the valuation and the terms of the Agreement.
2.) We mutually agree on the procedures for the customers that Roger desires to keep direct contact with, including billing procedures and billing fees, and sales opportunity access by SCI.
3.) We implement quickly to retain all desired employees.

PURCHASE STRUCTURE AND VALUATION

The acquisition would be an asset purchase, for cash.

Roger's 1997 income is as follows:

Category	DM (actual for 11 months, estimates for 1 month)	US$ (actual for 11 months, estimates for 1 month)
Software Sales	1,039,310	$ 588,386
Consulting	2,158,360	$1,222,279
Maintenance	868,510	$ 491,837
Hardware	485,360	$ 274,859
Other	144,920	$ 82,068
TOTAL	4,696,460	$2,659,429

An overview of the valuation matrix is:

Category	1997 Revenue	Low Factor	Middle Factor	High Factor
Sales Factor		1.0	1.5	2.0
Software Sales	$ 588K	$588K	$882K	$1,176K
Consulting Factor		.5	.75	1.0
Consulting	$1,222K	$611K	$917K	$1,222K
Maintenance Factor		.75	1.0	1.25
Maintenance	$ 492K	$369K	$492K	$615K
TOTAL	**$2,302K**	**$1,568K**	**$2,291K**	**$3,013K**

Other assets such as central servers and related equipment will carry some additional value, to be determined.

FINANCIAL ANALYSIS AND SUMMARY

Profit and Loss statements for 1997 and balance sheet for 1997 attached. 11 months are actual, and 1 month is estimated.

The balance sheet was prepared by Roger personnel, but they do not normally do a balance sheet down to this department level, so there may be some adjustments during the due diligence period.

APPENDIX A

Memorandum of Understanding

Memorandum of Understanding

November 27, 1997

1.) Sterling Commerce (SCI) intends to acquire the EDI/EC business unit from Roger, including the customer base, personnel, products, and projects. The products include Tiger, TeleTiger, and associated tools.

2.) Roger may continue to act as general contractor and bill a select group of the business unit customers at their discretion.

3.) Roger may have a transition team of approximately 5 personnel to assist and accelerate the migration to GENTRAN. The costs of the team will be charged to SCI during the first year, and after the first year Roger and SCI will decide where the team personnel go.

4.) Pricing for the above acquisition will be mutually negotiated as quickly as possible between SCI and Roger. Both parties will make their best efforts to conclude the negotiations within 30 days.

5.) Roger will supply SCI the information SCI requests to complete the negotiations and acquisition. Such information will be covered by a non-disclosure agreement to be signed between both parties as soon as possible.

6.) Roger and SCI will do joint announcements and press releases to the customer base and marketplace.

7.) Nothing in this memorandum shall be construed to be a binding obligation on either party.

Signed on behalf of Roger	Signed on behalf of Sterling Commerce, Inc.
Date	Date

APPENDIX C

VALUATION MODEL

APPENDIX D

HISTORICAL FINANCIAL STATEMENTS

Roger Acquisition Overview

STERLING COMMERCE

Roger Background Information

- Large Public Utility in Germany.
- Pan-European expansion plans.
- Current ISG Reseller for Germany.
- Business Unit of 31 personnel dedicated to EDI/EC.
- Long history/experience with EDI in Germany.
- Core of business unit is previous acquisition from Lion Software.

STERLING COMMERCE

ISG European Strategy

- Northern, Central, Southern, and Distributor Regions.
- Attack the major markets of UK, Germany, France.
- Support Center in Amsterdam with country level support personnel for premium support.
- Consulting organization in London with country level consultants as well.
- Localization lab to support European comms and EDI standards.

STERLING COMMERCE

The Strategic Fit

- Creates major opportunity for German market share dominance at a much faster rate than organic growth.
- Increases direct sales and support resources in Germany.
- More than doubles our European wide consulting resources.
- Adds key SAP knowledge and experience in each job category.
- Adds personnel already trained in ISG's product suite.
- Partnership will continue.

STERLING COMMERCE

Sales Resources

- **1 senior sales rep with training on our product.**
- **3 pre-sales resources with 2 of them having 5+ years experience, the other 2+ years.**
  - Currently do proposals, customer presentations, technical support of sales, and sales rep technical training.
  - SAP knowledge and experience.
  - Trained on ISG product.

STERLING COMMERCE

Consulting Resources

- 18 consultants, 6 with 5+ years experience, 9 more with 2-5 years experience.
- Dusseldorf based with single remote personnel in Hamburg, Berlin, Stuttgart, and Frieburg.
- Good SAP, X.400, and European comms and EDI standards knowledge and experience.

STERLING COMMERCE

Support Resources

- 5 customer support resources.
- Experience in offering normal and premium levels of support.
- 7x24 "beeper culture" already in place.
- SAP knowledge and experience.
- Some trained on ISG product.
- Potential Amsterdam resources.

STERLING COMMERCE

Development Resources

- **4 development resources, 3 of them with 5+ years experience, the other one with 2+ years.**
- **Currently do design for new products, maintenance of existing product, QA testing, integration, comms links.**
  - ▼ SAP knowledge and experience.
  - ▼ X.400 knowledge and experience.
  - ▼ European comms and EDI standards experience.

STERLING COMMERCE

Integration Plan

- **At time of close, the business will be immediately integrated into ISG's European Operations:**
  - The sales personnel will be integrated into the Central Europe Region sales team.
  - The consultants will be integrated into the European Client Services team.
  - The support staff will be integrated into the European Support Center.
  - The development staff will be integrated into the ISG Labs to provide the core of the ISG European Localization Lab.

STERLING COMMERCE

Source data for O.tel.o revenues is incomplete and not structured well by product and functional activities.

To construct 1997 Calendar year revenue model various simplifications and assumptions were made:

- Used $26.60K (47.73KDM) as total CY 1997 revenues (1.8 DM = 1 US $)
- Eliminated Hardware revenue of $270 (no Hdware maint)
- Assumed ~~virtually all~~ most software license revenue was from Tiger ~~and Comp. Util~~

Tiger/DOS	}	~~$181K~~
Tiger/UNIX		
Tiger/NT		
~~Com~~ total		
other -		$?
Total		$546K

Com Util

- Assumed software maintenance/services

Tiger/DOS	}	$181K
Tiger/UNIX		
Tiger/NT		
Total Tiger		
Com Util		544

[334K? what are SVCS

- Consulting Services -

product related - 40%		484
messaging - 60%		725
		1209

Tiger Analysis - 1987

Revenue (US$'000)		(DM'000)	
Software	545		any TT rev? any ComUtil rev?
Consulting -	1207		any non EDI Consulting
Maint/Supt	543		any Hdware or ComUtil Supt
~~Other~~	2295		
Hdware	269		
Other (ComUtil?)	96		
	2660	4773	[1.8
Cost of Sales			
Soft	58	184	
Hdware/other	—	445/6	
		555	
Expenses - Salaries	1406	2871	
~~Rent~~ [Teletiger		[340 ~~est~~] ?	~~HPC other~~ own staff
- deprec	248	446	
- other	751	1352	monthly rent
Overhead (o.tel.o)			where is HPC cost flow TT?

Ed Wozen

TIGER

2/12/98

($000)	1997	
DOS Maint	98	123 open contracts
UNIX "	83	36
ISOCOR/odex	19	17
Teletiger	5	15
Services	131	Lang Wese
Services	208	30 product (3-75?)
	544K	
Software	546K	
Services	1200	40% prod
EDI		60% cons/message
	2300	not in value
House	355	(covered by goodwill)
Travel Exp.		
	2655	

need to talk to:

at Rogen — TIGER mktg
Teletiger mktg

at ISG — Tiger mktg strategy
Comm util "
Teletiger strategy

ck with Lou Baugh on who will own copyright on Tiger + TT

STERLING
COMMERCE

FAX

To Bart Grad
Company:
Phone:
Fax: 1-914-631-1164

From: **Phil Dean**
Fax: **33-1-53.93.17.17**
Phone: **33-1-53.93.17.08**
Date:

Number of pages: 4
Time:

Final 1997 revenue figures. We are still awaiting an analysis of Software into Tiger UNIX and Third Party products.

Regards

Sterling Commerce International • Washington Plaza • 1st floor
44, rue de Washington • 75408 Paris Cedex 08 • France
Tel : 33-1-53.93.17.00 • Fax 33 1 53.93.17.17

billed revenues	01.-12./97
Hardware	485.234,36
Software	981.978,52
consulting	2.172.699,13
Maintenance / Support	978.172,00
others	155.412,35
Total	4.773.378,16

DEM k

Hardware 455

Software 982 (see attachment at 968)

Consulting 2.173

Maint/Supp 978

Others 155

Total 4,773 =

at 1.8

USD

269

545

1,207

543

96

$ 2,660

Bezeichnung	PLZ	ORT	PSP-Element	Debitor	Servicecode	Servicename	Kostenart	Kostenbezeichnung	Umsatz	Buchungsdatum
Alfred Karcher GmbH & Co.	71364	Winnenden	11229/K.1468	1468	351	Projekte	83.100.000	Software	12.000,00	Sep 97
Avnet E2000 GmbH	81829	München	11239/K.2075	2075	351	Projekte	83.100.000	Software	5.500,00	Mrz 97
Avnet E2000 GmbH	81829	München	11239/K.2075	2075	351	Projekte	83.100.000	Software	6.200,00	Jun 97
Benteler AG	33043	Paderborn	11149/K.2137	2137	370	Wartung	83.100.000	Software	-20.000,00	Okt 97
Borealis Coordination	1440	Brüssel	11000/K.2567	2567	351	Projekte	83.150.001	Software	37.000,00	Feb 97
Borealis Coordination Center, Belgien	1932	Sint Stevens Woluwe	11149/K.2567	2567	351	Projekte	83.150.001	Software	37.000,00	Mrz 97
Borealis Coordination Center, Belgien	1932	Sint Stevens Woluwe	11149/K.2567	2567	351	Projekte	83.150.001	Software	-37.000,00	Apr 97
Braun AG	61476	Kronberg	11219/K.1833	1833	352	Projekte	83.100.000	Software	14.980,00	Aug 97
CCG	50672	Köln	11149/K.1172	1172	351	Projekte	83.100.000	Software	1.320,00	Jan 97
CCG	50672	Köln	11149/K.1172	1172	351	Projekte	83.100.000	Software	2.097,00	Mrz 97
Daimler Benz Aerospace Airbus	28183	Bremen	11119/K.2134	2134	352	Projekte	83.100.000	Software	10.000,00	Okt 97
Dancin Vertriebsgesellschaft mbH	45329	Essen	11149/K.3139	3139	351	Projekte	83.100.000	Software	5.000,00	Sep 97
Deutsche Leasing AG	61352	Bad Homburg	11219/K.1672	1672	351	Projekte	83.100.000	Software	14.000,00	Jul 97
Deutsche Leasing AG	61352	Bad Homburg	11219/K.1672	1672	351	Projekte	83.100.000	Software	36.000,00	Sep 97
Edifact AG	8600	Dübendorf	11000/K.1187	1187	351	Projekte	83.150.001	Software	2.323,20	Apr 97
ETG, Offenburg	77606	Offenburg	11229/K.1922	1922	351	Projekte	83.100.000	Software	6.500,00	Jun 97
Flender AG, A. Friedr.	46395	Bocholt	11149/K.2535	2535	351	Projekte	83.100.000	Software	3.960,00	Feb 97
Frozen Fish	27533	Bremerhaven	11119/K.2871	2871	351	Projekte	83.100.000	Software	31.700,00	Mai 97
Gräfl. von Hardenberg'sche Kornbrennerei	37171	Northeim-Hardenberg	11119/K.3264	3264	354	Projekte	83.100.000	Software	28.800,00	Jun 97
H. Wollschläger GmbH & Co	44894	Bochum	11149/K.2542	2542	351	Projekte	83.100.000	Software	-7.500,00	Feb 97
H. Wollschläger GmbH & Co.	44894	Bochum	11149/K.2542	2542	351	Projekte	83.100.000	Software	12.500,00	Apr 97
Hapag Lloyd	20018	Hamburg	11249/K.1218	1218	351	Projekte	83.101.000	Software	5.500,00	Feb 97
Hapag Lloyd	20018	Hamburg	11249/K.1218	1218	351	Projekte	83.101.000	Software	7.500,00	Mai 97
Hapag Lloyd	20018	Hamburg	11249/K.1218	1218	351	Projekte	83.101.000	Software	-7.500,00	Jul 97
Harry Brot GmbH	22869	Schenefeld Hamburg	11119/K.2633	2633	351	Projekte	83.100.000	Software	44.990,00	Apr 97
Harting Elektronic Inc., Illinois, USA	60123	Elgin, IL	11000/K.3269	3269	351	Projekte	83.150.001	Software	23.420,84	Mai 97
Harting Elektronic Inc., Illinois, USA	60123	Elgin, IL	11000/K.3269	3269	351	Projekte	83.150.001	Software	179,00	Jun 97
Harting Elektronik AG, Schweiz	8604	Volketswil	11000/K.3263	3263	351	Projekte	83.150.001	Software	23.430,84	Apr 97
Harting Elektronik AG, Schweiz	8604	Volketswil	11000/K.3263	3263	351	Projekte	83.150.001	Software	8.499,20	Nov 97
Harting Elektronik LTD., Northampton, UK	NN4 7PW	Northampton	11000/K.3268	3268	351	Projekte	83.150.001	Software	33.257,24	Jun 97
Harting Elektronik S.A., Barcelona	8029	Barcelona	11119/K.3195	3195	351	Projekte	83.150.001	Software	12.359,20	Apr 97
Harting Elektronik S.A., Barcelona	8029	Barcelona	11119/K.3195	3195	351	Projekte	83.150.001	Software	13.663,20	Jun 97
Harting KG	32325	Espelkamp	11119/K.3156	3156	351	Projekte	83.100.000	Software	32.359,20	Apr 97
Harting KG	32325	Espelkamp	11119/K.3156	3156	351	Projekte	83.100.000	Software	179,00	Jun 97
Harting KG	32325	Espelkamp	11119/K.3156	3156	351	Projekte	83.100.000	Software	-179,00	Okt 97
HB Collection Wetzlar	35578	Wetzlar	11219/K.4007	4007	351	Projekte	83.100.000	Software	5.000,00	Nov 97
Heinrich Kopp AG	63796	Kahl	11239/K.1064	1064	351	Projekte	83.100.000	Software	300,00	Feb 97
Hennemuth	34117	Kassel	11219/K.2294	2294	351	Projekte	83.100.000	Software	-3.000,00	Jun 97
Hutchison	48155	Münster	11149/K.2266	2266	351	Projekte	83.100.000	Software	5.500,00	Jun 97
IPV GmbH	35410	Hungen	11219/K.3217	3217	351	Projekte	83.100.000	Software	4.500,00	Nov 97
Krüger GmbH & Co.	51469	Bergisch Gladbach	11149/K.1467	1467	351	Projekte	83.100.000	Software	14.000,00	Jun 97
Krüger GmbH & Co.	51469	Bergisch Gladbach	11149/K.1467	1467	351	Projekte	83.100.000	Software	-14.000,00	Jul 97
Krüger GmbH & Co.	51469	Bergisch Gladbach	11149/K.1467	1467	351	Projekte	83.100.000	Software	36.000,00	Aug 97
Krüger GmbH & Co.	51469	Bergisch Gladbach	11149/K.1467	1467	351	Projekte	83.100.000	Software	-36.000,00	Sep 97
LDG 2000	81379	München	11239/K.2959	2959	354	Projekte	83.100.000	Software	50.000,00	Apr 97
Ludwig Schokolade Aachen	52072	Aachen	11149/K.3236	3236	351	Projekte	83.100.000	Software	4.500,00	Apr 97
Lufthansa Systems	65451	Kelsterbach	11219/K.2231	2231	352	Projekte	83.100.000	Software	6.000,00	Jul 97
Lufthansa Systems	65451	Kelsterbach	11219/K.2231	2231	352	Projekte	83.100.000	Software		Sep 97
Meistermarken Werke GmbH	28215	Bremen	11129/K.1882	1882	700	Support	83.100.000	Software	4.500,00	Sep 97
Nestlé Deutschland AG	60528	Frankfurt	11219/K.1718	1718	351	Projekte	83.100.000	Software	23.000,00	Mrz 97
Oekametall, Bamberg	96052	Bamberg	11239/K.3436	3436	700	Support	83.100.000	Software	6.000,00	Jul 97
Ommer GmbH	51789	Lindlar	11149/K.3162	3162	351	Projekte	83.100.000	Software	3.100,00	Mrz 97

Bezeichnung	PLZ	ORT	PSP-Element	Debitor	Servic ecode	Ser...ename	Kostenart	Kostenbezeichnung	Umsatz	Buchungsd atum
Raiffeisen-Waren-Zentral Rheinland eG	50668	Köln	11149/K.3142	3142	351	Projekte	83.100.000	Software	10.720,00	Jan 97
Raiffeisen Central-Genossenschaft	48136	Münster	11149/K.3175	3175	351	Projekte	83.100.000	Software	1.800,00	Mrz 97
Raiffeisen Central-Genossenschaft	48136	Münster	11149/K.3175	3175	351	Projekte	83.100.000	Software	950,00	Jul 97
Rohm Electronics	47877	Willich	11149/K.1286	1286	353	Projekte	83.100.000	Software	152,17	Apr 97
Schenker & Co. AG	1011	Wien	11000/K.1290	1290	351	Projekte	83.150.001	Software	2.807,15	Jan 97
Schwartauer Werke GmbH & Co.	23611	Bad Schwartau	11119/K.1557	1557	351	Projekte	83.100.000	Software	28.800,00	Jul 97
Touristik Union International GmbH & Co.	30625	Hannover	11119/K.3238	3238	354	Projekte	83.100.000	Software	45.024,00	Jun 97
Touristik Union International GmbH & Co.	30625	Hannover	11119/K.3238	3238	354	Projekte	83.100.000	Software	8.130,00	Okt 97
Union Deutscher Lebensmittel	20355	Hamburg	11119/K.1434	1434	354	Projekte	83.100.000	Software	12.000,00	Mrz 97
Union Deutscher Lebensmittel	20355	Hamburg	11119/K.1434	1434	354	Projekte	83.100.000	Software	16.600,00	Apr 97
V. Fraas AG & CO.	95233	Helmbrechts / Wüstenselbitz	11239/K.2393	2393	351	Projekte	83.100.000	Software	3.000,00	Sep 97
Wolff Walsrode AG	29655	Walsrode	11119/K.1686	1686	351	Projekte	83.100.000	Software	9.960,00	Mai 97
Metro MGI Informatik GmbH	50676	Köln	11149/K.2868	2868	351	Projekte	83.100.000	Software	5.000,00	Mai 97
Metro MGI Informatik GmbH	50676	Köln	11149/K.2868	2868	351	Projekte	83.100.000	Software	5.000,00	Jul 97
Metro MGI Informatik GmbH	50676	Köln	11149/K.2868	2868	351	Projekte	83.100.000	Software	-5.000,00	Sep 97
ADtranz Deutschland GmbH	16761	Henningsdorf	11129/K.3194	3194	351	Projekte	83.100.000	Software	150,00	Apr 97
BMW AG	80788	München	11239/K.1159	1159	351	Projekte	83.100.000	Software	13.400,00	Nov 97
Bömers	28217	Bremen	11119/K.3863	3863	351	Projekte	83.100.000	Software	5.300,00	Nov 97
Brenntag AG	45130	Essen	11149/K.4152	4152	354	Projekte	83.100.000	Software	1.912,98	Dez 97
Brenntag Chemiepartner GmbH	45472	Mülheim	11149/K.4170	4170	354	Projekte	83.100.000	Software	5.738,94	Dez 97
Brenntag Eurochem GmbH	45472	Mülheim	11149/K.4169	4169	354	Projekte	83.100.000	Software	18.492,14	Dez 97
Brillux	48163	Münster	11149/K.2105	2105	352	Projekte	83.100.000	Software	150,00	Nov 97
Brillux	48163	Münster	11149/K.2105	2105	352	Projekte	83.100.000	Software	2.650,00	Dez 97
Daimler Benz Aerospace Airbus	28183	Bremen	11119/K.2134	2134	354	Projekte	83.100.000	Software	25.000,00	Nov 97
Daimler Benz Aerospace Airbus	28183	Bremen	11119/K.2134	2134	352	Projekte	83.100.000	Software	9.000,00	Nov 97
Gräfl. von Harzerberg'sche Kommanditer	37171	Northen-Harzenberg	11119/K.3264	3264	351	Projekte	83.100.000	Software	9.250,00	Dez 97
Gruner + Jahr AG & Co	20444	Hamburg	11119/K.3001	3001	354	Projekte	83.100.000	Software	41.600,00	Jun 97
Harting Elektronic Inc., Illinois, USA	60123	Elgin, IL	11000/K.3269	3269	351	Projekte	83.150.001	Software	1.726,60	Nov 97
Harting Elektronik S.A., Barcelona	8029	Barcelona	11119/K.3195	3195	351	Projekte	83.150.001	Software	12.970,60	Nov 97
Harting KG	32325	Espelkamp	11119/K.3156	3156	351	Projekte	83.100.000	Software	39.372,20	Sep 97
Herlitz AG	13507	Berlin	11129/K.2110	2110	352	Projekte	83.100.000	Software	13.462,80	Nov 97
Herpa Print	53604	Much	11149/K.2225	2225	352	Projekte	83.100.000	Software	15.700,00	Nov 97
Industick GmbH	45130	Essen	11149/K.4171	4171	354	Projekte	83.100.000	Software	1.275,32	Dez 97
INFODAS GmbH	50744	Köln	11149/K.3541	3541	352	Projekte	83.100.000	Software	11.540,00	Nov 97
Mannesmann DV	40885	Ratingen	11149/K.1259	1259	354	Projekte	83.100.000	Software	10.000,00	Nov 97
Metro MGI Informatik GmbH	50676	Köln	11149/K.2868	2868	351	Projekte	83.100.000	Software	23.500,00	Mrz 97
Ommer GmbH	51789	Lindlar	11149/K.3162	3162	351	Projekte	83.100.000	Software	550,00	Apr 97
Pfalzwerke AG	67010	Ludwigshafen	11219/K.3438	3438	352	Projekte	83.100.000	Software	11.830,00	Sep 97
Raab Karcher AG	45131	Essen	11149/K.1401	1401	352	Projekte	83.101.000	Software	30.850,00	Nov 97
Wolff Walsrode AG	29655	Walsrode	11119/K.1686	1686	351	Projekte	83.100.000	Software	6.300,00	Nov 97
									968.303,82	

STERLING
COMMERCE

FAX

To	Bert Grad	From:	**Phil Dean**
Company:		Fax:	**33-1-53.93.17.17**
Phone:		Phone:	**33-1-53.93.17.08**
Fax:	914-631-1164	Date:	
Number of pages:	6	Time:	

Contents,

1. Final 1997 results calculation.
2. O.tel.O forecast to year 2,000
3. SC forecast version 6.
4. Assumptions (2 pages)

Phil

Sterling Commerce International • Washington Plaza • 1st floor
44, rue de Washington • 75408 Paris Cedex 08 • France
Tel : 33-1-53.93.17.00 • Fax : 33-1-53.93.17.17

Profit and Loss Calculation 1997 EDI

Appendix 9

1997	TDM
Sales	**4773.87**
Cost of sales	**675.42**
hardware	521.05
software	130.20
other	24.17
Salaries, benefits	**2382.46**
total base salary	1921.57
total bonuses	2.63
total commission	45.63
total benefits	364.24
total other	48.40
Depreciation	**192.07**
Other expenditures	**1026.25**
advertising	34.03
maintenance/repairs	35.97
consulting	86.66
rents	34.75
office rent	426.57
leasing (cars)	47.22
travel costs	168.65
other	192.40
Total direct costs	**4276.20**
EBIT	**497.68**
Headcount	**22**
Consultants	12
Presales	2
Sales	1
Support	3
System Integration	4

Project/SW 3,795
3rd Party 373
Maintan. 604
4,772

Servers + PC's

Inventory $282
Rights $50
Localization $50

← Excludes Gentran inventory & Rights & localization

VANS Budget 1998 -2000 in TDM	Jan.-Nov. 97	Summe 1998	Summe 1999	Summe 2000
Messaging projects		812,75	1.249,50	1.928,50
Sterling projects		2.690,25	4.709,50	7.481,50
UNIX-Tiger projects		894,25	874,75	2.255,75
TeleTiger projects		1.384,00	2.022,00	3.568,00
Consulting old customers		480,00	480,00	480,00
maintanance old customers		700,00	700,00	700,00
change in inventory TeleTiger	340,00			
Total revenue	4.636,46	6.961,25	10.035,75	16.413,75
Total direct costs				
cost of sales	554,51	1.485,24	2.289,56	3.914,53
- Hardware	444,88	239,40	331,20	516,60
- Software	103,92	1.185,84	1.898,36	3.337,93
- others	5,72	60,00	60,00	60,00
salaries, benefits	2.870,64	3.340,83	3.949,95	4.762,76
- total base salary	2.328,02	2.455,00	2.920,00	3.533,75
- total bonuses	35,00	286,88	325,00	381,72
- total comission	0,00	0,00	0,00	0,00
- total benefits	507,62	598,96	704,95	847,29
depreciation	446,11	700,73	810,41	890,17
other expenditures	1.352,14	2.004,40	2.338,02	2.725,62
- advertising	6,81	121,00	164,00	201,00
- maintenance/ repairs	23,60	105,00	105,00	105,00
- consulting	75,21	108,00	108,00	108,00
- office rent	815,00	900,00	1.020,00	1.192,50
- leasing (cars)	83,60	36,00	54,00	72,00
- travel costs	161,97	124,00	152,80	190,00
- others	268,54	610,40	734,22	857,12
Total direct costs	5.223,41	7.531,20	9.387,94	12.293,08
EBIT E-Commerce	734,13	1.790,77	3.694,96	7.819,18
EBIT SW-Integration	-769,66	-1.194,92	-1.211,56	-1.222,50
EBIT Sales	-285,72	-407,02	-746,50	-1.072,39
EBIT Customer Service	-512,77	-758,79	-1.089,09	-1.403,62
Total EBIT	-586,95	-569,95	647,81	4.120,67
investment E-Commerce		530,00	392,00	392,00
investment SW-Integration		239,40	239,40	239,40
investment Sales		3,60	13,60	13,60
investment Customer Service		32,50	52,50	52,50
Total investment		805,50	697,50	697,50
staff E-Commerce	20	20	22	24
staff SW-Integration	4	4	4	4
staff Sales	1	1	2	3
staff Customer Service	4	5	7	9
Total staff	29	30	35	40

Earned rev to Nov 30.

includes 340 o.tel.o costs of Teletiger (own staff)

Total costs to allHPC 330
HPC 70
other 50
450

Marketing (e.g. Lotus Guitty.) 150/MK

2,500/mnth/person

December

Consulting	200
Software	100
Maintenance	100

(risky since G:Server for N not yet available)

Total Teletiger

450	External
340	Internal to Nov 30
200	Internal in Dec.
990	

Sterling Commerce - ISG
FORECAST Revenues

(in thousands)	Cal 1997 DEM	Cal 1998 DEM	7 months FY 1998 DEM	FY 1999 DEM	FY 2000 DEM	FY 2001 DEM	FY 2002 DEM	Price /unit DEM
NSS units								
DOS/UNIX Tiger								
UNIX-Serv WB		1	1	3	6	8	10	100
UNIX-Serv MID		6	4	8	12	16	21	50
UNIX-Serv Single		11	7	15	20	26	34	20
UNIX-Serv WS		16	10	20	25	33	43	10
DOS-Serv WS/NT		12	8	15	20	26	34	5
DOS-DIR		0	0	10	25	33	43	3
Teletiger		5	2	20	20	26	34	20
Total Units		51	32	91	128	168	219	
Education Units		2	1	4	5	6	8	
NSS $s								
DOS/UNIX Tiger	1,039	0	0	0	0	0	0	
UNIX-Serv WB		100	100	300	600	800	1,000	
UNIX-Serv MID		300	200	400	600	800	1,050	
UNIX-Serv Single		220	140	300	400	520	680	
UNIX-Serv WS		160	100	200	250	330	430	
DOS-Serv WS/NT		60	40	75	100	130	170	
DOS-DIR		0	0	30	75	99	129	
Teletiger		100	40	400	400	520	680	
Total Software	1,039	940	620	1,705	2,425	3,199	4,139	
Consulting - Days								Days per unit
DOS/UNIX Tiger	1,079	800	460	375	250	150	50	NA
UNIX-Serv WB	0	20	20	60	120	160	200	20
UNIX-Serv MID	0	72	48	96	144	192	252	12
UNIX-Serv Single	0	132	84	180	240	312	408	12
UNIX-Serv WS	0	80	50	100	125	165	215	5
DOS-Serv WS/NT	0	60	40	75	100	130	170	5
DOS-DIR	0	0	0	50	125	165	215	5
Teletiger	0	40	16	160	160	208	272	8
Ongoing New consulting	0	260	150	600	770	958	1,143	
Education	0	8	4	16	20	24	32	4
								Days per year
Total Billable Days	1,079	1,472	872	1,712	2,054	2,464	2,957	
Manpower @ 130ds/yea	8	11	11	13	16	19	23	130
Manpower @ 110ds/yea	10	13	13	16	19	22	27	110
								Rate per Day DEM
DOS/UNIX Tiger	2,158	1,600	920	750	500	300	100	2
UNIX-Serv WB	0	40	40	120	240	320	400	2
UNIX-Serv MID	0	144	96	192	288	384	504	2
UNIX-Serv Single	0	264	168	360	480	624	816	2
UNIX-Serv WS	0	160	100	200	250	330	430	2
DOS-Serv WS/NT	0	120	80	150	200	260	340	2
DOS-DIR	0	0	0	100	250	330	430	2
Teletiger	0	80	32	320	320	416	544	2
Ongoing New consulting	0	520	300	1,200	1,540	1,916	2,286	2
Education	0	150	75	300	375	450	600	19
Total Consulting Reven	2,158	3,078	1,811	3,692	4,443	5,330	6,450	
Growth on Prior Year		143%		120%	120%	120%	121%	
Maintenance								
UNIX Tiger	113	57	33	28	0	0	0	
UNIX Premium	377	400	233	500	500	650	845	
DOS Tiger	378	300	175	270	240	150	0	
UNIX-Serv WB	0	8	4	38	105	210	420	
UNIX-Serv MID	0	23	13	75	135	240	379	
UNIX-Serv Single	0	17	10	56	96	165	255	
UNIX-Serv WS	0	12	7	39	64	107	164	
DOS-Serv WS/NT	0	5	3	15	25	42	65	
DOS-DIR	0	0	0	2	10	23	40	
Teletiger	0	0	0	0	0	0	0	
Total Maintenance Reve	868	820	478	1,022	1,175	1,587	2,168	
Teletiger internal	340							
TOTAL REVENUES	4,405	4,838	2,909	6,419	8,043	10,116	12,757	

ASSUMPTIONS

750	custs
240	DOS on Maint
33	UNIX on MAINT
337	DOS not on MAINT
140	UNIX not on MAINT

2 Marks

	97	98	99	00	
Revenue					
DOS/UNIX TELE	917	0	0	0	
UNIX → SERV WB	0	100	300	600	@ 10K
UNIX → SERV MID	0	250	400	600	@ 60K
UNIX → SERV SINGLE	0	200	300	400	@ 20K
UNIX → SERV WS	0	150	200	250	@ 10K
DOS → SERV WS	0	50	75	100	@ 5K
OS → DIR/INT	0	0	30	75	@ 3K
TELETIGER	0	100	400	400	@ 20K
CONS. DOS/UNIX TELE	2300	1500	750	500	
CONS. UNIX → SERV WB	0	40	120	240	@ 48K 20
CONS. UNIX → SERV MID	0	120	192	288	@ 24K 12
CONS. UNIX → SERV SINGLE	0	240	360	480	@ 24K 12
CONS. UNIX → SERV WS	0	150	200	250	@ 10K 5
CONS. DOS → SERV WS	0	100	150	200	@ 10K 5
CONS DOS → DIR/INT	0	80	100	250	@ 10K 5
CONS TELETIGER	0	80	320	320	@ 16K 8
ONGOING NEW CONS.	0	700	755	824	
EDUCATION	0	150	300	450	
MAINT UNIX TELE	113	57	28	0	
MAINT DOS TELE	378	300	270	240	
MAINT SERV WB	0	8	38	105	
MAINT SERV MID	0	19	68	157	
MAINT SERV SINGLE	0	15	53	105	
MAINT SERV WS	0	15	51	98	
MAINT DIR/INT	0	0	2	10	
MAINT TOTAL	3708	4344	5462	6842	
		17%	25%	27%	

38 +30 +30 +45

38 + 30

15% @ 50% of yrs each new year

45 + 38×2 = 76 = 121

16

105

45

68×2 = 136

− (38)

143

45 @ 00

16 98

47 44

105

YR 1 38

YR 2 60

YR 3 45

143

Assume:

1) UNIX notice of 12 months - Lose 1/3 of 170 (56)
Then 30 move in year 1
Then 60 move in year 2 20K DM
Then 24 move in year 3

2) DOS 240 on maint. We continue to support for 3 years (assuming DIRECTOR enhanced for Germany)

Current	Go away	Year 1 DIR	Year 1 NT	Year 2 DIR	Year 2 NT	Year 3 DIR	Year 3 NT
240 MAINT DOS	80	45	5	72	8	27	3
337 NON MAINT	200	30	4	62	7	30	4
		75	9	134	15	57	7

DIR. INT @ 7K
NT @ 18K

Teletiger @ 20K
1/2 NT

750 Total Active

240 Maint DOS
33 Maint UNIX
337 Active DOS
140 Active UNIX

3) Consult DOS → DIR @ 2K
Consult UNIX → UNIX/NT @ 20K
Consult DOS → NT @ 4K
Consult O. ~~tot~~ O
Consult Teletiger @ 8K

O.tel.o Historic Data -- 1997

(US$000)	Tiger DOS	Tiger UNIX	Comm. Util.	Tele Tiger	Other	Total
REVENUES						
Hardware						
Hardware Maint.						
Software License						
SW Maint. & Svcs						
Consulting Svcs.						
Total						
EXPENSES						
COGS						
Hardware						
Hdwe Maint.						
SW License						
SW Maint.						
Consulting						
Total COGS						
Operations						
Sales/Mktg						
Dev. in-house						
Dev. 3rd pty						
Support/Maint.						
in-house						
3rd party						
Cons. Svcs.						
Total Operations Costs						
Total Expenses						
Operating Income						

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O. tel. o Historic Data ~~Needed~~ -- 1997

~~Revenues for 1997 (DM or US$)~~

(us $000)	Tiger DOS	Tiger UNIX	Comm. Util.	Tele Tiger	Other	Total
Revenues						
Hardware						
Hardware Maint.						
Software License						
Consulting Svcs.						
SW Maint. & Svcs						
Total						
Expenses						
~~Costs for 1997~~						
COGS						
Hdwe						
Hdwe Maint.						
SW License						
SW Maint.						
Consulting						
Total COGS						
Operations						
Sales/Mktg						
← Dev. in-house						
← Dev. 3rd pty						
Support/ Maintenance						
in-house						
3rd party						
Cons. Svcs.						
Total Operations (cost)						
Total Expenses						
Operating Income						

3754

U.S. ⌀

Historic Data Needed – 1997

(000)	Tiger DOS	Tiger UNIX	Comm. Util.	Tele Tiger	Other	Total
Revenues for 1997 (DM or US$)						
Hardware Sales						270
Hardware Maint.						—
Software License						546
SW Maint. & Svcs	98	83	24	5	334	544
Consulting Svcs.						1209
Total Revenues						2655
Costs for 1997						
COGS						
Hardware Sales						292
Hdwe Maint.						—
SW License						73
SW Maint.						13
Consulting						—
Total COGS						378
Operations						—
Sales/Mktg						-
Dev. in-house						..
Dev. 3rd ply						..
Support/Maint. in-house						--
Support/Maint. 3rd party						--
Cons. Svcs.						—
G&A						—
Total Operations Costs						2024
Total Expenses						2402
Operating Income						253

3754

fax #'s from Wasser

Tiger

Work paper

Infamak-

Derived from handwritten answers to March 9th 98 questions.

		DOS	UNIX	
1/	Actin Tiger on maint	123	41	
2/	Price maint ~~95~~ 97/year (?)	$900	$2300	
	98	991	2340	52K + 3rd party (?).

3/ 1997 SALES.

New Tiger licenses signed	60		24.
Renew.	—	546	—
Price 98	10		30
Consulting services	—	1,200	—
Value semi formen licenses.	—	3-30 days	—
Maintenance charge 96		No answer.	
Maintenance renew 97		No answer	but 492,000 according to other source.
Key customer	"3 key customers accounts for 160K support" Brenda.		

STERLING
COMMERCE

December 18, 1997

o.tel.o communications GmbH & Co.
Siemensstrasse 12b
D-63263 Neu-Isenburg
Frankfurt, Germany

Attention: Mr. Huber

Gentlemen:

This letter confirms our recent discussions concerning the possible acquisition by Sterling Commerce, Inc. or one or more of its subsidiaries (collectively "Sterling") of certain assets of o.tel.o communications GmbH & Co. (the "Company") on or about February 27, 1998 (the "Closing"). The terms and conditions will be as specified in an agreement ("Agreement") described below based upon the following:

1. (a) Subject to the terms and conditions in the Agreement, Sterling will acquire substantially all of the assets listed on Exhibit A, including but not limited to the Tiger and TeleTiger software (the "Products"), and customer contracts, licenses, intellectual property related to the Products free and clear of any liens or encumbrances (except for those liabilities which Sterling specifically agrees to assume) plus the confidentiality and non-competition agreements discussed in paragraph 4 hereof for a cash purchase price of DM 5,800,000 (five million, eight hundred thousand Deutschemarks) plus the NTBV (as hereinafter defined) as of the Closing (collectively, the "Purchase Price"). The allocation of the Purchase Price among the assets of the Company and the confidentiality and non-competition agreements shall be as mutually agreed by the parties. The assets to be acquired pursuant hereto (the "Assets") shall include those contracts, accounts receivable, equipment and other items listed on Exhibit A, plus such other assets as may be mutually agreed to by the parties.

(b) To the extent that the net tangible book value ("NTBV") as of the Closing is greater or less than DM 520,000 (five hundred and twenty thousand Deutschemarks) (*i.e.*, the NTBV value pursuant to Exhibit C as of November 30, 1997), calculated in a manner consistent with Exhibit C or in a manner otherwise mutually agreed to by the parties the Purchase Price will be increased or decreased on a DM-for-DM basis to reflect any excess or deficiency in that figure. Prior to Closing, Sterling shall have the right to remove any Computer Equipment items from Exhibit C, correspondingly lowering the NTBV. At the Closing, Sterling shall pay to the Company two-thirds of the estimated Purchase Price based on the parties' mutually agreed estimate of the NTBV as of the Closing. Within thirty days after Closing, the Company shall prepare the balance sheet in the form of Exhibit C as of the

Closing (the "Balance Sheet") and shall present it to Sterling for review and approval. Within five days after the parties have agreed on the NTBV as of the Closing calculated in the manner set forth above, Sterling shall pay to the Company the remainder of the Purchase Price less an amount equal to 50% of the accounts receivable reflected on the Balance Sheet as of the Closing, net of appropriate reserves, which shall be held in a separate interest bearing account by Sterling. Six months after Closing, Sterling shall be paid from such account, on a DM-for-DM basis, the aggregate amount of any portion of the accounts receivable (net of reserves) stated on the Balance Sheet as of the Closing which remain uncollected and the Company shall be paid the remaining balance of such amount.

2. Among the conditions to Sterling's obligations to close the transaction will be that: (a) Sterling shall have performed a thorough and comprehensive legal, financial and technical due diligence review and shall have determined that the results thereof were satisfactory to Sterling, in its reasonable business judgment; (b) all necessary notices of or consents to the transaction with Sterling, including but not limited to any required notices to the Company's creditors or any required consent of the Company's customers, creditors, vendors and employee counsels and any governmental or regulatory approval shall have been made, granted or obtained; (c) from the date hereof, the Company shall have operated with respect to the subject matter in this letter of intent in the ordinary course consistent with its past practices; provided, that the Company shall not have granted any salary increases or bonuses to the relevant employees, changed any of its relevant accounting methods or practices or entered into any relevant transactions not in the ordinary course of business without Sterling's prior written consent; (d) no material adverse change shall have occurred with respect to the business, financial condition, operations, assets or liabilities to be acquired since the date of the last financial statements provided to Sterling in connection with the proposed transaction; and (e) no investigation, action, suit or proceeding shall be pending or threatened before any court or governmental body which seeks to restrain, prohibit or otherwise challenge or interfere with the consummation of the proposed transaction. The parties hereto agree that Sterling's due diligence shall include, but is not limited to, reviewing the relevant intellectual property, license agreements, government contracts, if any, employee benefit and compensation plans, leases and other commitments, product development activities and revenue recognition and other accounting policies.

3. Sterling and the Company shall mutually agree on those liabilities, if any, to be assumed by Sterling at the Closing. With respect to Product license agreements of the customers set forth in Exhibit D, it is contemplated that the Company will continue to bill those customers and Sterling will act as a subcontractor and perform the support obligations thereunder related to the Products for a period of one year (or any extension thereof) in exchange for a

subcontractor fee to be mutually determined by the parties. The parties shall mutually agree on the date by which such contracts will be assigned to Sterling. Upon such mutual agreement, the Company shall cause such contracts to be assigned to Sterling without any further action or expense required by Sterling. The Company shall assist Sterling in marketing its products and services to the customers under such contracts. Sterling and Company will enter into a mutual referral arrangement as part of the Agreement.

4. (a) It will be a condition to Sterling's obligation to close that (i) certain key employees to be designated by Sterling and (ii) the Company enter into a three year confidentiality and non-competition agreement.

(b) The Company will use its best efforts to retain through the Closing the twenty-two employees described on Exhibit B (i.e. those currently working in the relevant business area) and to transfer to Sterling at the Closing the employees designated by Sterling from that list. It will be a condition to Closing that each key employee designated by Sterling accepts employment with Sterling; provided that the employment terms offered by Sterling to a key employee shall be no less favorable as a whole than those enjoyed by the employee as of the date hereof. It will be a further condition to closing that only those employees designated by Sterling shall become employees of Sterling and that there is no transfer by operation of law or otherwise of any other employment agreements. Company shall indemnify and hold harmless Sterling from and against any costs whatsoever associated with the transfer (or deemed transfer) to Sterling of any employees of the Company not designated by Sterling. In the event that an employee not designated by Sterling requests to be transferred to Sterling, Sterling and the Company will work together to find a solution that is in the best interests of both parties.

(c) Sterling shall not actively solicit the Company's employees prior to Closing; provided however that if there is a likelihood that an employee will leave the Company prior to the Closing, Sterling may solicit that employee and shall so notify the Company.

5. In order to perform our due diligence review, we and our attorneys, accountants and other representatives will be afforded the opportunity to review all relevant books and records with the consent of the Company, not to be unreasonably withheld, to interview such customers, distributors and the employees described on Exhibit B as we and our representatives shall determine.

6. The parties will pay their own expenses incident to the transaction, including fees of investment bankers, attorneys and accountants.

7. The parties will proceed diligently with negotiations and the preparation of appropriate documentation, and the making of all government filings required in connection with the proposed acquisition with a view to reaching an agreement on all the material terms of the transaction within forty-five days. Barring unforeseen difficulties, this transaction should close no later than February 27, 1998.

8. From and after your execution of this letter, the Company will not, directly or indirectly, discuss, encourage or negotiate with or furnish information to any other person concerning the transaction envisaged herein unless (a) agreed to in advance in writing by Sterling or (b) we notify you in writing that we no longer intend to complete the acquisition or (c) the Closing has not occurred by February 27, 1998 or, if Sterling requests an extension of time within which to close and is diligently proceeding to close and satisfy any conditions to Closing in the Agreement or otherwise, April 15, 1998. Anything herein to the contrary notwithstanding, you shall have the absolute right to refuse Sterling's request for an extension of time beyond April 15, 1998.

9. Both parties intend to terminate the existing International Distribution Contract dated June 16, 1997 at Closing.

10. The proposed Agreement shall be subject to German law and jurisdiction of the courts at Dusseldorf.

This letter is an expression of intention only and does not constitute a binding obligation of either party (except for the provisions of paragraphs 6 and 8). Neither you nor we will be bound unless and until the board of directors of Sterling has approved the acquisition, and the Agreement has been executed by all parties following approval of their respective counsel of the form and substance of such Agreement. All payments among the parties contemplated hereunder shall be in Deutschemarks.

In the event that the Agreement is not executed by all parties on or before February 27, 1998 (or April 15, 1998, if Sterling shall have requested an extension pursuant to paragraph 8 hereof), any party shall have the right to terminate all discussions pursuant to this letter upon written notice to the other parties and, except with respect to paragraphs 6 and 8 (with respect to acts occurring prior to such notice), no party shall have any further liability to any other party upon receipt of such letter, including, without limitation, any liability to pay damages to the other party on the grounds that such other party relied on this Agreement to be executed.

If the foregoing correctly reflects your understanding of our agreement, please so indicate by signing and returning to us a copy of this letter. In order to proceed with the transaction contemplated by this letter, we must receive a copy of this letter signed by the Company not later than the close of business on Friday, December 19, 1997. We will be ready to commence due diligence and the drafting of the Agreement as soon as we have received your agreement.

We are delighted to have the opportunity to work toward the transaction described in this letter. We believe that the strategic fit of our companies will enhance the long-term prospects of both businesses and will enable us to provide even better service and support to our customers.

Sincerely,

STERLING COMMERCE, INC.

By: _____

Its: SENIOR VICE PRESIDENT

CONFIRMED AND AGREED TO
THIS 19th DAY OF December 1997

O.TEL.O COMMUNICATIONS GmbH & CO.

By: _____

Its: Managing Dir. Key Accounts

Exhibit A - Assets List, Customer List, Contracts List

The relevant assets associated with this business, specifically including:

Tiger Software for DOS and Unix
TeleTiger Software
All associated trademarks, patents, copyrights
The attached customer list (which is an approximation and will be replaced by a full list as early in the due diligence as possible)and all associated contracts, files, and information
The Panda support system and related data
Other relevant customer support data or systems
The computer equipment listed below and summarized on Exhibit C
Other related assets as the parties mutually agree

Kunden mit Pflegevertrag (2)

Kundenname	ORT	Service / Produkt
Gödecke AG	Freiburg	TIGER Voll MS-DOS
Hommel Hercules Werk GmbH & Co.KG	Viernheim	TIGER Runtime MS-DOS
Heinrich Kopp AG	Kahl	TIGER Runtime MS-DOS
Max Sebold GmbH	Aschaffenburg	TIGER Voll MS-DOS
Trilux-Lenze GmbH	Arnsberg	TIGER Voll MS-DOS
BayWa AG	München	TIGER Voll MS-DOS
Beck & Co.	Bremen	ELFE Anwendung
Beck & Co.	Bremen	SINFOS Workstation A
Beck & Co.	Bremen	TIGER Voll MS-DOS
Gebr. Berker GmbH & Co.	Schalksmühle	TIGER Voll MS-DOS
Black & Decker GmbH	Idstein	TIGER Voll MS-DOS
Braun Melsungen AG	Melsungen	ELFE Anwendung
Braun Melsungen AG	Melsungen	TIGER Runtime MS-DOS
Alexander Bürkle GmbH & Co KG	Freiburg	TIGER Voll MS-DOS
Büroring	Haan	TIGER Voll MS-DOS
C. Ed. Schulte GmbH	Velbert	TIGER Voll MS-DOS
Colgate Palmolive GmbH	Hamburg	SINFOS Workstation C
Dachser GmbH & Co.	Kempten	TIGER Voll MS-DOS
Dragoco	Holzminden	TIGER Voll MS-DOS
Duravit AG	Hornberg	TIGER Voll MS-DOS
Duscholux Sanitärprodukte GmbH	Schriesheim	TIGER Voll MS-DOS
Erdal Rex GmbH	Mainz	SINFOS Workstation C
Eukerdruck GmbH	Marburg	TIGER Voll MS-DOS
Fielmann AG	Hamburg	TIGER Voll MS-DOS
Franken Mineral- und Heilbrunnen-Betriebe	Neustadt (Aisch)	SINFOS Workstation A
Freytag & Petersen GmbH & Co.	Köln	TIGER Voll MS-DOS
Gervais Danone AG	München	SINFOS Workstation C
GEZE GmbH & Co. KG	Leonberg	TIGER Voll MS-DOS
Giersiepen GmbH & Co	Radevormwald	TIGER Voll MS-DOS
Glunz AG	Hamm	ODEX PC DOS
Glunz AG	Hamm	TIGER Voll MS-DOS
Gummiwerke Fulda	Fulda	ELFE Anwendung
Gummiwerke Fulda	Fulda	TIGER Runtime MS-DOS
Heinrich Hamker GmbH	Bad Essen	SINFOS Workstation C
Hansa Metallwerke AG	Stuttgart	TIGER Voll MS-DOS
Hapag-Lloyd AG	Hamburg	TIGER Runtime AIX
Hapag-Lloyd AG	Hamburg	TIGER Voll AIX
Hapag-Lloyd Asia	Singapore	TIGER Runtime AIX
Hapag-Lloyd Asia	Singapore	TIGER Voll AIX
Hessische Landeszentralbank Luxemburg	Luxembourg	TIGER Voll MS-DOS
HEWI GmbH	Arolsen	TIGER Voll MS-DOS
Häfele GmbH & Co	Nagold	TIGER Voll MS-DOS
Hüppe GmbH & Co.	Bad Zwischenahn	TIGER Voll MS-DOS
Keuco GmbH & Co.KG	Hemer	TIGER Voll MS-DOS
KSB AG	Frankenthal	TIGER Voll MS-DOS
Langnese Iglo GmbH	Hamburg	
Lever GmbH	Hamburg	SINFOS Workstation C
Lonza AG	Visp	TIGER Voll MS-DOS
Mannesmann Rexroth	Lohr	TIGER Voll MS-DOS
Mannesmannröhren Werke	Mülheim a.d. Ruhr	TIGER GUIDE NAS
Mannesmannröhren Werke	Mülheim a.d. Ruhr	TIGER GUIDE NAS
Mannesmann Datenverarbeitung GmbH	Ratingen	ODEX
Mannesmann Datenverarbeitung GmbH	Ratingen	TIGER GUIDE NAS
Mannesmann Datenverarbeitung GmbH	Ratingen	TIGER Runtime AIX
Massa AG	Alzey	ELFE Anwendung
Mauser Werke GmbH	Brühl	TIGER Voll MS-DOS
Messer Griesheim GmbH	Frankfurt	TIGER Voll MS-DOS
Messer Griesheim GmbH	Frankfurt	ELFE Anwendung
Motorola GmbH	Taunusstein	TIGER Voll MS-DOS
Münchener Rückversicherung	München	TIGER Transl. AIX
Münchener Rückversicherung	München	TIGER Voll GUIDE NES
Münchener Rückversicherung	München	TIGER Voll GUIDE NES
NEC	Düsseldorf	TIGER Voll MS-DOS

Kunden mit Pflegevertrag (2)

Kundenname	ORT	Service / Produkt
Odenwald-Konserven	Breuberg	SINFOS Workstation A
Oral B	Frankfurt	SINFOS Workstation A
Ploenzke AG	Kiedrich	ELFE Anwendung
Ploenzke AG	Kiedrich	TIGER Voll MS-DOS
VDV	Hamburg	TIGER Voll MS-DOS
Remy Deutschland	Wiesbaden	SINFOS Workstation C
Rohm Electronics GmbH	Willich	ODEX
Rohm Electronics GmbH	Willich	TIGER Voll HP UNIX
RWE-DEA AG	Hamburg	TIGER Runtime MS-DOS
RWE-DEA AG	Hamburg	TIGER Voll MS-DOS
Röhm GmbH	Darmstadt	TIGER Voll MS-DOS
SAP AG	Walldorf	TIGER Voll HP UNIX
Schenker & Co. AG	Wien	ISOCOR ISOPLEX MTA
Schenker & Co. AG	Wien	ISOTRADE
Schenker & Co. AG	Wien	TIGER Voll SCO UNIX
Schering AG	Berlin	TIGER Voll HP UNIX
Schering AG	Berlin	TIGER Voll HP UNIX
B.A.T. Cigarettenfabriken GmbH	Hamburg	SINFOS Workstation C
Conditorei Coppenrath & Wiese	Westerkappeln	SINFOS Workstation C
Lady Cake Kuchen GmbH	Duingen	SINFOS Workstation C
Procter & Gamble GmbH	Weiterstadt	SINFOS Workstation C
Quaker Latz GmbH	Euskirchen	SINFOS Workstation C
Raab Karcher Wärmetechnik GmbH	Bochum	TeleTIGER
Union Deutscher Lebensmittel	Hamburg	SINFOS Workstation C
Union Deutscher Lebensmittel	Hamburg	TIGER Voll MS-DOS
Union Deutscher Lebensmittel	Hamburg	TIGER Voll SCO UNIX
Austria Tabak GmbH	Unterschleißheim	SINFOS Workstation A
Datograph Apparatebau	Heilbronn	SINFOS Workstation C
Deinhard & Co	Koblenz	SINFOS Workstation A
Howaldtswerke Deutsche Werft AG	Kiel	TIGER Voll MS-DOS
Hensel KG	Lennestadt	TIGER Voll MS-DOS
Jade Cosmetic GmbH	Frankfurt	SINFOS Workstation A
Kärcher GmbH & Co.	Winnenden	TIGER Voll MS-DOS
Marten GmbH	Gütersloh	SINFOS Workstation A
Ostmann KG	Bielefeld	SINFOS Workstation C
Seidel GmbH & Co.	Marburg	TIGER Voll MS-DOS
Stinnes Organisationsberatung GmbH	Mülheim	TIGER Voll SCO UNIX
Stora Billerud	Düsseldorf	TIGER Voll MS-DOS
Tele Quarz GmbH	Neckarbischhofsheim	TIGER Voll MS-DOS
Westdeutsche Allgemeine Zeitung	Essen	ELFE Anwendung
Westdeutsche Allgemeine Zeitung	Essen	TIGER Runtime MS-DOS
Linhard GmbH	Viechtach	TIGER Voll MS-DOS
Woolworth F.W. Co.KG	Frankfurt	TIGER Voll MS-DOS
Woolworth F.W. Co.KG	Frankfurt	ELFE Anwendung
Woolworth F.W. Co.KG	Frankfurt	ELFE Aufrüstung
GAD	Münster	TIGER Voll MS-DOS
Hoesch Metall + Kunststoffwerk GmbH & Co	Kreuzau-Schneidhausen	TIGER Voll MS-DOS
Vaillant	Remscheid	ELFE Anwendung
Vaillant	Remscheid	TIGER Runtime MS-DOS
Vaillant	Remscheid	TIGER Voll UNIX
Veka AG	Sendenhorst	TIGER Voll MS-DOS
VLSI Technology GmbH	München	TIGER Voll MS-DOS
Zanders	Bergisch -Gladbach	TIGER Voll MS-DOS
Reyher Nachf.	Hamburg	TIGER Voll MS-DOS
Stocko Metallwarenfabrik	Wuppertal-Vohwinkel	TIGER Voll MS-DOS
Uni Elektro Handelsg	Eschborn	TIGER Runtime MS-DOS
Uni Elektro Handelsg	Eschborn	TIGER Voll MS-DOS
Schwartauer Werke GmbH & Co.	Bad Schwartau	TIGER Voll MS-DOS
Schwartauer Werke GmbH & Co.	Bad Schwartau	SINFOS Workstation A
Van Houten International GmbH & Co.KG	Norderstedt	SINFOS Workstation C
Verpoorten	Bonn	SINFOS Workstation A
WK-Deutschland GmbH	Essen	SINFOS Workstation A
Ehrmann AG	Oberschönegg	SINFOS Workstation C

Kunden mit Pflegevertrag (2)

Kundenname	ORT	Service / Produkt
Erasco GmbH OHG	Lübeck	SINFOS Workstation A
Bols Strothmann	Minden	SINFOS Workstation A
Dr. Demuth GmbH	Katlenburg-Lindau	SINFOS Workstation A
Mittelrhein Verlag GmbH	Koblenz	ELFE Anwendung
Siemens AG	München	TIGER Runtime SUN SO
Walter Linss Nachf. GmbH	Malsfeld	TIGER Voll MS-DOS
Hermann Kleinhuis GmbH	Lüdenscheid	TIGER Voll Sun Solar
EDEKA Handelsgesellschaft Minden-Hannover GmbH	Minden	SINFOS Workstation C
Beratung & Software GmbH	Nürnberg	TIGER Voll MS-DOS
setron Schiffer-Elektronik GmbH & Co.KG	Braunschweig	TIGER Voll MS-DOS
Levi Strauss Germany GmbH	Heusenstamm	TIGER Voll MS-DOS
R.J. Reynolds Tobacco GmbH	Köln	SINFOS Workstation A
Linde AG	Höllriegelskreuth	ODEX
Linde AG	Höllriegelskreuth	TIGER Voll AIX
Hans Feierabend GmbH	Einbeck	TIGER Voll MS-DOS
Risse	Neukirchen	TIGER Voll MS-DOS
Keller & Kalmbach Gm	München	ODEX PC DOS
Keller & Kalmbach Gm	München	TIGER Voll MS-DOS
SDS Stinnes Data Services GmbH	Mülheim	ELFE Anw. Multiuser
SDS Stinnes Data Services GmbH	Mülheim	ISOCOR ISOPLEX MTA
SDS Stinnes Data Services GmbH	Mülheim	TIGER Runtime SCO Un
SDS Stinnes Data Services GmbH	Mülheim	TIGER Voll SCO UNIX
Reckitt & Colman Deutschland AG	Hamburg	SINFOS Workstation C
AT&T Easylink	Rösrath	TIGER Voll MS-DOS
Gretsch Unitas Baubeschläge GmbH	Ditzingen	TIGER Voll MS-DOS
Siemens Components	Kista	TIGER Voll MS-DOS
Honeywell AG	Mosbach	TIGER Voll MS-DOS
Hutschenreuther AG	Selb	ISOCOR Access Unit ISOTRADE ODT 5.x
Hutschenreuther AG	Selb	ISOCOR ISOPLEX MTA ODT 5.x
Hutschenreuther AG	Selb	ISOCOR X.400 / MS-Mail Gateway
Hutschenreuther AG	Selb	LION MS-Mail AU (mapigate)
Hutschenreuther AG	Selb	SAP R/3 IDOC-Schnittstelle
Hutschenreuther AG	Selb	TIGER Runtime SCO Unix ODT 5.x
Hutschenreuther AG	Selb	TIGER Voll SCO ODT 5.x
Philips GmbH	Hamburg	TIGER Voll MS-DOS
Woeste & Co GmbH & C	Düsseldorf	TIGER Voll MS-DOS
Woeste & Co Yorkshir	Übach-Palenberg	TIGER Voll MS-DOS
Ihr Platz-Zentrale	Osnabrück	SINFOS Workstation C
H.F. & PH.F. Reemtsma GmbH & Co.	Hamburg	IDOC-TIGER Kopplung
H.F. & PH.F. Reemtsma GmbH & Co.	Hamburg	ISOCOR ISOPLEX MTA
H.F. & PH.F. Reemtsma GmbH & Co.	Hamburg	ISOTRADE
H.F. & PH.F. Reemtsma GmbH & Co.	Hamburg	TIGER Runtime SCO Un
H.F. & PH.F. Reemtsma GmbH & Co.	Hamburg	TIGER Voll SCO UNIX
VARTA Batterie AG	Ellwangen	TIGER Voll HP UNIX
Klöckner Möller GmbH	Bonn	TIGER Voll AIX
Cherry Microschalter GmbH	Auerbach	TIGER Voll MS-DOS
Wieland Werke AG	Ulm	TIGER Voll MS-DOS
Continental AG	Hannover	CPI-C Schnittstelle
Continental AG	Hannover	IDOC-TIGER Kopplung
Continental AG	Hannover	ISOCOR ISOPLEX MTA
Continental AG	Hannover	ODEX
Continental AG	Hannover	TIGER Voll UNIX
Schneider Electric GmbH	Ratingen	TIGER Runtime MS-DOS
Power Logistics	Fallingbostel	TIGER Voll UNIX
Quickpack GmbH	Renningen	TIGER Runtime MS-DOS
Dethleffsen GmbH&Co.	Flensburg	SINFOS Workstation C
Siemens Brüssel	Brüssel	TIGER Voll MS-DOS
E. Holtzmann & Cie. AG	Karlsruhe	TIGER Voll MS-DOS
Nadler Feinkost	Mannheim	SINFOS Workstation A
Raab Karcher Energieservice	Münster	TeleTIGER
Freudenberg Informatik KG	Weinheim	CPI-C Schnittstelle
Freudenberg Informatik KG	Weinheim	IDOC-TIGER Kopplung

Kunden mit Pflegevertrag (2)

Kundenname	ORT	Service / Produkt
Freudenberg Informatik KG	Weinheim	ISOCOR ISOPLEX MTA
Freudenberg Informatik KG	Weinheim	ODEX
Freudenberg Informatik KG	Weinheim	TIGER Voll AIX
Milupa	Friedrichsdorf	SINFOS Regalopt.
Milupa	Friedrichsdorf	SINFOS Workstation C
Herlitz AG	Berlin	TIGER Voll SCO UNIX
Erni Elektroapp.	Adelberg	TIGER Voll MS-DOS
BP Chemical Plastec	Rottenacker	TIGER Voll MS-DOS
Excentra GmbH	Fellbach	TIGER Runtime MS-DOS
G. Schneider & Söhne GmbH	Ettlingen	TeleTIGER
Maico Ventilatoren	Villingen-Schwenn.	TIGER GUIDE NAS
Saarpor Klaus Eckhardt GmbH	Neunkirchen	TIGER Voll MS-DOS
BEL ADLER Allgäu GmbH & Co. OHG	Wangen	SINFOS Workstation A
Blaue Quellen Mineral- und Heilbrunnen AG	Rhens	SINFOS Mandantenf.
Blaue Quellen Mineral- und Heilbrunnen AG	Rhens	SINFOS Workstation C
Dr. August Oetker Nahrungsmittel KG	Bielefeld	SINFOS Workstation C
MuK Logistik GmbH	Bremen	TIGER Voll MS-DOS
MuK Logistik GmbH	Bremen	TIGER Voll SINIX
W. Schlafhorst AG & Co.	Mönchengladbach	TIGER Voll AIX
Phenolchemie GmbH	Gladbeck	TIGER Voll MS-DOS
Güth & Wolf GmbH	Gütersloh	TIGER Voll MS-DOS
NOWEDA eG Apothekergenossenschaft	Essen	TIGER Voll MS-DOS
Roland Arzneimittel	Hamburg	TIGER Runtime MS-DOS
Roland Arzneimittel	Hamburg	SINFOS Fernwartung
Roland Arzneimittel	Hamburg	SINFOS Workstation C
Bahntrans AG	Duisburg	TIGER Voll MS-DOS
Hans Schwarzkopf GmbH	Hamburg	SINFOS Workstation C
Sebapharma GmbH & Co	Boppard	SINFOS Workstation A
RUF Lebensmittel GmbH & Co.	Quakenbrück	SINFOS Workstation C
MEDERER Süßwarenvertriebs GmbH	Fürth	SINFOS EASY
Verfa GmbH	Ulm	TIGER Runtime MS-DOS
Hakle-Werke Hans Klenk GmbH & Co.	Mainz	SINFOS Workstation A
Golden Lady Strümpfe Deutschland GmbH	Medebach	SINFOS Workstation C
V. Fraas AG & CO.	Helmbrechts / Wüstensell	TIGER Voll MS-DOS
Krauth medical KG	Hamburg	TIGER Voll MS-DOS
Brenntag Chemievertrieb GmbH	Berlin	TIGER Runtime MS-DOS
Disco Factoring Finanz GmbH	Düsseldorf	TIGER Voll MS-DOS
Raab Karcher Tankstellentechnik GmbH	Hamburg	TeleTIGER
VALENTIN KLEIN GMBH	Hannover	TIGER Voll MS-DOS
US Army Mannheim		ELFE Ultrix Anwend.
US Army Mannheim		TeleTIGER
Nordson		
Raab Karcher Holz GmbH	Essen	TeleTIGER
Massa AG	Alzey	TIGER Voll MS-DOS
Hansen & Gieraths EDV Vertriebsges. mbH	Bonn	TIGER Voll MS-DOS
Rewe & Co. OHG	Bad Homburg v.d. Höh	TIGER Voll MS-DOS
Systematics System Service GmbH		Tiger Voll unix
Seppelfricke Armaturen GmbH & Co.	Gelsenkirchen	TIGER Voll MS-DOS
BSB GmbH	Weinstadt	SINFOS Workstation D
COTY Deutschland GmbH	Mainz	SINFOS Workstation C
Deutsche SiSi-Werke GmbH & Co. Betriebs KG	Heidelberg	SINFOS Workstation A
EDS Informationstechnologie und Service (Deutschland) GmbH	Neustadt	TIGER Voll MS-DOS
Eduscho GmbH & Co.KG	Bremen	ELFE Anw. Multiuser
EKU AG	Kulmbach	SINFOS Workstation A
Fresenius AG	Bad Homburg	TIGER Voll MS-DOS
GE Finance Holding	Rüsselsheim	ELFE Anwendung
GE Finance Holding	Rüsselsheim	TIGER Runtime MS-DOS
Gustav Klauke	Remscheid	TIGER Voll MS-DOS
Heinrich Electronic	Essen	TIGER Voll MS-DOS
Heumann Pharma GmbH	Nürnberg	TIGER Runtime MS-DOS
Hoffmann's Stärkef.	Bad Salzuflen	SINFOS Workstation C
Krüger GmbH & Co.KG	Bergisch Gladbach	SINFOS Workstation A

Kunden mit Pflegevertrag (2)

Kundenname	ORT	Service / Produkt
R+V Versicherungen	Wiesbaden	TIGER Voll AIX
Raab Karcher Spedition GmbH	Gelsenkirchen	TeleTiGER
Rexroth AG Schweiz	Venissieux	TIGER Runtime MS-DOS
Rexroth Belgien	Ternat	TIGER Runtime MS-DOS
Rexroth England	Huntingdon	TIGER Runtime MS-DOS
Rexroth Frankreich	Venissieux	TIGER Runtime MS-DOS
Rexroth Österreich	Pasching	TIGER Runtime MS-DOS
Rexroth Spanien	Santa Perpetua	TIGER Runtime MS-DOS
Vereinigter Baubesch	Korntal	TIGER Voll MS-DOS
Lingner & Fischer Verlag	Bühl	SINFOS Workstation A
Alusingen GmbH	Singen	TIGER Voll MS-DOS
Boehringer Mannheim	Mannheim	TIGER Voll MS-DOS
Boehringer Mannheim	Mannheim	TIGER Voll MS-DOS
Carl Kühne KG	Hamburg	SINFOS Mandantenf.
Carl Kühne KG	Hamburg	SINFOS Workstation C
Convent Knabber GmbH	Köln	SINFOS Mandantenf.
Convent Knabber GmbH	Köln	SINFOS Workstation C
ELBA Bürosysteme	Wuppertal	TIGER Voll MS-DOS
Ferrero oHG mbH	Frankfurt	SINFOS Workstation C
Gies Kerzen GmbH	Glinde	SINFOS Workstation A
Gillette	Berlin	SINFOS Workstation C
Holsten Brauerei	Hamburg	SINFOS A Mandant
Käserei Champignon	Heising	SINFOS Workstation C
Schneekoppe GmbH	Mönchengladbach	SINFOS Workstation C
Schöller Lebensmittel	Nürnberg	SINFOS Workstation A
Stollwerck AG	Köln	SINFOS Workstation C
Zweckform Werk GmbH	Oberlaindern	TIGER Voll MS-DOS
SISI Werke		Sinfos

Exhibit B - Employee List

The relevant employees currently employed by Company:

Consultants	12
Presales	2
Sales	1
Support	3
System Integration	4

Exhibit C - Balance Sheet

ASSETS

Current Assets

Accounts Receivable Net	DM 600,000
Computer Equipment Net	DM 220,000
TOTAL ASSETS:	DM 820,000

LIABILITIES

Salary and Related Liabilities	DM 240,000
Software Maintenance and Support Obligations	DM 60,000
Net Adjustment	DM 520,000
TOTAL LIABILITIES:	DM 820,000
NTBV =	DM 520,000

Prepared as of November 30, 1997

Exhibit D - Certain Customers

The Company shall provide to Sterling a list for review on or before Jan 15, 1998. Such list shall contain no more than 70 customers.

STERLING
COMMERCE

MEMORANDUM

TO: Brad Sharp
CC: Clark Woodford
FR: Pat Davis
DT: Dec 22, 1997
RE: Attached Roger Letter of Intent

Notes on the attached December 19, 1997 Letter of Intent:

Section	Comments
1b	Both sides understand that the balance sheet of Exhibit C was prepared as best Roger could in the timeframe required, and both sides will work together to make sure that changes to the balance sheet at closing that adjust the purchase price reflect true changes and increased accuracy rather than different methods.
4b	We put the numbers of employees in here for legal protection under German law from being forced to take 31 people. Both us and Roger understand that we will be interviewing all 31 people during the due diligence and making offers to the 22 we want. Additionally, both us and Roger hope that we can actually find places for more than 22, once we meet them during due diligence. Roger views all 31 as good employees and will have good positions to offer them if we do not have room for them. Under German law, the employees have a free individual choice to stay with Roger or go with us.
4c	We agree not to solicit employees unless we think they are going to jump ship to another company, then we simply notify Roger and can solicit.
5	We agreed verbally not to start any due diligence employee interviews until after the work council meets Jan 8th. We did not put that in the written agreement so as not to give any power to the work council to control the due diligence process.
Exhibit A	The exact computer hardware assets list was not available; they will get it to us right after they return from Christmas break. We can pick and choose from among the computer hardware assets we want to take, and the purchase price is lowered accordingly.

STERLING COMMERCE

MEMORANDUM

Exhibit A	The customer list is approximate; they will get an accurate one to us right after they return from Christmas break. Related software assets like maps, comms scripts, etc. are included under the "relevant assets" and "related assets" language; the list will be more specific at closing.
Exhibit B	We can change the numbers and the categories before closing; this was specific for protection for us under German law.
Exhibit C	The computer equipment calculation was an estimate. If we choose less computer equipment, the price will go down.

Please feel free to call me with any questions.

Jim Roper
Valuation

2/10/98

Tom Bray

Bill Hodder

Tiger - product valuation, relatively straightforward

TeleTiger - Technology val.
Germany
Europe
US / Canada
other international

BV price

mktg / sales - Pat, Randy

SAP

1997 Results

SAP announced preliminary figures for 1997 on 27th January 1998: Sales grew by 62% to DM 6.02 billion ($3.36 billion), further strengthening SAP's leading position in enterprise software solutions.

Growth was fuelled by sustained underlying demand for enterprise-wide packaged application software, with fourth-quarter revenues increasing 63% to DM 2.20 billion ($1.23 billion). European monetary union and year 2000 issues have driven further sales.

Income before taxes rose 72% to DM 1.67 billion ($932 million), while costs grew 57% to DM 4.49 billion ($2.51 billion). Net profits for the year climbed 63% to DM 924 million ($516 million). Earnings per share increased 62% to DM 8.86 ($4.94) (1996:DM 5.48) per share on an increased number of shares outstanding (1997: 104.3 m, 1996:103.5 m).

The strength of the US dollar and other key currencies relative to the deutsche mark had a positive effect on SAP's results. Currency effect amounted to DM 423 million (11%) on revenue, DM 301 million (11%) on costs, and DM 117 million (12%) on pretax profits. As at Dec 31st 1997 US$1 = DM 1.7921

Sales of R/3 system climbed 63% to DM 3.87 billion, while total product revenues grew by 56% to DM 4.10 billion. R3 represents 94% of product revenues, and 64% of total revenue. Consulting revenues increased 70% to DM 1.25 billion; training revenues rose 90% to DM 580 million.

Sales by Continent	% increase	DM	$m
Europe (exc Germany)	59	1.37 bn	764
Germany	23	1.17 bn	653
Americas	91	2.57 bn	1430
Asia Pacific	66	807 m	450

Geographically, sales outside Germany represented 81% of total revenues (1996: 75%).

Sales by Category	
Product	2290
Consulting	698
Training	324
Other	50

Plans for 1998:

SAP shipped R/3 release 4.0 to the first pilot customers on schedule in December 1997, the new release will become generally available at the end of the second quarter of 1998.

The Executive board anticipates a 30 to 35% increase in sales in 1998, with pretax profits

growing at a similar rate. These figures are based on careful estimates of the impact of European monetary union and year 2000 issues on growth, and also reflect uncertainty about the repercussions of the Southeast Asian financial crisis.

The listing of SAP's ADRs on the New York Stock Exchange in the third quarter of 1998 is intended to broaden the existing shareholder base. SAP will publish its final results on March 25 1998.

Comments

An article in the Financial Times (the leading UK/Europe business newspaper) on Jan 28th suggested that SAP's growth could slow down abruptly in 1998 - and its shares fell after it cautioned that the Asian crisis could hit its growth. The FT article written by Graham Bowley said that SAP is now seeking to boost its international presence by listing its shares in the US. Businesses preparing their computers for the change-over to the single European currency and the problem of the millennium bomb gave an especially strong impulse to demand in 1997.

But Mr Plattner, of SAP said uncertainty about how long these special factors would influence demand as well as the Asian crisis meant SAP expected sales and profit growth to slow to between 30 and 35% this year. However, analysts said SAP was probably being too cautious about its prospects.

Personnel:

At the end of 1997 the company employed 12,860 people an increase of 40% from 1996. In the US alone, SAP created 900 new positions, for a total of 2,600 employees at the year end. In order to leverage long-term growth opportunities, SAP expects to increase its world-wide headcount by 5,000 in 1998. Per capita sales based on the average headcount for the year (11,558) rose to DM 521,000 ($290,720) (1996:DM 455,000)

Dietmar Hopp (co-founder & Co-chairman) and Dr h.c Klau Tschira announced on Feb 5th that they will tender their resignations from the Executive board at the AGM on May 7th, and wish to be selected to the supervisory board.

An article in the FT on Feb 6th said that shares fell almost 6% in late trading after the announcement that Dietmar Hopp was stepping down as joint chief executive in May. The common shares fell DM13.5 within minutes of the news to close electronic trading at DM616.5

Henning Kagermann will replace Mr Hopp as SAP's joint chief executive. The other joint head is Hasso Plattner, also a co-founder.

o tel o Due Diligence Information

o tel o due diligence contact list revised 1/16/98

Name	Organization	Phone Number	Fax Number	Email Address	Comment
Jochen Fürbeth	o tel o Neu-Isenberg	49-6102-701-100	49-6102-701-144	jochen.fuerbeth@o-tel-o.de	o tel o main contact
Christina Terhaar	o tel o Köln	49-211-5602-1023	49-211-5602-8222	christina.terhaar@hotmail.com	o tel o financial due diligence contact
Mr. Grünewald	o tel o Köln	49-221-808-4170	49-221-808-5171		o tel o HR due diligence contact
Mr. Poensgen	o tel o Düsseldorf	49-211-474-8143	49-211-474-8139		o tel o legal due diligence contact
Christoph Weber	o tel o Düsseldorf	49-211-5602-3210			o tel o support, mktg, sales due diligence
Rainer Stachels	Baker & McKenzie Frankfurt	49-6929-9080	49-6929-908108		agreement, legal due diligence
Hannes Meckel	Baker & McKenzie Frankfurt	49-6929-9080	49-6929-908108		legal due diligence
Carsten Hölscher	Hewitt Associates Wiesbaden	49-611-928-830	49-611-261-461	caholsch@hewitt.com	HR due diligence assistance
Rainard König	Ernst & Young Düsseldorf	49-211-93520		none	financial due diligence assistance
John O'Sullivan	Burton Grad London	44-1932-761471	44-1932-761471	106142.2113@compuserve.com	technical due diligence assistance
Burt Grad	Burton Grad	914-631-1129	914-631-1164	burtgrad@aol.com	valuation writeup
Gail Froelicher	ISG Paris	33-1-5393-1715	33-1-5393-1717	gail_froelicher@ig.stercomm.com	sales, support, mktg due diligence, integration
Phil Dean	ISG Paris	33-1-5393-1700	33-1-5393-1717	phil_dean@ig.stercomm.com	F&A, legal, HR due diligence
Ed Waser	ISG Columbus	614-793-7146	614-793-5000	ed_waser@stercomm.com	F&A, legal, HR due diligence
Cynthia Pieciano	ISG Columbus	614-793-7178	614-793-5000	cynthia_pieciano@stercomm.com	HR due diligence
Esther McDowell	ISG Columbus	614-793-5171	614-793-5000	esther_mcdowell@stercomm.com	consulting due diligence, integration
Pat Davis	ISG Ann Arbor	313-930-7821	313-930-7840	patrick_davis@stercomm.com	due diligence coord
Randy Harvey	ISG Columbus	614-793-7174	614-793-5000	randy_harvey@stercomm.com	technical due diligence, integration
Dennis Byrnes	SCI Columbus	614-791-5727	614-718-1510	dennis_byrnes@stercomm.com	agreement, legal due diligence
Karen Dover	SCI Columbus	614-793-7124	614-799-6310	karen_dover@stercomm.com	financial due diligence

49 172 91 48 750

0172 91 48 750 (in GERMANY)

313 702 9102 cell phone

o.tel.o Due Diligence Schedule revised 1/16/1998

Activity	Dates	Location	SCI Personnel	o.tel.o Personnel	Outside Personnel
Legal due diligence	begin 1/12	Baker&McKenzie Frankfurt	Ed Waser Phil Dean Dennis Byrnes	Mr. Poensgen	Hannes Meckel
Personnel Interviews	1/15-16	SCI offices, Düsseldorf	Gail Froelicher Esther McDowell Randy Harvey HR	prospective employees	none
Financial due diligence	begin 1/19	o.tel.o offices Köln Düsseldorf	Phil Dean Ed Waser Karen Dover	Christina Terhaar	Rainard König
HR due diligence	begin 1/6	Düsseldorf	Phil Dean Ed Waser Cynthia Picciano	Mr. Grünewald	Carsten Holscher
Support, sales, marketing due diligence	begin 1/14	o tel.o office, Dusseldorf	Gail Froelicher Phil Dean	Christoph Weber	none
Technical Due Diligence	1/26-27	o tel.o offices Dusseldorf 3rd party offices	none (guidance from Randy Harvey)	Christoph Weber	John O'Sullivan
Integration Plan Review (plans due to Pat Davis by 1/26)	1/27	Columbus	Brad Sharp ISG VP's	none	none
Purchased R&D valuation	1/28-30	Burton Grad	Randy Harvey	none	Burt Grad

Author: "Randy Harvey" <Randy_Harvey@ns.stercomm.com> at *INTERNET
Date: 1/20/98 1:55 PM
Priority: Normal
TO: "Burton Grad" <Burton_Grad@ns.stercomm.com> at *INTERNET
BCC: Burton Grad at Corporate
Subject: Details on o.tel.o trip
---------- Message Contents ----------

Burt,

Long time no see, hope things are going well.
Can you forward this to John, I must have a wrong E-Mail address as it came back not delivered

Thanks

Randy
---------- Forwarded by Randy Harvey/Dublin-ISG on 01/19/98 14:04 ----------

Randy Harvey
01/20/98 13:49

To: 101642.2113@compuserv.com
cc: Patrick Davis@Dublin-ISG
Subject: Details on o.tel.o trip

John,

Good talking with you. I called Pat Davis and he will be forwarding you details of where and when. After my meetings with the group I would like to add the following areas for your review:

1) Details on how they install and integrate the Tele-Tiger product. It is my understanding from talking to a Friedhelm Bar that this product actually sits within the SAP environment and provides additional support for rolling up totals for telecommunications bills. Is it written in ABAP, a little history on the consulting company that is developing the product.

2) How much customization is delivered with the Tiger product. A comment was made to me concerning how much do we customize each installation of GENTRAN, when I said we deliver commercial software as a product they wanted to know how we could do that. This usually means they are doing a lot of customization on their product, which they said they do.

3) Can you check into what their R/2 interface into the old SAP system is like and what release of R/2 it supports. We have only built an interface for R/3. Is the R/2 interface built using C-PIC?

4) They talked about an on-going project for a better monitoring system. Where are they at with this project and what exactly does it entail

Thanks

Randy

Subj: Technical Due Diligence
Date: 98-01-20 15:34:43 EST
From: Patrick_Davis@ns.stercomm.com (Patrick Davis)
To: 106142.2113@compuserve.com, Randy_Harvey_AT_Dublin-ISG4@isg-ccmta (Randy Harvey AT Dublin-ISG4)
CC: burtgrad@aol.com, jochen.fuerbeth@o-tel-o.de

TO: John O'Sullivan
cc: Randy Harvey, Burt Grad, Jochen Fuerbeth
FR: Pat Davis
DT: Jan 20, 1998

John--
Your contact for the due diligence details is Mr. Christoph Weber of the o.tel.o Dusseldorf office. His phone is 49-211-5601-3210. He will arrange your visit with the various programmers as well as the 3rd party outside firm
developing TeleTiger. The outside firm is located near Essen, which is accessible by car or train from Dusseldorf.
Christoph is at a Sterling Commerce event for most of this week, so you can also make arrangements through his backup contact: Jochen Fuerbeth at 49-6102-701-120.
The above contacts are on the players list I have emailed to you previously.

I understand you and Randy Harvey have updated the due diligence checklist. You can fax the updated list to Jochen or wherever he directs you after you speak with him.
Feel free to call me with any questions.
Thanks,
Pat Davis

---------- Headers ----------
Return-Path: <Patrick_Davis@ns.stercomm.com>
Received: from relay15.mail.aol.com (relay15.mail.aol.com [172.31.106.74]) by air26.mail.aol.com (v37.8) with SMTP; Tue, 20 Jan 1998 15:34:43 -0500
Received: from ns.stercomm.com (ns.stercomm.com [199.3.19.2])
by relay15.mail.aol.com (8.8.5/8.8.5/AOL-4.0.0)
with SMTP id PAA10380 for <burtgrad@aol.com>;
Tue, 20 Jan 1998 15:34:41 -0500 (EST)
Received: ns.stercomm.com
id AA14341; Tue, 20 Jan 1998 15:34:21 -0500
Received: by smtplink.isg.stercomm.com(Lotus SMTP MTA SMTP v4.6 (462.2 9-3-1997)) id 85256592.0070FF06 ; Tue, 20 Jan 1998 15:34:13 -0500
X-Lotus-Fromdomain: DUBLIN-ISG
Return-Receipt-To: Patrick_Davis@ns.stercomm.com
From: "Patrick Davis" <Patrick_Davis@ns.stercomm.com>
To: 106142.2113@compuserve.com,
"Randy Harvey AT Dublin-ISG4" <Randy_Harvey_AT_Dublin-ISG4@isg-ccmta>
Cc: burtgrad@aol.com, jochen.fuerbeth@o-tel-o.de
Message-Id: <85256592.0070F60C.00@stercomm.com>
Date: Tue, 20 Jan 1998 15:31:27 -0500
Subject: Technical Due Diligence
Mime-Version: 1.0

ABAP® Workbench

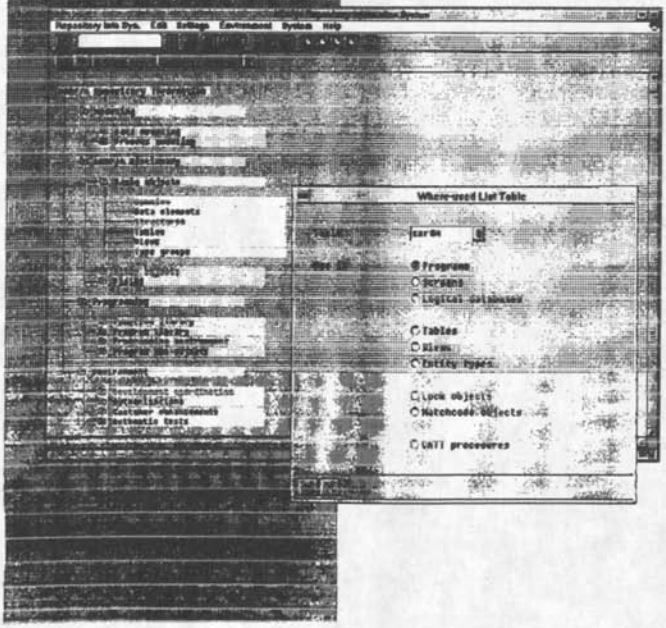
The Proven Path to Client/Server

Needs of Professional Software Development

At first glance, the range of programming tools currently available on the market seems to cover every need. However, those on the lookout for a client/server application programming environment face a tougher challenge than most. This type of software, which is used to support mission-critical business processes, can make or break a company's profitability. When the stakes are this high, a professional development environment is essential for programming and managing this kind of business software.

Flexible Architecture

SAP's response to this challenge is the ABAP Workbench, the tool used to develop the entire R/3 System. R/3, which has met with global acclaim, leverages the client/server structure to optimum effect.



Who is the Workbench designed for?

The ABAP Workbench can be used for modifying or individually enhancing standard R/3 applications. However, it is also of interest to companies looking to develop individual solutions separate from SAP standard software with an integrated, professional toolkit.

Experience

The R/3 client/server system is currently employed by over 4,500 customers in a variety range of projects. The applications, programmed by our customers with the ABAP Workbench, cover the complete spectrum of business processes and are daily used throughout the world.

Quotation from the German broadcasting company *Westdeutscher Rundfunk*. "The ABAP Workbench boosts the productivity and the economic viability of our development work."

Professional Fourth-Generation Language

SAP's development tool is based on the business-oriented language, ABAP. The strengths of this fourth-generation language are derived from its high performance and flexibility. Its prototyping functionality offers maximum programming support.

Powerful, Integrated Tools

The ABAP Workbench contains a multitude of powerful, integrated development tools that provide support throughout the development process:

SAP®

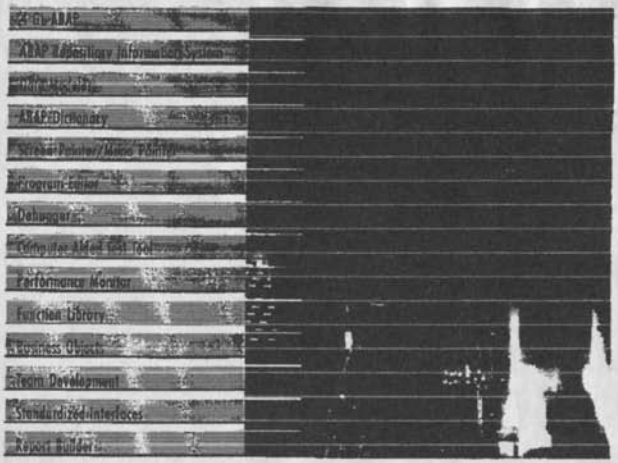
- **Transparent:** Data models are created in graphical form. Large data models can be managed especially easily.
- **Consistent:** The active ABAP Dictionary is the developer's central point of reference. The ABAP Dictionary and the development tools are seamlessly integrated.
- **Comfortable:** The ABAP Workbench contains a host of graphical elements for quickly and easily designing attractive screens and menu bars state-of-the-art.
- **Rapid development programming:** The editor helps developers make light work of their programming, with such functionality as automatic syntax correction and auto-matic insertion of prepropared program templates for all basic commands.
- **High quality:** Developers can easily check the quality of their software with the powerful testing tools.
- **Workflow included:** The SAP Business Workflow® package, designed to help you optimize your business processes, is an integral part of the ABAP Workbench.

Reusable Function Modules

The ABAP Workbench contains an extensive library of reusable function modules. These modules represent functions for various business needs, e.g. factory calendars, currency conversion, and graphics. Programmers can write ready-to-run software just by using these modules alone.

Easy Object Managing

All development objects are easily managed in the ABAP Repository. For information such as a where-used list for all objects, developers can consult the ABAP Repository Information System, which delivers real-time data from across R/3, thus ensuring transparency of all software components.



Optimizing Performance

The performance of company-wide business software is crucial. Professional developers are not therefore just responsible for the application logic, but are also concerned with system performance optimization.

- Tools allow a detailed analysis of the database interface
- Graphical reports show the resources used by individual commands and operations.

Developing as a Team

Client/server development projects are usually handled by teams of developers. SAP provides support throughout the entire development process, from project organization through implementation. The ABAP Workbench ensures that all the development work is carried out properly, easily, and error free. Changes to objects are precisely documented and registered. Version management also lets you track and compare changes, and reactivate previous versions.

Open Communication

The SAP technology infrastructure enables easy communication with other systems. Especially Remote Function Call and OLE ensure smooth program-to-program communication.

Easy to Learn, Easy to Use

Using the ABAP Workbench is child's play. With structured training plans and a detailed online help function, you can be working productively with the tool in no time at all, exploiting all the advantages offered by the user-friendly tools, intuitive GUI, and extensive navigation capability.

Entirely Platform-independent

The ABAP Workbench supports all high-end operating systems, databases, and front ends, ensuring that your investments are protected. Applications developed on one platform run effortlessly on others – meaning that if your company wants to change its hardware, it can.

Please do not hesitate to get in touch with us if you would like any further information.

SAP Headquarters: SAP AG • P.O. Box 1461 • 69185 Walldorf • Germany • Tel.: +49.180.5343424 • Fax: +49.180.5343420
SAP International: Argentina: Buenos Aires • Australia: Sydney, Melbourne, Brisbane, Adelaide • Austria: Vienna, Linz, Salzburg • Belgium: Brussels • Brazil: Sao Paulo
Canada: Toronto, Calgary, Montreal, Ottawa, Vancouver • China: Beijing • Czech Republic: Prague • Denmark: Copenhagen • France: Paris • Hong Kong • Greece: Athens • Hungary: Budapest • Israel: Tel Aviv
Italy: Milan • Japan: Tokyo • Korea: Seoul • Malaysia: Kuala Lumpur • Mexico: Mexico City • The Netherlands: Hoofddorp • New Zealand: Auckland, Wellington • Norway: Hovik • Philippines: Makati City
Poland: Warsaw • Portugal: Lisbon • Russia: Moscow • Saudi Arabia: Jeddah • Singapore • Slovakia: Bratislava • South Africa: Bonheid West, Cape Town, Durban • Spain/Portugal: Madrid, Barcelona, Lisbon • Sweden: Stockholm
Switzerland: Biel, Lausanne • Thailand: Bangkok • Turkey: Istanbul • U.K.: Middlesex • United Arab Emirates: Dubai • USA: Wayne, PA; Philadelphia, PA; Boston, MA; Foster City, CA; Denver, CO;

50 010 218 (9709/11)

Chapter 14

Distributed Applications, EDI, the IDoc and Workflow

EDI Messages and Workflow Management

EDI (Electronic Data Interchange) is the electronic exchange of structured data between different applications (for example, SAP applications and external systems). Consequently, it is the appropriate technology for processes across applications.

Classic examples for using EDI are customer-supplier relationships (purchase orders/orders and invoices) as well as "supply chain management." Supply chain management is the request for and supply of goods and services along the entire value-added chain.

Fig. 14-1: SAP-EDI Interface and Services

SAP's EDI architecture is built on three pillars:

- EDI-capable applications
- EDI interface
- EDI subsystem (converter)

Since Release 2.1, SAP Intermediate Document (IDoc) has been the standard interface for data exchange through EDI. The transformation of application-related data (offer, purchase order) into Idols is the central task of the EDI interface. Outgoing documents are transferred as Idols to the EDI subsystem. The EDI subsystem converts the IDoc into an EDI message defined by the partner profile and controls transmission to the addressee. EDI converters are offered by a number of different suppliers.

To ensure that these products are compatible with IDoc, SAP conducts a certification process for EDI converters using cooperation agreements.

SAP Business Workflow is extremely important regarding EDI, particularly to incoming IDoc processing. Combining the two concepts offers long-range advantages for structuring business processes across companies:

- The use of EDI provides a high measure of automation in the transfer of business data. To use this benefit internally, SAP Business Workflow offers a suitable solution by largely automating and substantially accelerating the subsequent steps.
- Handling and detecting exception and error conditions in incoming Idols is substantially facilitated by automatic start-of-workflow tasks for post-processing.
- Additional company-specific requirements are easily implemented through workflow constructs (for example, checking before and after processing).

The R/3 IDoc

The use of the EDI interface is not limited to the classic application cases listed above. SAP also uses the IDoc structure to provide a unique interface for data exchange with desktop applications such as MS Excel and MS Access.

Other examples range from linking various electronic-form systems to integrating the World Wide Web (WWW) with integrated business processes. SAP even uses the IDoc interface to provide information through the WWW. This facilitates receiving and processing orders converted to HTML forms. This type of scenario is particularly useful and practical for non-critical goods (informational material, catalogs, samples) destined for a large, anonymous target group.

Workflow Support for Distributed Applications (ALE)

The ALE concept (Application Link Enabling), which is available with R/3 Release 3.0, supports installation and operation of distributed applications. It comprises an administratively controlled message exchange with consistent data holding in loosely linked SAP applications. Applications are not integrated through a central database but through synchronous (request) and asynchronous (data exchange through IDoc) communication.

Therefore, ALE is SAP's answer to the ever stronger development of internal customer-supplier relationships due to the increasing independence of individual business areas.

With ALE, workflow ensures flexible processing of outgoing and particularly incoming data. Successful transfer of an IDoc to a system is followed by input processing on the ALE level which includes these steps:

- version management
- segment filtering
- field conversion
- transfer to the application
- posting in the database

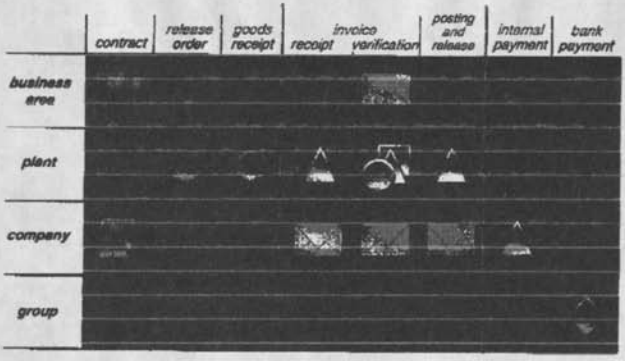


Fig. 14-2: ALE and Workflow

For the last two steps, transfer and posting, the following scenarios are provided:

- Direct call-up of a function module from the application to post the IDoc. In error situations, a workflow to initiate manual post-processing is automatically called up.
- Posting of the IDoc requires a sequence of several individual steps. A workflow task (multi-step task) is started to coordinate and control the individual activities.
- The IDoc is posted in a single step. The workflow started for this purpose is a single-step task.

Consequently, SAP Business Workflow and ALE complement each other in the support of distributed scenarios. While ALE establishes the business context of distributed applications and organizes the transfer of the corresponding object contents, Workflow has the task of continuing this flexibility within a system and ensuring detailed exception processing.

STERLING COMMERCE

news

Roger

FOR IMMEDIATE RELEASE

May 1, 1998

[Q & A About the Acquisition]

Sterling Commerce Completes Acquisition of o.tel.o Communications' EDI Business Unit in Germany

COLUMBUS, OH -- May 1, 1998 -- Sterling Commerce, Inc. (NYSE:SE), today announced the completion of its acquisition of the electronic data interchange (EDI) software and services unit of o.tel.o Communications GmbH & Co., of Duesseldorf, Germany. Effective immediately, Sterling Commerce will begin servicing o.tel.o's 440 German customers, providing EDI, electronic commerce (EC) and Web commerce solutions and consulting services.

Effective today, 23 o.tel.o employees become Sterling Commerce employees in Germany. Sterling Commerce now has over 70 employees and more than 800 customers in Germany giving it a leading market position in the EC, EDI and Web commerce software and services market.

"The acquisition of o.tel.o's EDI software and services unit continues Sterling Commerce's strategic plan to expand its global presence and more effectively service our customers globally," said Warner Blow, president and CEO of Sterling Commerce. "We've also gained a valuable asset in our employee base and we look forward to continuing to provide best-in-class EC, EDI and Web commerce solutions."

The expanded partnership will provide German-based customers with integrated EC and telecommunications solutions through Sterling Commerce's portfolio of enterprise EC solutions and o.tel.o's telecommunications offerings.

"The partnership with Sterling Commerce, a worldwide leading provider of electronic commerce applications, allows us to offer seamless EC and telecommunications solutions to our customers," said Helmut Huber, head of o.tel.o's key account division.

About o.tel.o

o.tel.o is the telecommunication company of RWE and VEBA. The company's aim is to become the leading challenger of Deutsche Telekom. Already today, o.tel.o has over 3 million customers in the areas of cellular phones, Miniruf, cable-TV and Internet services with over 800 key accounts. The company aims to have revenues of around 9 billion DM by the year 2005 (excluding E-plus). This represents, depending on the market sector, a market share of 12 to 17 percent. To reach this objective, o.tel.o will invest 7 billion DM (including E-Plus) and will create 10,000 new jobs in the coming years.

About Sterling Commerce

Sterling Commerce is a leading, global provider of business-to-business electronic commerce software and value-added services. The company is ranked eighth on Forbes magazine's list of the Best-Performing Small Companies in America. Also, The Red Herring, a magazine, which covers the business of technology, named Sterling Commerce as one of the five Best Long-Term Potential technology companies.

Sterling Commerce has been providing electronic commerce solutions for over 20 years, and has 36 office locations and more than 40 distributors worldwide. Sterling Commerce has over 37,000 customers and 1,700 employees worldwide, and 1997 revenues of over $350 million. For more information, visit the Sterling Commerce Web site at www.sterlingcommerce.com.

This news release contains certain forward-looking statements concerning Sterling Commerce that reflect the current views and expectations of Sterling Commerce with respect to future events. It also contains forward-looking statements concerning o.tel.o that reflect the current views and expectations of o.tel.o with respect to future events. Such statements are subject to certain risks, uncertainties and assumptions. Actual results and events may vary significantly.

STERLING COMMERCE

news

| Press Release |

Questions and Answers

Sterling Commerce Completes Acquisition of o.tel.o Communications' EDI Business Unit in Germany

1. Who is Sterling Commerce?

Sterling Commerce is a leading, global provider of business-to-business electronic commerce software and value-added services. The company is ranked eighth on *Forbes* magazine's list of the Best-Performing Small Companies in America. Also, *The Red Herring*, a magazine which covers the business of technology, named Sterling Commerce as one of the five Best Long-Term Potential technology companies. Sterling Commerce has been providing electronic commerce solutions for over 20 years, and has 36 office locations and more than 40 distributors worldwide. Sterling Commerce has over 37,000 customers and 1,700 employees worldwide, and 1997 revenues of over $350 million. For more information, visit the Sterling Commerce Web site at www.sterlingcommerce.com

2. Who is o.tel.o?

o.tel.o is a division of the large German telecommunications company of RWE and VEBA. The company's aim is to become the leading challenger of Deutsche Telekom. Already today, o.tel.o has customers in the areas of cellular phones, pagers, cable-TV and Internet services with over 800 key accounts. The company aims to have revenues of around 9 billion DM by the year 2005 (excluding E-plus mobile services). This represents ¾ depending on the market sector ¾ a market share of 12 to 17 percent. To reach this objective, o.tel.o will invest 7 billion DM (including E-Plus) and will create 10,000 new jobs in the coming years.

3. What part of o.tel.o's business and product line did Sterling Commerce acquire?

Sterling Commerce will acquire the sales, support, services and development employees from o.tel.o's DOS and UNIX EDI software business unit. o.tel.o and Sterling Commerce have had a business relationship since September 1996 and in June 1997, o.tel.o began reselling the GENTRAN:Server product. o.tel.o recently decided to focus on their core telecommunications business and sell their EDI software business unit to Sterling Commerce.

4. When is the acquisition effective?

The acquisition is effective May 1, 1998. The integration of the two companies and the products will continue over the next few months.

5. How will Sterling Commerce benefit from the acquisition?

This acquisition has many benefits for Sterling Commerce. To begin with, it strengthens Sterling Commerce in the German and European marketplace. Sterling Commerce will acquire certain assets of o.tel.o's business and begin servicing approximately 440 German customers, providing EDI, EC and Web commerce solutions and consulting services. In addition, these customers will have access to Sterling Commerce's portfolio of enterprise EC solutions to complement their current EDI products.

Of course, the most valuable assets for Sterling Commerce are the employees gained from the o.tel.o business unit. A total of 23 o.tel.o employees will join the GENTRAN team in Düsseldorf from development, services, sales and

support areas.

6. What advantages does the acquisition offer o.tel.o?

o.tel.o is very competitive in the German telecommunications market. This acquisition allows o.tel.o to dedicate its resources on their core voice/data telecommunications business. Meanwhile, Sterling Commerce will continue to provide o.tel.o's EDI customers with strong EDI/EC solutions.

7. What is the location of the German office?

Sterling Commerce GmbH
Uerdinger Strasse 90
40474 Düsseldorf Germany
Tel: +49-211-43848-0
Fax: +49-211-43848-111

(Post Office Box address)
Postfach 10 48 27
40039 Düsseldorf Germany

Subj: Roger
Date: 98-01-16 13:20:19 EST
From: 101642.2113@compuserve.com (John O'Sullivan)
Sender: 101642.2113@compuserve.com (John O'Sullivan)
To: burtgrad@aol.com (Burton Grad)

Burt,

1. Your fax recd today, thank you. This is helpful as it helps me to understand the overall strategy, eg integration with Sterling Germany.

A few points:

- There is a reference to a help desk. I should check that out. Perhaps see it. What tools do they use ? Any logs of call completion rates, queues, etc

-There is a reference to a pricelist. I assume someone else is checking whether this is actually used, or do they give discounts.

-The Alliances. How formal ? Is there a contractual document and what does it cover ? Does it survive change of ownership ?

-Incidentally, I have been told that formal SAP accredidation is hard to get, and SAP check rigourously before so awarding. We should whether they have this formal recognition.

-The paper refers extensively to the staffing matters, and integration with SC Germany. Someone else dealing ?

-Roger claims that the customer base is "largely happy". Should we attempt any independent valuation of that ?

-Why did Roger acquire from Lion, and why are they now disposing ?

-The last slide refers to integration with X400 and (European) EDI. Somebody should als worry about Internet integration. There is a trend for Internet e-commerce to replace formal EDI, especially at the lower PC end, which is the bulk of their customer base.

2. I have had a call from LON BAUGH, Director of Taxation at Sterling Corporate. They wish to split the purchase between Sterling BV in Holland and Sterling GmbH in Germany. He has asked if I could also assist with the allocation of the consideration between the two elements, without detracting from my prime task of Technical DD. I think I could do that (I am a Chartered Management Accountant here in the UK). I think the additional work could probably be done back here in UK.

3. No direct contact with Randy yet. I am awaiting him to return my call.

4. Still tracking a suitable programmer. In fact, I have three separate trails on the go, but proving elusive as yet,. Will keep on this rest of today, and over weekend if necessary.

5. Your hand-written note mentions "one page (assetts)". Did you send that ? Cant see it.

6. Availability for discussion, in UK times:

Lou Baugh

1/14/98

- Wolfgang Rohs – financial partner

want Teletiger high revenue for tech value
want BV to pay for it, but

want low value on BV – ?

Phil Dean (ISG) Intl – SCI contact

closing ~ (3/1) Report + tax value due 2/15

✓
ACS -- send final
Comfirst -- " " – Alexander 8/4
– Blaine 8/4
– ~~Baugh~~ 8/5 – ~~Intl~~

ACS Val report – new cover letter
Report + Appendices
Tax ACS – 8/8/98 (ltr to Baugh)
<ltr + Appendices>
8/4 – Baugh Intl

✓
8/7 ACS valuation Report – Blaine
8/8 ACS ~~Tax~~ Intl ltr letter – Baugh

8/4 CF Val Report – to Blaine? to Alexander?
8/5 CF Intl letter – Baugh

Complete
Cover note to Baugh – Copies of final reports
+ list of what's attached

Subj: Project Roger
Date: 98-03-24 06:43:45 EST
From: 101642.2113@compuserve.com (John O'Sullivan)
Sender: 101642.2113@compuserve.com (John O'Sullivan)
To: burtgrad@aol.com (Burton Grad)

Burt,

Firstly, thank you for remittance received a few days ago. Most welcome.

What progress on the acquisition ? Still going on ? I had a telephone message a couple of days ago from Astrid Lamberts, the TeleTiger lady, but I have not responded. They are all busy this week at CeBit, the major German trade show.

Hope we can speak this week, but I am out and about a good bit.

JOHN

———— Headers ————
Return-Path: <101642.2113@compuserve.com>
Received: from relay19.mx.aol.com (relay19.mail.aol.com [172.31.106.65]) by air09.mail.aol.com (v40.16) with SMTP; Tue, 24 Mar 1998 06:43:45 -0500
Received: from dub-img-8.compuserve.com (dub-img-8.compuserve.com [149.174.206.138])
by relay19.mx.aol.com (8.8.5/8.8.5/AOL-4.0.0)
with ESMTP id GAA15760 for <burtgrad@aol.com>;
Tue, 24 Mar 1998 06:43:44 -0500 (EST)
Received: (from mailgate@localhost)
by dub-img-8.compuserve.com (8.8.6/8.8.6/2.10) id GAA11406
for burtgrad@aol.com; Tue, 24 Mar 1998 06:43:43 -0500 (EST)
Date: Tue, 24 Mar 1998 06:42:10 -0500
From: "John O'Sullivan" <101642.2113@compuserve.com>
Subject: Project Roger
Sender: "John O'Sullivan" <101642.2113@compuserve.com>
To: Burton Grad <burtgrad@aol.com>
Message-ID: <199803240643_MC2-37C4-9EF5@compuserve.com>
MIME-Version: 1.0
Content-Transfer-Encoding: 7bit
Content-Type: text/plain; charset=us-ascii
Content-Disposition: inline

FAX TRANSMISSION
BURTON GRAD ASSOCIATES, INC.
235 Martling Avenue, Tarrytown, New York 10591
(914) 631-1129 Fax: (914) 631-1164

Date: March 13, 1998 No. Pages including cover page: 1

To: John O'Sullivan

From: Burt Grad

Subject: Roger Valuation

John, I haven't forgotten about you. I did not have the data I needed, but I do have it now, so I will be in touch with you on Monday, March 16.

BURTON GRAD ASSOCIATES, INC.
235 MARTLING AVENUE
TARRYTOWN, NEW YORK 10591
(914) 631-1129 FAX: (914) 631-1164
CC:MAIL BURTON GRAD@CORPORATE

Date: February 27, 1998

To: Ed Waser

Copy: Randy Harvey

From: Burton Grad

Subject: Roger Financials

Can you or Phil Dean fill out the attached spread sheet giving me 1997 calendar year data for Roger assets being acquired? I'd prefer the values in US$, but will do the conversions for DM if you give me the conversion rate.

3754

Historic Data Needed -- 1997

(000)	Tiger DOS	Tiger UNIX	Comm. Util.	Tele Tiger	Other	Total
Revenues for 1997 (DM or US$)						
Hardware Sales						
Hardware Maint.						
Software License						
SW Maint. & Svcs						
Consulting Svcs.						
Total Revenues						
Costs for 1997						
COGS						
Hardware Sales						
Hdwe Maint.						
SW License						
SW Maint.						
Consulting						
Total COGS						
Operations						
Sales/Mktg						
Dev. in-house						
Dev. 3rd pty						
Support/Maint. in-house						
Support/Maint. 3rd party						
Cons. Svcs.						
G&A						
Total Operations Costs						
Total Expenses						
Operating Income						

3754

BURTON GRAD ASSOCIATES, INC.
235 MARTLING AVENUE
TARRYTOWN, NEW YORK 10591
(914) 631-1129
(914) 631-1164 FAX

January 21, 1998

Mr. John Blaine
Sterling Commerce, Inc.
4600 Lakehurst Court
Dublin, Ohio 43016

Dear John:

At your request, Burton Grad Associates, Inc. (BGAI) would be pleased to perform a valuation of the intangible assets obtained by Sterling Commerce, Inc. (SCI) in its acquisition of certain assets from "Roger" (code name), a Germany.-based communications company.

The Roger assets consist of software and technologies related to use of EDI, specifically in Germany.

The technologies incorporated in the existing Roger products and other technologies under development by Roger will be of significant value to SCI/ISG in its future software plans for European markets. The technologies will apply to various countries in addition to Germany.

BGAI has been requested to determine the value of the products and technologies acquired by SCI/ISG from Roger. These assets may then be capitalized or written off as of the acquisition date according to appropriate FASB and other accounting rules.

SCI wishes to retain BGAI because of its extensive experience over the last 17 years in valuing software companies and their assets. BGAI will perform this independent valuation, using generally accepted valuation techniques. These valuations may be used by SCI to support financial (book) capitalization/amortization and in-process technology write-offs.

In addition, BGAI will determine the fair market price for the international marketing rights to the Roger products and technologies.

Work Plan

BGAI will perform this valuation study following these steps:

1. SCI/ISG will collect materials related to Roger and SCI/ISG as specified by BGAI which will provide the basis for the valuation study. An initial list of materials requested is shown in Attachment A.

2. BGAI will examine these materials and conduct telephone interviews with selected SCI/ISG and Roger executives to obtain information not available from the source materials or to amplify or clarify these materials.

3. BGAI will use selected valuation methodologies (principally net present value of projected cash flow; possibly actual or reconstruction costs of technologies, etc.) and analyze materials and interview notes so as to construct the valuation models needed.

4. For these models, key valuation factors will be determined including customer revenues, operating costs, maintenance renewal rates, NPV factors, projected tax rates, etc. Using these factors, the recommended product and technology values will be determined.

5. A valuation report will first be delivered in draft form to ensure that all information is accurate and complete and that the logic and calculations used are clear. Then the final report will be prepared and submitted, including appropriate appendices.

6. A separate report will be prepared to describe the process used and results determined for the fair market value of the international marketing rights for the acquired Roger assets.

Staffing

The principal valuation work will be performed by Burton Grad. John O'Sullivan, a BGAI Associate, may assist in the technology and market assessment activities. No other BGAI Associates will be used without prior approval by SCI/ISG including approval of assignments and rates. Grad's professional profile is enclosed as Attachment B-1. O'Sullivan's profile is Attachment B-2.

SCI/ISG and Roger will assign liaison people to work with BGAI to provide financial, market, organizational and technical information as required.

Schedule

SCI/ISG and BGAI will agree on a specific time schedule for the valuation study. It is BGAI's current intent to complete the valuation by February 15, 1998. Meeting this schedule will depend

upon timely availability of the source information and prompt interview responses by SCI/ISG and Roger personnel.

Confidentiality

BGAI will treat all information received and developed as confidential to SCI/ISG and not disclose this information to any third party without prior written authorization from SCI/ISG.

Costs and Payments

The SCI/ISG valuation project will be performed on a time and expense basis. Burton Grad's consulting rate for this work is $2,500 per day. John O'Sullivan's rate is $1,500 per day. From the information currently available to BGAI, it would appear that the project will require approximately 5-7 days of consulting services, assuming that no on-site meetings are required and that there are no substantive changes in the scope of the project. The total fees are estimated at $15,000. SCI/ISG will be informed in advance if the projected costs may exceed this estimate.

Authorized expenses including travel, telephone, facsimile and express delivery charges will be invoiced at cost. These will be minimal (under $500) since there are no on-site meetings planned.

On completion of the study, the total fees plus expenses will be invoiced and are payable within fifteen days of receipt.

If the above project description is satisfactory, please sign below and return a signed copy to BGAI.

Sincerely,

Burton Grad

Burton Grad
President

Enclosures
BG:3700

cc: Lon Baugh
Dennis Byrnes
Ed Waser

Accepted for: Sterling Commerce, Inc.

by _____
signature

_____
title

_____
date

Information Required for Product and Technologies Valuation

1. List of principal Roger customers for preceding three years and the revenues from each of these accounts for each year
2. Analysis of Roger installed base including installation dates, maintenance status, platforms
3. Financial statements for Roger and SCI/ISG for the preceding three years
4. Effective SCI/ISG tax rate (federal and state) for budget purposes as of the acquisition date
5. Cost of money for SCI/ISG as of acquisition date
6. Organization chart for Roger, with number of employees by function
7. Marketing materials for Roger offerings and services
8. List, description, size and market share of principal competitors to Roger and SCI/ISG
9. SCI/ISG acquisition analysis materials for Roger
10. SCI/ISG business and strategic plans for Roger products and technologies including planned products, types of services, pricing, development projects, etc.
11. SCI/ISG sales, marketing and support plan for acquired Roger products and customers
12. Technical analysis of Roger and relevant SCI/ISG products and in-process development activities in terms of applications, industries and system functionality
13. SCI/ISG technical plans for utilizing and incorporating acquired Roger technologies in future or in enhanced SCI/ISG products and services

JOHN O'SULLIVAN BSc FBCS CEng FCMA

Thames Communications

+44 (0)1932 761471 Tel/Fax
+44 (0)850 706246 Mobile
101642.2113@compuserve.com
johnosullivan@msn.com

119 The Avenue
Sunbury on Thames
Middlesex TW16 5EQ
UNITED KINGDOM

John O'Sullivan is Managing Director of Thames Communications, an independent London based consultancy in Telecommunications and Information Systems strategy and business development. Thames Communications is particularly focused on assisting Telecoms and IT companies to develop their European and global business strategies.

Formerly, he was Director Information Technology at BT, responsible for IS strategy, policies and plans, relating the exploitation of IT to achieve business benefits. He was then seconded to the UK Department of Trade and Industry as Industrial Advisor Telecoms, with particular responsibility for developing and promoting UK strengths in telecoms software.

Before that, he spent over 20 years in Information Systems at British Aerospace, with other responsibilities for Facilities, Business Planning and Human Resources, becoming Personnel and Resources Director at BAe Military Aircraft Ltd.

John is a Council Member of the IT Industry Training Organisation, an Advisory Director of the European Software Institute (in Bilbao), Chairman of the Real Time Club, and a member of PITCOM (Parliamentary IT Committee). Previously, he was Chairman of STARTS (UK industry programme for software process improvement), Vice-Chairman of ETIS (European Telcos IS association), and Council Member of EURIM (a Parliamentary briefing group for European IS matters).

Recent projects have included:

- Informix Software - Business development strategy for European/Global telecoms, and Segment Manager for Data Warehousing in Telecoms
- Opta Consulting - Business Development in Europe
- BT - Entering a new business area
- Thames Valley University - IT strategy, Managing ITT, selection and contracting, Bus devel.
- LondonLink - Project Director of a CBI initiative to create an advanced communications service, involving a major ITT
- ITITO - Study for D/EE into UK infrastructure for IS skills, and creation of *Alliance for Information Systems Skills*
- DTI - Led a £1bn telecoms development project in central China
- Legal & Trade - Interim IT Director, fixing serious supplier and organisation issues

JOHN O'SULLIVAN BSc FBCS CEng FCMA

119 The Avenue Sunbury on Thames **Middlesex TW16 5EQ**
Tel/Fax 01932 761471 **Mobile 0850 706246**

Experienced Director with proven track record in very large scale multi-function management: Strategic Planning, IT, Personnel, Facilities. Telecoms and Aerospace industries, with DTI exposure. Planned and managed major change-management programmes. Led industry analysis, national policy and major international business development for UK Telecoms.

Integrating strategic planning, leading teams in business analysis, formulating business plans, implementing major organisational change and cost reduction.

Directing Corporate IT Strategies; Applications, data and technical architectures and operational strategy; Controlling Group-wide large scale systems development, operations and exploitation of business benefits.

Directing the Human Resources function across a multi-site, multi-skilled company, with overseas operations. Executive resource development, workforce rebalancing, employee communications.

Planning, budgeting and controlling extensive property development, facilities, capital investment and all support services.

Understanding of political and public policy processes; public affairs skills.

Internal and external communications, publications, presentations, TV.

QUALIFICATIONS

BSc	Mathematics (Hons 2:1) University College London
FBCS	Fellow of British Computer Society
CEng	Chartered Engineer
FCMA	Fellow, Chartered Institute of Management Accountants

CAREER SUMMARY

1993-95	Industrial Advisor Telecoms	Dept of Trade & Industry
1993-95	Director Corporate Programmes & Infrastructure	BT
1990-93	Director Information Technology	BT
1987-90	Personnel and Resources Director	BAe Military Aircraft Ltd
1986-87	Resources Director	BAe Military Aircraft Div
1984-86	Executive Director Resources & Computing	BAe Weybridge Division
1974-84	Management Services Manager	British Aerospace Kingston
1972-74	Systems Manager	Hawker Siddeley Aviation Kingston
1969-71	Asst Systems Manager-Finance	Hawker Siddeley Aviation Kingston
1966-69	O&M Analyst, Technical Analyst	Hawker Siddeley Group

INDUSTRY BODIES • = current

STARTS	Chairman	UK Industry Programme for Software Process Improvement
ETIS	Vice-Chair	European Telcos IT (Brussels)
ITITO	• Council	Information Technology Industry Training Organisation
EURIM	Council	European Information Markets
ESI	• Advisory Bd	European Software Institute (Bilbao)
BCS	Vice-Chair	London and Kingston Branches
	• Vice-Chair	Real Time Club

PERSONAL British. Age 50. DoB 28/4/45. Married, 3 adult children.

Industrial Advisor Telecoms Dept of Trade & Industry Aug 93-May 95

Seconded by BT at Govt request to create national strategy to develop and promote telecoms software as a UK industrial strength.

Developed and published first ever analysis of Telecoms Software sub-sector

Led re-education in Telecoms of Govt export promotion machine

Produced UK Telecoms brochure and directory for worldwide export promotion use

Export promotion in Nordic area, India; led £1b consortium project in China

Launched UK industry programme for Software Process Improvement - STARTS

BT (British Telecom) Nov 90-May 95

World's fourth largest telecoms operator. £13bn turnover. 150,000 people. Ambitious customer service, product innovation, employee reduction, international expansion, all exploiting advanced technology.

Director Corporate Programmes and Infrastructure Apr 93-May 95

Additional responsibility for programme management of Corporate Research Programme. £55mpa. Defended and rebalanced programme

Director Information Technology Nov 90-Mar 93

Responsible for overall strategy for IT throughout BT, working with business Divisions to ensure business benefit, and with IT units providing services. £1b IT spend. 7000 IT staff.

Led business review to create Top 10 business-led applications strategy and applications architecture

Developed technical architecture with European and international collaboration

Drove open-systems strategy and software engineering thrust

Introduced IT planning process, linked to Corporate Strategy/Planning

Led office systems programme in emotional environment, inter-operating numerous disparate systems, and introducing next-generation open-systems facilities

Rationalised PC hardware and software procurement installation and service

Established real IT protection: Security/Disaster/Data Protection

Additional responsibility (June 92) for Corporate Architecture and Standards Programme. £20mpa. Reduced and rebalanced spend.

Obtained ISO 9001 certification for IT Unit at first attempt

BRITISH AEROSPACE MILITARY AIRCRAFT LTD **1966-90**
£3b revenue. 30000 employees. 8 major UK sites. International operations.

Personnel and Resources Director **1987-90**
Accountable at Board level for: business planning and operations strategy; HR function, facilities development / capital investment; IT function.3700 staff.

Planned and led strategic change, resulting in savings of £300m over 6 years through site closures, rationalisation, restructuring, personnel reduction and relocation, leading to re-organisation of the business as subsidiary company

Led business planning processes including mission statement; product strategies; technology, facilities, IT, manpower plans; communicated Plan to all levels

Directed trade union negotiations with far-reaching working practice changes

Initiated and managed capital investment programme of £60mpa, enhancing and modernising sites, buildings and facilities, with appraisal and audit

Sustained and led long-run total integrated applications development programme on a Corporate basis, and steered implementation. IT spend £73mpa, 600 staff.

Resources Director Military Aircraft Division **1986-87**

Completed Weybridge plant closure with transfer of assets from 1.5m sq ft and release of 90 acres for property redevelopment

Consolidated computer centres, switched suppliers, led top-level supplier negotiations on product requirements, prices, and leases

Executive Director Resources & Computing, Weybridge Div **1984-86**

Established the Facilities and IT strategies of new Division of 7 sites with 5 computer centres.

Formulated "The Way Ahead", the first BAe integrated Divisional Plan

Planned and implemented the amalgamation of two major plants

Led the planning of Weybridge closure, with innovative programme of staff redeployment and job creation, to achieve undisrupted relocation of work

Management Services Manager, Kingston **1974-84**

Developed and implemented comprehensive range of advanced aeronautical, manufacturing, financial and commercial systems

Managed the growth of one of the largest UK computer centres: IBM, ICL and DEC

Specified and introduced new telecoms network.

Staff career development from 50-125, pioneering grading and salary structure

Led Divisional Efficiency Improvement Campaign, eliminating 300 jobs.

Systems Manager Hawker Siddeley Aviation, Kingston **1972-74**
Asst Systems Manager-Finance **1969-71**
Technical Analyst / O&M Analyst **1966-69**

O. tel.o
communications
Christoph Weber

09/02/98

Mr. Burton Grad
Fax 001/914 631 1164

TeleTiger

Dear Mr. Grad,

both documents (Jürgen Linsch and HPC) about TeleTiger will be available (translated to english) on wednesday the 11th.
I will then send them to you via Fax.

Best regards

SCH/Roper

due diligence

- CAA to email out draft of O'Sullivan report
- AB to pick up any new email from O'Sullivan, Clayton, Weber, etc.
- AB to call O'Sullivan to work out mechanics and schedule for producing final report (and perhaps any follow-up work with Tim, Clayton, or Weber or Liersch)
- Weber to deliver certification from HPC
- Weber to deliver translation of Liersch report summary
- ~~Where is Clayton non-disclosure?~~
- Concerns on legal documents.

PERSONAL

Date: February 3, 1998

To: Pat Davis

Copy: Burton Grad

From: John O'Sullivan

Subject: Some Comments on Personnel

1. The activity comes across as a small but very professional software operations. They know the German EDI marketplace intimately.

2. Although this did not show in any specific way, the management team must be overstretched. The boss has just left. The acquisition has created uncertainty and even more work. A new product is at the critical acceptance point.

3. The Acting head, Christoph Weber, is providing visible leadership. He seems to inspire confidence in his colleagues. He has a calm, pleasant manner, and a mature approach to the software business. He is currently occupying three positions.

4. Klaus Spiegelberg and Udo Bongards are the middle management of the Consulting/Projects group. They both appear as capable, knowledgeable managers. Klaus is currently holding two positions. Udo is more obviously "techy".

5. Astrid Lamberts is clearly the mainstay and driving force of the TeleTiger product. She has a strong personality, very articulate, clear in what she wants, and seems capable of getting it. She should be retained if at all possible.

6. She is very capably supported by Friedhelm Bar, who has led the TeleTiger QA, involving intensive, careful work over long periods. His technical knowledge of the product is unsurpassed, and he too should be retained.

Rogers
Valuation

Product valuations —
Tiger –
DOS
Win
NT

make report date as of
8/15/98
acquisition date
5/1/98
data is only avail
as of 3/31/98

Technology Valuation

IPR&D for Teletiger
product planned for release 1Q99 (FY)

SCI facts for Teletiger –

	FY99	00	01	02	Total

⇒ Intl activity rights – Alan Bunch

Carol –

We need to look at the excel tables for Tigar and Teletigar (if any).

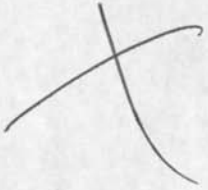
We will set them up so that I can do the Roger projections.

	A	B	C	D	E	F	G	H
1		Revenue Calculations - Tiger						
2								
3								4/1/98-
4	(Fiscal Year ends 9/30)	CY	6 mos. FY	FY	FY	FY	FY	9/30/02
5	($000)	1997	1998	1999	2000	2001	2002	Total
6								
7	**Tiger/DOS**							
8	New Software Sales							0
9	Software Maintenance							0
10	Related Services							0
11	Total Revenue	0	0	0	0	0	0	0
12								
13	**Tiger/Unix**							
14	New Software Sales							0
15	Software Maintenance							0
16	Related Services							0
17	Total Revenue	0	0	0	0	0	0	0
18								
19	**Tiger/NT**							
20	New Software Sales							0
21	Software Maintenance							0
22	Related Services							0
23	Total Revenue	0	0	0	0	0	0	0
24								
25	**Tiger Total**							
26	New Software Sales							0
27	Software Maintenance							0
28	Related Services							0
29	Total Revenue	0	0	0	0	0	0	0
30								
31	**Total**	0	0	0	0	0	0	0

	A	B	C	D	E	F	G	H
32		Revenue Income Model - Tiger						
33								4/1/98-
34	(Fiscal Year ends 9/30)	CY	6 mos. FY	FY	FY	FY	FY	9/30/02
35	($000)	1997	1998	1999	2000	2001	2002	Total
36								
37	Revenues							
38	New Software Sales	0	0	0	0	0	0	0
39	Software Maintenance	0	0	0	0	0	0	0
40	Related Services	0	0	0	0	0	0	0
41	Total Revenue	0	0	0	0	0	0	0
42								
43	Operating Expenses							
44	Sales & Marketing Rate		.20	.20	.15	.10	.10	
45	Sales & Marketing		0	0	0	0	0	0
46	Technical Rate		.15	.15	.15	.15	.15	
47	Technical		0	0	0	0	0	0
48	G&A Rate		.15	.15	.15	.15	.15	
49	G&A		0	0	0	0	0	0
50	Total Expenses		0	0	0	0	0	0
51								
52	Operating Income							
53	Pre-tax		0	0	0	0	0	0

	A	B	C	D	E	F	G	H
54								
55		NPV Calculations						
56	Client name	Tiger						
57	Assumptions							
58								
59	Tax rate	.37						
60	Cost of money	.085						
61								
62								
63			6 months	FY	FY	FY	FY	
64	($000)		1998	1999	2000	2001	2002	Total
65								
66	Operating Income							
67	Tax rate		.37	.37	.37	.37	.37	
68	Tax		0	0	0	0	0	0
69	After tax income		0	0	0	0	0	0
70	NPV factor		.980	.904	.833	.768	.707	
71	NPV		0	0	0	0	0	0

	A	B	C	D	E	F	G	H
1		Revenue Calculations - Tiger						
2								
3								4/1/98-
4	(Fiscal Year ends 9/30)	CY	6 months	FY	FY	FY	FY	9/30/02
5	($000)	1997	1998	1999 2000	2000	2001	2003	Total
6								
7	Tiger/DOS							
8	New Software Sales							
9	Software Maintenance							
10	Related Services							
11	Total Revenue	0	0	0	0	0	0	0
12								
13	Tiger/Unix							
14	New Software Sales							
15	Software Maintenance							
16	Related Services							
17	Total Revenue	0	0	0	0	0	0	0
18								
19	Tiger/NT							
20	New Software Sales							
21	Software Maintenance							
22	Related Services							
23	Total Revenue	0	0	0	0	0	0	0
24								
25	Tiger Total							
26	New Software Sales							
27	Software Maintenance							
28	Related Services							
29	Total Revenue	0	0	0	0	0	0	0
30								
31	**Total**	0	0	0	0	0	0	0



	A	B	C	D	E	F	G	H
32		Revenue/Income Model - Tiger						
33								4/1/98-
34	(Fiscal Year ends 9/30)	CY	6 months	FY	FY	FY	FY	9/30/02
35	($000)	1997	1998	~~1999~~ 2000	2000	2001	2002	Total
36								
37	Revenues							
38	New Software Sales	0	0	0	0	0	0	
39	Software Maintenance	0	0	0	0	0	0	
40	Related Services	0	0	0	0	0	0	
41	Total Revenue	0	0	0	0	0	0	0
42								
43	Operating Expenses							
44	Sales & Marketing Rate		.20	.20	.15	.10	.10	
45	Sales & Marketing		0	0	0	0	0	0
46	Technical Rate		.15	.15	.15	.15	.15	
47	Technical		0	0	0	0	0	0
48	G&A Rate		.15	.15	.15	.15	.15	
49	G&A		0	0	0	0	0	0
50	Total Expenses		0	0	0	0	0	0
51								
52	Operating Income							
53	Pre-tax		0	0	0	0	0	0

	A	B	C	D	E	F	G	H
54								
55		NPV Calculations						
56	Client name	Tiger						
57	Assumptions							
58								
59	Tax rate	.37						
60	Cost of money	.085						
61								
62								4/1/98-
63			6 months	FY	FY	FY	FY	9/30/02
64	($000)		FY 1998	1999	2000	2001	2002	Total
65								
66	Operating Income							
67	Tax rate		.37	.37	.37	.37	.37	
68	Tax		0	0	0	0	0	0
69	After tax income		0	0	0	0	0	0
70	NPV factor		.980	.904	.833	.768	.707	
71	NPV		0	0	0	0	0	0

Teletiger

	A	B	C	D	E	F	G	H
1		Customer Revenue Model - Germany						
2								
3								
4	(Fiscal Years ending 9/30)							
5	($000)	1999	2000	2001	2002	2003	2004	Total
6								
7	Installed Units (beginning of period)		0	0	0	0	0	
8								
9	Erosion Rate	.10	.10	.10	.10	.15	.15	
10								
11	# Lost (Erosion)	0	0	0	0	0	0	
12								
13	New Sales Rate	.00	.25	.25	.20	.15	.10	
14								
15	New Sales Units	0	0	0	0	0	0	
16								
17	Total Installed Units (end of period)	0	0	0	0	0	0	
18								
19	Price of Software License							
20								
21	New Software Sales	0						
22								
23	Price of Services/1st Year	35	35	35	35	35	35	
24								
25	Services Revenue from New Customers	0	0	0	0	0	0	0
26								
27	Effective Price of Services After 1st Year							
28								
29	Services Revenue from Installed Base							
30								
31	Price of Maintenance	0	15	15	15	15	15	
32								
33	Maintenance Revenue	0						
34								
35	Total Revenue							
36								

TeleTiger Technologies
~~Homecare Web~~ Tech

Germany

	A	B	C	D	E	F	G	H
1	(Fiscal years ending 9/30)	Customer Revenue Model - ~~Homecare Web~~						
2								
3	($000)	1998	2000 1999	2000	2001	2002	2003	Total
4								
5	Installed ~~Base~~ Units (beginning of period)	200	230	265	304	335	335	
6								
7	Erosion Rate	.10	.10	.10	.10	.15	.15	
8								
9	# Lost (Erosion)	20	23	27	30	50	50	
10								
11	~~Growth Rate~~ new Sales rate	.25	.25	.25	.20	.15	.10	
12								
13	~~# Gained~~ new Sales units	50	58	66	61	50	34	319
14								
15	Total ~~Customer Avail~~ installed units (end of period)	230	265	304	335	335	319	
16								
17	~~Web Penetration Rate~~		.02	.04	.04	.04	.04	
18								
19	~~# New Web Customers~~		5	12	13	13	13	56
20								
21	Price of Software License	100	100	100	100	100	100	
22								
23	New Software Sales (#13 * 21)	0	500	1200	1300	1300	1300	5600
24								
25	Price of Services ~~1st Year~~ 1st year	35	35	35	35	35	35	
26								
27	Services Revenue 13 x 25 from new unit	0	175	420	455	455	455	1960
28	2nd portion Price of Services after 1st year							
29	Cumulative Installations	~~0~~	~~5~~	~~17~~	~~30~~	~~43~~	~~56~~	
30	Services Revenue from installed base							
31	Price of Maintenance ~~of Web Customers~~ 15 x 28	15	15	15	15	15	15	
32								
33	Maintenance Revenue 15 * 31	0	75	255	450	645	840	2265
34								
35	Total Revenue	0	750	1875	2205	2400	2595	9825

total Services Rev

	A	B	C	D	E	F	G	H
37		TeleTiger - Germany						
38	(Fiscal Years ending 9/30)							
39	($000)	1999	2000	2001	2002	2003	2004	Total
40								
41	Revenues							
42	New Software Sales	0	500	1200	1300	1300	1300	5600
43	Software Maintenance	0	75	255	450	645	840	2265
44	Related Services	0	175	420	455	455	455.00	1960
45	Total Revenue	0	750	1875	2205	2400	2595	9825
46								
47	Operating Expenses							
48	Sales & Marketing Rate	.40	.40	.40	.40	.40	.40	
49	Sales & Marketing	0	300	750	882	960	1038	3930
50	Technical Rate	.20	.20	.20	.20	.20	.20	
51	Technical	0	150	375	441	480	519	1965
52	G&A Rate	.15	.15	.15	.15	.15	.15	
53	G&A	0	113	281	331	360	389	1474
54	Total Expenses	0	563	1406	1654	1800	1946	7369
55								
56	Operating Income							
57	Pre-tax	0	188	469	551	600	649	2457
58								

	A	B	C	D	E	F	G	H	I
59		NPV Calculations							
60	Client name		TeleTiger - Germany						
61	Assumptions								
62									
63	Tax rate	0.37							
64	Cost of money	0.085							
65									
66	($000)		1999	2000	2001	2002	2003	2004	Total
67									
68	Operating Income		188	469	551	600	649	2457	4913
69	Tax rate		.37	.37	.37	.37	.37	.38	
70	Tax		69	173	204	222	240	933	1842
71	After tax income		118	295	347	378	409	1523	3071
72	NPV factor		.961	.886	.816	.752	.693	.639	
73	NPV		113	262	283	284	283	973	2200

TeleTiger - Germany

	A	B	C	D	E	F	G	H
36	(Fiscal years ending 9/30)			~~Hemocare/Web~~				
37								
38	($000)	1998	1999	2000	2001	2002	2003	Total
39								
40	Revenues							
41	New Software Sales	0	500	1200	1300	1300	1300	5600
42	Software Maintenance	0	75	255	450	645	840	2265
43	Related Services	0	175	420	455	455	455.00	1960
44	Total Revenue	0	750	1875	2205	2400	2595	9825
45								
46	Operating Expenses							
47	Sales & Marketing Rate	.40	.40	.40	.40	.40	.40	
48	Sales & Marketing	0	300	750	882	960	1038	3930
49	Technical Rate	.20	.20	.20	.20	.20	.20	
50	Technical	0	150	375	441	480	519	1965
51	G&A Rate	.15	.15	.15	.15	.15	.15	
52	G&A	0	113	281	331	360	389	1474
53	Total Expenses	0	563	1406	1654	1800	1946	7369
54								
55	Operating Income							
56	Pre-tax	0	188	469	551	600	649	2457

	A	B	C	D	E	F	G	H	I
1					NPV Calculations				
2	Client name				~~Mediware - Homecare/Web~~				
3	Assumptions								
4									
5	Tax rate	0.37							
6	Cost of money	0.085							
7									
8	($000)		1998	~~1999~~ 2000	2000	2001	2002	2003	Total
9									
10	Operating Income		0	188	469	551	600	649	2457
11	Tax rate		.37	.37	.37	.37	.37	.37	
12	Tax		0	71	178	209	228	247	934
13	After tax income		0	117	291	342	372	402	1523
14	NPV factor		~~.961~~	~~.886~~	~~.816~~	~~.752~~	~~.693~~	~~.639~~	
15	NPV		0	103	237	257	258	257	1113

February 27, 1998

John O'Sullivan
119 The Avenue
Sudbury on Thames
Middlesex TW16 5EQ
U.K.

Dear John:

BGAI wishes to use your services in valuing the assets to be acquired by SCI/ISG from Roger.

Your specific assignments are:

1. Review any materials I send you regarding product strategies and plans and about market opportunities and competition. This will be specifically related to TeleTiger. I plan to do the work needed for Tiger.

2. Prepare any written material I request regarding TeleTiger product and market for Germany and Europe.

3. Consult with me in my projections of unit sales, revenues and costs for TeleTiger.

Your rate will be US$1500/day plus reimbursement for authorized expenditures. I expect the project to take less than two days.

Your confidentiality agreement remains in force.

Sincerely,

Burton Grad
BG:3753

BURTON GRAD ASSOCIATES, INC.
235 MARTLING AVENUE
TARRYTOWN, NEW YORK 10591
(914) 631-1129 FAX: (914) 631-1164
CC:MAIL BURTON GRAD@CORPORATE

Date: February 23, 1998

To: John O'Sullivan

From: Burton Grad

Subject: Roger Valuation

Thanks for the SAP information. This is sufficient for our purpose at this time.

The approach to valuation is as follows:

1. We will separately value Tiger as a continuing product and TeleTiger as "improven" technology (from a technical and market standpoint). We will not value the communications utilities.

2. We will use the Tiger sales history plus the installed base only for new software licenses, for software maintenance and for related services. We will eliminate hardware and hardware maintenance as well as any specific hardware design and installation services. When we exclude the hardware items, we will also exclude (explicitly or implicitly) any hardware related costs.

3. We will review any SCI/ISG strategic planning documents and their projections to assist us in making appropriate assumptions and producing our own revenue, cost and operating income projections.

I will probably need your help in describing the products (from a market standpoint) and in constructing revenue forecasts for Tiger and TeleTiger. This will probably require only 1-2 days work over the next 5-10 days. Are you available? What days?

As you may know, I'm currently in Mexico for one week on vacation, but will work on this project while I'm here.

Thanks for your help to date.

February 23, 1998

John O'Sullivan's availability for the valuation work:

2/24	morning and evening
2/26	evening
2/27	all day
3/2	afternoon and evening
3/3	all day
3/4	evening
3/5	morning and evening
3/6	all day