

Assignment 2: Due October 17

Enzed Printing

The TFC Business

In 2012, Enzed Printing was a corporation with annual sales of \$900 million in business forms and specialty paper products, such as writing paper, envelopes, note cards, and greeting cards. In 2008 the company had expanded into business forms inventory management services. This was an area where Enzed believed it could offer value-added services to differentiate it from other business forms manufacturers. The forms manufacturing business was mature by 2008, and all competitors were seeking ways to generate sales growth. Enzed embarked on a campaign to enrol its corporate clients in a program which it called "Target Facilitation for Customers" (TFC).

By 2012, sales from TFC were about \$60 million and Enzed had established a separate company within the business forms division to handle these accounts. The services provided under TFC included warehousing and distribution of forms (including inventory financing) as well as inventory control and forms usage reporting. Enzed used a sophisticated computer systems network to monitor a client's forms inventory, forms usage, and ordering activities. They provided this information to their clients via comprehensive yet simple-to-read management reports.

As part of its distribution services, Enzed also offered "pick pack" service where trained workers actually opened full cartons to pick the exact number of forms requested by the clients. Enzed's philosophy was that a well-run warehousing and distribution network is vital to any forms management program- "we know what you need.., the *right* product at the *right* place at the *right* time."

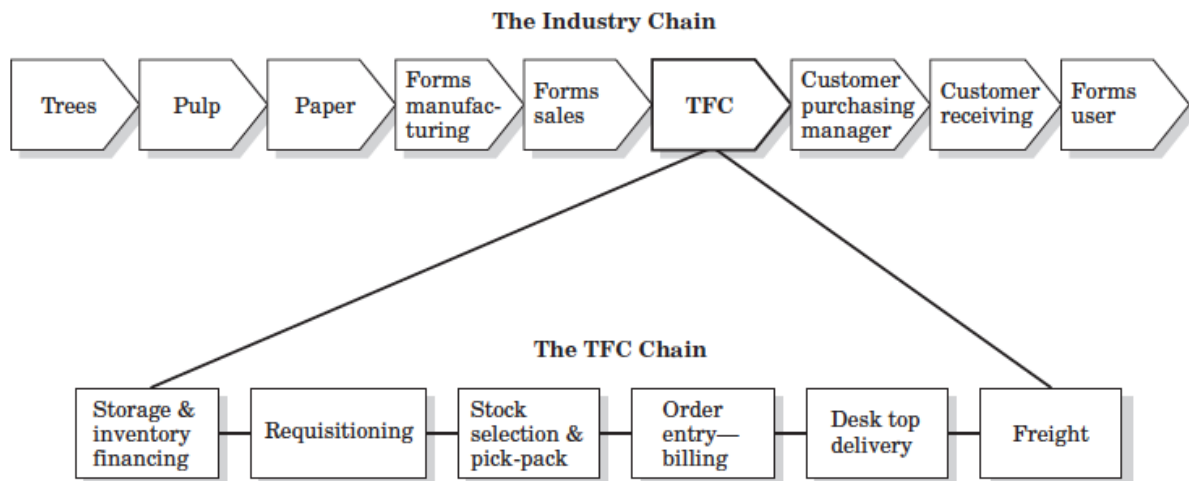
For a small number of clients Enzed also offered "desk top delivery," where Enzed personnel would distribute the forms to individual offices (forms were usually delivered only to the loading dock). As a comprehensive forms management provider, Enzed's product line also had to be comprehensive. Their product line included everything from standard computer printout paper and fax paper to custom-designed forms tailored to meet the exact business needs of the client.

Current Cost Accounting System

Enzed operated its forms manufacturing and TFC activities as separate profit centres. The transfer of product to TFC was at arm's length with the transfer price set at fair market value.

Enzed manufactured business forms in 13 locations. Although the company encouraged internal sourcing for customer orders, TFC salespeople had the option of outsourcing product if necessary. The industry value chain for TFC is shown in Exhibit 1.

EXHIBIT 1



Clients who participated in the forms management program kept an inventory of forms at one of Enzed's 10 distribution centres. The forms were distributed to the client as needed. The client was charged a service fee to cover the cost of warehousing and distribution based on a percentage of the cost of sales of the product for that month, regardless of the specific level of service provided to that client.

If a TFC client made use of any of the distribution services, they were supposed to be charged a price for the forms which was high enough to allow for an additional 32.2% of product cost to cover warehousing and distribution expenses, the cost of capital tied up in inventory and freight expense. This percentage was determined based on actual 2010 financial data so that on an aggregate basis, in total, all expenses were covered (see Exhibit 2). The sales force then marked up the cost of product and services by 20%, on average. As shown in Exhibits 3 and 4, prices for individual accounts could vary from the standard formula.

Understanding Customer Profitability

With TFC profitability suffering in October 2012, General Manager Stuart Simpson began to question the appropriateness of the distribution charges.

"The Business Forms Division in 2008 earned a 20% Return on Investment (ROI). But returns have been dropping for several years. TFC is projected to earn an ROI of only 6% for 2012. Something tells me that we are not managing this business very well! It seems to me that the charge for services needs closer scrutiny. I believe we should charge our clients for the services they use. It doesn't seem fair that if two clients buy the same amount of product from us, but one keeps a lot of inventory at our distribution centre and is constantly requesting small shipments and the other hardly bothers us at all, both should pay the same service fees."

Stuart looked through his records and found two accounts of similar size, accounts A and B, which were handled by different sales people. Accounts A and B both had annual sales of \$79,320 with the cost of the product being \$50,000.

EXHIBIT 2

Calculation of Service Fee Charges (000s)

2010 Product sales at cost	\$24,059
2010 Warehousing/distribution expense	\$ 4,932
% of product cost	20.5%
2010 Average inventory balance	\$10,873
2010 Average cost of capital	10.4%
Total cost of inventory financing	\$ 1,131
% of product cost	4.7%
2010 Total freight charges	\$ 1,684
% of product cost	7.0%
Total services costs	32.2%
Standard price of 5 (Product cost * 1.32) * 1.2	

EXHIBIT 3

Top 20 TFC Accounts for August 2012 (Ranked by Contribution \$)

Account	Actual Net Sales	Product Cost	ABC-Based Service Costs	Revised Contribution
1	\$ 76,904	\$ 49,620	\$ 2,862	\$ 24,422
2	130,582	74,396	34,578	21,608
3	72,956	48,216	3,456	21,284
4	64,903	37,981	6,574	20,348
5	45,088	26,098	1,309	17,681
6	104,689	62,340	25,356	16,993
•	•	•	•	•
•	•	•	•	•
•	•	•	•	•
18	45,893	29,570	6,904	9,419
19	62,954	41,034	13,746	8,174
20	26,699	16,830	2,236	7,633
Total	\$1,279,133	\$779,003	\$209,852	\$290,278

EXHIBIT 4

Bottom 20 TFC
Accounts for
August 2012
(Ranked by
Contribution \$)

Account	Actual Net Sales	Product Cost	ABC-Based Service Costs	Revised Contribution
1081	\$ 3,657	\$ 2,356	\$ 2,325	\$ 21,024
1082	38,467	26,301	13,740	21,574
1083	5,926	3,840	4,214	22,128
1084	163	89	2,390	22,316
1085	3,256	2,006	3,590	22,340
1086	82,086	61,224	23,756	22,894
•	•	•	•	•
•	•	•	•	•
•	•	•	•	•
1098	74,569	50,745	45,698	221,874
1099	88,345	64,930	53,867	230,452
1100	113,976	82,987	72,589	241,600
Total	\$717,142	\$486,035	\$417,472	\$2186,365

Under the current system, these accounts carried the same service charges, but Stuart noticed that these accounts were similar only in the value of the product being sold; they were very different on the level of service they required from Enzed.

In the past year, customer A had submitted 364 requisitions for product with a total of 910¹ lines: (all of them "pick pack") while customer B had submitted 790 requisitions with a total of 2500 lines (all "pick-pack"). Customer A kept an average of 350 cartons of inventory at the distribution centre while customer B kept 700 on average. Customer B's average monthly inventory balance was \$50,000 (\$7,000 of which had been sitting around for a whole year) while that of customer A was only \$15,000. Because of the greater activity on customer account, a shipment went out three times a week at an annual freight cost of \$7,500 while Customer A required only one shipment a week at an annual freight cost of \$2,250. In addition, customer 13 had requested desk top 26 times during the past year, while customer A did not request desk top delivery at all. Stuart Simpson turned to TFC Controller Jane Dunhill and Director of Operations Steve Cunningham for help.

Stuart said, "How can I better understand customer profitability?" "Well," Steve: said, "if we can figure out, without going overboard of course, what exactly goes on in the distribution centres, maybe we can have a much better idea of what it costs to serve our various clients." Steve knew that two primary activities took place in the distribution centres, the warehousing of forms and the distribution of those forms in response to a customer requisition. He and Stuart decided to talk to some people in the field to get more specific information.

Distribution Centre: Activity Analysis

Stuart and Steve visited Enzed's Adelaide distribution facility. Site manager Simon Smith confirmed, "All we do is store the cartons and process the requisitions. The amount of warehouse space we need just depends on the number of cartons. It seems like we've got a lot of cartons that just sit here forever. If we created some flexible lease programs and changed aisle configurations, we could probably adjust our space requirements if the number of cartons we stored were to change. The other thing that really bothers me is that we've got some inventory that's been sitting here forever. What's it to the client? They don't pay for it until they requisition it. Isn't there a way we can make them get this stuff out of here?"

"As far as the administration of the operation goes, everything depends on the number of requisitions. And, on a given requisition, the customer can request as many different items as they like."

The team then interviewed warehouse supervisor Dick Flemington, who said, "I don't care if I get a hundred requisitions with one line each or one requisition with a hundred lines on it, my guys still have to go pick a hundred items off the shelves. And those damn "pick-pack" requests. Almost everything is "pick-pack" nowadays. No one seems to order a whole carton of 500 items anymore. Do you know how much more labour it requires to pick through those cartons? And on top of that, this desk top delivery is a real pain for my guys. Sure, we offer the service, but the clients who use it should have to pay something extra. It's not like my guys don't have enough to do."

¹Wherever a customer requires forms, they submit a requisition for all the different products they need. Each separate product request is a "line." If the request is for whole cartons, it is considered a "carton line." For quantities less than a whole carton, it is considered a "pick-pack line."

EXHIBIT 5

Breakdown of Expenses by Activity (000s)

	Total Expense	Activity Costs*
Rent	\$1,424 @ 85%	\$1,211
Depreciation	\$ 208 @ 85%	177
Utilities	\$ 187 @ 85%	159
Security	\$ 3	3
Total storage expense		<u>\$1,550</u>
Rent	\$1,424 @ 15%	\$ 214
Depreciation	\$ 208 @ 15%	31
Utilities	\$ 187 @ 15%	28
Salaries & fringes	\$ 909	909
Telephone	\$ 96	96
Taxes/insurance	\$ 104	104
Travel/entertainment	\$ 40 @ 75%	30
Postage	\$ 56	56
Hourly payroll & fringes	\$ 316	316
Temp help	\$ 17	17
Total requisition handling expense		<u>\$1,801</u>
Variable warehouse pay & fringes	\$1,735	<u>\$1,735</u>
Travel and entertainment (25%)	\$ 40 @ 25%	10
Total warehouse activity		<u>\$1,745</u>
Basic warehouse stock selection (44%)		\$ 761
"Pick-pack" activity (42%)		734
Desk top delivery (14%)		250
Data processing expense	\$ 612	612
Total	<u>\$5,708</u>	<u>\$5,708</u>

*Some expense items were allocated between activities.

Stuart and Steve were starting to get a pretty good idea of what goes on in the distribution centres, but there was still one person to talk to. They knew that a lot of money was spent on data processing, mostly labour. They needed to know how those people spent their time.

Dominique Balentine had been a data entry operator at Enzed for 17 years. "All I do is key in those requisitions, line by line by line. I've gotten to the point where I know the customers so well that all the order information is easy. The only thing that really matters is how many lines I have to enter."

Using the interviews and observations, Steve and Stuart broke distribution down into six primary value-added activities--storage, requisition handling, basic warehouse stock selection, "pick-pack" activity, data entry, and desk top delivery. With Jane's help, they assigned costs to these activities as follows for a sample of five of the distribution centres (see Exhibit 5 for calculations):

Storage	\$1,550
Requisition handling	1,801
Basic warehouse stock selection	761
"Pick-pack" activity	734
Data entry	612
Desk top delivery	250
Total	\$5,708

Steve then estimated the following for 2012 based upon historical information and current trends for the sample of five warehouses:

- On average, these five distribution centres scattered across the country will have combined inventories of approximately 350,000 cartons (most cartons are of fairly standard size).
- They will process about 310,000 requisitions for 2012.
- Each requisition will average 2.5 lines.
- About 90% of the lines will require 'pick-pack" activity (as opposed to slipping an entire carton).
- Cost of capital in 2012 was probably about 13%.

"Our new computer system is coming on line soon, which will track individual freight charges," said Steve, "so, we can just charge the client for what it actually costs us." Stuart and Jane agreed that this sounded fair.

Some things that were said at the distribution centre still stuck in Steve's mind. "Don't you think we should do something to get that old inventory moving? What about charging something extra, say 1.5% per month, for anything that's been there over nine months."

"Great idea," Jane said. "This will also help protect us against the loss we often take on old inventory when the clients end up changing their forms. You know we just eat that and never charge them for it."

They were almost finished. "What about desk top delivery?" Steve said. "I think we should charge extra for it, but I don't want this to get too complicated."

Stuart said, "How much extra time does it take your guys on average to run around the client company?"

"I'd say about an hour and a half to two hours at \$15 per hour, that's about \$30 each time. Sound fair?"

"Sounds OK to me. Also, that ties pretty well to the \$250,000 overall assignment, since we will process somewhere around 8,500 'desk top' requests this year."

Services Based Pricing (SBP)

The entire management team, including Doug Engelbrecht, Chief Financial Officer of the Business Forms Division, felt that there had to be a better way of charging out distribution services to help TFC become more profitable. They now had a much better understanding of the drivers of costs involved in distribution services.

"It wouldn't be easy getting the sales force to accept an activity-based pricing program," Stuart said. "Some of them get pretty stuck in their ways and don't like change. Some accounts would see increases because of the additional distribution charges under a Services Based Pricing (SBP) scheme. These salespeople wouldn't be very happy. On the other hand, some salespeople may see their margins increase." Overcoming these organizational problems would be only the tip of the iceberg.

The accounting department maintained a data base which showed all activity against individual accounts and calculated a contribution from that account. However, they had not yet been able to use this information effectively. TFC management took their data and began to analyse it.

EXHIBIT 6

TFC Net Sales,
2011

Annual Sales/Account	Number of Accounts	% of TFC Net Sales
> \$ 300,000	40	48%
> \$ 150,000	53	19
> \$ 75,000	86	15
> \$ 30,000	143	11
> \$ 0	778	7
Total	1100	100%

Although TFC maintained 1100 separate accounts, a large portion of the business came from very few accounts. The top 40 accounts represented 48% of the company's net sales (see Exhibit 6).

As a way of understanding customer profitability, TFC management worked the information in the data base as if the accounts had been charged service fees based on actual usage, leaving net sales and product cost the same as before. They recalculated contribution based on these figures. They ranked the accounts according to profit contribution. Exhibit 3 shows the top 20 accounts for the month of August and Exhibit 4 shows the bottom 20.

Since such a large part of the profit opportunity rested with so few accounts, management felt that it might be possible to significantly improve profitability by concentrating on individual account management. The team felt they were on the right track for improving account profitability and wondered what should be the next step. They also wondered what other issues might be important for improving the overall profitability of TFC.

Assignment Questions:

1. Using the information in the text and in Exhibit 5, calculate "ABC"-based services costs for the TFC business. [25 Marks]
2. Using your new ABC costing system, calculate the distribution services costs for "Customer A" and "Customer B." What inference do you draw about the profitability of these two customers? Discuss, in your opinion, should TFC implement the SBP pricing system? [35 Marks]