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RECORD KEEPING — A CONTRACTOR'S PERSPECTIVE¹

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INTRODUCTION

The business of logging has changed! In the past the mark of a good contractor was the amount of wood he could pull in a day. Now his ability is judged not only on how much wood he can pull, but more importantly on how well he monitors the business side of his operation. More than ever now there is a need to:

- be more cost efficient
- monitor business performance
- have budget and cashflow guidance
- have accurate costs for tender preparation.

An essential requirement for the above goals is maintaining good records. My system of record keeping, which has been developed over the last four years, is based on three important prerequisites:

- it is simple
- it requires minimal time (Important for anyone working up to twelve hours a day)
- it is relevant, ie. not record keeping just for it's own sake.

The system is based around three record types : financial records with descriptive information; management records; and periodic comparative evaluations.

FINANCIAL RECORDS

Expenditure is summarized monthly into the classifications indicated in Figures 1 and 2. The facts and figures are collated in conjunction with the payment of invoices. Generally, for an average month, the entire summary takes approximately two hours to complete. The financial section is divided into two parts, direct running costs and administration/overhead costs (Figure 1). The same sheet is repeated to allow for a description, where required, of each expense (Figure 2).

Direct Running Costs

Most of the information is very straight forward. The cost is noted alongside an item, eg. Skidder R & M = \$379.97, and on the second sheet, the reason for the cost. (in this instance - winch maintenance and bolts) Recording the reason for the expenses is most important if the costs are to be usefully interpreted at a later date. It is difficult to remember a wet day six months or a year later.

Being able to identify the reason for an expense in one months time or in one years time is essential. It is better to write it down rather than to commit it to memory.

Machine costs are always kept separate for each machine. Diesel is metered and the amount that goes into each machine each day is noted down along with the hours the machine has done. The same applies to R&M; not only is the cost of the repairs and what was repaired noted, but, also, a record of how long the job took.

1. A paper presented at the LIRA 1988 "Business of Logging" Seminar.

The wages entry includes the man hours worked for the month plus any overtime. Overtime is normally limited to the odd Saturday and is noted in the comments.

Overheads and Administrative Expenses

The same format is used (Figure 1 and 2) and the true monthly costs are assessed. For example, insurance and ACC levies, which are annual payments, are entered proportionally for each month. Other aspects such as accountant and consultant fees should be entered and explained. For example:

Accountant - Tax Assessment
= \$2000

- Discussion/Finance
= \$200

Consultant - Record Analysis
= \$180

Any expense requiring factual justification is entered in this fashion.

We now have a summary of expenditure. At this stage costs are being readily identified. After all, increasing costs must be identified before they can be reduced.

A clear picture of the expenditure within the business is beginning to emerge.

MANAGEMENT SUMMARY

The financial information on its own is presenting only half the picture. To achieve full business management, the second section contains information which describes certain influencing factors.

The first of these (Figure 3) contains four factors : wet days, machinery downtime, Saturdays worked, and the number of men employed during the month.

Running Expenses for the month ended

INCOME	
Bush Contracting	
EXPENSES	
Direct Operating Costs	
Chainsaw - Fuel & Oil	\$1016.60
- Repairs	
Cartage	
Hire of Equipment	
Machines - Fuel	\$1405.49
Loader - R & M	\$320.13
Skidder - R & M	\$379.97
Oil - GMP	
- M.30	
- HLP 60	\$119.20
Car & Truck - Fuel	\$574.19
- Repairs	\$282.88
Wages	\$8975.40
Chainsaw Allowance	\$1080.00
Sub-contractors	
Wire Rope	\$462.90
Protective Clothing	\$97.64
Administrative & Overhead Expenses	
Accountancy	
Entertainment	\$29.70
General Expenses	\$291.62
Hire Purchase Charges	\$8173.48
Insurance - Vehicles	\$498.41
Insurance - Other	
Telephone	\$53.15
Travelling Expenses	
Consultants Fees	
Accident Compensation Levies	\$367.07
Interest	
P.A.Y.E.	\$3311.67
TOTAL EXPENSES	
NET CONTRACTING PROFIT FOR MONTH	

Figure 1 : Cost information

Running Expenses for the month ended _____

INCOME
Bush Contracting
EXPENSES
Direct Operating Costs
Chainsaw - Fuel & Oil 4 CH Bar + Petrol
- Repairs
Cartage
Hire of Equipment
Machines - Fuel 160 Hrs 1980 Lt - 172 Hrs 1450 Lt
Loader - R & M Filters, Hoses, Tires etc
Skidder - R & M Winch maint Rotts
Oil - GMP
- M.30
- HLP 60 60 Lt
Car & Truck - Fuel Petrol & Oil
- Repairs Warranty check + Lube
Wages 1360 HRS - Extra man & Winds
Chainsaw Allowance
Sub-contractors
Wire Rope One new rope, 2 2nd Hds
Protective Clothing Boots
Administrative & Overhead Expenses
Accountancy
Entertainment Tavern
General Expenses Power - 2 log tapes
Hire Purchase Charges
Insurance - Vehicles
Insurance - Other
Telephone
Travelling Expenses
Consultants Fees
Accident Compensation Levies
Interest
P.A.Y.E.
TOTAL EXPENSES
NET CONTRACTING PROFIT FOR MONTH

Figure 2 : Cost Explanation

Wet Days - 7 hrs. lost

Mach. Downtime

- Skidder - 1 hr. (flat tyre)
- Loader - 0.5 hr. (hyd. hose)

Sat./OT Worked - 2

No. Men - 2 wks @ 5, 2 wks @ 6

(My own trials with manning levels)
(Recording lost time ie. accidents)

Figure 3 : Influence on Production

Once again, reasons are given for each factor including time lost. Of course the amount of time spent on the likes of machine downtime has already been recorded in the financial data.

For the second part I extract from my diary relevant factors influencing production and expenditure. Realistically, these are personal assumptions. Aspects such as, piece size, average, maximum and minimum haul distance and comments on how they affect my production/cashflow are included.

More facts are obtained from logging prescriptions (or by looking over the supervisors shoulder at the appropriate moment?!). Figure 4 is an example of the format I use.

Topography - Good hauler country

Haul Distance - Average 175 metres
Maximum 350 metres
Minimum 30 metres

Piece Size - 2.4 m³

Timberlands Planning and Management

Attitudes and Comments

Target and price

Figure 4 : Comments

As well as these two forms, I also take a summary of the month from my diary.

The final part of this section is the employer's weighbridge summary and pay out document.

All of the factors mentioned are very relevant to our existence, in fact our very survival in business. Within this section I also note such things as : whether skid location and roading has been well planned; has the target and price been properly set; is the target within our capabilities to achieve; any restrictions on production levels; and availability of over time.

This extra information helps justify variations in the final analysis of the financial data and can be used in determining unit rates for tendering. For example, fuel cost per machine per working day, or time lost per annum due to R & M or the lack of it. The information also shows the added cost of machinery not only in direct \$ terms, but, more importantly, the cost of downtime represented by lost production. This lost production will never be recouped.

COMPARISON OF RESULTS

In any month any business will perform better than expected, or worse. Rarely does it perform exactly to expectations. By keeping the added management information you will be better equipped to determine why the final figures have varied. Is it for instance, because of:

- production higher or lower than expected?
- number of days worked?
- gang attendance?
- location ie. compartment, topography etc?
- other events - strikes, earthquakes, wind, etc?

Maintaining an accurate record of performance is important; impressions alone can be misleading and are subject to memory clouding or loss.

Comparison with Accountant's Records

In many respects the information collected by this system is directly comparable with the accountants end of year financial report. Most cost items will be similar in both reporting systems.

The major differences in treatment arise with the way machine depreciation is handled, and the distinction between capital and interest components within the monthly hire purchase instalments. That there are differences is not unreasonable since the reports are for different purposes. The accountant is reporting financial position and assessing tax. My reports are for management decision making and control purposes.

The reports are put together promptly each month and thus give me ready reference to all costs. Being closer to the action, I am confident that my classification of expenditure is accurate.

Further Data Processing

To me this is the "icing on the cake". I have made use of a Forestry Consultant to process data. Through the use of a computer they are able to take the information I supply and produce all manner of graphs. These graphs point out some interesting trends/results. One such graph is shown in Figure 5.

For those of you who have looked at this and gone straight to the end to see the difference between total revenue and total costs, look again as you have missed the point of such an illustration. I will go into detail about three aspects of this graph.

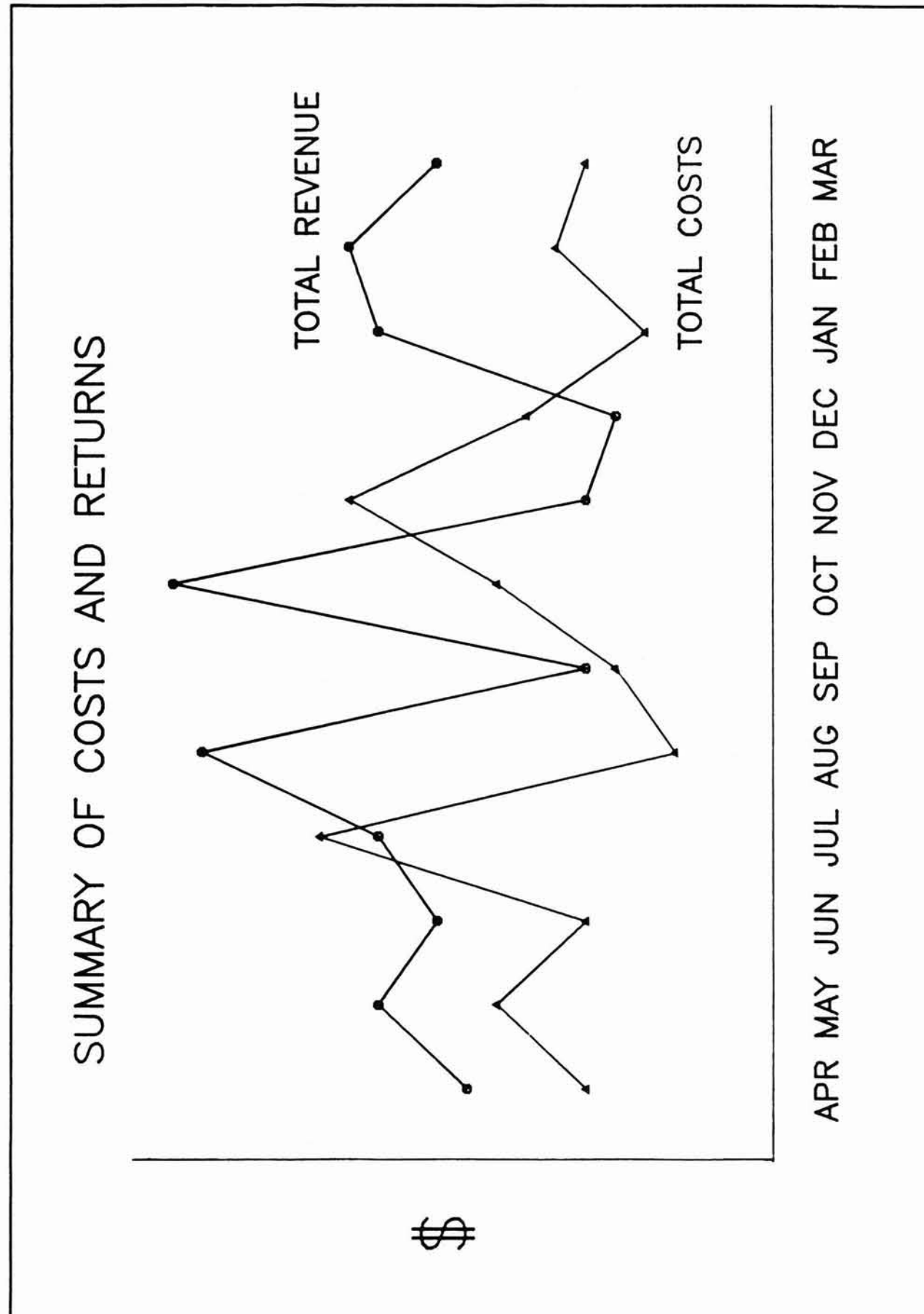


Figure 5 : Summary of Costs and Returns

Firstly, the point at July where expenditure exceeds income. Through going back to my detailed management report of June that year I note that there had been an under estimate of my end of month log stocks. Therefore I ended up running in overdraft for a period.

Secondly, the very high peak in revenue for October was one of those months we all have now and again where every thing went right. Unfortunately such months don't happen often enough!

Thirdly, the dip in revenue during October/November, again from my records, was attributable to being held to target production because of a strike

Primarily the information collected is for my own use. It could, however, also be used in discussing overdraft facilities with the bank manager, or machine finance with a finance house.

Computerisation

All my records are entered manually. It might be asked if a computer could be used to advantage in presenting my results and for data entry.

My answer to that is simple. Having completed these records manually for some time, I now find the exercise straight forward, and, in fact it is the actual writing on paper stage that gives me the first hand look at costs. I still have to be convinced that my level of computer operating expertise would justify the use and expense of a computer.

CONCLUSION

These are the rewards of one to two hours record keeping per month. I thoroughly enjoy working with this system and (although my bank manager may not agree) my business is reflecting this attitude of efficiency.

A simple record keeping system as outlined can give you a much improved understanding of your business and provide a competitive advantage in a changing logging business environment.

REFERENCE

"A Cost-Records System for a Logging Business" US Department of Agriculture, Pennsylvania, USA.

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