Foundations of Accounting & Finance

Prof. Arun Kumar Gopalaswamy

Department of Management Studies - IIT Madras

Week - 04

Lecture – 14

Preparation of Income Statement: Maynard Company B

Introduction

In the last session, we worked on solving Maynard Company A. We prepared two balance sheets: the opening and the closing. These statements were as on 01 and 30, June, respectively. We also discussed classifications within assets, such as current and non-current assets, and various types of liabilities, such as current and non-current liabilities (Figure 1). Now, we will focus on Maynard Company B, the income and expenditure statement.

Maynard Company B

Diane Maynard was grateful for the balance sheets that her friend prepared. In going over the numbers, she remarked, "It's sort of surprising that cash increased by $31,677, but net income was only $19,635.

It's important to note that a dividend of $11,700 was paid to Diane Maynard from the net the income. If the net income of $7,935 is added to the dividend of $11,700, it accounts for the net income as per statement of Diane Maynard. Despite significant increase in cash, the profit hasn't seen a similar increase. Diane found this situation somewhat puzzling.

In response, her friend suggested preparing an income statement for the month of June to gain further insight. He offered to locate the necessary data and prepare the statement accordingly.

Preparation of Income Statement

In addition to the data given in Case (A), her friend found a record of cash receipts and disbursements, which is summarized in Figure 2. She also learned that all accounts payable was to vendors for purchase of merchandise inventory and that cost of sales was $39,345 in June.

Figure 1: Maynard Company A (Balance sheet)

MAYNARD COMPANY Balance Sheets as of June 1 and June 30				
	As of June I		As of June 30	
Assets				
Current Assets:				
Accounts receivable	21,798		26,505	
cash	34,983		66,660	
Merchandise inventory	29,835		26,520	
Notes from Diane Maynard	11,700		-	
pre paid insurance	3,150		2,826	
supplies on hand	5,559		6,630	
Total current assets		1,07,025		1,29,141
Noncurrent assets:				
Building	5,85,000		5,85,000	
Less Accumulated depreciation	1,56,000		1,57,950	
		4,29,000		4,27,050
Equipment @ cost	13,260		36,660	
Less Accumulated depreciation	5,304		5,928	
		7,956		30,732
LAND		89,700		89,700
other non current assets		4,857		5,265
Total noncurrent assets		5,31,513		5,52,747
Total assets		6,38,538		6,81,888
Liabilities and Shareholders' Equity				
Current liabilities:				
Accounts payable	8,517		21,315	
Accrued wages payable	1,974		2,202	
bank notes payable	8,385		29,250	
taxes payable	5,700		7,224	
Total current liabilities		24,576		59,991
Other noncurrent liabilities		2,451		2,451
Total liabilities		27,027		62,442
Shareholders' Equity:				
Capital stock	3,90,000		3,90,000	
retained earnings	2,21,511		2,29,446	
Total shareholder's equity		6,11,511		6,19,446
Total liabilities and shareholders' equity		6,38,538		6,81,888

The exhibits include details such as cash sales, credit customers, and various disbursements, along with some reconciliation information.

Figure 2: Cahs Receipts and Disbursements

Cash Receipts and Disbursements Month of June			
Cash Receipts		**Cash Disbursements**	
Cash sales	$44,420	Equipment purchased	$23,400
Credit customers	21,798	Other assets purchased	408
Diane Maynard	11,700	Payments on accounts payable	8,517
Bank loan	20,865	Cash purchases of merchandise	14,715
Total receipts	98,783	Cash purchase of supplies	1,671
		Dividends	11,700
		Wages paid	5,660
		Utilities paid	900
		Miscellaneous payments	135
		Total disbursements	67,106

Reconciliation:	
Cash balance, June 1	34,983
Receipts	98,783
Subtotal	133,766
Disbursements	67106
Cash balance, June 30	66,660

Now let us proceed to draft the income and expenditure statement.

I. Receipts

1. Cash sales

Cash sales represent transactions where payment is received immediately at the time of the sale. In this case, the cash sales amounts to $44,420. This figure indicates that revenue has been generated from the sales, and the money has been received. Therefore, it can be categorized as revenue or receipts.

2. Credit sale

Are there any credit sales recorded? Yes, indeed. The company has received $21,798 from credit customers. However, our concern is in knowing is the total amount of credit sales for the month of June. While the $21,798 represents cash inflow from credit customers, it doesn't indicate that the full extent of amount received on credit sales pertains to the sale in the month of June. It could be possibly a receipt from the sale in one of prior months.

To determine this, let's examine the accounts receivable as of June 01. According to the balance sheet, accounts receivable amounted to $21,798 on June 01. The cash receipts from credit customers in the month of June is the same amount as accounts receivable. Therefore it is safer for us to conclude that the receipts from credit customers pertains to prior month's sale and not for the sale in the month of June. But despite receiving the entire money due as of June 01 we observe that there is accounts receivable as of June 30. This is possible only due to the credit sale that must have taken place between June 01 and 30. It signifies new accounts receivable resulting from sales made during the month.

To calculate the credit sales for June, we subtract the old receivable amount from the new receivable amount. In this case, as there were no pending receivables from the previous month, the old receivable amount is considered as $0. Therefore, the total credit sales for June amount to $26,505.

Accounts receivable as on June 1st	21,798
less: amount received from credit customers	21,798
Amount still due from last month receivable	0
Less: accounts receivable as on June 30th	26,505
Credit sale for the month of June	26,505

In summary, the total revenue for this period includes both cash sales and credit sales. By adding the revenue from cash sales and credit sales together, we arrive at the total revenue generated during this period. So far, we have addressed both cash sales and credit sales, ensuring that all revenue streams are accounted for.

3. Other cash receipts

Bank loan

Diane Maynard repaid her loan from the company of $11,700, therefore it is not a revenue. There was a bank loan of $26,20,865. It's important to note that while a bank loan results in a cash inflow, it is not considered revenue.

Receipt from Diane Maynard

When Diane Maynard paid $11,700, it was to settle the notes from Diane Maynard recorded on the closing balance sheet. This amount indicates money that was owed to Diane Maynard and has now been repaid. Therefore, neither the payment made by Diane Maynard nor the bank loan qualifies as revenue.

Now, let us transition to discussing expenses. We will comfortably move on to examining the expenses incurred during this period.

II. Expenditure

1. Cost of Sales

Let us first determine the cost of sales. To do this, we need to analyse the purchases made during the month. Firstly, we look at merchandise purchased with cash, which amount to $14,715. Now, we need to ascertain the merchandise purchased on credit.

For this we work on accounts payable. As of June 01, the accounts payable stood at $8,517. By the end of June, this figure had increased to $21,315. It has to be noted here that during the month of June there was a payment for accounts payables amounting to $8,517. Once the payment is made the accounts payable arising due to prior month purchases is nil. Therefore, the credit purchases for the month amounted to $21,315.

Accounts payable as on June 1st	8,517
Less: paid on accounts payable in the month of June	8,517
Amount still due from old payable	0
Less: Accuonts payable as on June 30th	21,315
Credit purchase as of june	21,315

Now, considering both cash and credit purchases along with the opening inventory of $29,835, we determine the total available inventory for June. This total represents the inventory available for utilization during the month ($ 65,865).

To calculate the utilized inventory, we subtract the remaining inventory at the end of the month ($26,520) from the total available inventory. This gives us the inventory utilized during June, which in turn represents the cost of sales ($39,345).

Merchandise purchased for cash	14,715
Add: Merchandise purchased on credit	21315
Add: Inventory, June 1	29,835
Total goods available during June	65,865
Less: Inventory, June 30	26,520
Cost of Sales	39,345

The cost of sales is subtracted from the total revenue to calculate the gross profit. This gross profit is obtained by subtracting the cost of sales from the total revenue.

2. Cash purchase of supplies

Continuing with our analysis, let us examine the cash purchase of supplies, which amounted to $1,617. While supplies may have been purchased, our concern lies in determining how much of these supplies were actually utilized during the month.

To calculate the amount utilized in the month of June, we need to consider the supplies available at the beginning of the month. According to the opening balance sheet, this amount is $5,559. Therefore, the total supplies available for the month consist of the beginning balance plus the cash purchases made ($1671).

Next, we subtract the supplies remaining at the end of the month ($6630) from the total supplies available. This gives us the amount of supplies utilized during the month ($600).

Cash paid for supplies	1671
Add: Supplies at the Beginning	5,559
Total supplies available	7,230
Less: Supplies at the end	6,630
Supplies utilized	600

3. **Purchase of equipment**

When we discuss equipment purchase, it's essential to understand that it represents a capital expenditure. This means that the company has invested in acquiring an asset. Since this expenditure relates to the acquisition of a long-term asset rather than an expense directly linked to operations, it is not included in the profit and loss statement. Instead, it is reflected on the balance sheet as a capital asset. Therefore, we do not need to consider equipment purchases in the profit and loss statement. Another way to explain would be that the benefit of that equipment purchased will be carried forward for a long time and the entire benefit is not derived in period for which we are accounting, hence it is an asset.

4. **Purchase of other assets**

When it comes to the purchase of other assets, it's important to note that this transaction primarily impacts the balance sheet rather than the profit and loss statement. Since purchase of assets involves acquiring long-term assets for the company, such as property or equipment, it doesn't directly affect the day-to-day operational expenses that are typically recorded in the profit and loss statement. Instead, the impact of such purchases will be reflected in the balance sheet and will be considered when calculating depreciation expenses in the future. As indicated earlier the benefit of such expenditure in purchase of the asset is derived over a longer horizon and not in the period for which we are accounting now. Therefore, at this stage, we do not consider the purchase of other assets in the profit and loss statement. We will address depreciation expenses later.

5. **Dividends**

Dividends represent distribution of profits to shareholders. Since dividends are paid out from profits, they are considered a post-profit allocation. At this stage, we do not include dividends in our analysis as they are not a part of the profit and loss statement. Instead, dividends are accounted after profits have been determined. Therefore, we will not consider dividends in our current calculations.

6. Wages paid

Let us carefully analyse the wages paid during the month. Firstly, we need to differentiate between wages paid and wages accrued. Wages paid refers to the actual cash disbursed during the month, which amounts to $5,660.

However, what we are concerned about is the wages accrued for the month of June which means the amount of wage for which the benefit has been derived in the month of June (irrespective of whether part of which or the whole amount might have been paid). To calculate this, we need to consider the wages payable at the beginning and end of the month. According to balance sheet, the accrued wages at the beginning of June were $1,974, and at the end of June, they amounted to $2,202.

Out of the $5,660 paid, $1,974 relates to the wages that were due at the beginning of the month. Therefore, the portion of wages paid pertaining to the month of June is $3,686 ($5660 - $1974). Additionally, there is still an outstanding amount of $2,202 in accrued wages at the end of June.

Therefore, the total wages accrued for the month of June can be calculated by adding the wages paid for June ($3,686) to the amount still due at the end of June ($2,202). This gives us the total wages accrued for the month of June.

Wages payable at the beginning of the month	1,974
Add: Wages paid in cash during the month	5,660
Wages paid pertaining to the month of June	3,686
Less: Wages still due at the end of the month	2,202
Total wages accrued for the month of june	5,888

7. Utilities paid

Let us address the utilities paid, which amounted to $900. Unlike wages, there is no indication of accrued or pending utilities expenses. Therefore, the $900 represents the amount paid for utilities during the period, totaling $19,700.

8. Miscellaneous payments

The only remaining item is a miscellaneous payment of 135. This will be considered as an expense in the profit and loss statement.

9. Prepaid insurance

At the beginning of the month, the prepaid insurance stood at $3,150, and by the end of the month, it decreased to $2,826. This reduction indicates the extent to which insurance was utilized during the month of June. One can argue that the reduction was due to a refund, if there were a refund, it would have been reflected as a cash asset, similar to the bank loan repayment.

To calculate the insurance expense for the month of June, we subtract the ending prepaid insurance balance from the beginning prepaid insurance balance. Therefore, the insurance expense for June is $3,150 - $2,826 = $324.

10. Accumulated depreciation on the building

Let us analyse the accumulated depreciation on the building. From the beginning of June to end of June, it increased from $156,000 to $157,950. This increase of $1,950 is due to the addition of depreciation related to the building for the month of June.

To calculate the depreciation for the building in June, we subtract the beginning accumulated depreciation from the ending accumulated depreciation. Therefore, the depreciation for the building in June is $157,950 - $156,000 = $1,950.

Similarly, we can calculate the depreciation for equipment. If we subtract the opening accumulated depreciation for equipment ($5,304) from the ending accumulated depreciation for equipment ($5,928), we find that the depreciation for equipment in June is $5,928 - $5,304 = $624.

It is important to note that depreciation represents the decrease in value of these assets over time, and it's typically accounted for as an expense in the profit and loss statement.

III. Profit before taxes

To determine the profit before taxes, we subtract the total accrued expenses for June from the gross profit. This gives us the profit before taxes. Similarly, to calculate the profit after taxes, we subtract any applicable income tax from the profit before taxes.

Let's review the figures:

- Total expenses accrued for June: Sum of all accrued expenses for the month.
- Profit before taxes: Gross profit minus total accrued expenses for June.
- Income tax for the month of June: The difference between taxes payable at the end of June and taxes payable at the beginning of June.
- Net income after taxes: Profit before taxes minus income tax for the month of June.

Upon reviewing the balance sheet, we note the change in taxes payable from the beginning to the end of June, indicating the taxes due for the month. Therefore, we calculate the income tax for June based on this difference ($7,224 - $5,700 = $1524).

After subtracting the income tax for June from the profit before taxes, we arrive at the net income after taxes, which matches the figure mentioned in Maynard Company A's statement regarding the increase in retained earnings ($7,935). The income statement of Maynard Company for the month of June is depicted in Figure 3.

Figure 3: Maynard Company, Income Statement

MAYNARD COMPANY	
Income Statement, June	
REVENUES	
Cash sale	44,420
credit sale	26,505
Total revenue	**70,925**
EXPENSES	
Cost of sale	39,345
GROSS PROFIT	**31,580**
supplies utilised	600
wages	5,888
utilities	900
mis payments	135
insurance	324
depreciation on building	1,950
depreciation on equipment	624
Total expenses accrued for June	**10,421**
Profit before tax	**21,159**
Income tax for the month of June	1,524
Net Income after tax	19,635
Dividends	11,700
Increase in retained earnings	**7,935**