

5.1 THE ROLE OF THE FINANCE FUNCTION

FINANCE FUNCTION:

In any business, the functional area of finance is to *oil the other functional areas* by providing them with all the actual finance and financial information they need to plan and make decisions to help them operate effectively. The finance department is there to *carry out all financial and management accounting functions*. It will *assess and determine the financial needs of the business, analyse and interpret all the business's financial data, assess appropriate sources of finance, prepare all budgets, manage working capital, prepare cash flow statements and forecasts, and prepare all the necessary financial documentation required by government legislation*.

BUSINESS FUNCTIONAL AREAS:

The *finance department* has an impact on the other functional areas of the business and on its activities. It must, therefore, work in an *integrated and interdependent way with them to the best advantage of the business*. For example, the human resources department needs to plan for employee levels and, therefore, needs a budget from the finance department for recruitment. Production needs raw materials and possibly new machinery, additional staff, etc. depending on a sales forecast from the marketing department. Both need to know the finance available to carry out their functions effectively. In business, all functional areas are interdependent, but as profit predictions are essential and cash is king, the *finance department provides the 'oil' or 'lifeblood', in practice and theory, that sustains all business activity and keeps the business dynamic and alive*.

5.2 SOURCES OF FINANCE

THE NEED FOR BUSINESS FINANCE:

Business finance is a very wide-ranging area and covers many aspects of business activity concerning the management and control of actual money, credit, assets, liabilities, etc. Bringing money into a business, or financing the business, is essential as the business needs finance for day-to-day operations, for expansion purposes, to effectively deal with competitors, to recruit new staff, for promotional and marketing purposes, to invest in new capital projects and to keep abreast of developments in new technology. The sources of finance available to a business depend on many factors, including whether it is a new start-up enterprise or an existing, profitable and established business. For example:

Most likely and appropriate source of business finance	New start-up businesses	Established businesses
Loan	Possibly	Yes
Overdraft	Possibly	Yes
Trade credit	Not likely	Yes
Retained profit	No	Yes
Sale of assets	No	Yes
Owners' capital	Yes	Yes
New partner	Not likely	Possibly
Share issue	Not likely	Yes
Crowdfunding	Yes	Possibly

SOURCES OF BUSINESS FINANCE:

A business might be able to raise finance from internal sources, external sources or a mixture of both, depending on factors such as its type, size, life stage, reputation and profitability. Ways of raising finance for a business include getting a loan or overdraft from a financial institution such as a bank or building society, obtaining favourable trade credit terms from suppliers, using retained profit, by sale of assets, from the owner or owners, bringing in a new partner, by share issue or by crowdfunding.

THE FINANCE TERM:

Short-term finance is usually taken out for a period of less than one year, and is used for the general day-to-day operations of a business. Any repayment time of more than one year is considered to be medium-to-long-term finance; for example, a bank or building society loan repayable within, say, five years could be regarded as medium-term finance, whereas the issue of shares or the taking out of a 25-year mortgage would be regarded as long-term financing. Long-term finance is usually used for the purpose of purchasing new and replacement fixed assets or for long-term project development.



LOAN:

A loan from a financial institution such as a bank or building society is an external medium-to-short-term source from which a business can obtain extra finance. However, it is expensive, as interest is charged on the full amount of the loan, irrespective of how much of it the borrower actually uses. For example, suppose a one-year £6,000 bank loan is agreed at an interest rate of 10% per annum. Then £6,600 must be repaid by the borrower at the end of the year, irrespective of how much of the initial £6,000 loan the borrower actually used. The lender usually requires security to be provided by the borrower in case they default on the loan. It is usually given to an established business with a good 'bottom line' and the ability to provide adequate security. Loans might also be made available to new start-up businesses, but with more severe, and more prohibitive, terms and conditions.

OVERDRAFT:

An overdraft from a bank or building society is a short-term external source from which a business can obtain extra finance. Arranging an overdraft involves a business agreeing with the lending institution a fixed amount by which their current account balance can be exceeded. An overdraft is much cheaper than a loan because the lender will only charge interest on the amount which the customer actually overdraws, which may not necessarily be the full agreed amount of the overdraft. For example, assume that an overdraft agreement for one year is drawn up between the lender and a customer. It states that the customer can overdraw their current account balance to a maximum of £1,000, and be charged an interest rate of 10% on the overdrawn amount. If within that one year the customer uses only £400 of the overdraft facility, they are charged only £40 interest by the lender. Overdrafts are more difficult to get than a loan, and are available to any business with a current account. As with many forms of financing, overdrafts are more likely to be approved for established, proven businesses than for new start-ups.

TRADE CREDIT:

Trade credit is an *external short-term source* from which a business can obtain extra finance. Extended trade credit terms are an *interest-free* way for a business to raise finance. When a creditor gives a business a longer time to repay its debt to them, they are in fact giving that business an interest-free loan. However, the *business could become over-reliant on its creditors' generosity* and, if there was a market crash in the demand for its product or service, the 'extended credit amount' might become an irrecoverable bad debt to the creditor and consequently a *blemish on the image* of the defaulting business. *Although newly established businesses would benefit from getting trade credit, it is unlikely that they do in the majority of cases, because of the fact they are 'new', with no historical trading track record.* Therefore, *trade credit is usually extended and gifted to established businesses.*

RETAINED PROFIT:

Retained profit is *historical profit that the business has not paid out to its owner or owners, or used for any other purposes.* It is an internal, long-term source of finance for a business. The benefit of using this is that it is a *quick source of finance* on which *no interest has to be repaid* by the business. However, excessive use of such funds *means that there is less finance available to the business to cover unexpected emergencies*, if and when they arise. As retained profit is historical, then, by definition, it is *only a source of finance to profitable established businesses* with a positive track record, not to new business start-ups!

SALE OF ASSETS:

Selling the business's *unwanted assets* is a *fairly quick and interest-free internal, long-term source of finance* for a business, depending on the demand for the asset. However, the '*second-hand*' assets *might only have a specific use and so have a limited target market.* Also, their sales value would depend on the assets' *age and working condition.* Raising finance through sale of assets is really *only an option for an established existing business.*

OWNERS' CAPITAL:

Using the owners' own capital is a *long-term, internal financial sourcing method.* It is *interest-free, but somewhat limited in availability.* It *could be used as start-up capital for a new business or for expansion purposes in an existing established business.*

NEW PARTNER:

Bringing in additional new partners to a business is a *long-term financial external sourcing method.*

Bringing in a new partner is *strictly limited to a legal partnership entity.* The finance obtained is *not only interest free, but does not have to be repaid by the partnership.* However, it *does make the partnership bigger and increases the 'baggage problems' with that!* Taking on a new partner *changes the legal structure* of a partnership, requiring the *dissolution* of the existing one. For this reason it is more likely to be *used by an existing established business.*

SHARE ISSUE:

Issuing *ordinary shares* to obtain finance is a *long-term financial external sourcing method for a limited company only.* Share values are *not repaid to their owners* and *no interest applies to them.* However, some types of *preference shares* do carry some guaranteed financial repayment. With ordinary shares, dividends from the company's profits are paid to holders at some stage and ordinary shareholders can vote at the annual general meeting of the company. Shares of established companies with a good bottom line are more likely to be bought by investors than those offered by new business start-ups and demand a higher share price.

CROWDFUNDING:

Crowdfunding is a *long-term external source of finance.* It is *relatively new and has only 'taken off' with development of Internet social media sites.* An entrepreneur with a concept for a business start-up asks people – the crowd – to fund the development of the enterprise through a fundraising website. There are several forms of crowdfunding model a business can consider, e.g. '*free gratis*' *donation funding* for charities and 'good causes', *investment-reward funding* involving the investor getting a reward for providing the finance, and *equity funding* where the investor gets a part-ownership of the business project. *Crowdfunding is a source of finance predominantly used by new business start-ups.*

Activity

1. Investigate reasons why some businesses might source finance internally, while others might use external sources of finance. Present your findings to your class using PowerPoint.

Questions

1. Why might some businesses only source their finance internally?
2. Explain the differences between a bank loan and a bank overdraft. Give examples.

5.3 REVENUE, COSTS, PROFIT AND LOSS

REVENUE, COSTS, PROFIT AND LOSS:

All businesses incur *variable and fixed start-up and running costs*, and get *revenue income from trading and other activities*. They also *enjoy profits and suffer losses*. *Measuring and analysing the constantly fluctuating relationships between these four elements plays an importance in business decision-making.*

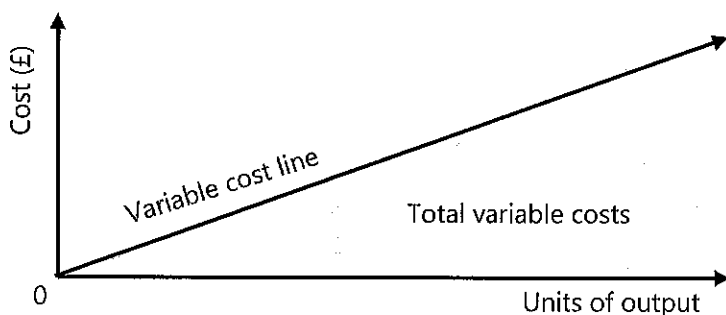
UNIT VARIABLE COST:

Variable costs are the costs *directly attributable to the production process*. For example, say, to produce one unit of output it is calculated that it takes £5 worth of *direct raw material*, £3 worth of *labour wages, or direct labour*, and £2 worth of *directly associated production expenses*. This would mean that the *variable cost of producing that one unit is £10*. This will remain constant for that unit, at least for a while! Examples of direct costs of production include direct raw materials used in production, direct expenses such as electricity used up in the production process, and the wages of workers directly associated with the production process.

TOTAL VARIABLE COST:

The total variable cost will vary with the level of production; the more units produced, the more the total variable costs will be. Total variable costs are found by the formula: *(variable cost per unit × number of units produced)*. For example, if the variable cost per unit is £10 and 100 units are produced, then the total variable cost of production is $(£10 \times 100) = £1,000$. If 50,000 units are produced and the variable cost per unit stays the same, then the total variable cost of production is $(£10 \times 50,000) = £500,000$.

Total variable cost graph:

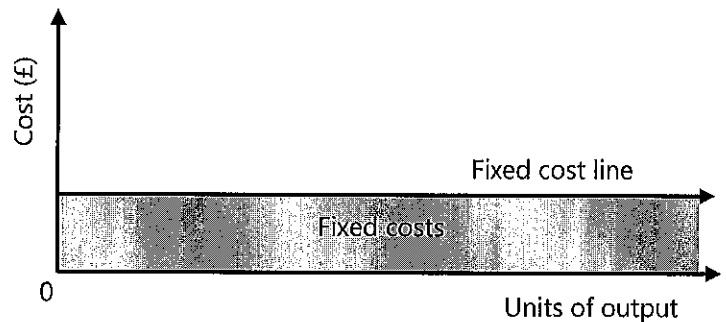


Note that the variable cost line starts '0', the baseline, because if no units are made then no variable costs are incurred.

FIXED COSTS:

Fixed costs are sometimes referred to as *period costs or indirect costs*. They are costs which will *not change with level of production output, but may change due to other factors*. For example, the landlord might increase the yearly rent, the local authority might raise the annual business rates and an insurance company might increase its yearly insurance premium cost. *Examples of fixed costs are rent, rates and insurance.*

Fixed costs graph:

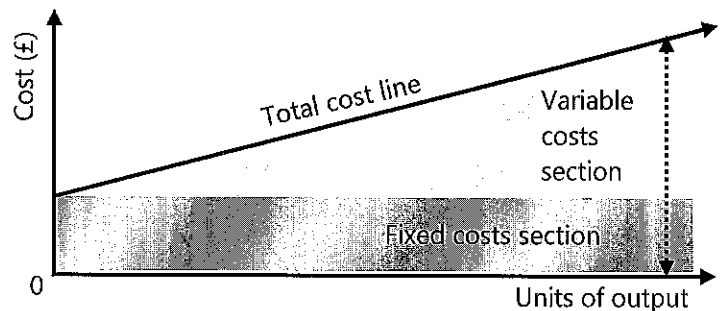


Note that the fixed costs line starts above '0', the baseline, because fixed costs are incurred even when no units are produced.

TOTAL COST:

The total production cost is *all costs involved in producing a given unit volume of output*; that is, the total fixed cost of production added to the total variable cost of production. In formula terms, total cost = *(fixed cost + total variable cost)*.

Total cost graph:



Note that the total costs line starts above the baseline, '0', at the fixed costs point, because fixed costs are incurred even when there are no units produced.

REVENUE:

Revenue is the *income that a business receives from trading sales and investments*. Assume that a business has no investments but sells 100,000 units of its product over a trading year. If the selling price of each unit was £20, then its total sales revenue income over the year is calculated by the formula: *sales revenue = (units sold × selling price per unit)*. That is, sales revenue = $(100,000 \text{ units} \times £20) = £2,000,000$.

BUSINESS PROFIT:

In simple terms, a *financial profit* is the excess of business sales revenue income over its expenditure output over a given time period. If, for example, over a financial year sales revenue amounted to £300,000 and business expenses were £250,000, then the profit made over the year would be £50,000.

BUSINESS LOSS:

Basically, a financial loss occurs when a business's expenditure exceeds its income over a specific period of time. For example, if over a financial trading year a business had sales revenue income of £45,000, but expenses of £50,000, then it would have made a loss of (£5,000). *Note that it is good practice to denote a negative figure inside brackets as a minus sign can sometimes go unnoticed!*

THE TRADING AND PROFIT AND LOSS ACCOUNT:

The trading and profit and loss account, or *income statement*, basically shows the financial performance of a business over a specific period of time, usually 'for the year ending...' The trading account section calculates the gross profit, and the profit and loss account section calculates the net profit.

COMPONENTS OF THE TRADING AND PROFIT AND LOSS ACCOUNT:

Trading and profit and loss account for the year ending 5 th April 20xx			
	£	£	£
Sales			1,000,000
Less: Cost of Sales			
Opening stocks	600,000		
Add: Purchases	<u>200,000</u>	800,000	
Less: Closing stocks		<u>300,000</u>	<u>500,000</u>
Gross Profit			500,000
Less: Expenses			
Electricity		150,000	
Advertising		130,000	
Insurance		<u>20,000</u>	<u>300,000</u>
Net Profit			<u>200,000</u>

OPENING STOCKS:

Opening stocks, or *opening inventories*, are *unsold stocks that the business had on its hands at the end of the last accounting period and which are still in saleable condition*.

CLOSING STOCKS:

Closing stocks, or *closing inventories*, are the *unsold stocks at the end of the current accounting period*. They become the opening stocks of the next accounting period, providing they stay in saleable

condition. For this reason, *closing stocks are considered as part of the business's current assets*, and so are also shown in the business's balance sheet, or statement of financial position.

MEASURING BUSINESS PERFORMANCE:

A business can use its trading and profit and loss account to *measure its current performance, performance against previous years, performance against competitors and performance from the perspective of a range of stakeholders*.

GROSS PROFIT MARGIN:

The gross profit margin is a business's *gross profitability expressed as a percentage of its sales revenues*. The formula is $\text{gross profit margin} = (\text{gross profit} \div \text{sales revenues}) \times 100$. For example, assume a business made a gross profit of £4,000 on sales of £160,000, then its gross profit margin is calculated as $(£4,000 \div £160,000) \times 100$, which is 2.5%. *This means that for every £100 of sales, the business made a gross profit of £2.50.*

NET PROFIT MARGIN:

The net profit margin is a business's *net profitability expressed as a percentage of its sales revenues*. The formula is $\text{net profit margin} = (\text{net profit} \div \text{sales revenues}) \times 100$. For example, assume a business made a net profit of £2,000 on sales of £160,000, then its net profit margin is calculated as $(£2,000 \div £160,000) \times 100$, which results in a figure of 1.25%. *This means that for every £100 of sales the business made a net profit of £1.25.*

THE AVERAGE RATE OF RETURN THEORY:

The average rate of return (ARR), also known as *the accounting rate of return*, is one of the many *investment appraisal techniques* a business can use to *judge the worthiness of a particular investment project*. The return is calculated as a simple objective mathematical percentage expressing the average accounting profit made by the project over its life with its initial cost. It is expressed by the formula $\text{average rate of return} = (\text{average net profit} \div \text{initial investment outlay}) \times 100$.

THE AVERAGE RATE OF RETURN PRACTICAL:

Suppose an investment project costing £8,000,000 lasted for 20 years and brought in a total income of £10,000,000. The total profit from it would be $(£10,000,000 - £8,000,000) = £2,000,000$. The average profit $= (£2,000,000 \div 20) = £100,000$. The ARR $= (£100,000 \div £8,000,000) \times 100 = 1.25\%$. *This means for every £100 invested in the project it yielded an annual average return of £1.25. If there were a number of projects to choose from, and money return was the prime consideration, then the project that provides the highest percentage return would be the one chosen.*

5.4 BREAK-EVEN

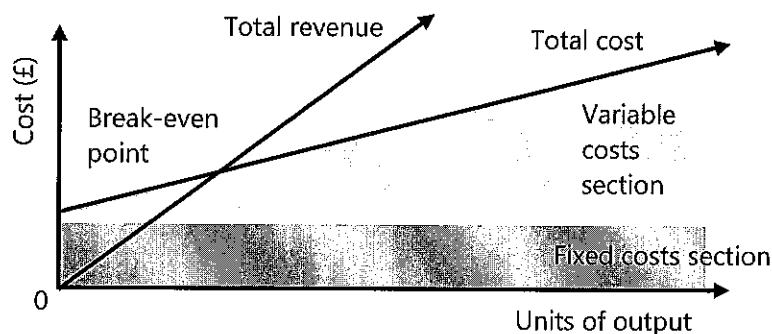
BREAK-EVEN OUTPUT:

Break-even output is *the number of product units a business must produce and sell to cover the total cost incurred in producing them*. For example, if a business fixes its selling price for one unit of production at £35, and calculates that its total production costs are £700,000, then in order to break even it must produce and sell 20,000 units. Thus, *break-even output is at the point where total costs equals total revenue*. Any output below the break-even output would result in a loss, but any output exceeding the break-even level represents profit.

A BREAK-EVEN CHART:

A break-even chart is a way that a business can *graphically show the interrelationship between costs, outputs, profits and losses*.

A break-even chart example:



BENEFITS OF BREAK-EVEN ANALYSIS:

The benefits to a business of using break-even analysis include that it *can see relevant costs and revenues in diagrammatic form, and the effect of changes in any of the variables can be demonstrated in a dynamic way*. It is also *a relatively easy concept to understand and is recognised by most businesses as a simple decision-making tool to put into operation*. Finally, the *profit or loss at any level of production can be easily calculated or read directly from the break-even chart simply by measuring the difference between the total cost line and the total revenue line*.

DRAWBACKS OF BREAK-EVEN ANALYSIS:

The main drawbacks for a business of using break-even analysis as a decision-making tool are: it is considered to present a *very simplistic and static view of the dynamic business environment as it assumes a linear relationship between costs and revenues and so can be used only for short-term decision-making*; as it *relates only to a single product, one single break-even analysis for the business in its entirety would not be possible*; and it is based on the *assumption that all goods produced are sold*.

5.5 CASH AND CASH FLOW

CASH:

Cash is the *most liquid of all a business's assets*. In business, 'cash is king' and it is the *lifeblood of any business*. Cash is *real, tangible and immediate*, and is the *most acceptable medium for the payment of business expenses*. In short, cash is important because it provides a business with *real liquidity and enables it to meet short-term debts and pay business expenses*. Finally, cash can be used universally as a *unit of account, a medium of exchange and a store of value*.



THE DIFFERENCE BETWEEN CASH AND PROFIT:

Cash is the amount of *actual money that flows into and out from a business over a specified period of time*. Profit is the *excess income a business earns over its expenditure during a specific period of time*. The distinction between the two is extremely important as a business could show a good 'paper' profit but could be very short of *actual real cash*.

CASH FLOW:

Cash flow is the *movement of actual money, in to and out from a business, over a specific period of time*. Cash is the *lifeblood of any business* and so must be monitored frequently, carefully and accurately!

POSITIVE CASH FLOW:

Positive cash flow simply means that a business has, over a specific period of time, *more money flowing into it than it has flowing out from it*. A business must have a positive cash flow if it is to make a profit.

NEGATIVE CASH FLOW:

Negative cash flow simply means that a business has, over a specific period of time, *more money flowing out from it than it has flowing in to it*. If persistent, the problem of a negative cash flow needs to be fully addressed.

CAUSES OF CASH FLOW PROBLEMS:

A business can get into cash flow problems for many reasons; for example, as a result of a business having *extensive running costs, excessive stockholdings or very frequent trading losses*, having to make a *large unexpected payment*, or having *debtors who do not pay their bills on time, excessive irrecoverable bad debts* owing to it or *creditors who require upfront or speedy payment*.

THE CONSEQUENCES OF CASH FLOW PROBLEMS:

The ultimate consequence for a business having persistent and severe cash flow problems is that *it will eventually cease to trade*. It will grind to a halt as outflow of its lifeblood, money, exceeds its inflow. *In the short run, even the most profitable business cannot survive if it is cash poor and cannot pay its bills as 'cash is king' in the world of commerce.*

THE USEFULNESS OF CASH FLOW FORECASTING:

There are many reasons why a business should construct a cash flow forecast, including: to *identify times in the future when there might be insufficient cash in circulation and when there might be excessive cash in circulation*; to help with *forwarding planning*; to use as evidence to show that it is *forward-thinking* and gives consideration to future events; and to *help with an application for a grant or a loan*. In short, to *closely monitor the movements and availability of the most liquid asset of all and the lifeblood of the business that is cash*. So, a cash flow forecast will be useful to a business as a *forward planning tool* to help it anticipate and deal with periods of cash shortage and to provide management with targets for which they can strive.

COMPLETION OF A CASH FLOW FORECAST:

A cash flow forecast is a *quantifiable financial statement covering a specific period of time*. It shows how much *actual money a business expects to receive in and to pay out over that specific period*.

Cash flow forecast for three months ending 30 th September 20xx			
	July	August	September
	£	£	£
Cash inflows			
Sales revenues	45,000	20,000	75,000
Rental income	15,000	15,000	15,000
Total inflows	60,000	35,000	90,000
Cash outflows			
Purchases	30,000	55,000	35,000
Overheads	20,000	25,000	15,000
Total outflows	50,000	80,000	50,000
Net cash flow	10,000	(45,000)	40,000
Opening balance	15,000	25,000	(20,000)
Add: Net cash flow	10,000	(45,000)	40,000
Closing balance	25,000	(20,000)	20,000

Practical questions for 5. Finance

1. Assuming unit cost, fixed costs and unit selling price remain the same over the production run, complete the following table:

Units of production	Variable cost per unit	Selling price per unit	Fixed costs	Total variable cost	Total production cost	Total revenue	Profit or (Loss)
Units	£s	£s	£s	£s	£s	£s	£s
0	-	-	5,000	0	5,000	0	
100	5	20	5,000				
200							
300							
400							
500							

2. The closing balances on the accounts of My Books on December 2018 were as follows:

Sales	£50,000
Purchases	£25,000
Opening stocks	£5,000
Closing stocks	£10,000
Expenses	£20,000

- From this information, prepare a trading profit and loss account for My Books for the year ending December 2018.
 - From the account you prepared in (a) above, calculate:
 - the gross profit margin
 - the net profit margin
3. Suppose the business My Books invested £500,000 in a new printing press. If this new printing press was expected to last for 20 years and bring in a total net profit of £1,000,000 over its life span, then:
- calculate My Books' average rate of return on this investment
 - explain what this means
4. Draw and clearly label a break-even chart from the following information:
- Total sales revenue £3,000 at 1,500 units
 - Total costs £2,000 at 1,500 units
 - Fixed costs £500
5. a) Complete the following cash flow forecast for the last four months of 2019.

Cash flow forecast for four months ending 31 st December 2019				
	September	October	November	December
	£	£	£	£
Balance brought forward	5,000		4,000	(5,000)
Income				
Sales revenues	20,000	12,000	15,000	24,000
Total income	20,000	12,000		24,000
Expenditure				
Purchases	10,000		17,000	11,000
Expenses	8,000	6,000	7,000	6,000
Total expenditure		15,000	24,000	17,000
Balance carried forward		4,000		

- b) Fill out the following table after completing part (a) above.

	September	October	November	December
	£	£	£	£
Net cash flow				