CHAPTER 3: EVALUATING THE FINANCIAL POSITION OF CLIENTS

LEARNING OBJECTIVES:

After studying this chapter, you should know about:

- Cash flow management in personal finance
- Know about preparation of household budget
- Cash inflows and outflows
- Know about budgeting and forecasting
- Importance of monitoring budgets and provision for savings
- Creating personal balance sheet and net-worth
- Creating a budget and savings plan
- Understand contingency planning
- Evaluating the financial position of clients

3.1 Importance of cash flow management in personal finance

Personal finance involves looking at the various sources of income and expenses and ensuring that there is some surplus savings which is allocated to various investments to meet the different goals in the future. One of the key aspects of the entire process is to look at the cash flow that is generated by the individual or household and how this is handled.

There are several factors that make the entire process of managing the cash flow very significant in the personal finance management process.

The cash flow is the starting point of the whole personal finance process. The time and the amount of income that is generated and the time and the amount when this is spent as expense is critical to ensure that there is a proper balance maintained between the two.

The time of the cash flow becomes critical because the income has to be available when expenses crop up. A very good example of a balance between income and expense is that of a salaried individual who gets a monthly income in the form of salary and whose expenses are also due monthly like payment of electricity, telephone bill, salary to household staff etc.

Even a slight mismatch between the cash flow can lead to the need for debt which is costly for the individual. If there is a situation wherein the income comes in at unspecified time intervals, but the expenses are evenly spread out then this can lead to a short term mismatch. This has to be met through debt, which comes at a cost in the form of interest. The interest becomes an extra outgo, which reduces the savings further.

There has to be adequate income coming in at all points of time so that a surplus is generated. This surplus called savings is essential because this is necessary for difficult times. Cash flow mismanagement can become a source of tension for the individual and family. This can disrupt normal life and peace in the family which becomes a crucial factor to consider. This can further lead to health problems if the tension persist over a period of time.

Cash flow management ensures that there is a control over the finances in a family and for an individual. There is a sense of empowerment that this gives, because there is confidence that things are being handled in a proper manner. It also makes for smooth running of the household as funds are available as and when required.

3.2 Preparing Household Budget

The investment adviser performs an important role in helping the household or an individual understand a household budget. Preparing a household budget entails an understanding of the sources from which the household or individual receives income, and the application of these funds in a typical month. A sample household budget is shown in Table 3.1.

The way to go about preparing a household budget is to first start with the various heads of income. All the amount that is received from various sources has to be listed out and this will become the income. Some of it might be regular in nature while there might be heads like investment income that is not regular and which comes infrequently.

On the expense side there are some amounts that have to be compulsorily spent and these are called mandatory expenses. Others are essential living expenses, which are necessary for daily use. Finally comes the discretionary expenses and these are the expenses that can be cut in case there is need for a control on the total amount spent.

The total expenses when reduced from the total income would give the savings that are managed by the household. In some cases there could be just a single family member who is earning while in other families there could be more than one earning family member.

The difference between monthly surplus in hand and savings is to be noted. The monthly surplus in hand is calculated after mandatory deductions, such as, contributions made to provident fund and National Pension System. These are added back to the monthly surplus in hand to arrive at the savings.

Let us assume that 6 months expenses need to be covered. Monthly expenses to consider are Rs.79,000 (regular expenses) and Rs.12,000 (loan servicing) i.e. Rs.91,000.

Table 3.1 **Monthly Household Budget of ABC Family**

		Particulars			(In Rupees)	
			Mr. A	**Ms .B**	**Total**	
I		**Income**				
	a.	Gross Salary	50,000	60,000	1,10,000	
	b.	Income from Investment	15,000	12,000	27,000	
		i. Total Income	65,000	72,000	1,37,000	
II		**Expenses**				
	a.	*Mandatory Expenses*				
		ii. Contribution to PF	4000	5000	9000	
		iii. Tax	5000	7000	12000	
		iv. Loan repayment		12000	12000	
	b.	*Essential Living Expenses*				
		v. Grocery			12,000	
		vi. Fees and education			15,000	
		vii. Rent, Maintenance & Other charges			15,000	
		viii. Transportation			10,000	
		ix. Telephone and Internet			7,000	
		x. Utilities			5,000	
	c.	*Discretionary Expenses*				
		xi. Entertainment			5,000	
		xii. Lifestyle expenses			10,000	
		xiii. Total Expenses			112000	
III		**Investments**	10,000	8,000	18,000	
		xiv. Income net of Tax and PF			1,16,000	i -(ii+ iii)
		xv. Monthly surplus in hand			7,000	i-(xiii+III)
IV		**Savings**			34,000	ii+III+xv
		Savings Ratio			24.8%	IV/i

3.3 Cash inflows and outflows

3.3.1 Cash management

One of the important aspects of the household budget management process is the handling of the cash. On paper there could be a situation wherein there is some savings or surplus that is being seen, but this has to match with the actual cash flow because the income and expense figures have to be backed by actual cash.

This aspect of handling the income and expense flow, so that there is proper balance between the need and availability of cash is known as cash management. For example, consider a situation wherein Sunita earns Rs 50,000 a month. This is the income and the various expenses will be considered against this to see how the savings work out. In reality there is something more that needs to be seen and this is whether the full amount of Rs 50,000 has been received every month. It could be that there are several components to Sunita's salary, let us say, Rs 15,000 of various reimbursements that need to be claimed. If in a particular month this figure has not been claimed, then the actual cash inflow would be just Rs 35,000. This can throw the entire calculation out of control and there could be a cash crunch that could arise.

On the expense side too there has to be look at the cash aspect because this can cause some mismatch too. If too many expenses come right at the start of the month then the overall cash balance could run low, which would leave less amounts available for spends during the rest of the month. In case there is a situation where some additional expenses spring up, then again there could be cash mismatch that is witnessed.

Too many expenses right in the first few days of the month can also lead to a problem if the income is delayed for even a few days. This is where the entire cash management comes into play. Taking all these factors and possibilities into consideration, the individual and the household has to ensure that there is enough cash available for various expenses. In addition, there is also the need to ensure that some delays or disruption would not lead to a crisis.

The way in which this would work out is that a surplus amount would always be maintained in the bank or in cash. This would ensure that there is adequate balance available for even some extra expenses that might suddenly arise. The other way to tackle this is through the creation of a separate fund set aside for this purpose. This is different from an emergency fund that is used to tackle income disruption. This separate fund just helps to tackle some short-term cash mismatch.

Effective cash management is thus at the heart of every budget because this will ensure that there is no crisis that arises because there is not enough money to meet the expenses when required. It takes some understanding of the exact nature of the income and the expenses to be able to create the right cash handling position.

3.3.2 Income and expenditure statement

An income and expenditure statement gives a view of the financial flows for an individual or household for a specific time period. There is always a time period for which the income and expenditure statement is prepared and this could be a year or month.

The income and expenditure statement shows the actual amount of income earned during the period and the actual amount of expenses that have been made. This is a very useful tool because the actual figures can be compared with the amounts that have been taken in the budget.

All the income that has been earned is taken on one side and this is considered against the expenses that have been incurred. There is a slight difference between the income and the expenditure statement as compared to the cash statement because there can be some items in the income and expenditure statement that have not been received or paid yet.

A very good example of this is say income from salary. An individual might be receiving their salary on the first of the next month. However, the income and expenditure figure would include the figure in the previous month since this pertains to the previous month. The amount is received a day later, but for calculation purpose it goes into the earlier time period. Similarly, there can be expenses made using a credit card but the payment for this could be due later when the free credit period is over and the bill is generated. Still, this would have to be included in expenditure statement for the period in which the expense was actually made.

The income and expenditure statement shows the extent of the surplus or savings that is generated and this can also give an idea about where the money is actually going and what needs effective control.

3.4 Budgeting and forecasting

The income of a household or individual has to be adequate to meet the current expenses as well as provide the savings to create the assets that will help meet future expenses. If the current expenses are controlled, then it contributes to securing the financial future of the household. It is essential to understand the nature of income and expenses of the household to be able to manage the personal financial situation.

Income has to be regular and stable to be able to be assigned to expenses. The income is first used to meet mandatory expenses such as repayment of loans and payment of taxes. The remaining income is next used to meet essential expenses, such as the living expenses. Discretionary expenses, such as those on entertainment and recreational activities, are next met out of available income. The excess income available is the savings of the household. However, meeting goals and future needs cannot be done if savings is ad-hoc. Prudent financial management requires that a defined level of savings should be targeted that is essential to meet goals. A budget helps a household plan its income and expenses so that the income available is utilized in the best possible way to meet current and future requirements.

The steps to making a budget are the following:

1. List and total the regular and definite incomes that will be received in the period.

2. List and deduct the mandatory expenses from the total income. What is left is the disposable income.

3. Identify essential living expenses of the household and deduct from the disposable income.

4. List the discretionary expenses and deduct it from available income to arrive at the savings.

Once the incomes and expenses are identified and listed, it will be easy to assess where the problem lies, if the savings are seen to be inadequate. The income cannot be expanded beyond a certain level. The focus should be on managing the expenses to enhance savings. If the mandatory expenses are too high, it may be because of the pressure from loan repayments. A debt rationalisation exercise with a financial planner may help reduce the burden to some extent. Discretionary expenses and living expenses to some extent are areas where a household can focus on cutting back or postponing till the income expands to accommodate them without compromising on the required savings.

Forecasting or projecting is the ability to look ahead and plan for the future. Forecasting requires looking at the various data and conditions that are present and based on this and the expected changes there is an estimate of the various figures going forward. There are some conditions that are related to forecasting that needs to be understood.

1. This involves predicting the future situation that is expected to arise. This requires the individual or the household to look at how various events will play out because the final forecast will be based on the conditions prevalent at that point of time.

2. There has to be a specific basis on which forecasting is done. This means that it is not just a random exercise but there is a basis for which the predictions are made. Arriving at the basis for forecasting thus becomes a key aspect.

3. The various evolving conditions are taken into consideration when the forecasting is made. This makes forecasting a dynamic exercise.

4. There are several assumptions that are made when the forecasting is undertaken so these assumptions need to be looked at closely. Assumptions can also change along with the change in the overall conditions.

5. There might be a need for several experts or expert opinion in the way in which things are considered, so this assumes an important role in the overall plan. This is needed as one person might not know about all the areas and factors that impact decision making.

6. There has to be some experience present for the person making the forecasts. Hence, the more one does it, the better it gets because there is a proper idea of how things will work out under different circumstances.

Forecasting is an exercise and this can be used to move ahead with budgeting as it can be the basis for the budget that is prepared. The forecast also has to be seen in the context of what actually happens so that the real situation is understood and deviations if any are plugged.

3.5 Monitoring budgets and provision for savings

Understanding the concept of budgeting is the first step in the entire process of maintaining control over the finances of the household or the individual. Once the concept is known the next step is to actually prepare a budget. This will give a complete picture about how the financial flows look like and it will also give an idea about the areas in which action needs to be taken. This does not complete the process, because one of the most important steps remains i.e. monitoring of the budget.

The process of monitoring of the budget involves recording the actual income and the expenses that have arisen. This shows the real situation that is faced by the household or the individual and it has a vital role to play in decision making. The actual figures when compared to the budget plan, will give an idea of how robust the budget planning actually was. It is not likely that every item considered in the budget will end up with the same actual figure, thus the variation witnessed gives a better picture of the strength of the budgeting process.

The monitoring of the budget has to be done on a continuous basis and after looking at the difference seen in the figures further action needs to be taken. This action has to be in the form of correcting the budget figures going ahead. If there is an area where there is a constant miss of the budget target then the planning is off track and this needs to be improved through future changes. For example, if there is a provision of Rs 4,000 a month for conveyance and the average conveyance expense comes to Rs 6,000 for a few months then it is clear that either the budget figure has to be raised or the individual has to change the mode of conveyance to reduce cost.

The ability to provide various areas of action through monitoring ensures that the budget improves over a period of time. This is the desired outcome from the effort of monitoring.

There can be an end of the month monitoring that will give an idea about the actual situation but the effort also depends on the kind of record keeping that is taking place. If there is a regular noting down of expense, then even a mid month review can be made so that a better idea is available about the manner in which the trend is going and if some specific action is required in the remaining part of the month.

The final objective of the budgeting process is to have some element of extra amounts left with the individual or the household. This means that the income has to be more than the expenses that are made. This balance figure is the savings that can then be put to better use for the future. All the further steps in the financial planning process can arise only if there are savings generated.

The amount of savings that is actually seen has to be checked in the light of the requirements of an individual or household. For example, a person could have a savings of Rs 15,000 per month but if the goals require an investment of Rs 30,000 a month then this is not enough. The budget and its monitoring will also give a direction about the steps to be undertaken so that the savings can rise and reach to the desired level or target.

There might be a small difference between the savings desired and the actual amount of savings done. If this is there then bridging the gap is not a difficult task. The real challenge is when the gap between the actual and the desired savings is huge. This will require a step by step approach to raise the savings level. It can consist of some of the following steps.

1. A target of raising the savings rate by a specified percentage might be set. This could be something like 10 % which is not too difficult to achieve.

2. The target once achieved would result in a further target being set. This will ensure that there are constant efforts to raise the savings rate.

3. The manner in which the savings come about is also significant. Elimination of wasteful expenditure and cutting down on discretionary expenses are a good way to raise the savings rate.

4. Lumpsum of large receipts should be directly diverted towards savings. This can give a boost to the overall savings rate.

5. Higher income should not be committed to some additional expense but this should be left free for contribution to the savings rate.

3.6 Creating a personal Balance Sheet and net-worth

Creating a personal balance sheet for an individual will require that various assets and liabilities are brought together and shown at a single place. A balance sheet shows the financial position of the individual or household in the form of assets and liabilities at a particular date. Things can change after the date and the balance sheet will also change but it is necessary to see how things are stacked up at a particular time and this what the balance sheet actually provides.

Assets for an individual will include physical assets like property, car etc. and financial asset like investments in equity, debt and mutual funds. There might be some advances received by them along with their cash and bank balances which would form current assets. On the liabilities side the various loans that they have plus other payments outstanding including short term debt like credit card dues would make up the list. The different between the assets and the liabilities would be the net worth of the individual or the household.

The income of a household or individual is at the base of all financial activities it undertakes. The income is used to meet current expenses and a portion is set aside to meet expenses in the future. The portion of current income earmarked for future needs is called savings. The adequacy of the income of a household is always relative to its expenses. If the expenses are managed within the income and there is surplus to save, then the household's finances are seen as stable. Short-term imbalances in income and expenses can be managed by loans and advances. The loans are a liability and come at a cost which may further strain the future income. The option of loans to fund expenses must be used with discretion since it weakens the financial situation of the household.

The savings of a household are put to work by investing them in assets. Assets are broadly classified as physical assets and financial assets. Assets may be appreciating in value or depreciating. All assets have a resale value. Investors hold assets for the returns they provide. The nature of return that an asset provides classifies them as growth-oriented, income-oriented or a combination of the two.

Physical assets are tangible assets and include real estate, gold and other precious metals. Physical assets have an intrinsic value though the actual price at which they trade is impacted by demand and supply. They are usually seen as natural hedges against inflation since their price show a positive correlation with inflation. Physical assets are more growth investments that are bought for the appreciation in value rather than the income they generate. Some such as real estate provide both income and growth while others such as gold are pure growth-oriented assets. The primary drawbacks of physical assets are illiquidity, lack of regulation/limited regulation and the need for specific skills to identify investment opportunities, assess the merits of the investment, arrange for the purchase of the asset and its management and sale of the asset when required. The other limitation of physical assets as an investment is that they are typically large ticket investments and require substantial savings or a combination of savings and loan to acquire.

Financial assets represent a claim that the investor has on benefits represented by the asset. For example, a bank deposit gives the benefit of periodic interest and repayment of principal amount to the holder of the asset, an equity share provides periodic dividend paid, if any, and the appreciation or depreciation in its value is also to the account of the holder. These assets may be structured as growth-oriented assets, such as equity investments, or as income-oriented, such as deposits, or a combination of the two, such as all listed securities. Financial assets are typically standardized products and controlled by the regulations in force at the point in time. They may differ on liquidity features, with some such as listed securities enjoying high liquidity, while others such as privately placed instruments featuring low liquidity. The standardization of financial assets and the mandatory information made available makes evaluation and comparisons more efficient. These assets lend themselves to investment in small amounts and units. Together, the physical and financial assets represent the investments made by the investor.

While these assets represent financial benefits and returns to the holder, the financial strength of the household depends upon how the assets are acquired. Loans and borrowings used to buy assets create a liability and impose a repayment obligation on the buyer and a charge on the future income of the household. Loans taken to buy appreciating assets add to the long-term wealth. Loans taken to buy financial assets, also called leveraging, is risky because of the higher volatility in the price of such assets. Assets acquired with savings and without taking on a liability add to the financial strength of the household.

An assessment of the financial well-being of the household can be made by calculating the Net worth. The net worth is calculated as Assets – Liabilities. Higher this number better is the financial position of the household. Net worth should be calculated periodically, and the progress tracked to bring the financial situation to the desired stage.

An example of a personal budget for Lakshmi is given below. A brief analysis of this will give a better idea about the existing financial situation for her. There is a fixed asset in the form of a house and a car that is present. As compared to the value of the house, the investment figure is still a bit less and these are also not much into growth assets like equity and equity oriented mutual funds. The amount lying in the bank is also not very high. On the other side the net worth figure is relatively low because most of the assets have been acquired through loans and a large part of these are still outstanding. Over a period of time the changes in the net worth can be seen to see how this is rising along with the value of the assets. The net worth is the total assets of Rs 36,22,000 reduced by the total liabilities of Rs 12,07,000 (Rs 12,02,000 +5,000) giving the amount as Rs 24,15,000. Individuals tend to look at total assets but it is net worth that is more relevant.

Personal balance sheet example

Liabilities	Amount	Assets	Amount
Net worth	**24,15,000**	House	18,12,000
Loans		Car	3,25,000
Housing Loan	12,02,000	Investments	
Credit card dues	5,000	Mutual Funds	8,40,000
		PPF	3,20,000
		Shares	2,80,000
		Cash and Bank	45,000
Total	36,22,000	**Total**	36,22,000

3.7 Creating a budget and savings plan

There are several steps that need to be taken when a budget and savings plan is created. This will ensure that the process is done in a step-by-step manner and nothing has been missed out. The following steps would be useful in the budget creation process

a) Start by gathering all the relevant details about the various sources of income and expenses for the individual or the household. The availability of the basic information is the most crucial part of the process, so unless this is present the budget would not reflect the true situation.

b) Check to see that some area has not been missed out in terms of the heads of income or the heads of expenses. This requires going back and looking at the details over and over again. The wider the coverage of the areas, the better the budget will turn out to be.

c) Base the budget figures on either actual expenses that have been made in the past or if this has changed, then the kind of expense that are likely. A record of various expenses would be very useful to arrive at the correct estimate.

d) There has to be some element of change in the various figures in the budget based on the time period for which this is done. For example, when vegetable prices show a seasonal spike a higher amount needs to be allocated here. A month in which there are a couple of birthdays in the family might need a higher allocation for discretionary expenses.

e) There has to be a contingency figure that is present in the budget. There are times when a sudden change disrupts everything but this feature would ensure that the budget remains robust.

f) The amount of savings needed would have to be achieved through the curtailment of expenses within limits. So, the required savings figure based on the goals needs to be present.

g) There has to be a proper allocation of the savings amount and this should be done before the figure is spent elsewhere. This is why there has to be a direct transfer to the various investments, so that the amount automatically goes each month in the required investments.

Make the savings plan a part of the fixed figure in the budget and this will ensure that there are no variations here and that the goal is met.

3.8 Contingency Planning

Investment advisers need to prepare the client for various contingencies that might come up. The household or individual's financial strategy needs to provide for these risks. The following are typical contingencies to provide for:

* A family that is dependent on incomes of both its earning members needs some protection. If anything were to happen to either earning member, the family will be in dire straits. Life insurance mitigates this risk.

* Healthcare costs are another financial risk for any family. Medical insurance, addresses this risk.

*Income streams are also affected if people lose their jobs. The double income can offer some kind of insurance against the job loss risk. If one loses the job, the other hopefully will retain the job. This would ensure that some income keeps coming in every month.

* An emergency fund needs to be the first goal towards which a household or individual should save as a protection against the possibility of loss or reduction of income. The fund should be adequate to meet the expenses for six months, in the event the regular income is not available. The emergency fund should be held in liquid assets, to enable easy access as and when required. If income security is high, the fund can also be held in a laddered way, with the equivalent of around three months' expenses being held in liquid assets, and the rest of the funds being held in a less liquid assets but which gives better returns. If the emergency fund is used then efforts must be made to replenish it as soon as possible. The adequacy of the emergency fund should also be periodically reviewed. It should be done annually or whenever there is a large addition, such as an EMI, to the monthly expenses.

* Separation (divorce) is another risk that families face. In developed countries, the wealthy go in for pre-nuptial agreements. This is an agreement, entered into before marriage, which details how the finances (and any other matter) will be dealt with, in the event of a separation. The legality of such pre-nuptial agreements in India has not been established.

* The Investment Adviser should ensure a healthy distribution between both spouses of the holdings of the family's assets and liabilities. For example, in some investments, one partner will be the first holder, while the other may be a joint holder; the holding pattern can be reversed in some other investments.

* In the case of double income families, the holding pattern can be closely aligned to the source of income of the investment. Investment made out of incomes of one partner can be held with that partner as the first holder.

* Another approach would be to keep the salary account of each partner distinct (with the other partner as joint holder). This account is to be used only for investments, or to transfer funds to another joint account that is used for meeting household expenses. Such segregation of investment flows and household expense flow helps in better expense monitoring, as well as investment record keeping and tax record keeping.

* When a housing loan is taken for purchase of property, the partners can be joint owners of the property as well as joint borrowers for the loan.

3.9 Evaluation of financial position of clients

The personal financial situation of an individual or a household primarily refers to its ability to manage its current and future needs and expenses. The income available to do this may be drawn from salary, a business or profession or from the assets created over time by saving and investing a portion of the income. Typically, assets are created to meet the future expenses of the household, and financial planning helps apportion the available current income to immediate expenses and savings for the future. Loans are used to meet expenses and to create assets, if the income is inadequate to meet all the needs. This creates a liability for the household which also has to be settled in the future from the income.

The efficiency with which the interplay between income, expenses, assets and liabilities are handled by the household determines its financial situation. Insurance planning is an essential element of a financial plan. Insurance is an efficient way of protecting the household finances from a loss of income or a large, unexpected expense that can derail the financial situation. Similarly, meeting income needs in retirement is an important concern and financial goal for all households.

Just as analysts use various ratios to assess the financial position of companies, similarly, investment advisers use various personal finance ratios to assess the financial position of their clients. These ratios are calculated using the income, expenses, savings and investment data for each client and gives a numerical snapshot of their current situation. It helps identify areas that require changes and helps set the course of action for the future. Personal finance ratios thus form an important input in the financial planning process. Some of the important ratios are as follows:

3.9.1 Savings Ratio & Expenses Ratio

Savings Ratio is the percentage of annual income that a person is able to save. It is calculated as Savings per year/Annual Income.

ABC earns an annual income of Rs. 6 lakhs and saves Rs. 60,000 from the income. The savings ratio is Rs. 60,000 ÷ Rs. 6,00,000 = 10%.

Savings is not limited to money that is retained in the savings bank account. Money invested in fixed deposits, mutual funds, shares, debentures, public provident fund, national savings certificates, post office deposits, real estate, gold and others during the year also form part of the savings.

Some savings may not even reach the investor during the year. For example, the company's contribution to provident fund or superannuation fund on account of the investor. The money will not go to the investor immediately, but it belongs to the investor and will be available in the investor's account with the provident fund or superannuation fund and will form part of the savings during the year.

Annual income will include all income earned from employment or business and in the form of interest, dividend, rent and such other items during the year.

Consider the following information. XYZ earned a gross salary of Rs. 10,000, including company's contribution to provident fund of Rs. 500. Net take home salary was Rs. 9,000 after deducting Rs. 500 towards employee's contribution to provident fund. XYZ earned Rs. 200 towards interest in the savings bank account. Expenses during the month were Rs. 7,000. What is the savings ratio?

Total Income: Gross salary + Interest income = Rs10,000 + 200 = Rs10,200

Savings: (Net salary + Interest income + Contributions of employer and employee to provident fund)–(Expenses) = Rs9,000 + Rs200 +Rs500 + Rs500 – Rs7,000 =Rs3,200.

Savings Ratio: Savings /Total Income = Rs3,200 ÷ Rs10,200 =31.4%.

The Savings to Income ratio measures the total accumulated savings of the individual relative to the annual income. It is calculated as Total Savings/Annual Income.

Consider the following information of the financial situation of GGN.

Annual salary: Rs.12,00,000

Accumulated investments, including PF balance, value of bank deposits, mutual fund units, PPF, NSC: Rs. 15,00,000

Accumulated Savings to Income ratio: Rs.15,00,000/Rs.12,00,000= 1.25

This ratio measures the preparedness to meet long term goals such as retirement. The current value of the investments and assets, after accounting for any outstanding loans taken to acquire the same, is taken to compute the total savings. Self-occupied home is typically not included when calculating the savings level.

The appropriate level for this ratio will depend upon the age of the individual. When the individual is young, expenses are high relative to the income available and the accumulated savings are likely to be low. Moreover, at this stage much of the available surplus is likely to go towards servicing a home loan. The ratio is expected to improve over time, as income goes up and expenses stabilize. A suitable savings to income ratio in the early 40s is at least 3 times the annual income. This means that the annual savings rate, or the annual savings relative to income, has to be stepped up as income levels go up, so that the savings can be built to a level that is suitable to the age and stage in life.

In the earlier example, if ABC has saved Rs. 60,000 out of an income of Rs. 6 lakhs, it stands to reason that Rs. 6,00,000 – Rs. 60,000 i.e. Rs. 5,40,000 was spent towards various expenses.

The Expenses Ratio is calculated as Annual Recurring Expenses ÷ Annual Income. In the case of ABC, it amounts to Rs. 5,40,000 ÷ Rs. 6,00,000 = 90%.

Expenses Ratio can also be calculated as 1 – Savings Ratio. Similarly, Savings Ratio is 1 – Expenses Ratio.

Non-recurring expenses are kept out of the expense ratio. For example, if a person incurred a one-time medical expenses of Rs. 50,000 in a year, then that would be excluded. However, if it is found that on an average, every year the family spends Rs. 30,000 towards healthcare expenses (beyond any re-imbursement from employers or insurers), then these would be included in determining the expense ratio.

Suppose a family goes on a foreign holiday every 3 years, when they spend about Rs. 6,00,000, then its annual equivalent viz. Rs2,00,000 will be considered in the expense ratio.

Expenses may be mandatory, such as taxes, rents, EMIs for loans and necessities for living. Discretionary expenses are those items of expenses that are not essential. Much of the reduction and rationalisation of expenses happen with respect to discretionary expenses in order to improve the savings ratio. A low expense ratio and high savings ratio is desirable for an individual’s financial security and stability.

3.9.2 Total Assets

Savings of the individual are deployed in various forms of physical and financial assets such as shares, debentures, mutual funds, real estate, gold, provident fund, superannuation fund, and others over a period of time. The current value of these assets constitutes the investor's total assets. Physical assets such as real estate is typically acquired with a combination of savings and loans.

A conservative approach would be to exclude personal jewellery, one residential house that the investor's family stays in, and any other form of asset meant for personal use (e.g. car) while estimating assets available to meet goals and financial needs.

3.9.3 Total Liabilities

Liabilities include loans and different forms of credit taken to meet expenses or to acquire assets. These may be taken from institutional sources, such as banks and financial institutions, or from personal sources such as friends and relatives. Liabilities may be long term and secured on assets, such as mortgage towards purchase of house and car loans. Or they may be short-term and unsecured, such as credit card outstanding and personal loans. Such liabilities tend to be more expensive.

Liabilities imply an obligation to repay the loan from the future income. This impacts the ability of the household to meet other expenses and to save for other assets. It must be used with caution, ideally to acquire assets that appreciate in value. Greater is the liability, more shall be the financial pressures on the investor for repayment.

3.9.4 Leverage Ratio

This is a measure of the role of debt in the asset build-up of the investor. It is calculated as Total Liabilities ÷ Total Assets.

For example, an investor owns real estate worth Rs.50 lakhs, investments and bank balances valued at Rs.10 lakhs, and Rs.5 lakhs is lying in provident fund account. The real estate was bought with a loan of Rs. 30 lakhs, of which Rs. 10 lakhs is currently outstanding. The investor also has credit card dues of Rs. 2 lakhs and a loan of Rs.1 lakh from a friend.

Total assets = Rs. 50 lakhs + Rs. 10 lakhs + Rs. 5 lakhs i.e. Rs. 65 lakhs.

Total liabilities = Rs. 10 lakhs + Rs. 2 lakhs + Rs. 1 lakh i.e. Rs. 13 lakhs.

Leverage Ratio = Rs. 13 lakhs ÷Rs. 65 lakhs i.e. 20%.

Higher the leverage, more risky it is for the individual's financial situation. A ratio greater than 1 indicates that the assets will not be adequate to meet the liabilities. The ratio is likely to be high immediately after a large-ticket asset, such as real estate, is purchased with debt. Over time as the asset value appreciates, the ratio will also moderate. Investor needs to look at the leverage in the context of debt servicing capability. Further, investor needs to ensure that a risky investment position is not compounded with high leverage financing it.

3.9.5 Net Worth

A strong asset position is of no use, if most of these are acquired through loans that are outstanding. Similarly, liability is not bad, if it has been used for creating an asset, such as real estate, which has the potential to appreciate in value.

It is therefore normal to monitor any investor's financial position through the net worth. It is calculated as Total assets – Total liabilities.

In the previous example,

Net worth = Rs. 65 lakhs – Rs. 13 lakhs i.e. Rs. 52 lakhs.

Net worth is monitored over a period of time to monitor improvement or deterioration in the financial position.

3.9.6 Solvency Ratio

Despite having assets, a person may be insolvent, if the liabilities are higher than the value of the assets held. A critical benchmark is that the individual's net worth should be positive.

The extent of the investor's solvency can be determined through the solvency ratio, which is calculated as Net Worth ÷ Total Assets. For the same asset position, higher the solvency ratio, stronger the investor's financial position.

In the above example, it is calculated as Rs. 52 lakhs ÷ Rs. 65 lakhs i.e. 80%.

It can also be calculated as 1 – Leverage Ratio. Similarly, Leverage Ratio = 1 – Solvency Ratio.

3.9.7 Liquid Assets

Liquid assets are those assets that can be easily converted into cash at short notice to meet expenses or emergencies. Liquid assets include money in savings bank account, fixed deposits that mature within 6 months, investment in liquid funds or other mutual funds and such other short-term assets. On the other hand, there are assets that are not easy to convert into cash. For example, it can take a long time to sell real estate at the fair value and realize it.

Closed-end mutual fund units may not be as easily realizable as units of open-end mutual fund units. Some assets may be easily converted into cash but their values may fluctuate widely in the short-term, thus making them unsuitable for realising cash at short notice. Shares and open-end equity schemes fall under this category. Open-end debt schemes too have a significant market element in their valuation which makes their return volatile, and therefore unsuitable to meet the need for funds at short notice.

More the money in liquid assets, lesser are the chances of the investor getting caught in a liquidity crunch. However, keeping the entire money in liquid assets is not a sensible solution. Liquidity comes at a cost. For example, banks usually offer lower rate of interest on shorter-term fixed deposits; liquid schemes may yield a lower return than longer-term debt schemes.

Investors therefore need to balance their liquidity and return needs. Keep enough in liquid assets to meet liquidity requirements, and invest the balance in longer term assets with a view to earning superior return.

3.9.8 Liquidity Ratio

The role of liquid assets is to meet the near-term liquidity needs of the individual. It is normal to calculate the liquidity needs as the expenses that an investor will incur over the following 6 months (including loan repayments). In exceptional situations, expenses over a longer period may be considered.

Liquidity ratio measures how well the household is equipped to meet its expenses from its short-term assets. It is calculated as: Liquid Assets/Monthly Expenses.

A ratio of at least 4 to 6 indicates a comfortable level for the household to meet its expenses for 4 to 6 months, even if there was a loss or decline in regular income.

Consider the financial situation of NFG. The monthly expense incurred, including loan repayments, is Rs.1.5 lakh. The market value of the assets held are as follows:

Equity Shares Rs.3 lakhs

Savings bank account Rs.7lakhs

Short-term Fixed Deposits Rs.2 lakhs

Long-term Fixed Deposits Rs.6 lakhs

Open-end liquid mutual fund schemes Rs.4 lakhs

Other open-end mutual fund schemes Rs.5 lakhs

Closed-end mutual fund schemes Rs.12 lakhs

Liquid assets = Rs.7lakhs + Rs.2lakhs + Rs.4 lakhs = Rs.13 lakhs.

Liquid Ratio = Rs.13lakhs ÷ Rs.1.5 lakhs= 8.66.

A ratio of around 6, which means 6 months, indicates a comfortable situation to manage short-term obligations.

Note: Shares have not been included in liquid assets because the uncertainty in the value of the share makes it risky for an investor to include in liquid assets.

Another liquidity ratio that is tracked is the Liquid assets to Net worth ratio. This ratio has to be interpreted in light of the goals of the individual. If there is a longer period to the goals, then this ratio should be low. A high ratio would indicate that a large portion of the savings are held in liquid assets and would be earning low returns. This will affect the ability to meet their long-term goals efficiently. If goals have to be met in the near term, then adequate assets must be held in easily realisable assets. In this situation the ratio needs to be higher.

3.9.9 Financial Assets Ratio

Assets can broadly be categorised as financial assets such as shares, debentures, bank deposits, Public Provident Fund, mutual fund investments and others, and physical assets such as gold, other precious metals, diamonds and real estate. Financial assets have the advantage of greater liquidity, flexibility, convenience of investing and ease of maintaining the investments. They are primarily income generating investments, though some of them, such as equity-oriented investments are held for long-term capital appreciation. There is greater ease of investing in such assets as it lends itself to small and frequent investments.

Consider the assets held by PQR:

Shares Rs. 5 lakhs, Fixed Deposits Rs. 10 lakhs, Mutual Fund Investments Rs. 12 lakhs, Land Rs. 9 lakhs and Gold Rs. 14 lakhs

Financial assets are Rs. 27 lakhs (5 + 10 + 12)

Physical assets are Rs. 23 lakhs (9 + 14)

Total assets are Rs. 50 lakhs (27 + 23)

Financial assets ratio= [(Rs. 27 lakhs ÷ Rs. 50 lakhs)*100]= 54%.

A higher proportion of financial assets is preferred especially when goals are closer to realisation and when there is a need for income or funds to meet the goals.

3.9.10 Debt to Income Ratio

Leverage ratio measures the extent of debt use in asset acquisition. It however does not directly measure the ability of the individual's income to service or meet the obligations arising from all debt outstanding. Debt to income ratio is an indicator of the individual's ability to manage current obligations given the available income and a parameter used by lenders to determine eligibility for additional loans.

It is calculated as Monthly Debt Servicing Commitment ÷ Monthly Income.

Debt servicing refers to all payments due to lenders, whether as principal or interest.

Consider an example where an individual has a monthly income of Rs.1.5 lakh and has loan commitments of Rs. 60,000 per month. The Debt to Income ratio = Rs.60,000/Rs.150,000= 40%.

A ratio higher than 35% to 40% is seen as excessive. A large portion of the income of the household is committed to meet these obligations and may affect their ability to meet regular expenses and savings. Obtaining loans in the case of an emergency may also become difficult. Any reduction in income will cause stress to the household's finances.

Personal Finance Ratios need to be calculated periodically, say once a year, and compared with past numbers to identify trends. They help identify areas where corrective action needs to be taken to improve the financial situation. The trends also show the efficacy of actions already taken. While benchmarks have been established for each of the ratios, they may have to be customized to each individual's situation.