R15 Introduction to Financial Statement Analysis

Version 1.0

1. Introduction

Financial analysis is the process of examining a company's performance. For this purpose, financial reports are one of the most important sources of information available to a financial analyst. A financial analyst must have a strong understanding of the information provided in a company's financial reports, notes, and supplementary information.

2. Scope of Financial Statement Analysis

In order to understand financial analysis, we first need to understand the difference between the roles of financial reporting and financial statement analysis.

Financial reporting
The role of financial reporting is to provide information about a company's performance (income statement and cash flow statement), financial position (balance sheet) and changes in financial position (statement of changes in equity).

Financial statement analysis
The role of financial statement analysis is to use the financial reports prepared by firms and combine them with other sources of information to decide if you can invest in the equity of the firm or lend money to the firm.

3 – 8. Primary Financial Statements and Other Information Sources

Instructor's Note: The financial statements mentioned below will be covered in a lot more detail in later readings. At this stage, you simply need to understand the basics.

The primary financial statements are the balance sheet, the income statement, the cash flow statement, and the statement of changes in owners' equity.

Balance Sheet (Statement of Financial Position)
The balance sheet reports the firm's financial position at a specific point in time. It has the following elements:

- Assets – What the company owns.
- Liabilities – What the company owes.
- Owners' equity – What the shareholders of the company own. Depending on the form of the organization, owners' equity may be referred to as "partners' capital" or "shareholders' equity" or "shareholders' funds", or "net assets".

The relationship between the elements can be shown as:

Assets = Liabilities + Owners' equity

The capital structure of a company represents the combination of liabilities and equity used to finance its assets. Both financial position and capital structure are useful in credit analysis.

Income statement
The income statement reports the financial performance of the firm over a period of time. It has the following elements:

- Revenues – Income generated by selling goods and services.
- Expenses – Costs incurred for producing goods and services.
- Net income – Resulting profit or loss.

The relationship between the elements can be shown as:

Net income = Revenues - Expenses

Cash flow statement

The cash flow statement reports the sources and uses of cash for the firm over a period of time. It has the following elements:

- Operating cash flows – Cash flows from day-to-day activities.
- Investing cash flows - Cash flows associated with the acquisition and disposal of long-term assets, such as property and equipment.
- Financing cash flows - Cash flows from activities related to obtaining or repaying capital.

Statement of changes in owner's equity

It reports the changes in the owners' investment in the firm over time. It has the following elements:

- Paid in capital – Amount raised from owners.
- Retained earnings – Firm's profits that have been retained (i.e., not paid out as dividends).

Along with these required financial statements (mentioned above), a company typically provides additional information in its financial reports. This includes footnotes, management's commentary, and auditor's report.

Footnotes

They provide additional details about the information presented in financial statements. This includes important information about the accounting methods, estimates, and assumptions. They also contain information regarding acquisitions and disposals, commitments and contingencies, legal proceedings, employee stock options and other benefits, related party transactions and business, and geographic segments.

Management's commentary or Management Discussion and Analysis (MD&A)

It provides an assessment of the data reported in the financial statements from the management's perspective. Examples of content include trends and significant events affecting the company's operations, liquidity and capital resources, off-balance sheet obligations, and planned capital expenditures.

Auditor's report

An audit is an independent review of a firm's financial statements. It enables the auditor to express an opinion on the fairness and reliability of the financial reports. An audit report can contain one of the following opinions:

- Unqualified Opinion - Reasonable assurance that financial statements are fairly

presented. This is also referred to as an "unmodified" or a "clean" opinion. (This is the opinion that you would like to see.)
- Qualified Opinion - Some misstatement or exception to accounting standards.
- Adverse Opinion - Financial statements materially depart from accounting standards and are not presented fairly.
  If the auditor is not able to issue an opinion for reasons such as a scope limitation, a disclaimer of opinion is issued.

For listed companies, the audit report also includes a discussion of Key Audit Matters (international) and Critical Audit Matters (US). Key Audit Matters and Critical Audit Matters include issues having a higher risk of misstatement, involving significant management judgment and estimates.

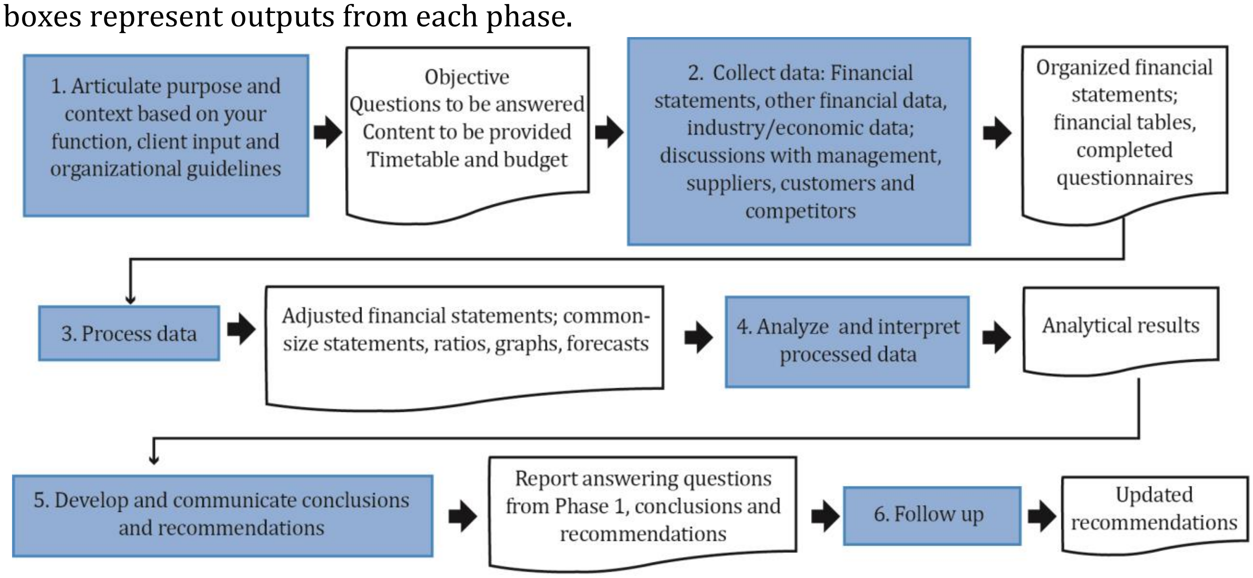
Other information sources

Apart from the above-mentioned sources, other information sources available for an analyst are:

- Interim reports – Quarterly or semiannual reports prepared by the firm. These reports are not audited.
- Proxy statements - Statements distributed to shareholders about matters that are to be put to a vote.
- Press releases, conference calls, and websites – Firms often provide current information via these media.
- External sources – Information about the economy, industry, and the firm's competitors.

9. Financial Statement Analysis Framework

A financial statement analysis framework recommended by the CFA Institute is summarized in the figure below. The grey boxes represent phases of financial analysis while the white boxes represent outputs from each phase.



Articulate the Purpose and Context of Analysis
In this step, we understand the purpose of the analysis. For example, an equity analyst analyzes the financial reports in order to decide whether to invest in the stocks of the company or not. On the other hand, a credit analyst looks at the company in a very different light in order to judge whether it should be given a loan or not.

Next, the analyst defines the context which includes details such as the intended audience, time frame, budget, and so on. Once the purpose and the context are defined, the analyst compiles the specific questions to be answered by the analysis, decides on the content to be prepared, and finalizes the timeline and the budget.

Collect Data
Next, the analyst collects data required to answer the questions compiled in the previous step. The sources of data are financial reports and other information sources.

The output from this step includes organized financial statements, financial tables, and completed questionnaires.

Process Data
After collecting data, the analyst processes the data using appropriate analytical tools. This involves:

- Making any adjustments to the financial statements to facilitate comparison. For example, adjustments will be required to compare a company using IFRS with a company using US GAAP.
- Creating graphs, ratios, common-size statements, etc.

The output from this step includes adjusted financial statements, common-size statements, ratios, graphs, and forecasts.

Analyze/Interpret the Processed Data
The next step is to interpret the processed data and come up with a decision. For example, an equity analyst may come up with a buy, sell, or hold decision.

Develop and Communicate Conclusions/Recommendations
Next, the analyst communicates the conclusions or recommendations in the appropriate format. For example, an equity analyst will prepare a research report and send it to his firm's clients.

Follow-up
Conduct periodic reviews to check if the previous conclusions are still valid. Change the conclusions/recommendations when necessary. For example, an equity analyst may send quarterly updates on his initial buy, sell, or hold recommendation.

Summary

LO.a: Describe the roles of financial reporting and financial statement analysis.

The role of financial reporting is to provide information about a company's performance (income statement and cash flow statement), financial position (balance sheet) and changes in financial position (statement of changes in equity).

The role of financial statement analysis is to use the financial reports prepared by firms and combine them with other sources of information to decide if you can invest in the equity of the firm or lend money to the firm.

LO.b: Describe the roles of the key financial statements (statement of financial position, statement of comprehensive income, statement of changes in equity, and statement of cash flows) in evaluating a company's performance and financial position.

The balance sheet reports the firm's financial position at a specific point in time. It shows the firm's assets, liabilities, and owners' equity.

The income statement reports the financial performance of the firm over a period of time. It shows the firm's revenues, expenses, and net income.

The cash flow statement reports the sources and uses of cash for the firm over a period of time. It shows the firm's operating, investing, and financing cash flows.

Statement of changes in owner's equity reports the changes in the owners' investment in the firm over time. It shows the firm's paid in capital and retained earnings.

LO.c: Describe the importance of financial statement notes and supplementary information - including disclosures of accounting policies, methods, and estimates - and management's commentary.

The notes (also called footnotes) are important as they disclose information about the accounting policies, methods, and estimates used to prepare the financial statements. They contain important information regarding acquisitions and disposals, commitments and contingencies, legal proceedings, employee stock options and other benefits, related party transactions and business, and geographic segments.

Management's commentary comprises of subjective information where management is presenting its view and interpretation of the data it has reported. Examples of content include trends and significant events affecting the company's operations, liquidity and capital resources, off-balance sheet obligations, and planned capital expenditures.

LO.d: Describe the objective of audits of financial statements, the types of audit reports, and the importance of effective internal controls.

An audit is an independent review of a firm's financial statements. It enables the auditor to express an opinion on the fairness and reliability of the financial reports. An audit report can contain one of the following opinions:

- Unqualified Opinion - Reasonable assurance that financial statements are fairly presented.
- Qualified Opinion - Some misstatement or exception to accounting standards.
- Adverse Opinion - Financial statements are not presented fairly.

For listed companies, the audit report also includes a discussion of Key Audit Matters (international) and Critical Audit Matters (US). Effective internal controls are important to ensure the accuracy of financial statements. A firm's management is responsible for maintaining an effective internal control system.

LO.e: Identify and describe information sources that analysts use in financial statement analysis besides annual financial statements and supplementary information.

Apart from the financial statements, other information sources available for an analyst are:

- Interim reports – Quarterly or semiannual reports prepared by the firm.
- Proxy statements - Statements distributed to shareholders about matters that are to be put to a vote.
- Press releases, conference calls, and websites – Firms often provide current information via these mediums.
- External sources – Information about the economy, industry, and the firm's competitors.

LO.f: Describe the steps in the financial statement analysis framework.

The financial statement analysis framework consists of the following six steps:

1. Define the purpose and context of the analysis.
    - Define the purpose and context of the analysis based on your function, client inputs, and organizational guidelines.
    - Determine the time frame and the resources available for the task.
2. Collect data.
    - Collect data from financial statements and other information sources.
3. Process the data.
    - Make adjustments to financial statements.
    - Create graphs, ratios, common-sizes statements, etc.
4. Analyze and interpret the data.
5. Develop and communicate conclusions and recommendations.
6. Follow up.
    - Conduct periodic reviews to check if previous conclusions are still valid.

Practice Questions

1. Information regarding a company's financial position, financial performance, and changes in financial position is disclosed in which of the following process:
   A. auditing.
   B. financial statement analysis.
   C. financial reporting.

2. A company's financial position at a given time is *best* portrayed by:
   A. balance sheet.
   B. income statement.
   C. cash flow statement.

3. Information regarding the accounting policies, estimates, and the methods used in preparing the financial statements would be *most likely* found in the:
   A. management's discussion and analysis.
   B. notes to financial statements.
   C. auditor's report.

4. When analyzing financial statements, the type of audit opinion that is *most* preferred is:
   A. unqualified.
   B. qualified.
   C. adverse.

5. Which of the following would *most likely* provide information about election of board members?
   A. auditor's report.
   B. notes to financial statements.
   C. proxy statement.

6. Ratios are an output of which step in the financial statement analysis framework?
   A. Collect data.
   B. Analyze and interpret data.
   C. Process data.

Solutions

1. C is correct. In financial reporting, statements that include information regarding the company's financial position, financial performance, and changes in financial position are published. In financial statement analysis, information disclosed in the financial statements is evaluated.

2. A is correct. The balance sheet portrays the current financial position of the company at a specific time. The income statement and cash flow statement portray the financial performance of the company over a specific period of time.

3. B is correct. Information regarding the accounting policies, estimates, and the methods used in preparing the financial statements is found in the notes to financial statements.

4. A is correct. An unqualified opinion is a clean opinion that represents that statements are free from errors and are in accordance with accounting standards. A qualified opinion represents any deviations from the accounting standards while an adverse opinion represents that the statements are not represented in a fair manner.

5. C is correct. Matters, like election of board members, that require shareholder vote are included in the proxy statement.

6. C is correct. The steps in the financial statement analysis framework are:
   1. Articulate purpose and context of analysis.
   2. Collect data.
   3. Process data.
   4. Analyze and interpret data.
   5. Develop and communicate recommendations and conclusions.
   6. Follow up.

   Ratios are an output of the "process data" step. They then form an input to the "analyze and interpret data" step.

