

Registration ID: 15513, Discipline: MS Civil Engineering, Course Title: Construction Financial Management, Course Code: CE-602, Instructor: Dr. Engr. Muhammad Zeeshan Ahad, Date: 20.04.2020

STERLING CONSTRUCTION COMPANY, INC. & SUBSIDIARIES

CONSOLIDATED BALANCE SHEETS

(Amounts in thousands, except share and per share data)

	As at 31-12-2018	As at 31-12-2017
ASSETS		
Current assets:		
Cash and cash equivalents	\$ 94,095	\$ 83,953
Receivables, including retention	145,026	133,931
Costs and estimated earnings in excess of billings on uncompleted contracts	41,542	37,112
Inventories	3,159	4,621
Receivables from and equity in construction joint ventures	10,720	11,380
Other current assets	8,074	7,529
Total current assets	302,616	278,526
Property and equipment, net	51,999	54,406
Goodwill	85,231	85,231
Intangibles, net	42,418	44,818
Other assets, net	309	317
Total Assets	\$ 482,573	\$ 463,298
LIABILITIES AND EQUITY		
Current liabilities:		
Accounts payable	\$ 99,426	\$ 97,457
Billings in excess of costs and estimated earnings on uncompleted contracts	62,407	62,374
Current maturities of long-term debt	2,899	3,978
Income taxes payable	318	81
Accrued compensation	9,448	9,054

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Other current liabilities	4,676	9,348
Total current liabilities	179,174	182,292
Long-term liabilities:		
Long-term debt, net of current maturities	79,117	86,160
Members' interest subject to mandatory redemption and undistributed earnings	49,343	47,386
Deferred taxes	1,450	—
Other long-term liabilities	1,229	1,271
Total long-term liabilities	131,139	134,817
Commitments and contingencies		
Equity (Net Worth)		
Sterling stockholders' equity:		
Preferred stock, par value \$0.01 per share; 1,000,000 shares authorized, none issued	—	—
Common stock, par value \$0.01 per share; 38,000,000 shares authorized, 27,063,974 and 27,051,468 shares issued	271	271
Additional paid in capital	233,795	231,183
Treasury Stock at cost, 466,519 shares at December 31, 2018	(4,731)	—
Retained deficit	(64,934)	(90,121)
Total Sterling common stockholders' equity	164,401	141,333
Non-controlling interests	7,859	4,856
Total equity	172,260	146,189
Total liabilities and equity	\$ 482,573	\$ 463,298

Table: 1.1

Source: http://www.annualreports.com/HostedData/AnnualReports/PDF/NASDAQ_STRL_2018.pdf

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Case Study - Sterling Construction Company, Inc.:

Sterling Construction Company, Inc. is a heavy civil construction company engaged in the building and reconstruction of transportation and water infrastructure projects all over USA. The Company's transportation infrastructure projects include highways, roads, bridges, airfields, ports and light rail. Its water infrastructure projects include water, wastewater and storm drainage systems.

Financial Analysis:

Financial position of a company is reflected by the balance sheet, at any point of time, which is usually the last date of the company's fiscal year. It is like a snap shot picture that indicates the company's financial status at any point of time i.e. the measure of its assets, liabilities and equity. Financial health of the company is compared for at least two consecutive fiscal years.

Sterling's balance sheet (Table 1.1) for the fiscal year 2017-2018 is taken into consideration for its financial analysis. Key parameters of company's financial soundness are:

1. Assets
 - 1.1. Current Assets
 - 1.2. Fixed Assets
2. Liabilities
 - 2.1. Current Liabilities
 - 2.2. Long Term Liabilities
3. Equity (Net Worth)
4. Working Capital
5. Current Ratio
6. Under Billing & Over Billing

1. Assets:

The assets of a business or company represents whatever a company owns and are usually indicated at the top of a balance sheet. Assets are categorized as Current & Fixed assets. **Current Assets** of a construction company are usually cash, receivable accounts, construction material inventory and others, which have high liquidity, whereas the **Fixed Assets** includes property and

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equipment, construction plant, trucks and so on which can't be converted into easy cash. Fixed Assets are also termed as Long-term Assets. The sum of Current & Fixed Assets results in Total Assets of the business / company.

Total Assets = Total Current Assets + Total Fixed Assets

Given Data Table 1.1 (Amounts in thousands):

Total Current Assets (2018) = \$ 302,616

Total Fixed Assets (2018) = \$ 179,957

Total Assets (2018) = \$ 302,616 + \$ 179,957 = \$ 482,573

Total Current Assets (2017) = \$ 278,526

Total Fixed Assets (2017) = \$ 184,772

Total Assets (2017) = \$ 278,526 + \$ 184,772 = \$ 463,298

Increase/Decrease in Total Assets = Total Assets (2018) - Total Assets (2017)

= \$ 482,573 - \$ 463,298

= \$ 19,275

1.1 Current Assets:

Given Data Table 1.1 (Amounts in thousands):

Total Current Assets (2018) = \$ 302,616

Total Current Assets (2017) = \$ 278,526

Increase/Decrease in Total Current Assets = Total Current Assets (2018) - Total Current Assets (2017)

= \$ 302,616 - \$ 278,526 = \$ 24,360

1.2 Fixed Assets:

The operating performance of the company is measured by the **Fixed Asset Turnover Ratio (FAT)**. This efficiency ratio compares sales to fixed assets and measures a company's ability to

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generate net sales from its fixed asset. Higher, the ratio, higher is the effectiveness of the company in managing their fixed assets.

Given Data Table 1.1 (Amounts in thousands):

Total fixed Assets (2018) = \$ 179,957

Total fixed Assets (2017) = \$ 184,772

Increase/Decrease in Total Fixed Assets = Total Fixed Assets (2018) - Total Fixed Assets (2017)

$$= \$ 179,957 - \$ 184,772 = \$ -4,815 = \$ (4,815)$$

2. Liabilities:

Liability is defined as the obligation that a company owes to the third party, it is usually indicated in the middle of the balance sheet and is categorized as Current & Fixed Liabilities. The current liability includes bank overdraft, short term loans, accounts payable to sub-contractors, suppliers and employees, rents, utilities and so on. Usually, it is the debt that a company has to pay within a year time. Long-term liabilities, on the other hand are obligations in term of debt that are to be paid during more than a year period, usually few years or longer. Long term liabilities refers to long term bank loans / loans for mortgages of equipment, building, land or even cars and trucks. These Long term liabilities are usually paid in installments. The sum of current and long-term liabilities accounts for Total liabilities of the company.

Given Data Table 1.1 (Amounts in thousands):

Total Liabilities = Total Current Liabilities + Total Long Term Liabilities

Total Current Liabilities (2018) = \$ 179,174

Total Long Term Liabilities (2018) = \$ 131,139

Total Liabilities (2018) = \$ 179,174 + \$ 131,139 = \$ 310,313

Total Current Liabilities (2017) = \$ 182,292

Total Long Term Liabilities (2017) = \$ 134,817

Total Liabilities (2017) = \$ 182,292 + \$ 134,817 = \$ 317,109

Increase/Decrease in Total Liabilities = Total Liabilities (2018) - Total Liabilities (2017)

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$$= \$ 310,313 - \$ 317,109$$

$$= \$ -6,796 = \$ (6,796)$$

2.1 Current Liabilities:

Given Data Table 1.1 (Amounts in thousands):

Total Current Liabilities (2018) = \$ 179,174

Total Current Liabilities (2017) = \$ 182,292

$$\begin{aligned} \text{Incr. / Decr. in T. Current Liabilities} &= \text{T. Current Liabilities (2018)} - \text{T. Current Liabilities (2017)} \\ &= \$ 179,174 - \$ 182,292 = \$ -3,118 = \$ (3,118) \end{aligned}$$

2.2 Long Term Liabilities:

Given Data Table 1.1 (Amounts in thousands):

Total Long Term Liabilities (2018) = \$ 131,139

Total Long Term Liabilities (2017) = \$ 134,817

$$\begin{aligned} \text{Inc. /Dec. in T. L. Term Liabilities} &= \text{T. Long Term Liabilities (2018)} - \text{T. long Term Liabilities (2017)} \\ &= \$ 131,139 - \$ 134,817 \\ &= \$ -3048 = \$ (3048) \end{aligned}$$

3. Equity (Net Worth):

Equity is defined as the capital invested by the Owners of a company. As we are aware that some companies are owned by the stockholders, therefore equity is also sometimes referred as stockholder's Equity. It is also known by the name of "Net worth". Equity actually represents the net worth of the business and is obtained by adding up, the capital the owners have invested and the profits that have been accumulated (after deducting all the dividends paid so far to the owners) and retained up to the present moment since the business started.

Equity (Net Worth) + Total Liabilities = Total Assets

Equity (Net Worth) = Total Assets – Total Liabilities

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Given Data Table 1.1 (Amounts in thousands):

Year 2018:

Total Liabilities (2018) = \$ 310,313

Total Assets (2018) = \$ 482,573

Equity (Net Worth) (2018) = \$ 482,573 - \$ 310,313

= \$ 172,260

Year 2017:

Total Liabilities (2017) = \$ 317,109

Total Assets (2017) = \$ 463,298

Equity (Net Worth) (2017) = \$ 463,298 - \$ 317,109

= \$ 146,189

Increase in Equity (Net Worth) = Equity (Net Worth) 2018 - Equity (Net Worth) 2017

= \$ 172,260 - \$ 146,189 = \$ 26,071

4. Working Capital:

Working capital is another important financial indicator of company's soundness. It is the amount available to carry current business operations or to fulfill short term financial commitments.

Working capital is calculated as follows:

Working Capital = Current Assets – Current Liabilities

Given Data Table 1.1 (Amounts in thousands):

Year 2018:

Total Current Assets (2018) = \$ 302,616

Total Current Liabilities (2018) = \$ 179,174

Working Capital (2018) = Total Current Assets (2018) - Total Current Liabilities (2018)

= \$ 302,616 - \$ 179,174

= \$ 123,442

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Year 2017:

Total Current Assets (2017) = \$ \$ 278,526

Total Current Liabilities (2017) = \$ 182,292

Working Capital = Total Current Assets - Total Current Liabilities = \$ 278,526 - \$ 182,292 = \$ 95,964

5. Current Ratio:

The current ratio is the liquidity ratio that measures a company's ability to pay short term obligations or those due within one year. It is a means to maximize current assets on its balance sheet to satisfy its current liabilities. The current ratio for a construction company should be 1.3 or higher.

Current Ratio = Current Assets / Current Liabilities

Given Data Table 1.1 (Amounts in thousands):

Year 2018:

Total Current Assets = \$ 302,616

Total Current Liabilities = \$ 179,174

Working Capital = T.C. Assets (2018) / T.C. Liabilities (2018) = \$ 302,616 / \$ 179,174 = 1.69

Year 2017:

Total Current Assets = \$ 278,526

Total Current Liabilities = \$ 182,292

Working Capital = Current Assets / T. Current Liabilities = \$ 278,526 / \$ 182, 29 = 1.53

6. Under Billing and Over Billing:

Under billing is defined as when a contractor completes a certain amount of work but does not claim its client for full payment. Over billing is that a contractor demands more than the work completed. In balance sheet over billing is shown in current liabilities as “Billing in excess of costs & estimated earnings on works in progress”.

Table 1.1 shows that “billing in excess of costs & estimated earnings on works in progress” is **\$ 62,407 (2018)** and **\$ 62,374 (2017)** and Costs and estimated earnings in excess of billings on uncompleted contracts in (2018) is “**\$ 41,542 and (2017) \$ 37,112**”. The amount under Liabilities is more than amount mentioned in Assets in both the financial years, therefore Sterling construction is involved in overbilling during both the years.

Summary of Sterling Financial Position:

In view of the above findings and as shown in the balance sheet, the following is concluded:

1. The company’s Total assets has increased by **\$19.275 B** in one year.
2. Total current assets have increased by **\$24.090 B**.
3. Total fixed assets of Sterling decreased in the year 2018 by **\$ 4.185 M**.
4. The goodwill value of the company remained constant during both the years and is estimated at **\$ 8.5 M**.
5. Depreciation value of the fixed assets of the company has decreased by **\$ 4.185 M** during the year 2018.
6. Total liabilities of the Company have decreased during year 2018 by **\$ 6.796 M**.
7. Sterling company has shown improvement in long term liabilities. They have been reduced by **\$ 3.678 M** during year 2018.
8. Equity has shown improvement by **\$ 26.01 M** during year 2018.
9. Working capital for both the years is in Surplus.
10. Current Ratio for 2018 is **1.69** and for 2017 is **1.53**, which are greater than 1.3.

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Conclusion: Working capital is indicator of short term financial strength. The volume of work in progress should be ten times the working capital and for big project in progress volume of project should be five times working capital. Working capital of Sterling is **\$ 95.964 M** and **\$ 123.442 M** respectively for year 2017 & 2018. In both the years positive trend persists and the company is financially sound to meet its current expenses. The surplus amount in working capital of Sterling is the indication of sound financial management and satisfactory business performance during 2017 and 2018.

Balance of payment is perfect because current liabilities are less than the current assets. Current ratios for both 2017 and 2018 are **1.53** and **1.69** respectively, which are greater than 1.3 and has further increased in year 2018. This is a clear indication that Sterling financial health is satisfactory in both the fiscal years.

Sterling with total assets of **\$ 4.83 Billion** and equity (net worth) of **\$ 1.72 Billion** has performed well during both financial years. Due to good performance during both years the goodwill value of the company has remained the same for both the years i.e. **\$ 8.5 M**. At present the company is financially sound and can fulfill all its current liabilities.

The financial report can be the basis of healthy current financial position. Short & Long term financial parameters are favorable and have shown significant improvement with increase in total assets by **\$ 19.30 M**, decrease in fixed assets by **\$ 4.815 M** and improvement in total current assets by **\$ 24.09 M**. This increase indicates the improvement in the operational health of the company and is a sign of company financial growth.