

**22<sup>ND</sup> COMPREHENSIVE EXAMINATION****Marks****CASE # 1****Alternative-I:**To hire out the surplus capacity of department <sup>1</sup>G, <sup>1</sup>R and <sup>1</sup>S:

				Rupees	
Incremental hire charges hiring revenue:					
Department	G	600 hours x	(Rs.2,500 – Rs.2,000)	300,000	2
	R	720 hours x	(Rs.1,800 – Rs.1,500)	216,000	2
	S	1,200 hours x	(Rs.1,600 – Rs.1,200)	480,000	2
Total				996,000	
Add: Present return on capital employed		(Rs.180 million x 10 ÷ 100)		18,000,000	1
Total income				18,996,000	1

$$\text{Return on capital employed} = \frac{\text{Rs.18.996 million}}{\text{Rs.180 million}} \times 100 = 10.55\% \quad 2$$

**Alternative-III:**To increase the installed capacity of the factory to 12,000 units by adding plant and machinery in Department <sup>1</sup>P at a capital cost of Rs.40 million.

				Rupees	
Incremental hire charges:					
Department	R	160 hours x	(Rs.1,800 – Rs.1,500)	48,000	2
	S	800 hours x	(Rs.1,600 – Rs.1,200)	320,000	2
Total				368,000	1
Add: Sales revenue on additional units		(3,000 units x Rs.1,600)		4,800,000	1
Add: Return on capital employed		(Rs.180 million x 10 ÷ 100)		18,000,000	1
Total income				23,168,000	1

$$\text{Return on capital employed} = \frac{\text{Rs.23.168 million}}{\text{Rs.220 million}^*} \times 100 = 10.53\% \quad 1$$

(\*Rs. 180 million + Rs. 40 million)

Workings Notes:

Calculation of Spare Capacity:

Dept. <sup>1</sup> G	=	2,400	–	75% of 2,400 i.e.,	1,800	=	600	hours	1
<sup>1</sup> P	=	2,400	–	100% of 2,400 i.e.,	2,400	=	Nil		1
<sup>1</sup> R	=	2,400	–	70% of 2,400 i.e.,	1,680	=	720	hours	1
<sup>1</sup> S	=	2,400		50% of 2,400 i.e.,	1,200	=	1,200	hours	1

Calculation of Number of Units per Hour:

Dept. <sup>1</sup> G	=	9,000	units/1,800 hours	=	5.00	units per hour	½
<sup>1</sup> P	=	9,000	units/2,400 hours	=	3.75	units per hour	½
<sup>1</sup> R	=	9,000	units/1,680 hours	=	5.36	units per hour	½
<sup>1</sup> S	=	9,000	units/1,200 hours	=	7.50	units per hour	½

**22<sup>ND</sup> COMPREHENSIVE EXAMINATION****Marks**

Surplus Hours available after Production of Additional 3,000 Units:

Department	Surplus Hours Available	Additional Units	Units Per Hour	Hours Utilised	Balance Hours Available	
G	600	3,000	5.00	600	—	1
P	—	3,000*	3.75	800	—	1
R	720	3,000	5.36	560	160	1
S	1,200	3,000	7.50	400	800	1

\*As a result of expansion

**Analysis:**

Return on investment is more with Alternative-II, hence it is suggested to hire out the surplus capacity of departments 'G', 'R' and 'S'.

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**CASE # 2****(a) Addition to Retained Earnings as on June 30, 2013:**

Sunshine Textile  
Pro Forma Income Statement  
for the year ended June 30, 2013

			Rs. '000 <sup>±</sup>	
	2011-12	Forecast Basis	Pro Forma 2012-13	
Sales	72,000	1.15 x Sales	82,800	1
Operating costs	64,800	0.90 x Sales	74,520	1
Earnings before interest and taxes	7,200		8,280	1
Interest	920	0.10 x Debt	1,120	2
Earnings before taxes	6,280		7,160	1
Taxes (40%)	2,198		2,506	1
Net income	4,082		4,654	1
Dividends (45%)	1,837		2,094	1
Addition to retained earnings	2,245		2,560	1
			Presentation =	1

**22<sup>ND</sup> COMPREHENSIVE EXAMINATION****Marks****(b)**

Sunshine Textile  
Pro Forma Balance Sheet  
as of June 30, 2013

	Rs. '000 <sup>b</sup>						
	2011-12	Forecast Basis (%) of Sales 2012-13	Additions	Pro Forma	Financing	Pro Forma after Financing	
Cash	2,160	3.00		2,484		2,484	1
Accounts receivable	12,960	18.00		14,904		14,904	1
Inventories	18,000	25.00		20,700		20,700	1
Total current assets	33,120			38,088		38,088	1
Fixed assets	25,200	35.00		28,980		28,980	1
Total assets	58,320			67,068		67,068	1
Accounts payable	8,640	12.00		9,936		9,936	1
Accruals	5,760	8.00		6,624		6,624	1
Notes payable	4,200			4,200	4,028	8,228	1
Total current liabilities	18,600			20,760		24,788	1
Term certificates	7,000			7,000		7,000	
Total debt	25,600			27,760		31,788	1
Ordinary shares	7,000			7,000		7,000	
Retained earnings	25,720		2,560*	28,280		28,280	1
Total liabilities and equity	58,320			63,040		67,068	1
AFN				4,028			1

\*From income Statement

AFN = Increase in assets – increase in current liabilities – increase in retained earnings 1

= Rs.8,748,000 – Rs.2,160,000 – Rs.2,560,000 = **Rs.4,028,000** 3

Presentation = 1

**THE END**