

PROGRAM

: NATIONAL DIPLOMA

ENGINEERING: INDUSTRIAL

SUBJECT

: INDUSTRIAL ACCOUNTING 3

CODE

: BBB 341

DATE

: SUMMER SSA EXAMINATION 2017

10 JANUARY 2017

DURATION : (SESSION 1) 08:00 - 11:00

WEIGHT

: 40:60

TOTAL MARKS : 100

ASSESSOR

: MR P. DUBE

MODERATOR : MR N. NDOU

2275

NUMBER OF PAGES : 5 PAGES

INSTRUCTIONS TO STUDENTS

PLEASE ANSWER ALL QUESTIONS. OPEN BOOK EXAMINATION ANSWER THE QUESTIONS IN SEQUENCE

REQUIREMENTS

ONLY ONE POCKET CALCULATOR PER CANDIDATE MAY BE USED. GRAPH PAPER

Question 1

- 1.1 The non-current assets are R600, the total assets are R900, , long-term debt is R500, and short-term debt is R200. Calculate the amount of net working capital? (3)
- 1.2 Nomsa Pvt Limited spent R2 400 to purchase equipment three years ago. This equipment is currently valued at R1 800 on today's balance sheet but could actually be sold for R2 000. Net working capital is R200 and long-term debt is R800. Calculate the book value of shareholders' equity. (3)
- 1.3 Themba Pvt Limited . paid R500 in dividends and R600 in interest this past year. Ordinary shares increased by R200 and retained profit decreased by R100. Calculate the net profit after tax for the year.

 (3)
- 1.4 The tax rates are as shown. You currently have net profit after tax of R100 400. Calculate the additional tax if you increase your net profit after tax by R21 000. (3)

Net profit after tax			Tax Rate
R	0 -	50 000	15%
50	001 -	75 000	25%
75	001 -	100 000	34%
100	001 -	335 000	39%

- 1.5 Zomba Pvt Limited paid R155 in dividends and R220 in interest expense. The addition to retained profits is R325 and net new equity is R50. The tax rate is 25 per cent. Sales are R1 600 and depreciation is R160. Calculate the profits before interest and taxes. (3)
- 1.6 Nhlonganwe Pvt limited has beginning long-term debt of R180 and ending long-term debt of R210. The beginning and ending total debt balances are R340 and R360, respectively. The interest paid is R20. Calculates the amount of the cash flow to lenders.

Question 2

The following balance sheet and income statement should be used for questions 2.1 through 2.8:

Hlengiwe Ltd. 2015 and 2016 Balance Sheets

	<u>2015</u>	<u>2016</u>		<u>2015</u>	<u>2016</u>
Cash	R120	R 140	Accounts payable	R1 110	R1 120
Accounts rec.	930	780	Long-term debt	840	1 210
Inventory	<u>1 480</u>	<u>520</u>	Ordinary shares	3 200	3 000
Total	R2 530	R2 440	Retained earnings	530	710
Net non-current	assets_3 150	<u>3 600</u>			
Total assets	<u>R5 680</u>	<u>R6 040</u>	Total liabilities & equ	ity <u>R5 680</u>	<u>R6 040</u>

Hlengiwe, Inc. 2016 Income Statement

Net sales	R8 450
Less: Cost of goods sold	7 240
Less: Depreciation	400
PBIT	810
Less: Interest paid	70
PBT	R740
Less: Taxes	259
NPAT	R 481

2.1	Calculate the Hlengiwe quick ratio for 2016.	(2)
2.2	Calculate the Hlengiwe days' sales in receivables? (use 2016 values).	(2)
2.3	Calculate the Hlengiwe non-current asset turnover? (use 2016 values).	(2)
2.4	Calculate the Hlengiwe equity multiplier for 2016.	(2)
2.5	Calculate Hlengiwe cash coverage ratio for 2016.	(2)
2.6	Calculate the amount of the net cash from investment activity for 2016.	(2)
2.7	Calculate the net change in cash during 2016.	(2)
2.8	Calculate the accounts payable that will appear on the 2016 statement of cash flows.	(2)

Question 3

- 3.1 Phumuzile invests R500 in an account that pays 3 per cent simple interest. Calculate the amount of money that Phumuzile will have at the end of ten years. (2)
- 3.2 Dlozana would like to give your daughter R40 000 towards her university education thirteen years from now. Calculate the amount of money that Dlozana must set aside today for this purpose if he can earn 6,3 per cent. (3)
- 3.3 You would like to have just as much money at the end of the next five years as your sister. Your older sister deposited R5 000 today at 8 per cent interest for five years. However, you can only earn 6 per cent interest. Calculate the extra amount you must deposit today if you are to have the same amount at the end of five years with your sister. (4)

Question 4

4.1 Themba is able to pay R160 a month for five years for a bike. If the interest rate is 4,9 per cent, calculate the amount that Themba must borrow to buy the bike.

4.2 The Shongwe Corp. has a management contract with their newly hired CEO. The contract requires a lump sum payment of R25 thousand be paid to the CEO upon the completion of her first ten years of service. The company wants to set aside an equal amount of funds each year to cover this anticipated cash outflow. The company can earn 6,5 per cent on these funds. How much must the company set aside each year for this purpose? (4)

Question 5

- 5.1 The bonds issued by Tsonga bear a 6 per cent coupon, payable semi-annually. The bond matures in 8 years and has a R1 000 face value. Currently, the bond sells at par. Calculate the yield to maturity.
- 5.2 Khekhe, Inc. has a 6 per cent coupon bond that matures in 11 years. The bond pays interest semi-annually. Claculate the market price of a R1 000 face value bond if the yield to maturity is 12,9 per cent.
- 5.3 Langa Inc. has a 5 per cent, semi-annual coupon bond with a current market price of R988,52. The bond has a par value of R1 000 and a yield to maturity of 5,29 per cent. Calculate the time to maturity of these bonds.

 (4)

Question 6

- 6.1. Mamo Inc, made two announcements concerning their ordinary shares today. First, the company announced that their next annual dividend has been set at R2,16 a share. Secondly, the company announced that all future dividends will increase by 4 per cent annually. Calculate the maximum amount Momo should pay to purchase a share if her goal is to earn a 10 per cent rate of return. (3)
- 6.2 Jenaguru shares traditionally provides an 8 per cent rate of return. The company just paid a R2 a year dividend which is expected to increase by 5 per cent per year. If you are planning on buying 1000 shares next year, how much should you expect to pay per share if the market rate of return for this type of security is 9 per cent at the time of your purchase. (3)
- 6.3 The current yield on Jephu's ordinary shares is 4,8 per cent. The company just paid a R2,10 dividend. The rumour is that the dividend will be R2 205 next year. The dividend growth rate is expected to remain constant at the current level. Calculate the required rate of return on Jephu's shares. (4)

Question 7

7.1 Calculate the net present value of a project with the following cash flows and a required return of 12 per cent. (5)

Year	Cash Flow
0	-R28 900
1	R12 450
2	R19 630
3	R 2750

7.2 You are considering the following two mutually exclusive projects. The required rate of return is 11,25 per cent for project A and 10,75 per cent for project B. Which project should you accept and why?

<u>Year</u>	Project A	Project B
0	-R48 000	-R126 900
1	R18 400	R 69 700
2	R31 300	R 80 900
3	R11 700	R 0

7.3 An investment has the following cash flows. Should the project be accepted if it has been assigned a required return of 9,5 per cent? Why or why not? (3)

Year	Cash Flow
0	-R24 000
1	R 8 000
2	R12 000
3	R 9 000

7.4 You are considering two independent projects both of which have been assigned a discount rate of 8 per cent. Based on the profitability index, what is your recommendation concerning these projects?(9)

Project A		Project	Project B		
	Year	Cash Flow	Year	Cash Flow	
	0	-R38 500	0	-R42 000	
	1	R20 000	1	R10 000	
	2	R24 000	2	R40 000	

7.5 A project has an initial cost of R1 900. The cash inflows are R0, R500, R900, and R700 over the next four years, respectively. Calculate the payback period. (2)