NAMIBIA UNIVERSITY
OF SCIENCE AND TECHNOLOGY

FACULTY OF COMMERCE, HUMAN SCIENCES AND EDUCATION

DEPARTMENT OF ACCOUNTING, ECONOMICS & FINANCE

QUALIFICATION: BACHELOR OF ACCOUNTING (HONOURS)	
QUALIFICATION CODE: 08BOAH	LEVEL: 8
COURSE CODE: AMA811S	COURSE NAME: ADVANCED MANAGEMENT ACCOUNTING
SESSION: JUNE 2022	PAPER: PRACTICAL AND THEORY
DURATION: 3 HOURS	MARKS: 100

SECOND OPPORTUNITY EXAMINATION QUESTION PAPER	
EXAMINERS:	Kuhepa Tjondu
MODERATOR:	Mr. L. Shinkeva

INSTRUCTIONS

- This question paper is made up of THREE (3) questions.
- Answer All the questions and in blue or black ink.
- Show all your working in the answer sheet.
- Start each question on a new page in your answer booklet and show all your workings.
- Questions relating to this paper may be raised in the initial 30 minutes after the start of the paper. Thereafter, candidates must use their initiative to deal with any perceived error or ambiguities and any assumption made by the candidate should be clearly stated.

PERMISSIBLE MATERIALS

Non-programmable calculator/financial calculator

THIS QUESTION PAPER CONSISTS OF 7 PAGES (Including this front page)

QUESTION 1 **[40 MARKS]**

It is now May 2022. Okandjira Co is a listed company which produces a range of branded products all of which are well-established in their respective markets, although overall sales have grown by an average of only 2% per annum over the past decade. The board of directors is currently concerned about the company's level of financial gearing, which although not high by industry standards, is near to breaching the covenants attaching to its 15% debenture issue, made in 2009 at a time of high market interest rates. Issued in order to finance the acquisition of the premises on which it is secured, the debenture is repayable at par value of N$100 per unit at any time during the period 2022 – 2025.

There are two covenants attaching to the debenture, which state:

'At no time shall the ratio of debt capital to shareholders' fund exceed 50%. The company shall also maintain a prudent level of liquidity, defined as a current ratio at no time outside the range of the industry average (as published by the corporate credit rating agency, Creditrate), plus or minus 20%.'

Okandjira's most recent set of accounts is shown in summarised form below. The buildings have been depreciated since 2009 at 4% per annum, and most of the machinery is only two or three years old, having been purchased mainly via a bank overdraft. The interest rate payable on the bank overdraft is currently 9%. The finance director argues that Okandjira should take advantage of historically low interest rates on the European money markets by issuing a medium-term Eurodollar bond at 5%. The dollar is currently selling at a premium of about 1% on the three-month forward market.

Okandjira's ordinary shares currently sell at a P/E ratio of 14, and look unattractive compared to comparable companies in the sector which exhibit an average P/E ratio of 18. According to the latest published credit assessment by Creditrate, the average current ratio for the industry is 1.35. The loan stock currently sells in the market at N$15 above par.

Summarised financial accounts for Okandjira Co for the year ended 31 December 2021:

STATEMENT OF FINANCIAL POSITION AS AT 31 DECEMBER 2021

	N$m	N$m
Assets employed		
Non-current (net):		
Land		5.0
Premises		4.0
Machinery and vehicles		11.0
		20.0

Current		
Inventory	2.5	
Receivables	4.0	
Cash and cash equivalents	0.5	
		7.0
Total assets		**27.0**
Equity		
Ordinary shares (25 cents par value)		5.0
Reserves		10.0
Long-term payables		
15% Loan notes 2022 to 2025		5.0
Current liabilities		
Payables	4.0	
Bank overdraft (interest bearing)	3.0	
		7.0
Total equity and liabilities		**27.0**

STATEMENT OF PROFIT OR LOSS EXTRACTS FOR THE YEAR ENDED 31 DECEMBER 2021

	N$m
Sales	28.00
Profit before interest and tax	**3.00**
Interest payable	-1.00
Profit before tax	**2.00**
Taxation	-0.66
PAT	**1.34**
Dividend	-0.70
Retained profit	**0.64**

REQUIRED:		
(a)	**Calculate appropriate gearing (debt/equity) ratios for Okandjira Co using:**	
(i)	Book values; and	(3)
(ii)	The market values of debt and equity.	(4)
(b)	Assess how close Okandjira Co is to breaching the debenture covenants.	(4)
(c)	Discuss whether Okandjira Co's gearing is in any sense 'dangerous' based on debt levels, Interest coverage and the entity's Non-current assets.	(10)
(d)	**Discuss what financial policies Okandjira Co might adopt:**	
(i)	In order to lower its capital gearing; and	(8)
(ii)	To improve its interest cover. (show the relevant calculations to support your suggestions)	(6)
(e)	Explain why a company might prefer raising capital in the form of convertible debt as distinct from raising straight debt or straight equity and the associated benefits of such a strategy.	(5)
TOTAL		**(40)**

QUESTION 2 **[35 MARKS]**

The directors of Otjunda Co are considering a planned investment project costing N$25m, payable at the start of the first year of operation. The following information relates to the investment project:

Years	1	2	3	4
Sales volume (units/year)	520,000	624,000	717,000	788,000
Selling price (N$/unit)	30.00	30.00	30.00	30.00
Variable costs (N$/unit)	10.00	10.20	10.61	10.93
Fixed costs (N$/year)	700,000	735,000	779,000	841,000

This information needs adjusting to take account of selling price inflation of 4% per year and variable cost inflation of 3% per year. The fixed costs, which are incremental and related to the investment project, are in nominal terms. The year 4 sales volume is expected to continue for the foreseeable future.

Otjunda Co pays corporation tax of 30% one year in arrears. The company can claim tax-allowable depreciation on a 25% reducing balance basis.

The views of the directors of Otjunda Co are that all investment projects must be evaluated over four years of operations, with an assumed terminal value at the end of the fourth year of 5% of the initial investment cost. Both net present value and discounted payback must be used, with a maximum discounted payback period of two years. The real after-tax cost of capital of Otjunda Co is 7% and its nominal after-tax cost of capital is 12%.

The Chief Operating Officer (COO) Mr. Hunga attended a 1 day training workshop on capital budgeting and investment appraisal last year. During the workshop they were taught about the basic principles of capital budgeting which are very similar to relevant costing principles. Unfortunately the COO cannot remember the principles but he is of the opinion that they can be useful when looking at a project like this one.

REQUIRED:		
(a)	Calculate the net present value of the planned investment project.	(20)
(b)	Calculate the discounted payback period of the planned investment project.	(2)
(c)	Discuss the financial acceptability of the investment project.	(2)
(d)	Critically discuss the views of the directors on Otjunda Co's investment appraisal	(6)
(e)	Briefly explain the principles (assumptions) of Capital Budgeting and the treatment of financing costs.	(5)
TOTAL		**(35)**

QUESTION 3 [25 MARKS]

OMBU Co, a company listed on a major stock market, is looking at its cost of capital as it prepares to make a bid to buy a rival unlisted company, IMBII. Both companies are in the same business sector. Financial information on OMBU Co and IMBII is as follows:

	OMBU Co		IMBII	
	N$m	N$m	N$m	N$m
Non-current assets		36		25
Current assets		7		7
Total assets		**43**		**32**
Ordinary shares, par value 50 cents	15		5	
Retained earnings	10		3	
Total equity		**25**		**8**
Current liabilities		3		4
7%bonds, redeemable at par in seven years' time		15		
9% bonds, redeemable at par in two years' time				20
Total equity and liabilities		**43**		**32**
Other relevant financial information:				
Risk-free rate of return	4%			
Average return on the market	10.5%			
Taxation rate	30%			

IMBII has a cost of equity of 12% per year and has maintained a dividend payout ratio of 45% for several years. The current earnings per share of the company is 80c per share and its earnings have grown at an average rate of 4.5% per year in recent years.

The ex div share price of OMBU Co is N$4.20 per share and it has an equity beta of 1.2. The 7% bonds of the company are trading on an ex interest basis at N$94.74 per $100 bond. The price/earnings ratio of OMBU Co is eight times.

The directors of OMBU Co believe a cash offer for the shares of IMBII would have the best chance of success. It has been suggested that a cash offer could be financed by debt.

REQUIRED:		
(a)	Calculate the weighted average cost of capital of OMBU Co on a market value weighted basis	(9)
(b)	Calculate the total value of the target company, IMBII, using the following valuation methods:	
(i)	Price/earnings ratio method, using the price/earnings ratio of OMBU Co; and	(4)
(ii)	Dividend growth model.	(4)
(c)	Discuss the relationship between capital structure and weighted average cost of capital, and comment on the suggestion that debt could be used to finance a cash offer for IMBII.	(8)
TOTAL		**(25)**

TOTAL ASSESSMENT MARKS **[100]**

THE END