



UNIVERSITY
OF
JOHANNESBURG

Department of Finance and Investment Management

Financial Planning

FPL3A01

SUPPLEMENTARY ASSESSMENT OPPORTUNITY

17 JULY 2014

Time: 3 hours

Marks: 150

Assessors: Mrs S Naidu
Mrs M Lotter

External Moderator: Riette Brune (Milpark Business School)

INSTRUCTIONS:

- This paper consists of 17 pages.
- Answer ALL questions in the **answer book** provided. Only answers in your own handwriting in the official answer book will be considered.
- Silent, non-programmable calculators may be used, unless otherwise instructed. The use of any other electronic devices for whatever reason will lead to immediate expulsion from the examination as well as from the course
- Where applicable, show all calculations clearly.
- Use today's date for all calculations unless instructed differently
- Answers that have been corrected by the use of Tippex and answers in pencil will **not** be marked.
- Scratch out all open spaces and empty pages.
- Good luck!

Question	Topic	Marks	Time
1	Regulatory environment	10	12
2	Financial calculations	20	24
3	Investment planning	20	24
4	Retirement planning	25	30
5	Tax planning	75	70
		150	180 minutes

QUESTION 1

[10 marks]

1.1. National Treasury has identified the Treating Customers Fairly (TCF) principles as one of its policy objectives with regard to consumer protection and market conduct as part of the new regulatory framework. The outcomes of a TCF policy includes all of the following **except**:

- A. Consumers do not face unreasonable post sales barriers to changing a product, switching a provider, submitting a claim or making a complaint
 - B. Consumers are provided with clear information and are kept appropriately informed before, during and after a point of sale
 - C. Consumers can expect the promotion and advancement of their social and economic welfare by the establishment of a legal framework for the achievement and maintenance of a consumer market that is fair, accessible, efficient, sustainable and responsible for the benefit of consumers generally
 - D. Consumers are provided with products that perform as businesses have led them to expect, and the associated service is both of an acceptable standard and what they have been led to expect
- (2)

1.2. Piwe has met with her client Naledi, who is a nurse in Midrand. Naledi requested a meeting with Piwe since she would like to invest R2 000 000 in five different investments. Piwe is unaware of where the money originates from but feels that Naledi is a honest person with great integrity. She therefore acts on Naledi's instructions.

Indicate the **incorrect** statement with reference to the Financial Intelligence Centre Act 38 of 2001

- A. Piwe has a duty to report Naledi's investment as a suspicious transaction
 - B. Piwe should establish and verify the identity of Naledi
 - C. Piwe should inform Naledi that the transactions are suspicious and refuse to assist Naledi
 - D. Piwe has a duty to keep records of her business relationship with Naledi
- (2)

1.3. The purpose of the Financial Intelligence Centre Act 38 of 2001 includes all of the following **except** :

- A. To combat money laundering activities
 - B. To impose certain duties on institutions and other persons that may be used for money laundering purposes
 - C. To provide for the confiscation and forfeiture of assets
 - D. To establish a Money Laundering Advisory Council and a Financial Intelligence Centre
- (2)

- 1.4. Rich People (Pty) Ltd is an authorised financial services provider. Ian is the manager of Rich People (Pty) Ltd. Lauren is a financial planner and is employed by Rich People and she regularly furnishes advice to clients as part of her duties. Shobna is Lauren's assistant who is responsible for the submission and filing of documents when clients of Rich People purchase financial products. Shobna also assists Lauren with claims against financial product providers on behalf of clients. Asha is the recoveries specialist who contacts clients regarding outstanding account balances. Indicate the correct answer

(2)

- A. Lauren is the key individual, Asha is the representative and Shobna offers intermediary services
 - B. Ian is the key individual, Lauren is the representative and Shobna offers intermediary services
 - C. Ian is the key individual, Shobna is the representative and Asha offers intermediary services
 - D. Lauren is the key individual, Shobna is the representative and Asha offers intermediary services
- 1.5. The office of the Financial Advisory and Intermediary Services Ombud, as an alternative dispute resolution mechanism, has proved to be highly successful in resolving cases brought by clients against financial services providers and their representatives. Indicate the incorrect answer.

(2)

- A. The FAIS Ombud will consider the complaint if it is alleged that the financial services provider or representative has treated the complainant unfairly
- B. There is no limit on the monetary claim by the complainant
- C. No upfront fees are payable to the FAIS Ombud by the complainant
- D. The FAIS Ombud must set out the determination in writing and give reasons for the determination

QUESTION 2**[20 Marks]**

Miss Smarty Pants is planning to retire by the end of next month. She has saved R5 000 000 over the last 25 years to fund her expenses after retirement. She is 65 years old and would like to make provision for retirement until age 85. Miss Smarty Pants can invest her money at a rate of 10%. Her income in retirement must increase by 5.5% each year. She indicates to you that she would like to receive a monthly income at the beginning of each month.

Question 2.1

Calculate the income amount that Miss Smarty Pants will receive in the first month of the first year of retirement?

(6)**Question 2.2**

Lance Armflop won a cycling event, the Tour De Dump, on 1 January 2014. He won the following prizes:

- a two year membership at one of the most prestigious cycling clubs
- prize money of R1 000 000

Lance informs you that he is afraid that he might not have enough income to continue his membership of the cycling club after his prize of the two year membership expires in December 2015. Lance is keen on training at the club at least three times a week after his membership expires. He therefore would like to save his prize money to continue the membership for at least five years from the date that it expires in December 2015.

The annual membership fee payable at the beginning of 2014 was R150 000 and it increases by 7% every year. He knows he can invest his prize money at an interest rate of 9%

Calculate how much of Lance's prize money he needs to invest to fund his membership for five years from 1 January 2016.

(10)**Question 2.3**

Sofia invested a lump sum of R10 000 five years ago. At the same time she also started contributing an amount of R4000 every second month for five years to the investment. Her total investment after five years is R151 811.58

Calculate the investment return for the period of five years.

(4)

QUESTION 3

[20 Marks]

3.1. The rule of 72 is a method of determining the impact of inflation on the value of an investment. How many years will it take for income of R200 000 in today's money to be halved at an inflation rate of 5%? Select the correct option.

(2)

- A. 14 years
- B. 14.4 years
- C. 0.06944 years
- D. 13.8 years

3.2 Sources of risk to the investor include : select the correct option(s)

- i. loss of income when funds are reinvested
- ii. fluctuations in securities markets
- iii. the financing decisions of the firm

(2)

- A i and ii
- B i and iii
- C ii and iii
- D i, ii and iii

3.3 Inflation can be said to encompass three sets of effects: distribution, economic and social & political. The following statements all apply to inflation. Indicate the incorrect statement

- A. inflation tends to redistribute income and wealth from creditors to debtors
- B. the difference between the effective rate and the inflation rate is called the real interest rate
- C. the economic effects are those effects that impact on the performance of the economy as a whole
- D. inflation can create a climate of conflict and tension which is not conducive to economic progress

(2)

3.4 Standard deviation is a commonly used measure of risk. Indicate the incorrect statement

- A. It is a measure of the possible range of outcomes around the expected return
- B. standard deviation is the only measure of volatility
- C. a lower volatility means a security's value does not fluctuate dramatically
- D. a higher volatility means a security's value can be spread out over a larger range of values

(2)

3.5. Economic growth does not occur smoothly. The business cycle has a number of elements. Indicate the **incorrect** statement (2)

- A. the period of high business activity is called the expansionary phase
- B. the period of contraction in business activity is called the recessionary phase
- C. a recession is technically defined as three successive quarters of negative growth
- D. in the revival phase the weak rand makes local exports attractive

3.6. Sanele owns an investment property on the Victoria and Alfred Waterfront in Cape Town. She receives a monthly income of R65 000 from the property. Her financial planner has established that she should be earning a return of 13% from the property. Indicate the annual capitalized value of the property. (2)

- A. R5 000 000
- B. R881 400
- C. R6 000 000
- D. R73 450

3.7. Which of the following is **not** an investment constraint? (2)

- A. Tax considerations
- B. Risk tolerance
- C. Legal and regulatory requirements
- D. Time horizon

3.8. Prince Mpofo invested in an endowment policy in 2009. The policy is due to mature in two months and the maturity value is R785 000. Prince has a marginal tax rate of 38%. What is the tax payable on the policy proceeds of R785 000? (2)

- A. zero
- B. R298 300
- C. R285 574
- D. R99 433

3.9. Moscow Ncube has been offered a return of 9% on his fixed deposit at his local bank. He is aware that inflation will impact on this expected return of 9%. Inflation is currently 7%. What is the real rate of return on Moscow's investment? (2)

- A. 0.15576%
- B. 2.00%
- C. 1.86916%
- D. 14.670%

3.10. A wrap fund can be described as

(2)

- A. A collective investment scheme that invests in other collective investment schemes
- B. A selection of collective investment schemes packaged into a single investments package
- C. Funds are outsourced to independent investment managers who are specialists in their field
- D. A selection of collective investment schemes packaged into multiple investment packages

QUESTION 4

[25 Marks]

Question 4.1

Jacob Muza would like to retire in 20 years time. He informs you that he currently earns a salary of R750 000 per annum and his salary increases with the inflation rate of 8% per annum. He has estimated that he requires approximately 80% of his salary to live comfortably at retirement. He would like his retirement income to escalate by 7% each year. He has done some research and has established that he can earn an investment return (compounded monthly) of 11% on any funds invested. He expects to live for 20 years after retirement.

4.1.1 Calculate the capital required at retirement to meet Jacob's stated needs

(8)

4.1.2 Jacob's current retirement provisions are not sufficient to meet his needs at retirement. He approaches you to advise him on the options he has to ensure that he has sufficient capital to meet these retirement needs. List three options available to Jacob.

(3)

4.1.3 Jacob would like to know what annual amount he should invest in order to meet the capital required at retirement. Assume that the capital required at retirement is actually R6 000 000. The investment return that he can earn on any funds invested is 11% compounded monthly. Jacob will increase his annual contribution by 8% per annum.

(10)

Question 4.2

Mrs Bureaucracy retired from the Government Employees Pension Fund on 1 February 2014. She received a lump sum of R3 500 000. She joined the fund on 1 February 1982. Calculate the tax payable on the lump sum received.

(4)

QUESTION 5

[75 Marks]

Question 5.1

Your client, Mr Spiritual, a retired entrepreneur aged 61, underwent a life changing event that resulted in him deciding to dispose of most of his assets and travel to a spiritual retreat in India. He is unsure of how long he intends living there or whether his spiritual journey will take him elsewhere in the world. His wife of many years, Mrs Spiritual, will accompany him. They are married out of community of property. All parties referred to herein are South African residents.

On 1 May 2014, Mr Spiritual disposed of the following assets:

- he gave his son, Joel, a Ferrari. The market value of the Ferrari was R1 500 000 and Mr Spiritual paid the donations tax of R300 00 in respect of this donation. He had purchased the vehicle on 1 January 2010 for R2 000 000.

- he gave his wife a holiday home situated on Zimbali Estate in Kwazulu Natal. The market value of the house was R3 000 000. He had purchased the home on 1 August 2001 for R2 000 000 and the market value on 1 October 2001 was R2 000 000.

- he sold his 15 metre yacht for R2 400 000. He purchased it for R1 500 000 in 2007

- he sold his gold coin collection for R1 000 000. He had actually inherited these coins from his deceased father's estate on 1 September 2004. They had originally cost his late father R250 000 and at the time that Mr Spiritual inherited the collection, it had a market value of R500 000.

- he also sold the family residence in Sandton which had a market value on 1 October 2001 of R3 500 000. The proceeds from the sale of the house was R7 000 000 and Mr Spiritual had purchased the house on the 30 May 1999 for R2 750 000.

He did not enter into any other transactions during the year of assessment.

Calculate Mr Spiritual's taxable capital gain for the year of assessment, using the most beneficial base cost value in each instance. Show all workings and calculations and provide motivations for including or excluding assets from the calculations.

(15)

Question 5.2

Mr Morgan Freewoman was born in Brazil and is 51 years old. He has been a resident of South Africa for the past 11 years.

During the current year of assessment he made the following donations:

- On 1 March he donated his palatial home in Rio de Janeiro to his childhood friend, Mr Lucky Fish. Mr Fish was 40 years old at the time of the donation. Mr Freewoman had purchased the house 16 years ago for R1 200 000. The market value of the house at the time of the donation was R15 000 000.

- On 4 March, he sold his rights in a recording of a worldwide hit to a local record company for R5 000 000. Mr Freewoman also holds an interest in this recording company. The market value of the recording rights was R6 000 000 and the SARS has accepted this value as reasonable.

- On 10 March, he gave his niece, Jessica Timberwell three valuable Van Gogh paintings. The market value of these paintings was R2 500 000 in total. The paintings were valued R500 000 ten years ago.

- Three years ago, Mr Freewoman inherited his late father's Aston Martin. His father had always been a resident of Brazil. On 13 March, Mr Freewoman donated this Aston Martin to a designer friend, Carolina Perrera for her 45th birthday. The market value of the vehicle was R1 500 000. The motor vehicle always remained in Brazil.

- On 15 March, he donated R2 000 000 to the Government of South Africa to further its aims of developing arts and culture in South Africa.

- On 20 March, he donated a usufruct over his Sandton home to his cousin, Tom Cruiser who turned 39 years old on this date. The bare dominium was donated on the same date to Adam Bandler who was 36 years old on the date of the donation. The market value of the house was R7 200 000 on 13 March.

Mr Freewoman also made the following donation during the subsequent year of assessment:

- On 12 March, he donated a usufruct over his holiday home in Knysna to Ron Johnson for a 10 year period. The fair market value of the house on 12 March was R2 500 000. Ron Johnson was 33 years old at the time and Mr Freewoman was 51 years old on the date of donation

Calculate the donations tax payable on each of the above donations. Show all workings and calculations and provide motivations for including or excluding any transactions from your calculations
(20)

Question 5.3

Money Spinner (Pty) Ltd is a small business enterprise which offers data storage solutions to its clients. Annual sales amount to R16 000 000 and costs incurred for the business amount to R9 000 000. The company has two shareholders: Mark Buttleworth and his wife, Serena. Mark actively manages the business whilst Serena attends to the marketing of the company. The business has been very successful and they are looking to recruit more personnel. The Buttleworths inform you that they recently fell out of favour with their accountants and they are keen to understand what the various advantages are that are available to small businesses.

- 5.3.1. List four requirements for a business to be classified as a small business corporation
- 5.3.2. What is the tax benefit available to small business corporations?
- 5.3.3. Briefly explain to the Buttleworths how turnover tax works
- 5.3.4. List two requirements for a business to qualify for turnover tax?
- 5.3.5. What types of receipts will be subject to turnover tax?
- 5.3.6. Does Money Spinner (Pty) Ltd qualify for either the small business corporation tax regime or the tax regime applicable for turnover tax or does Money Spinner qualify for both tax regimes?

(15)

QUESTION 5.4

Heidi and Seal Klump are married in community of property. They have four children under the age of 18 years. Heidi is a successful fashion designer and Seal is an investment banker for a global bank. During the year of assessment, Seal received the following income:

- Basic salary (note 1)	750 000
- Commission	250 000
- Annual bonus	560 000
- Travel allowance (note 2)	350 000
- Interest from local bank account	250 000
- Local dividends	75 000

During the year of assessment, Heidi received the following income:

- income from her design business	2 500 000
- interest of fixed deposit (local)	80 000
- Dividends (local)	45 000

Seal also owns several properties in Johannesburg that he rents out and in respect of these properties he received the following income and incurred the following expenses:

- rental income	750 000
- Rates and taxes	100 000
- interest component on mortgage bond	65 000
- capital improvements to properties (note 5)	55 000

NOTES

1. Seal contributes 7.5% of his basic salary to a provident fund
2. Seal uses his own vehicle for business purposes. He keeps an accurate account of his travel in a logbook. According to the logbook he travelled a total of 65 300 km for the current year of assessment. He can prove that 32 400km were for business purposes. The motor vehicle originally cost R650 000 including VAT.
3. Seal also contributes R6 000 per month to a retirement annuity
4. Seal belongs to a medical aid scheme and his entire family are registered dependants on the scheme. His total monthly contribution is R6500. Unfortunately one of his children suffers from a disability as defined. Expenses not covered by the medical aid for the year amounted to R125 000.
5. Seal had built boundary walls around one of the properties after a security breach

Required

Calculate Seal's tax payable for the current year of assessment. Show all calculations and steps in full.

(25)

Appendix A :

Tax on retirement lump sum withdrawal benefits

Taxable income (R)	Rate of tax (R)
0 – 25 000	0% of taxable income;
25 001 – 660 000	0 + 18% of taxable income above 25 000
660 001 – 990 000	114 300 + 27% of taxable income above 660 000
900 001 and above	203 400 + 36% of taxable income above 990 000

Tax on retirement lump sum benefits

Taxable income (R)	Rate of tax (R)
0 – 500 000	0% of taxable income
500 001 – 700 000	0 + 18% of taxable income above 500 000
700 001 – 1 050 000	36 000 + 27% of taxable income above 700 000
1 050 001 and above	130 500 + 36% of taxable income above 1 050 000

INCOME TAX: INDIVIDUALS & SPECIAL TRUSTS

Rates of normal tax payable by persons (other than companies and trusts or approved public benefit organizations and recreational clubs) in respect of the year of assessment ending 28 February 2015

Taxable income (R)	Rate of tax (R)
0 – 174 550	18% of taxable income;
174 551 – 272 700	31 419 + 25% of taxable income above 174 550
272 701 – 377 450	55 957 + 30% of taxable income above 272 700
377 451 – 528 000	87 382 + 35% of taxable income above 377 450
528 001 – 673 100	140 074 + 38% of taxable income above 528 000
673 101 and above	195 212 + 40% of taxable income above 673 100

Travel allowance cost scaleTravel allowance for years of assessment **commencing** on or after 1 March 2006

(Government Gazette no. 28 550 of 24 February 2006)

Value of the vehicle (incl. VAT) (R)	Fixed cost (R p.a.)	Fuel cost (c/km)	Maintenance cost (c/km)
0 - 80 000	25 946	92.3	27.6
80 001 - 160 000	46 203	103.1	34.6
160 001 - 240 000	66 530	112.0	38.1
240 001 - 320 000	84 351	120.5	41.6
320 001 - 400 000	102 233	128.9	48.8
400 001 - 480 000	120 997	147.9	57.3
480 001 – 560 000	139 760	152.9	71.3
560 001 and above	139 760	152.9	71.3

Appendix B

The a (55) life mortality tables

The a(55) tables for annuitants (published in 1953 by the University Press, Cambridge)							
Male				Female			
Age		Age		Age		Age	
20	53,379	60	17,520	20	57,496	60	21,144
21	52,341	61	16,773	21	56,562	61	20,330
22	51,405	62	16,041	22	55,630	62	19,526
23	50,469	63	15,323	23	54,696	63	18,733
24	49,531	64	14,622	24	53,761	64	17,9 53
25	48,593	65	13,936	25	52,827	65	17,185
26	47,656	66	13,268	26	51,892	66	16,430
27	46,717	67	12,617	27	50,955	67	15,690
28	45,778	68	11,984	28	50,020	68	14,965
29	44,839	69	11,370	29	49,084	69	14,2 56
30	43,900	70	10,774	30	48,148	70	13,563
31	42,961	71	10,199	31	47,211	71	12,887
32	42,023	72	9,643	32	46,275	72	12,229
33	41,085	73	9,107	33	45,339	73	11,590
34	40,149	74	8,592	34	44,404	74	10,9 70
35	39,214	75	8,098	35	43,470	75	10,370
36	38,281	76	7,622	36	42,537	76	9,788
37	37,349	77	7,166	37	41,605	77	9,226
38	36,420	78	6,731	38	40,674	78	8,686
39	35,495	79	6,317	39	39,745	79	8,1 67
40	34,572	80	5,923	40	38,818	80	7,669
41	33,654	81	5,547	41	37,894	81	7,192
42	32,739	82	5,192	42	36,972	82	6,736
43	31,829	83	4,856	43	36,053	83	6,302
44	30,925	84	4,539	44	35,137	84	5,8 90
45	30,026	85	4,241	45	34,225	85	5,500
46	29,133	86	3,961	46	33,316	86	5,131
47	28,247	87	3,698	47	32,411	87	4,782
48	27,368	88	3,453	48	31,511	88	4,455
49	26,496	89	3,223	49	30,615	89	4,1 47
50	25,632	90	3,009	50	29,724	90	3,859
51	24,776	91	2,818	51	28,838	91	3,596
52	23,929	92	2,640	52	27,957	92	3,352
53	23,091	93	2,477	53	27,082	93	3,126
54	22,263	94	2,326	54	26,212	94	2,916
55	21,445	95	2,186	55	25,349	95	2,723
56	20,636	96	2,058	56	24,492	96	2,544
57	29,839	97	1,941	57	23,643	97	2,379
58	19,054	98	1,832	58	22,801	98	2,228
59	18,280	99	1,731	59	21,968	99	2,087

Life expectancy and present value tables (Table A)

Age	Expectation of life		Present value of R1 per annum for life		Age
	Male	Female	Male	Female	
0	64,74	72,36	8,32791	8,33105	0
1	65,37	72,74	8,32828	8,33114	1
2	64,50	71,87	8,32776	8,33091	2
3	63,57	70,93	8,32714	8,33064	3
4	62,63	69,97	8,32644	8,33033	4
5	61,69	69,02	8,32567	8,32999	5
6	60,74	68,06	8,32480	8,32961	6
7	59,78	67,09	8,32381	8,32918	7
8	58,81	66,11	8,32271	8,32869	8
9	57,83	65,14	8,32146	8,32815	9
10	56,85	64,15	8,32007	8,32753	10
11	55,86	63,16	8,31849	8,32684	11
12	54,87	62,18	8,31673	8,32608	12
13	53,90	61,19	8,31480	8,32522	13
14	52,93	60,21	8,31265	8,32427	14
15	51,98	59,23	8,31029	8,32320	15
16	51,04	58,26	8,30770	8,32203	16
17	50,12	57,29	8,30489	8,32071	17
18	49,21	56,33	8,30180	8,31926	18
19	48,31	55,37	8,29841	8,31764	19
20	47,42	54,41	8,29471	8,31584	20
21	46,53	53,45	8,29061	8,31383	21
22	45,65	52,50	8,28613	8,31161	22
23	44,77	51,54	8,28117	8,30912	23
24	43,88	50,58	8,27564	8,30633	24
25	43,00	49,63	8,26959	8,30326	25
26	42,10	48,67	8,26274	8,29981	26
27	41,20	47,71	8,25516	8,29595	27
28	40,30	46,76	8,24677	8,29171	28
29	39,39	45,81	8,23737	8,28697	29
30	38,48	44,86	8,22694	8,28170	30
31	37,57	43,91	8,21538	8,27583	31
32	36,66	42,96	8,20257	8,26930	32
33	35,75	42,02	8,18836	8,26210	33
34	34,84	41,07	8,17262	8,25400	34
35	33,94	40,13	8,15536	8,24509	35
36	33,05	39,19	8,13647	8,23517	36
37	32,16	38,26	8,11558	8,22426	37
38	31,28	37,32	8,09274	8,21199	38
39	30,41	36,40	8,06781	8,19866	39
40	29,54	35,48	8,04030	8,18386	40
41	28,69	34,57	8,01067	8,16762	41
42	27,85	33,67	7,97844	8,14983	42
43	27,02	32,77	7,94344	8,13012	43
44	26,20	31,89	7,90547	8,10881	44

Age	Expectation of life		Present value of R1 per annum for life		Age
	Male	Female	Male	Female	
45	25,38	31,01	7,86380	8,08527	45
46	24,58	30,14	7,81924	8,05956	46
47	23,79	29,27	7,77109	8,03119	47
48	23,00	28,41	7,71843	8,00026	48
49	22,23	27,55	7,66236	7,96617	49
50	21,47	26,71	7,60201	7,92950	50
51	20,72	25,88	7,53713	7,88967	51
52	19,98	25,06	7,46748	7,84646	52
53	19,26	24,25	7,39387	7,79965	53
54	18,56	23,44	7,31631	7,74834	54
55	17,86	22,65	7,23234	7,69355	55
56	17,18	21,86	7,14414	7,63363	56
57	16,52	21,08	7,05178	7,56896	57
58	15,86	20,31	6,95225	7,49927	58
59	15,23	19,54	6,85004	7,42321	59
60	14,61	18,78	6,74206	7,34135	60
61	14,01	18,04	6,63010	7,25457	61
62	13,42	17,30	6,51232	7,16020	62
63	12,86	16,58	6,39301	7,06046	63
64	12,31	15,88	6,26822	6,95537	64
65	11,77	15,18	6,13789	6,84161	65
66	11,26	14,51	6,00726	6,72393	66
67	10,76	13,85	5,87165	6,59893	67
68	10,28	13,20	5,73403	6,46635	68
69	9,81	12,57	5,59182	6,32818	69
70	9,37	11,96	5,45165	6,18466	70
71	8,94	11,37	5,30775	6,03607	71
72	8,54	10,80	5,16744	5,88278	72
73	8,15	10,24	5,02437	5,72222	73
74	7,77	9,70	4,87876	5,55743	74
75	7,41	9,18	4,73490	5,38893	75
76	7,07	8,68	4,59354	5,21727	76
77	6,73	8,21	4,44663	5,04679	77
78	6,41	7,75	4,30309	4,87092	78
79	6,10	7,31	4,15898	4,69389	79
80	5,82	6,89	4,02440	4,51647	80
81	5,55	6,50	3,89051	4,34399	81
82	5,31	6,13	3,76802	4,17315	82
83	5,09	5,78	3,65276	4,00482	83
84	4,89	5,45	3,54546	3,83988	84
85	4,72	5,14	3,45232	3,67921	85
86	4,57	4,85	3,36864	3,52371	86
87	4,45	4,58	3,30066	3,37426	87
88	4,36	4,33	3,24907	3,23175	88
89	4,32	4,11	3,22597	3,10296	89
90	4,30	3,92	3,21438	2,98912	90

Annuity table (Table B)

Year	Amount	Year	Amount	Year	Amount	Year	Amount
1	0,8929	26	7,8957	51	8,3076	76	8,3318
2	1,6900	27	7,9426	52	8,3104	77	8,3320
3	2,4018	28	7,9844	53	8,3128	78	8,3321
4	3,0374	29	8,0218	54	8,3150	79	8,3323
5	3,6048	30	8,0552	55	8,3170	80	8,3324
6	4,1114	31	8,0850	56	8,3187	81	8,3325
7	4,5638	32	8,1116	57	8,3203	82	8,3326
8	4,9676	33	8,1354	58	8,3217	83	8,3326
9	5,3282	34	8,1566	59	8,3229	84	8,3327
10	5,6502	35	8,1755	60	8,3240	85	8,3328
11	5,9377	36	8,1924	61	8,3250	86	8,3328
12	6,1944	37	8,2075	62	8,3259	87	8,3329
13	6,4236	38	8,2210	63	8,3267	88	8,3330
14	6,6282	39	8,2330	64	8,3274	89	8,3330
15	6,8109	40	8,2438	65	8,3281	90	8,3330
16	6,9740	41	8,2534	66	8,3286	91	8,3331
17	7,1196	42	8,2619	67	8,3291	92	8,3331
18	7,2497	43	8,2696	68	8,3296	93	8,3331
19	7,3658	44	8,2764	69	8,3300	94	8,3331
20	7,4694	45	8,2825	70	8,3303	95	8,3332
21	7,5620	46	8,2880	71	8,3307	96	8,3332
22	7,6446	47	8,2928	72	8,3310	97	8,3332
23	7,7184	48	8,2972	73	8,3312	98	8,3332
24	7,7843	49	8,3010	74	8,3314	99	8,3332
25	7,8431	50	8,3045	75	8,3316	100	8,3332