

Self Study And SSS Problems For Chapters 1 to 5

To provide practice in problem solving, these are the Self Study Problems for Chapters 1 to 5. The detailed solutions to these problems are available in both the print and online Study Guide.

For additional practice in problem solving, there are Supplementary Self Study Problems with detailed solutions available for each chapter. These problems and solutions are available in this file after the Self Study problems for each Chapter.

Chapter 1 Self Study Problems

Self Study Problem One - 1

(Regressive Taxation)

A regressive tax can be described as one which is assessed at a lower rate as income levels increase. Despite the fact that the Harmonized Sales Tax (HST) is based on a single rate, it is referred to as a regressive form of taxation.

Required: Explain how a tax system with a single rate can be viewed as regressive.

SOLUTION available in printed and online Study Guide.

Self Study Problem One - 2

(Flat Rate Tax)

At a recent cocktail party, Mr. Right was heard complaining vehemently about the lack of progress towards tax simplification. He was tired of spending half of his time filling out various CRA forms and, if the matter were left to him, he could solve the problem in 10 minutes. "It is simply a matter of having one tax rate and applying that rate to 100 percent of income."

Required: Discuss Mr. Right's proposed flat rate tax system.

SOLUTION available in printed and online Study Guide.

Self Study Problem One - 3

(Qualitative Characteristics)

The Conservative government introduced several tax measures in 2014 and 2015. A selected group of these measures can be described as follows:

Family Tax Cut This provision provided a tax reduction based on a limited amount of income splitting. Specifically, a separate calculation of Tax Payable was based on the assumption that up to \$50,000 of Taxable Income was transferred from a higher income spouse to a lower income spouse. It was only available to couples with a child under the age of 18. This provision was repealed in 2016.

Lifetime Capital Gains Deduction An increase in the provision to remove from Taxable Income, capital gains on the disposition of a qualified farming or fishing property from \$813,600 (2015 limit) to \$1,000,000.

Home Accessibility Tax Credit A new credit against Tax Payable equal to 15 percent of up to \$10,000 in expenditures made by seniors and disabled people to gain access to, be more mobile within, or reduce the risk of harm within, their home.

Small Business Rate A reduction scheduled for 2016 (2 years in the future) in the federal tax rate on active business income earned by Canadian Controlled Private Companies. The rate was reduced from 11 percent of Taxable Income to a new rate equal to 10.5 percent of Taxable Income.

Increase In Tax Free Savings Account (TFSA) Limits The TFSA provision allows non-deductible contributions to be made to a registered account where earnings accumulate on a tax free basis. Withdrawals from these accounts are not taxed. The annual limit on contributions to Tax Free Savings Accounts (TFSAs) was increased from \$5,500 to \$10,000 for 2015. This increase was reversed in 2016.

Required: Analyze each of the described changes using two of the qualitative characteristics of tax systems that are listed in your text. For your convenience, the list of qualitative characteristics presented in the text is as follows:

- equity or fairness
- neutrality
- adequacy
- elasticity
- flexibility
- simplicity and ease of compliance
- certainty
- balance between sectors
- international competitiveness

SOLUTION available in printed and online Study Guide.

Self Study Problem One - 4

(Sources Of Tax Information)

The principal source of Canadian income tax information is the *Income Tax Act*. There are, however, other sources that are of considerable significance in the application of these rules.

Required: List and briefly describe these other sources of information on Canadian income tax matters.

SOLUTION available in printed and online Study Guide.

Self Study Problem One - 5

(Net Income For Tax Purposes - Two Cases)

The following two Cases make different assumptions with respect to the amounts of income and deductions for the current year for Christina Szabo, a Canadian resident.

Case A Christina had employment income of \$46,200, as well as income from an unincorporated business of \$13,500. A rental property owned by Christina experienced a net loss of \$2,350. Dispositions of capital property during the current year had the following results:

Taxable Capital Gains	\$14,320
Allowable Capital Losses	23,460

Christina paid deductible spousal support of \$4,800 during the current year. While gambling was an unusual pastime for Christina, a recent trip to Las Vega resulted in roulette winnings of \$123,000. The expenses of the trip were \$8,450.

Case B Christina had employment income of \$64,000, interest income of \$2,600, and net rental income of \$4,560. Christina had a 50 percent interest in a partnership. During the current year the partnership had a business loss of \$144,940. Dispositions of capital property during the current year had the following results:

Taxable Capital Gains	\$32,420
Allowable Capital Losses	29,375

Deductible contributions of \$12,480 were made to Christina's RRSP.

Required: For both Cases, calculate Christina's Net Income For Tax Purposes (Division B income). Indicate the amount and type of any loss carry overs that would be available at the end of the current year.

SOLUTION available in printed and online Study Guide.

Self Study Problem One - 7

Self Study Problem One - 6**(Net Income For Tax Purposes - Four Cases)**

The following four Cases make different assumptions with respect to the amounts of income and deductions of Karl Marks for the current year:

	Case A	Case B	Case C	Case D
Employment Income	\$73,300	\$41,400	\$89,400	\$34,300
Income (Loss) From Business	(14,700)	(4,700)	(112,600)	(47,800)
Rental Income (Loss)	8,300	5,900	5,300	(20,100)
Taxable Capital Gains	42,400	7,800	23,700	24,700
Allowable Capital Losses	(18,600)	(11,600)	(21,200)	(26,300)
Subdivision e Deductions	(6,200)	(2,800)	(22,400)	(6,400)

Required For each Case, calculate Mr. Marks' Net Income For Tax Purposes (Division B income). Indicate the amount and type of any loss carry overs that would be available at the end of the current year, or state that no carry overs are available.

SOLUTION available in printed and online Study Guide.

Self Study Problem One - 7**(Net Income For Tax Purposes - Four Cases)**

The following four Cases make different assumptions with respect to the amounts of income and deductions of Mr. Knowlton Haynes for the current year:

	Case A	Case B	Case C	Case D
Employment Income	\$45,000	17,000	\$24,000	\$18,000
Income (Loss) From Business	(20,000)	(42,000)	(48,000)	(20,000)
Income From Property	15,000	12,000	47,000	7,000
Taxable Capital Gains	25,000	22,000	22,000	13,000
Allowable Capital Losses	(10,000)	(8,000)	(73,000)	(18,000)
Subdivision e Deductions	(5,000)	(6,000)	(4,000)	(12,000)

Required For each Case, calculate Mr. Haynes' Net Income For Tax Purposes (Division B income). Indicate the amount and type of any loss carry overs that would be available at the end of the current year, or state that no carry overs are available.

SOLUTION available in printed and online Study Guide.

Chapter 1 Supplementary Self Study (SSS) Problems

The solutions to these Chapter 1 SSS Problems can be found following the SSS Problems for this Chapter.

SSS Problem One - 1

(Qualitative Characteristics)

With the growing importance of free trade and e-commerce, Canada is contemplating increased harmonization of the Canadian tax system with other major tax regimes in the world. Harmonization with the United States is the first priority, with harmonization with other major economic groups being secondary. Assume the following changes are proposed:

- A. Taxing all e-commerce transactions based on where the goods and services are delivered.
- B. Full deduction of mortgage interest related to principal residences, combined with taxation of capital gains arising on dispositions of these residences. Currently in Canada, the capital gains on the disposition of principal residences are not taxed and mortgage interest related to principal residences is not deductible.
- C. Requiring corporations that are under common control to file a single consolidated tax return for all of the corporations in the group.
- D. Conversion of the GST system into a national sales tax to be applied to the sale of goods and services at the retail level.

Required: Indicate a significant tax advantage, other than the benefits associated with international harmonization, that would result from introducing each of the proposed changes. In addition, analyze each proposed change using two of the qualitative characteristics of tax systems that are listed in your text.

For your convenience, the list of qualitative characteristics presented in the text is as follows:

- equity or fairness
- neutrality
- adequacy
- elasticity
- flexibility
- simplicity and ease of compliance
- certainty
- balance between sectors
- international competitiveness

SSS Problem One - 2**(Net Income For Tax Purposes - Two Cases)**

The following two Cases make different assumptions with respect to the amounts of income and deductions for the current year for Christophe Szabo, a Canadian resident.

Case A Christophe has employment income of \$46,700, interest income of \$3,500, a net rental loss of \$22,250, and a net business loss of \$37,260. Dispositions of capital property during the current year had the following results:

Taxable Capital Gains	\$13,470
Allowable Capital Losses	10,540

Christophe paid deductible spousal support of \$500 per month. His cash position was significantly improved when he won a provincial lottery prize of \$450,000 during the year.

Case B Christophe had employment income of \$75,400, interest income of \$4,560, and a net rental loss of \$12,200.

Dispositions of capital property during the current year had the following results:

Taxable Capital Gains	\$8,725
Allowable Capital Losses	9,460

Subdivision e deductions for the current year were child care costs of \$4,520, RRSP contributions of \$6,570, and spousal support payments of \$3,600.

Required: For both Cases, calculate Christophe's Net Income For Tax Purposes (Division B income). Indicate the amount and type of any loss carry overs that would be available at the end of the current year.

SSS Problem One - 3**(Net Income For Tax Purposes - Four Cases)**

The following four Cases make different assumptions with respect to the amounts of income and deductions of Jonathan Oakley for the current year:

	Case A	Case B	Case C	Case D
Employment Income	\$83,000	\$92,000	\$46,000	\$57,000
Income (Loss) From Business	(22,000)	(22,000)	21,000	16,000
Rental Income (Loss)	12,000	16,000	(42,000)	(92,000)
Taxable Capital Gains	81,000	18,000	22,000	31,000
Allowable Capital Losses	(35,000)	(32,000)	(53,000)	(35,000)
Subdivision e Deductions	(15,000)	(12,000)	(16,000)	(17,000)

Required For each Case, calculate Mr. Oakley's Net Income For Tax Purposes (Division B income). Indicate the amount and type of any loss carry overs that would be available at the end of the current year, or state that no carry overs are available.

Chapter 1 Supplementary Self Study (SSS) Solutions

SSS Solution One - 1

Given the subject matter of this question, there are many answers that would satisfy the requirements of the problem. Those listed below should only be considered as examples of possible solutions.

- A. A big advantage here would be the likelihood that Canadian tax revenues would increase. In terms of qualitative characteristics, two possibilities would be:
- More neutrality, as businesses would no longer make location decisions based on the tax status of the shipping point.
 - Complexity would be added in terms of finding a mechanism to enforce collections.
- B. A possible advantage would be economic development in that the deductibility of interest could encourage real estate purchases. In terms of qualitative characteristics, two possibilities would be:
- Vertical equity in the sense that high income taxpayers benefit most from the non-taxation of capital gains on the disposition of a principal residence.
 - Balance between sectors would be improved as the tax relief on interest payments would reduce taxes on individuals.
- C. A major advantage would likely be increased revenues as the ability to use multiple corporate structures for tax planning purposes would be reduced. In terms of qualitative characteristics, two possibilities would be:
- More neutrality, as it would remove the incentive to make investment decisions on the basis of multiple corporate structures.
 - There would be greater ease of compliance as only one tax return would be required.
- D. The major advantage here would likely be greater ease of compliance for business. In terms of qualitative characteristics, two possibilities would be:
- Simplicity and ease of compliance would be improved.
 - Certainty would be improved, in that taxpayers would be more aware of the amounts to be paid, without having to do the additional calculations required for input tax credits.

SSS Solution One - 2**Case A**

The Case A solution would be calculated as follows:

Income Under ITA 3(a):		
Employment Income	\$46,700	
Interest Income	<u>3,500</u>	\$50,200
Income Under ITA 3(b):		
Taxable Capital Gains	\$13,470	
Allowable Capital Losses	<u>(10,540)</u>	2,930
Balance From ITA 3(a) And (b)		\$53,130
Spousal Support Payments [(12)(\$500)]		<u>(6,000)</u>
Balance From ITA 3(c)		\$47,130
Deductions Under ITA 3(d):		
Net Rental Loss		(22,250)
Business Loss		<u>(37,260)</u>
Net Income For Tax Purposes (Division B Income)		<u>Nil</u>

In this Case, Christophe has rental and business loss carry overs of \$12,380 (\$47,130 - \$22,250 - \$37,260). The provincial lottery winnings would not be included in Christophe's Net Income For Tax Purposes as they are not subject to tax.

Case B

The Case B solution would be calculated as follows:

Income Under ITA 3(a):		
Employment Income	\$75,400	
Interest Income	<u>4,560</u>	\$79,960
Income Under ITA 3(b):		
Taxable Capital Gains	\$8,725	
Allowable Capital Losses	<u>(9,460)</u>	Nil
Balance From ITA 3(a) And (b)		\$79,960
Child Care Costs		<u>(4,520)</u>
RRSP Contributions		<u>(6,570)</u>
Spousal Support Payments		<u>(3,600)</u>
Balance From ITA 3(c)		\$65,270
Deduction Under ITA 3(d):		
Net Rental Loss		<u>(12,200)</u>
Net Income For Tax Purposes (Division B Income)		<u>\$53,070</u>

In this Case, Christophe has an allowable capital loss carry over of \$735 (\$8,725 - \$9,460).

SSS Solution One - 3**Case A**

The Case A solution would be calculated as follows:

Income Under ITA 3(a):		
Employment Income	\$83,000	
Rental Income	<u>12,000</u>	\$ 95,000
Income Under ITA 3(b):		
Taxable Capital Gains	\$81,000	
Allowable Capital Losses	<u>(35,000)</u>	46,000
Balance From ITA 3(a) And (b)		\$141,000
Subdivision e Deductions		<u>(15,000)</u>
Balance From ITA 3(c)		\$126,000
Deduction Under ITA 3(d):		
Business Loss		<u>(22,000)</u>
Net Income For Tax Purposes (Division B Income)		<u>\$104,000</u>

In this Case, Mr. Oakley has no loss carry overs at the end of the year.

Case B

The Case B solution would be calculated as follows:

Income Under ITA 3(a):		
Employment Income	\$92,000	
Rental Income	<u>16,000</u>	\$108,000
Income Under ITA 3(b):		
Taxable Capital Gains	\$18,000	
Allowable Capital Losses	<u>(32,000)</u>	Nil
Balance From ITA 3(a) And (b)		\$108,000
Subdivision e Deductions		<u>(12,000)</u>
Balance From ITA 3(c)		\$ 96,000
Deduction Under ITA 3(d):		
Business Loss		<u>(22,000)</u>
Net Income For Tax Purposes (Division B Income)		<u>\$ 74,000</u>

In this Case, Mr. Oakley has a carry over of \$14,000 (\$32,000 - \$18,000) in unused allowable capital losses.

SSS Solution One - 3

Case C

The Case C solution would be calculated as follows:

Income Under ITA 3(a):		
Employment Income	\$46,000	
Business Income	<u>21,000</u>	\$67,000
Income Under ITA 3(b):		
Taxable Capital Gains	\$22,000	
Allowable Capital Losses	(53,000)	Nil
Balance From ITA 3(a) and (b)		\$67,000
Subdivision e Deductions		(16,000)
Balance From ITA 3(c)		\$51,000
Deduction Under ITA 3(d):		
Rental Loss		(42,000)
Net Income For Tax Purposes (Division B Income)		<u>\$ 9,000</u>

In this Case, Mr. Oakley would have an allowable capital loss carry over in the amount of \$31,000 (\$53,000 - \$22,000).

Case D

The Case D solution would be calculated as follows:

Income Under ITA 3(a):		
Employment Income	\$57,000	
Business Income	<u>16,000</u>	\$73,000
Income Under ITA 3(b):		
Taxable Capital Gains	\$31,000	
Allowable Capital Losses	(35,000)	Nil
Balance From ITA 3(a) And (b)		\$73,000
Subdivision e Deductions		(17,000)
Balance From ITA 3(c)		\$56,000
Deduction Under ITA 3(d):		
Rental Loss		(92,000)
Net Income For Tax Purposes (Division B Income)		<u>Nil</u>

Mr. Oakley would have a carry over of unused business losses in the amount of \$36,000 (\$92,000 - \$56,000) and of unused allowable capital losses in the amount of \$4,000 (\$35,000 - \$31,000).

Chapter 2 Self Study Problems

Self Study Problem Two - 1

(Individual Tax Instalments)

The following information relates to Ms. Shannon Birch for tax years ending December 31:

	Federal And Provincial Income Taxes Payable	Income Taxes Withheld By Employer
2014	\$23,000	\$21,500
2015	\$27,000	\$15,000
2016 (Estimated)	\$21,200	\$18,000

Required:

- Indicate whether Ms. Birch has an obligation to make instalment payments during the 2016 taxation year. Explain your conclusion.
- If Ms. Birch is required to make instalment payments, indicate the minimum amounts that should be paid and the dates on which the amounts are payable. Your answer should include the calculations for all the alternatives that are available to Ms. Birch, as well as an indication as to which alternative is preferable.
- Ms. Birch would like your advice as to whether or not she should make the recommended instalment payments. Explain your conclusion.

SOLUTION available in printed and online Study Guide.

Self Study Problem Two - 2

(Corporate Tax Instalments And Balance Due Date)

Amalmor Inc. is a publicly traded company. For its fiscal year ending December 31, 2014, the Company had Taxable Income of \$250,000 and paid taxes of \$62,500. In 2015, the corresponding figures were \$320,000 and \$80,000. It is estimated that for the current year ending December 31, 2016, the Company will have Taxable Income of \$380,000 and taxes payable of \$95,000.

Required: Show all required calculations.

- Determine the amount of the minimum instalments that must be made by Amalmor Inc. during 2016 and when they would be due. Your answer should include the calculations for all the alternatives that are available to Amalmor Inc., as well as an indication as to which alternative is preferable.
- How would your answer to Part A differ if Amalmor Inc. was a small CCPC?
- Indicate when any final payment of tax is due in both Part A and B.

SOLUTION available in printed and online Study Guide.

Self Study Problem Two - 3

(Individual And Corporate Tax Instalments)

For the three years ending December 31, 2016, the taxpayer's combined federal and provincial taxes payable were as follows:

Year Ending December 31	Taxes Payable
2014	\$23,540
2015	11,466
2016 (Estimated)	25,718

Case One The taxpayer is an individual whose employer withholds combined federal and provincial taxes of \$18,234 in 2014, \$7,850 in 2015, and \$27,346 in 2016.

Case Two The taxpayer is an individual whose employer withholds combined federal and provincial taxes of \$21,720 in 2014, \$6,250 in 2015, and \$21,833 in 2016.

Case Three The taxpayer is a small CCPC with a taxation year that ends on December 31.

Case Four The taxpayer is a publicly traded corporation with a taxation year that ends on December 31. Assume that its combined federal and provincial taxes payable for the year ending December 31, 2015 were \$32,560, instead of the \$11,466 given in the problem.

Required: For each of the preceding independent Cases determine:

- Whether instalments are required for the 2016 taxation year (you should indicate the requirement to make instalments, even if one of the methods results in instalments of nil). Explain your conclusion. Show all calculations, even in cases where the answer to this question is obvious.
- If instalments are required, indicate the best alternative for calculating the instalments, as well as the amount of the instalments under that alternative.
- If instalment payments must be made, indicate the dates on which the payments will be due.

SOLUTION available in printed and online Study Guide.

Self Study Problem Two - 4

(Individual And Corporate Tax Instalments)

For each of the following independent Cases, the taxpayer's combined federal and provincial taxes payable amounted to \$18,000 for the year ending December 31, 2014, while for the year ending December 31, 2015, the amount payable was \$14,400. At the beginning of 2016, it is estimated that federal and provincial taxes payable for the year ending December 31, 2016 will be \$13,500. The actual federal and provincial taxes payable for 2016, calculated in March, 2017, is \$16,000.

- A. The taxpayer is an individual whose only income is rental income.
- B. The taxpayer is an individual whose employer withholds combined federal and provincial taxes of \$7,000 in 2014, \$15,000 in 2015, and \$9,000 in 2016.
- C. The taxpayer is a small CCPC with a December 31 year end.
- D. The taxpayer is a publicly traded corporation with a December 31 year end. Assume that its combined federal and provincial taxes payable for the year ending December 31, 2016 are estimated to be \$16,000, instead of the \$13,500 given in the problem.

Required: For each of the Cases, state whether instalments are required for the 2016 taxation year, even if one of the methods results in required instalments of nil. Explain your conclusion. If instalments are required, indicate:

- the best alternative for calculating the instalments,
- the amount of the instalments under that alternative showing all calculations, even if the optimum solution is obvious,
- the dates on which the payments will be due, and
- any consequences of the 2016 estimated taxes being lower than the actual taxes payable.

SOLUTION available in printed and online Study Guide.

Self Study Problem Two - 5

(Canadian Taxable Entities)

List the three types of entities that are subject to federal income taxation in Canada and, for each, state:

- how their taxation year is established;
- the filing deadlines for their respective income tax returns;
- how frequently income tax instalments must be made; and
- the dates on which the instalment payments must be made.

SOLUTION available in printed and online Study Guide.

Self Study Problem Two - 6

(Assessment Disputes)

Mr. Norman Coffee has been one of your major clients for years. He is extremely wealthy and has paid his very sizable tax payable (and your fees) for decades without complaint.

On August 15th of the current year, Mr. Coffee receives a Notice of Reassessment indicating that he owes \$5,000 of additional taxes, plus interest, for the preceding taxation year. Since you filed the tax return in dispute, Mr. Coffee expects you to deal with the matter quickly.

Required: Indicate the procedures that may be used in dealing with this dispute between the CRA and Mr. Coffee.

SOLUTION available in printed and online Study Guide.

Self Study Problem Two - 7

(Tax Preparer's Penalty)

For each of the following independent cases, indicate whether you believe a penalty would be assessed against the tax return preparer under ITA 163.2. Explain your conclusion.

- A. Joan Bridge, a recently qualified CPA, has several clients that have been reassessed with respect to deductions related to their investment in the Large Partners tax shelter. In each case, the CRA has denied loss deductions, claiming that they are based on an overvaluation of the organization's assets. One of these clients has taken the case to the Tax Court of Canada which confirmed the CRA's reassessment. No further appeal was undertaken. Joan has a new client who also has an interest in this same Large Partners tax shelter. Joan prepares this new client's return claiming the same deductions that were disallowed for her other clients.
- B. Jack Hodge, a CPA, is paid to EFILE the tax return of Barbra Hicks, a very close friend of his mother. Barbra provides him with a T4 slip indicating that she has \$31,000 in employment income. She also indicates that she made a \$22,000 contribution to a registered charity, but forgot to bring the receipt to the meeting with Jack. In actual fact, she did not make the donation. Jack files the tax return without questioning her claim after his mother assures him that Barbra is completely trustworthy.
- C. Marian Flexor, a CPA, is asked by Jason March to prepare and file his tax return. Jason provides a financial statement for his business activities which shows a significant profit. Included in the statement provided to Marian is a large amount of travel costs, all of which are supported by receipts. After the return is filed, the CRA audits Jason's business activities and finds that more than one-half of the travel costs were personal, rather than business related.

SOLUTION available in printed and online Study Guide.

Chapter 2 Supplementary Self Study (SSS) Problems

The solutions to these Chapter 2 SSS Problems can be found following the SSS Problems for this Chapter.

SSS Problem Two - 1

(Individual Tax Instalments)

In January, 2016, you are asked to provide tax advice to Ms. Leslie Garond. She has provided you with the following information about her combined federal and provincial taxes payable and the income taxes withheld by her employer for the 2014 and 2015 taxation years:

Year	Taxes Payable	Taxes Withheld
2014	\$22,000	\$9,500
2015	18,000	9,700

For 2016, she estimates that her combined federal and provincial taxes payable will be \$14,000 and that her employer will withhold a total of \$9,850 in income taxes.

She has asked you whether it will be necessary for her to pay instalments in 2016 and, if so, what the minimum amounts that should be paid are, and when they are due.

Required: Provide the information requested by Ms. Garond. Show all required calculations.

SSS Problem Two - 2

(Individual Tax Instalments)

In January, 2016, you are asked to provide tax advice to Mr. Lester Gore. For the three years 2014, 2015, and 2016, he provides the following information on his combined federal and provincial taxes payable, along with information on withholdings by his employer:

Year	Taxes Payable	Taxes Withheld
2014	\$15,000	\$11,500
2015	10,800	11,750
2016 (Estimated)	17,000	13,000

He has asked you whether it will be necessary for him to pay instalments in 2016 and, if so, what is the minimum he has to pay and when.

Required: Provide the information requested by Mr. Gore. Your answer should include a conclusion on whether or not instalments are required, even if the amount of the instalments is nil. Also indicate the due dates, even if no instalments are required. Show all required calculations.

SSS Problem Two - 3

(Individual And Corporate Tax Instalments)

For the year ending December 31, 2014, the taxpayer's combined federal and provincial taxes payable amounted to \$93,000, while for the year ending December 31, 2015, the amount payable was \$108,000. It is estimated that federal and provincial taxes payable for the year ending December 31, 2016 will be \$82,500.

Case A The taxpayer is an individual whose employer withholds combined federal and provincial taxes of \$86,700 in 2014, \$109,500 in 2015, and \$79,200 in 2016.

Case B The taxpayer is an individual whose employer withholds combined federal and provincial taxes of \$91,500 in 2014, \$98,700 in 2015, and \$78,300 in 2016.

Case C The taxpayer is a small CCPC with a December 31 year end.

Case D The taxpayer is a publicly traded corporation with a December 31 year end. Assume that its combined federal and provincial taxes payable for the year ending December 31, 2014 are estimated to be \$78,100, instead of the \$93,000 given in the problem.

Required: For each of the preceding independent Cases, provide the following information:

1. Indicate whether instalments are required during the year ending December 31, 2016, including a brief explanation of your conclusion. This explanation should be provided even if the amount of the required instalments is nil.
2. Calculate the amount of instalments that would be required under each of the acceptable methods available.
3. Indicate which of the acceptable methods would best serve to minimize instalment payments during 2016. If instalments must be paid, indicate the date on which they are due.

SSS Problem Two - 4

(Instalments, Interest And Penalties For Corporations)

The fiscal year of the Sloan Company, a public company, ends on October 31. During the year ending October 31, 2014, its federal taxes payable amounted to \$168,000, while for the year ending October 31, 2015, the federal taxes payable were \$153,000. It is estimated that federal taxes payable for the year ending October 31, 2016 will be \$144,000.

Required:

- A. Calculate the instalment payments that are required for the year ending October 31, 2016 under each of the alternative methods available. Indicate which of the alternatives would be preferable.
- B. If the Company did not make any instalment payments towards its 2016 taxes payable, and did not file its corporate tax return or pay its taxes payable on time, indicate how the interest and penalty amounts assessed against it would be determined (a detailed calculation is not required).

SSS Problem Two - 5

(Tax Preparer's Penalty)

For each of the following independent cases, indicate whether you believe a penalty would be assessed against the tax return preparer under ITA 163.2. Explain your conclusion.

- A. Accountant X is asked by Client A to prepare a tax return including a business financial statement to be used in the return. In response to a request by Accountant X for business related documents, Client A supplies information to Accountant X, which includes a travel expense receipt. Accountant X relies on this information provided by Client A and prepares the business statement that is filed with the return. The CRA conducts a compliance audit and determines that Client A's travel expense was a non-deductible personal expense.
- B. Accountant X has several clients that have been reassessed in respect of a tax shelter. Accountant X knows that the CRA is challenging the tax effects claimed in respect of the tax shelter on the basis that the shelter is not a business, is based on a significant overvaluation of the related property and is technically deficient in its structure. The Tax Court of Canada, in a test case (general procedures), denies deductions claimed in respect of the tax shelter in a previous year by Client B (a client of Accountant X). Client B's appeal is dismissed. The case is not appealed and Accountant X is aware of the Court's decision. Accountant X prepares and files a tax return on behalf of Client C that includes a claim in respect of the same tax shelter that the Tax Court denied deductions for.
- C. Taxpayer Z approaches Tax-preparer X to prepare and EFILE Z's tax return. Taxpayer Z provides X with a T4 slip indicating that Z has \$32,000 of employment income. Taxpayer Z advises X that he made a charitable donation of \$24,000 but forgot the receipt at home. Z asks that X prepare and EFILE the tax return. In fact, Z never donated anything to a charity. X prepares Z's tax return without obtaining the receipt.

Chapter 2 Supplementary Self Study (SSS) Solutions

SSS Solution Two - 1

Need For Instalments

Instalments are required when an individual's "net tax owing" exceeds \$3,000 in the current year and in either of the two preceding years. In somewhat simplified terms, "net tax owing" is defined as the combined federal and provincial taxes payable, less amounts withheld under ITA 153. Ms. Garond's net tax owing figures are as follows:

2014 = \$12,500 (\$22,000 - \$9,500)
2015 = \$ 8,300 (\$18,000 - \$9,700)
2016 = \$ 4,150 (\$14,000 - \$9,850) Estimate

As Ms. Garond's net tax owing in all three of the years 2014 through 2016 exceeds \$3,000, she is required to make instalment payments.

Amounts

The amount of the instalments could be based on the net tax owing for 2015 or 2016. Alternatively, the first two 2016 instalments could be based on the net tax owing for 2014, with the final two quarterly instalments based on the 2015 net tax owing. Given that the lowest net tax owing figure is 2016's \$4,150 (\$14,000 - \$9,850), use of this figure will give the lowest instalment payments.

The quarterly payments would be \$1,037.50 and are due on March 15, June 15, September 15, and December 15.

SSS Solution Two - 2

Need For Instalments

Instalments are required when an individual's "net tax owing" exceeds \$3,000 in the current year and in either of the two preceding years. In somewhat simplified terms, "net tax owing" is defined as the combined federal and provincial taxes payable, less amounts withheld. Mr. Gore's estimated net tax owing for the three years under consideration is as follows:

2014 = \$3,500 (\$15,000 - \$11,500)

2015 = Nil (\$10,800 - \$11,750)

2016 = \$4,000 (\$17,000 - \$13,000) Estimate

As Mr. Gore's net tax owing in 2016 (the current year) and his net tax owing in 2014 (one of the two preceding years) is greater than \$3,000, he is required to make instalment payments.

Amounts

Note that the problem does not require the calculation of instalments under the three alternative methods, only the minimum instalments required.

The amount of the instalments could be based on the net tax owing for 2015 or 2016. In addition, the first two instalments could be based on the net tax owing for 2014, with the last two instalments based on the net tax owing for 2015, less the amounts paid in the first two instalments.

However, since net tax owing for 2015 is nil, the best solution for Mr. Gore is to use that year. This means that, even though Mr. Gore meets the requirements for making instalment payments, the minimum amount of the required instalments would be nil.

Due Dates

If Mr. Gore did have to pay instalments, the due dates would have been March 15, June 15, September 15 and December 15.

SSS Solution Two - 3

Case A

1. The individual's net tax owing for the relevant three years is as follows:

2014 \$6,300 (\$93,000 - \$86,700)

2015 Nil (Withholdings Exceed Tax Payable)

2016 \$3,300 (\$82,500 - \$79,200)

As the net tax owing exceeds \$3,000 in the current year and one of the two preceding years, instalments are required.

2. The three alternatives would be:
- Quarterly instalments of \$825 ($\$3,300 \div 4$) based on the current year estimate.
 - Quarterly instalments of Nil based on the first preceding year.
 - Two quarterly instalments of \$1,575 ($\$6,300 \div 4$) based on the second preceding year. No further instalments will be required.
3. The best alternative would be quarterly instalments of nil, based on the first preceding year. There was no net tax owing for that year.

Case B

1. The individual's net tax owing for the relevant three years is as follows:

2014 \$1,500 (\$93,000 - \$91,500)

2015 \$9,300 (\$108,000 - \$98,700)

2016 \$4,200 (\$82,500 - \$78,300)

As the net tax owing exceeds \$3,000 in the current year and one of the two preceding years, instalments are required.

2. The three alternatives would be:
- Quarterly instalments of \$1,050 ($\$4,200 \div 4$) based on the current year estimate.
 - Quarterly instalments of \$2,325 ($\$9,300 \div 4$) based on the first preceding year.
 - Two quarterly instalments of \$375 ($\$1,500 \div 4$) based on the second preceding year, followed by two instalments of \$4,275 $\{[\$9,300 - (2)(\$375)] \div 2\}$.
3. The best alternative would be quarterly instalments of \$1,050, for a total of \$4,200. This is much lower than the total of \$9,300 required under the other two alternatives.
- The instalments are due on March 15, June, 15, September 15, and December 15.

*SSS Solution Two - 3***Case C**

1. As the corporation's tax payable for both the current and the preceding year exceeds \$3,000, instalments are required. As the corporation is a small CCPC, quarterly instalments can be used.
2. The three acceptable alternatives would be as follows:
 - Quarterly instalments of \$20,625 ($\$82,500 \div 4$) based on the current year estimate.
 - Quarterly instalments of \$27,000 ($\$108,000 \div 4$) based on the first preceding year.
 - One quarterly instalment of \$23,250 ($\$93,000 \div 4$) based on the second preceding year, followed by three instalments of \$28,250 [$(\$108,000 - \$23,250) \div 3$], a total of \$108,000.
3. The best alternative would be quarterly instalments of \$20,625 based on the current year Tax Payable estimate. The total would be \$82,500, significantly less than the \$108,000 total under the other two methods.

The instalments are due on March 31, June 30, September 30, and December 31.

Case D

1. As the corporation's tax payable for both the current and the preceding year exceeds \$3,000, instalments are required. As the corporation is not a small CCPC, monthly instalments are required.
2. The three acceptable alternatives would be as follows:
 - Monthly instalments of \$6,875 ($\$82,500 \div 12$) based on the current year estimate.
 - Monthly instalments of \$9,000 ($\$108,000 \div 12$) based on the first preceding year.
 - Two monthly instalment of \$6,508.33 ($\$78,100 \div 12$) based on the second preceding year, followed by 10 monthly instalments of \$9,498.33 [$(\$108,000 - (2)(\$6,508.33) \div 10)$], a total of \$108,000.
3. The best alternative would be monthly instalments of \$6,875, based on the current year Tax Payable estimate. The total would be \$82,500, significantly less than the \$108,000 total under the other two methods.

The instalments would be due on the last day of each month, beginning in January.

SSS Solution Two - 4**Part A**

Under ITA 157(1), the Sloan Company would have three alternatives with respect to the calculation of its instalment payments. The alternatives and the relevant calculations are as follows:

Current Year Base The instalment payments could be 1/12th of the estimated taxes payable for the current year. In this case the resulting instalments would be \$12,000 per month ($\$144,000 \div 12$).

Preceding Year Base The instalment payments could be 1/12th of the taxes payable in the immediately preceding taxation year. The resulting instalments would be \$12,750 ($\$153,000 \div 12$).

Preceding And Second Preceding Years The third alternative would be to base the first two instalments on 1/12th of the taxes payable in the second preceding year and the remaining 10 instalments on 1/10th of the taxes payable in the preceding year less the total amount paid in the first two instalments.

In this case, the first two instalments would be \$14,000 ($\$168,000 \div 12$) and the remaining 10 instalments would be \$12,500 [$(\$153,000 - \$28,000) \div 10$]. The total instalments under this approach would be \$153,000.

As the Company has been experiencing a decline in its taxes payable over this three year period, the payments based on the current year's estimated taxes payable would be the most favorable in terms of minimizing cash outflows.

Part B

If the Company failed to make instalment payments towards the 2016 taxes payable, it would be liable for interest from the date each instalment should have been paid to the balance due date, December 31, 2016.

Assuming the actual 2016 taxes payable are \$144,000, it would be the least of the amounts described in ITA 157(1), and interest would be calculated based on this instalment alternative. The rate charged would be the one prescribed in ITR 4301 for amounts owed to the Minister, the regular rate plus 4 percentage points.

There is a penalty on large amounts of late or deficient instalments. This penalty is specified in ITA 163.1 and is equal to 50 percent of the amount by which the interest owing on the late or deficient instalments exceeds the greater of \$1,000 and 25 percent of the interest that would be owing if no instalments were made. While detailed calculations are not required, we would note that this penalty would be applicable in this case.

Interest on the entire balance of \$144,000 of taxes payable would be charged beginning on the balance due date, December 31, 2016. The rate charged would be the one prescribed in ITR 4301 for amounts owed to the Minister, the regular rate plus 4 percentage points.

There is also a penalty for late filing. If no return is filed by the filing date, the penalty amounts to 5 percent of the tax that was unpaid at the filing date, plus 1 percent per complete month of the unpaid tax for a maximum period of 12 months. This penalty is in addition to any interest charged due to late payment of instalments or balance due. In addition, interest would also be charged on any penalties until such time as the return is filed or the instalments (balance due) paid.

The late file penalty could be doubled to 10 percent, plus 2 percent per month for a maximum of 20 months for a second offence within a three year period.

SSS Solution Two - 5

Part A

Accountant X is not liable for participating in an understatement of Client A's taxes payable because Accountant X did not know the expense receipt was personal in nature, and would not be reasonably expected to know, but for circumstances amounting to culpable conduct, that this was the case. This is because X relied in good faith on the information provided by A.

Part B

Based on these facts, Accountant X would be liable for a third party penalty. However, if Accountant X had determined that there was a reasonable basis upon which the Tax Court decision could be overturned by a higher court, the penalty would not apply.

Part C

Based on these facts, if X were to prepare and EFILE Z's return without obtaining the charitable donation receipt, X would be liable for a third party penalty. Given that the size of the donation is so disproportionate to Z's apparent income as to defy credibility, to EFILE the return without verifying the amount of the receipt would show an indifference as to whether the Act is complied with or would show a wilful, reckless, or wanton disregard of the law.

Chapter 3 Self Study Problems

Self Study Problem Three - 1

(Bonus Arrangements)

Empire Inc. has an October 31 year end. On October 31, 2016, the Company accrues a bonus of \$250,000, payable to Joan Betz, the president of the Company.

Required: For each of the following cases, indicate the taxation year in which the Company could deduct the bonus, as well as the taxation year in which Ms. Betz would have to include it in her taxable income.

Case A The bonus is paid on November 1, 2016.

Case B The bonus is paid on January 1, 2017.

Case C The bonus is paid on June 30, 2017.

Case D The bonus is paid on January 1, 2020.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 2

(Employee Vs. Self-Employed)

Farnham Ltd. is interested in acquiring the services of a highly qualified engineering professional. This individual has agreed to become an employee at a salary of \$250,000 per year. For employees, the cost of providing benefits (pension plan and extended health care) is about 8 percent of gross wages. In addition to CPP and EI, the province levies a 2 percent payroll tax to provide for health care. The tax applies to all wages and salaries with no upper limit.

This individual's work is such that a contract could be arranged that would make him an independent contractor. However, because he likes the security and benefits associated with being an employee, the contract would have to provide income of \$280,000 in order for him to find it acceptable.

Required Advise the company as to the preferable alternative.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 3

(Taxable Automobile Benefits)

Ms. Tamira Vines is a salesperson for Compudata Ltd., a Regina based software company. As her work requires her to travel extensively throughout southern and central Saskatchewan, the Company provides her with an automobile. Saskatchewan does not participate in the HST program and has a provincial sales tax which is assessed at a rate of 5 percent.

From January 1, 2016 through May 31, 2016, the Company provided her with an Acura TLX. This car was purchased by the Company on January 1, 2016 at a cost of \$39,000, plus \$1,950 in provincial sales tax and \$1,950 in GST. During the period January 1, 2016 through May 31, 2016, the car was driven 38,800 kilometers for employment related purposes and 3,400 kilometers for personal use. The Company paid all operating costs during the period, an amount of \$3,656, including applicable provincial sales tax and GST.

On June 1, 2016, following a late evening sales conference at the Shangri La Hotel in Moose Jaw, Ms. Vines was involved in an accident in which the Acura was destroyed. Ms. Vines was hospitalized and was not able to return to work until July 1, 2016. Compudata's insurance company paid \$27,500 to the Company for the loss of the car.

When she returned to work on July 1, 2016, the Company provided Ms. Vines with a Ford Taurus. The Company leased this vehicle at a monthly cost of \$699 per month, including applicable provincial sales tax and GST. This monthly payment also includes a \$100 per month charge for insurance.

For the period July 1, 2016 through December 31, 2016, operating costs, other than insurance, totaled \$3,456, including applicable provincial sales tax and GST. These were paid for by the Company. During this period, Ms. Vines drove the car 15,600 kilometers for employment related purposes and 14,600 kilometers for personal use.

Ms. Vines paid to the Company \$0.10 per kilometer for the personal use of the cars owned or leased by the Company for the year.

Required: Calculate the minimum taxable car benefit that will be included in Ms. Vines' employment income for the year ending December 31, 2016.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 4

(Taxable Automobile Benefits)

During the current year, the Carstair Manufacturing Company provides automobiles for four of its senior executives, with the value of the cars being in proportion to the salaries which they receive. While each of the individuals uses their car for employment related travel, they also use them for personal matters. The portion of personal use varies considerably among the four individuals. When the car is not being used by the employee, the Company requires that it be returned to the corporate premises.

The details related to each of these cars, including the amount of personal and employment related travel recorded by the executives, are as follows:

Mr. Sam Stern Mr. Stern is the president of the Company and is provided with a Mercedes which has been purchased by the Company at a cost of \$78,000. The car was new last year and, during the current year, it was driven a total of 38,000 kilometers. Of this total, only 6,000 kilometers were for employment related purposes, while the remaining 32,000 were for personal travel. Operating costs totaled \$.50 per kilometer and, because Mr. Stern made an extended trip outside of North America, the car was used by Mr. Stern for 8 months during the current year. During the period when he was outside North America, the Company required Mr. Stern to return the car to the Company garage.

Ms. Sarah Blue Ms. Blue is the vice president in charge of marketing and has been provided with a Corvette. The Company leases this vehicle at a cost of \$900 per month. During the current year, the car was driven a total of 60,000 kilometers, with all but 5,000 of these kilometers being for employment related purposes. The car was used by Ms. Blue throughout the current year, and total annual operating costs amount to \$18,000.

Mr. John Stack Mr. Stack is the vice president in charge of finance and he has been provided with an Acura that was purchased by the Company in the preceding year at a cost of \$48,000. During the current year, Mr. Stack drove the car 42,000 kilometers for employment related purposes and 10,000 kilometers for personal travel. Operating costs for the year were \$20,800, and the car was used by Mr. Stack throughout the current year. In order to reduce his taxable benefit, Mr. Stack made a payment of \$7,000 to the Company for the use of this car.

Mr. Alex Decker Mr. Decker, the vice president in charge of industrial relations, chose to drive a Lexus. This car was leased by the Company at a cost of \$500 per month. The lease payment was significantly reduced by the fact that the Company made a refundable deposit of \$10,000 to the leasing Company at the inception of the lease. During the current year, Mr. Decker drove the car 90,000 kilometers for employment related purposes and 8,500 kilometers for personal use. The operating costs were \$0.35 per kilometer and, because of an extended illness, he was only able to use the car for the first 10 months of the year. During the period when he was ill, the Company required Mr. Decker to return the car to the Company garage.

Required: Calculate the minimum amount of the taxable benefit for the current year that will accrue to each of these executives as the result of having the cars supplied by the Company. In making these calculations, ignore GST/HST/PST considerations. From the point of view of tax planning for management compensation, provide any suggestions for the Carstair Manufacturing Company with respect to these cars.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 5

(Employer Provided Vs. Employee Owned Car)

John Rush is a key employee of Megan Ltd. (ML), a Canadian public company. He is not required to use an automobile in carrying out his employment duties.

In 2014 and 2015, ML has provided John with a car with ML paying all of the operating costs of the car. John uses the car exclusively for personal travel.

On January 2, 2016, ML has indicated to John that, as an alternative to continuing to provide the car for him, they will sell the car to him at its current fair market value of \$20,000. If he chooses to purchase the car, ML will no longer pay the operating costs.

John expects that, whether he chooses to purchase the car or not, he will use the car for two more years, 2016 and 2017. If he purchases the car, the estimated sales price at the end of these two years would be \$12,000. He expects to drive the car about 40,000 kilometers in each of the two years.

Assume that operating costs will be \$0.20 per kilometer and the prescribed operating cost benefit will be \$0.26 per kilometre throughout both years.

John's combined federal/provincial marginal tax rate is 48 percent.

Required: On the basis of undiscounted cash flows, advise John as to whether he should purchase the car assuming:

- A. ML purchased the car for \$35,000.
- B. ML purchased the car for \$70,000.

Ignore GST/HST considerations.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 7

Self Study Problem Three - 6

(Loans To Employees)

Mr. Thomas Malone is employed by Technocratic Ltd. in a management position. Because of an outstanding performance in his division of the Company, he is about to receive a promotion accompanied by a large increase in compensation. He is discussing various possible ways in which his compensation might be increased without incurring the same amount of taxation as would be assessed on an increase in his salary. He has suggested that it might be advantageous for the Company to provide him with a five year interest free loan in the amount of \$200,000 as part of any increase in compensation.

The funds will either be used to purchase a cottage in which case any interest on related loans will not be deductible to Mr. Malone, or used to purchase investments in which case any interest on related loans will be deductible to Mr. Malone.

Other relevant information is as follows:

- Given Mr. Malone's present salary, any additional income will be taxed at 45 percent.
- Technocratic Ltd. is able to invest funds at a before tax rate of 18 percent. It is subject to taxation at a 25 percent rate.
- Mr. Malone can acquire a similar term, \$200,000 loan at an annual rate of 5 percent.
- Assume that the relevant Regulation 4301 rate for imputing interest on various tax related balances is 2 percent.

Required: Evaluate Mr. Malone's suggestion of providing him with an interest free loan in lieu of salary from the point of view of the cost to the Company. How will the deductibility of the interest affect your conclusion?

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 7

(Employee Stock Options)

During 2014, Ms. Sara Wu's employer, Imports Ltd., granted her stock options that allowed her to acquire 12,000 shares of the Company's common stock at a price of \$22 per share. At this time, the shares have a fair market value of \$20 per share.

On June, 1, 2015, Ms. Wu exercises all of these options. At this time, Imports Ltd. shares have a fair market value of \$31 per share.

On January 31, 2016, Ms. Wu sells the 12,000 Imports Ltd. shares at a price of \$28 per share.

Required For each of the following Cases, calculate the tax consequences of the transactions that took place during 2014, 2015, and 2016 on both the Net Income For Tax Purposes and the Taxable Income of Ms. Wu. Where relevant, identify these effects separately.

Case A Imports Ltd. is a public company.

Case B Imports Ltd. is a Canadian controlled private corporation.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 8

(Employee Stock Options)

During 2014, her first year as an employee of Borden Ltd., Ms. Marcia Balzac was granted options to purchase 2,500 of the Company's shares at a price of \$8.00 per share.

When Ms. Balzac exercises the options, the shares are trading at \$8.30 per share.

On November 1, 2016, Ms. Balzac sells all of her shares at a price of \$8.55 per share.

Required: Indicate the tax effect on Ms. Balzac of the transactions that took place during 2014, 2015, and 2016 under each of the following independent Cases. Your answer should include the effect on both Net Income For Tax Purposes and Taxable Income. Where relevant, identify these effects separately.

- A. Borden Ltd. is a Canadian controlled private corporation. At the time the options were granted, the Company's shares had a fair market value of \$7.50 per share. The options were exercised on October 1, 2015.
- B. Borden Ltd. is a Canadian public company. At the time the options were granted, the shares were trading at \$7.50 per share. The options were exercised on October 1, 2015.
- C. Borden Ltd. is a Canadian public company. At the time the options were granted, the shares were trading at \$8.25 per share. The options were exercised on October 1, 2015.
- D. Borden Ltd. is a Canadian controlled private corporation. At the time the options were granted, the Company's shares had a fair market value of \$9.00 per share. The options were exercised on October 1, 2014.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 9

(Employment Income - No Commissions)

For the last three years, Sam Jurgens has been employed in Halifax as a loan supervisor for Maritime Trust Inc. Maritime Trust is a large public company and, as a consequence, Mr. Jurgens felt that he did not have the opportunity to exhibit the full range of his abilities. To correct this situation, Sam decided to accept employment in Toronto effective July 1, 2016 as the general manager of Bolten Financial Services, a Canadian controlled private corporation specializing in providing financial advice to retired executives.

In April, 2016, prior to leaving Maritime Trust, Mr. Jurgens exercised options to purchase 5,000 shares of the public company's stock at a price of \$15 per share. At the time the Maritime Trust options were granted, the shares were trading at the option price of \$15 per share. At the time that he exercised these options, the shares were trading at \$16 per share. He is still holding these shares on December 31, 2016.

Mr. Jurgens had an annual salary at Maritime Trust of \$105,000, while in his new position in Toronto, the salary is \$90,000 per year. However, he has the option of acquiring 1,000 shares per year of Bolten stock at a price of \$20 per share. On July 1, when he was granted the option, Bolten stock had a fair market value of \$14 per share. On December 1, 2016, when the Bolten stock has a fair market value of \$22 per share, Mr. Jurgens exercises these options and acquires 1,000 shares. It is his intent to hold these shares for an indefinite period of time.

Because there is extensive travel involved in the position with Bolten Financial Services, the Company has provided Mr. Jurgens with a \$40,000 company car. Between July 1 and December 31, 2016, Mr. Jurgens drove this car a total of 25,000 kilometers, of which 15,000 kilometers were clearly related to his work with Bolten Financial Services. The operating costs associated with the car for this period, all of which were paid for by the Company, amount to \$5,000. Because of extensive repairs resulting from a manufacturer's recall, the car had to be returned to the Company for the months of October and November, 2016.

At the time of his move to Toronto, Bolten Financial Services provided Mr. Jurgens with a \$200,000 home relocation loan to purchase a personal residence near the center of town. No interest was charged on this loan.

During the year, Mr. Jurgens earned \$15,000 in interest and received \$45,000 in dividends from taxable Canadian corporations.

Assume that the relevant prescribed rate through all of 2016 is 2 percent.

Required: Compute Sam Jurgens' minimum net employment income for the year ending December 31, 2016.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 10

(Employment Income - Simple)

Ms. Sarah Kline is a copy editor for a major Canadian publisher. Her gross salary for the year ending December 31, 2016 is \$73,500. For the 2016 taxation year, Ms. Kline's employer withheld the following amounts from her income:

Federal And Provincial Income Taxes	\$26,000
Registered Pension Plan Contributions	2,400
Contributions To Group Disability Plan	175

Ms. Kline's employer made a \$2,400 matching contribution to her registered pension plan and a \$200 matching contribution for the group disability insurance.

Other Information:

1. During 2016, Ms. Kline is provided with an automobile that has been leased by her employer. The lease payments are \$700 per month, an amount which includes a \$50 monthly payment for insurance. The car is used by her for 11 months of the year and, during the month of non-use, she is required to return the vehicle to her employer's premises. During 2016, she drives it a total of 40,000 kilometers. Of this total, 37,000 kilometers were for travel required in pursuing the business of her employer, and the remainder was for personal use. The operating costs of the car totaled \$5,200 for the year and were paid by her employer. She reimbursed her employer \$.30 per kilometer for her personal use of the automobile.
2. During 2016, Ms. Kline was hospitalized. The disability plan which provides periodic benefits to compensate for lost employment income paid her benefits of \$1,800 during this period. Ms. Kline began making contributions to this plan in 2015 and paid \$225 for that year.
3. Ms. Kline paid dues to her professional association in the amount of \$1,650 for the year.
4. In 2015, Ms. Kline was given options to buy 200 shares of her employer's publicly traded stock at a price of \$50 per share. At the time the options were issued, the shares were trading at \$50 per share. On June 6, 2016, Ms. Kline exercises the options. At the time of exercise, the shares are trading at \$70 per share. She is still holding the shares on December 31, 2016.

Required: Calculate Ms. Kline's minimum net employment income for the year ending December 31, 2016. Ignore all GST and PST considerations.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 11**(Employment Income With Commissions)**

Ms. Sandra Firth is a commission salesperson who has been working for Hadley Enterprises, a Canadian public corporation, for three years. During the year ending December 31, 2016, her gross salary, not including commissions or allowances, was \$72,000. Her commissions for the year totalled \$14,000. The following amounts were withheld by Hadley Enterprises from Ms. Firth's gross salary:

Federal and provincial income taxes	\$22,000
Registered pension plan contributions (Note One)	3,200
Payments for group disability insurance (Note Two)	250
Payments for personal use of company car (Note Three)	2,400
Payments for group term life insurance (Note Four)	450
Interest on home purchase loan (Note Five)	3,000
Purchase of Canada Savings Bonds	2,060

Note One Hadley Enterprises made a matching \$3,200 contribution to Ms. Firth's registered pension plan.

Note Two Ms. Firth is covered by a comprehensive disability plan which provides periodic benefits during any period of disability to compensate for lost employment income. Prior to 2016, Hadley Enterprises paid all of the \$500 per year premium on this plan. However, as of 2016, Ms. Firth is required to pay one-half of this premium, the \$250 amount withheld from her gross salary. During 2016, Ms. Firth was hospitalized for the month of March. For this period, the disability plan paid her \$500 per week, for a total of \$2,000.

Note Three Hadley Enterprises provides Ms. Firth with a Lexus that was purchased in 2015 for \$58,000. During 2016, she drove the car 92,000 kilometers, 7,000 of which were personal in nature. Ms. Firth paid all of the operating costs of the car, a total of \$6,200 for the year ending December 31, 2016. However, the Company provides her with an annual allowance of \$7,200 to compensate her for these costs. While Ms. Firth was hospitalized during the month of March (see Note Two), her employer required that the car be returned to their premises.

Note Four Ms. Firth is covered by a group term life insurance policy that pays her beneficiary \$160,000 in the event of her death. The 2016 premium on the policy is \$1,350, two-thirds of which is paid by her employer.

Note Five On January 1, 2016, the Company provided Ms. Firth with a \$400,000 loan to assist with the purchase of a new residence. The loan must be repaid by December 31, 2016. All of the interest that is due on the loan for 2016 is withheld from Ms. Firth's 2016 salary. This loan does not qualify as a home relocation loan. Assume that during all of 2016, the prescribed rate was 2 percent.

Other Information:

1. At Christmas, the Company gives all of its employees a mini iPad. Each mini iPad costs the Company \$350, including all applicable taxes. The Company deducts this amount in full in its corporate tax return.
2. During 2015, Ms. Firth received stock options from Hadley to acquire 1,000 shares of its common stock. The option price is \$5.00 per share and, at the time the options are issued, the shares are trading at \$4.50 per share. In June, 2016, the shares have increased in value to \$7.00 per share and Ms. Firth exercises her options to acquire 1,000 shares. She is still holding them at the end of the year and has no intention of selling them.

Self Study Problem Three - 11

3. The Company provides Ms. Firth with a membership in the Mountain Tennis Club. The cost of this membership for the year is \$2,500. During the year, Ms. Firth spends \$6,500 entertaining clients at this club. The Company does not reimburse her for these entertainment costs.
4. Ms. Firth had travel costs related to her employment activities as follows:

Meals	\$1,300
Lodging	3,500
Total	\$4,800

Her employer provides her with a travel allowance of \$300 per month (\$3,600 for the year) which is included on her T4 for the year.

Required: Calculate Ms. Firth's minimum net employment income for the year ending December 31, 2016. Provide reasons for omitting items that you have not included in your calculations. Ignore any GST or PST implications.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 12

(Employment Income With Commissions, Car CCA)

Mr. Jones is a salesman handling a line of computer software throughout Western Canada. During 2016, he is paid a salary of \$25,800 and receives sales commissions of \$47,700. He does not receive an allowance from his employer for any of his expenses. During the year, Mr. Jones made the following employment related expenditures:

Airline Tickets	\$ 2,350
Office Supplies And Shipping Costs	415
Purchase Of Laptop Computer	2,075
Client Entertainment	1,750
Cost Of New Car	24,000
Operating Costs Of Car	7,200

The new car was purchased on January 5, 2016, and replaced a car which Mr. Jones had leased for several years. During 2016, Mr. Jones drove the car a total of 50,000 kilometers, of which 35,000 kilometers were for employment related purposes. The maximum capital cost allowance for the car (100 percent) is \$3,600.

In addition to expenditures to earn employment income, Mr. Jones has the following additional disbursements:

Alberta Blue Cross Medical Insurance Premiums	\$435
Group Life Insurance Premiums	665

Mr. Jones indicates that he regularly receives discounts on his employer's merchandise and, during the current year, he estimates that the value of these discounts was \$1,300.

One of the suppliers of his employer paid \$2,450 to provide Mr. Jones with a one week vacation at a northern fishing lodge.

Required: Determine Mr. Jones' net employment income for the 2016 taxation year. Ignore all GST and PST implications.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 13

Self Study Problem Three - 13**(Commission Income And Work Space In Home)**

Mr. Worthy is a commissioned salesman and has asked for your assistance in preparing his income tax return for the current year. He has provided you with the following information:

Employment Income		
Salary		\$65,000
Commissions		\$11,000
Telephone Charges		
Monthly Charge For Residential Line	\$ 250	
Long Distance To Clients		
From Work Space In Home	400	
Cellular Phone Airtime To Clients	<u>800</u>	\$ 1,450
Office Supplies And Postage At Home Office		\$ 295
Cost of Tickets To Basketball Games With Clients		\$ 2,550
Travel Expenses		
Car Operating Costs	\$2,700	
Meals	900	
Hotels	<u>2,850</u>	\$ 6,450
Capital Cost Allowance On Car (100%)		\$ 2,450
Cost Of Maintaining Work Space In The Home (Based On A Proportion Of Space Used)		
House Utilities	\$485	
House Insurance	70	
House Maintenance	255	
Capital Cost Allowance - House	750	
Capital Cost Allowance - Office Furniture	475	
Mortgage Interest	940	
Property Taxes	<u>265</u>	\$ 3,240
Interest		
On Loan To Buy Office Furniture	\$1,700	
On Loan To Buy Car	<u>2,300</u>	\$ 4,000

Mr. Worthy's car was purchased, used, several years ago for \$28,000. Twenty percent of the milage on the car is for personal matters. He is required by his employer to maintain an office in his home and is eligible to deduct work space in the home costs. Mr. Worthy has received no reimbursement from his employer for any of the amounts listed.

Required: Ignore GST and PST implications in your solutions.

- Calculate Mr. Worthy's minimum net employment income for the current year.
- Assume Mr. Worthy had only \$4,000 in commission income in addition to his \$65,000 salary. Calculate Mr. Worthy's minimum net employment income for the current year.

SOLUTION available in printed and online Study Guide.

Self Study Problem Three - 14

(Comprehensive Employment Income)

Mitch Lesner graduated from the University Of Alberta in early 2016 at the age of 28. He immediately applied for a number of jobs and accepted a position as a financial planner in the Ottawa office of Oxford Associates Ltd. Oxford Associates Ltd. is a large Canadian controlled private corporation (CCPC) employing more than two hundred people.

Prior to accepting employment with Oxford Associates, Mitch had lived in Red Deer, Alberta. Once he had signed the contract with Oxford Associates, plans were made to sell the house he owned in Red Deer. Unfortunately, the home remained unsold when he moved on March 8, 2016. It was sold in late May, 2016 for \$125,000. He had purchased the home several years before for \$147,000.

He arrived in Ottawa on March 16 and moved into an apartment he had rented on a monthly basis until he could arrange to purchase a home. Rent payments were required from April 1.

Mitch began work on April 1, 2016 and eagerly awaited the arrival of his long-time girlfriend Janice Masters from Alberta. Shortly after her arrival in Ottawa, Mitch and Janice were married on November 29, 2016. Mitch had purchased a house just outside of Ottawa for \$235,000 that they moved into on December 1, 2016.

Mitch's new job requires him to meet with existing and prospective clients outside of regular office hours and, at times, on weekends. As a result, Oxford Associates will sign form T2200 stating Mitch is required to pay for certain employment expenses without reimbursement and use a portion of his home for work. He has set aside a small room in his rented apartment which is used exclusively to meet with clientele. Mitch is also provided with an automobile to use in his work.

Mitch is compensated by salary with a bonus and stock option arrangement. The bonus is based on overall company profits. The stock option is available to all employees depending upon level of service and overall job evaluation.

Other Information:

1. Given Mitch's high grades at the University Of Alberta, Oxford Associates offered Mitch \$10,000 to convince him to sign a five year employment contract. After Mitch accepted, he received the cheque in February, 2016. During the period April 1, 2016 through December 31, 2016, Mitch earned salary of \$63,700. Of these earnings, \$62,550 was paid during this period as Oxford Associates holds back one week's pay. The Company withheld the following amounts from his salary:

Income Taxes	\$11,400
CPP	2,544
EI	955
RPP Contributions	1,200
Payment For Personal Use Of Automobile	600

2. On December 16, 2016, a bonus of \$7,450 was accrued for Mitch. Mitch received \$2,000 of this bonus on December 21, 2016, with the remainder being paid on February 17, 2017.
3. A few months into the new job Mitch became quite depressed. His employer suggested he take advantage of the company assistance program. He went to four appointments in October and November and felt much better. Oxford Associates paid \$700 for Mitch's counselling services.
4. Oxford Associates provides group medical coverage to all of its employees. The premiums paid by Oxford Associates on Mitch's behalf cost \$410.

Self Study Problem Three - 14

5. Oxford Associates contributed \$1,200 on Mitch's behalf to the Company's RPP.
6. Mitch is a Certified Financial Planner and paid \$785 in professional dues in 2016. Oxford Associates' policy is to reimburse 80 percent of such annual professional dues. Oxford Associates reimbursed him \$628 in November 2016.
7. When Mitch was married in November he received non-cash wedding gifts valued at \$850. Half of the amount was contributed by his employer and the balance from other employees.
8. Oxford Associates discovered years ago that many existing clients frequent certain recreational and sporting clubs. To encourage contacts with potential clients, employees have their choice among five such clubs. Since Mitch enjoys squash, he chose a free membership at a local squash club. The annual membership fee is \$915.
9. Oxford Associates reimbursed Mitch for 80 percent of the \$22,000 (\$147,000 - \$125,000) loss that he experienced on the sale of his Red Deer home.
10. Mitch had \$35,000 for a down-payment on his new Ottawa home. Since he had no previous work experience, the banks were reluctant to provide him a mortgage at favourable terms. His employer stepped in and agreed to an interest-free housing loan of \$200,000 beginning on December 1, 2016. Mitch agreed to reduce his salary slightly with respect to this benefit. The loan requires annual payments of \$7,500 due at the end of November beginning in 2017. The loan is required to be paid if Mitch dies, sells the home or terminates his employment. Assume that the prescribed interest rates for such benefits are 2 percent in each of the first two quarters of 2016 and 1 percent in the third and fourth quarters.
11. Oxford instituted a stock option plan for its employees in 2015. The plan eligibility requires six months of service. Employees are permitted to acquire a limited number of option shares at 20 percent below their fair market value on either May 1 or November 1. The company hires valuers to determine the fair market value at each of those dates. Mitch acquires 200 shares November 1, 2016 for \$12,800. Low on cash and wanting to buy Janice a nice wedding ring, he is forced to sell 80 of the shares. He sells them on December 16, 2016 for \$8,960.
12. Oxford Associates has an arrangement with a local dealership to lease a minimum number of new automobiles each year at favourable rates. Mitch receives his leased automobile May 1, 2016. It has 162 kilometers on it when it is received. The odometer reads 19,414 kilometers on December 31, 2016. Mitch estimates that he drove 5,198 kilometers for personal purposes, including drives to and from home to the office. Oxford Associates pays monthly lease payments (including HST) of \$430. The cost of gas, oil, insurance, repairs and maintenance and other charges total \$2,175 for 2016. Oxford Associates requires each employee provided with an automobile to pay \$75 each month for the use of the automobile which is withheld directly from their pay.
13. Mitch prepared a separate room in his apartment to be used exclusively for a home office. He used the office space between June 1 and November 30, 2016. A home office was not ready in his newly purchased home until February, 2017. The apartment office space is exactly 100 square feet. The total apartment space is 1,176 square feet. Home office related costs are as follows:

Self Study Problem Three - 14

Monthly Rent	\$ 960
Monthly Phone Line Charge (April to November)	41
Employment Related Long Distance Calls (June to November)	74
Total Electricity Charge (March 16 to November 30)	870
Property Insurance (March 16 to November 30)	175
Paint For Apartment	253
Office Furniture	1,344
Computer Purchase	1,739
Stationery And Office Supplies Purchased	129

14. Mitch received an allowance of \$250 per month for six months to cover the costs of maintaining an office in his home.

Required: Determine Mitch's net employment income for the year 2016. Provide explanations for all amounts including reasons for omitting items not included in your calculations.

SOLUTION available in printed and online Study Guide.

Chapter 3 Supplementary Self Study (SSS) Problems

The solutions to these Chapter 3 SSS Problems can be found following the SSS Problems for this Chapter.

SSS Problem Three - 1

(Taxable Automobile Benefits)

Three employees of the Cancar Company were given the use of company cars on January 1 of the current year. The three cars are identical. Each car was driven 16,000 kilometers during the year and the operating costs were \$2,400 for each car during the year, all of which were paid by the company. When the car is not being used by the employee, the Company requires that it be returned to its premises.

Required: Ignore all GST/PST/HST implications. For each of the following cars, calculate the minimum taxable benefit to the employees for the current year ending December 31.

Car A is purchased for \$30,000. It is used by Aaron Abbott for the whole year. He drives it for personal purposes for a total of 9,000 kilometers.

Car B is leased for \$635 per month. It is used by Babs Bentley for 11 months of the year. She drives it for personal purposes for a total of 6,000 kilometers and pays Cancar Company \$500 for the use of the car.

Car C is purchased for \$30,000. It is used by Carole Cantin for 10 months of the year. She drives it for personal purposes for a total of 7,000 kilometers.

SSS Problem Three - 2

(Loans To Employees)

Eileen Lee is an extremely successful computer salesperson living and working in Hearst, Ontario, who is unhappy with her current employer. She is discussing a compensation package with her future employer, HER Ltd., a very profitable Canadian controlled private corporation.

As Ms. Lee's current and anticipated investment income place her in the 45 percent income tax bracket, she is very interested in finding ways in which she can be compensated without incurring the same amount of taxation as would be assessed on an equivalent amount of salary.

Ms. Lee is contemplating a major cash outlay. She plans to completely renovate a commercial property that she owns. She had been planning to obtain a loan of \$100,000 at a 5 percent rate in order to finance the renovations. She has suggested that it might be advantageous for the Company to provide her with an interest free loan of \$100,000 as part of her compensation. Because she will be using the loan for income producing purposes, any interest on the loan will be deductible to Ms. Lee.

HER Ltd. is able to invest funds at a before tax rate of 20 percent. It is subject to taxation at a 28 percent rate. Assume that the relevant prescribed rate is 2 percent.

Required: Evaluate, from the point of view of the cost to the Company, Ms. Lee's suggestion of providing her with an interest free loan in lieu of sufficient salary to carry a commercial loan at the rate of 5 percent. Assume that the cost of the renovations will be fully deductible in the year in which they are made.

SSS Problem Three - 3

(Employee Stock Options)

Ms. Marian Bytech is an employee of Merlin Industries Ltd. During 2014, Ms. Bytech was granted options to acquire 200,000 of her employer's shares at a price of \$15 per share.

On August 1, 2015, all of the options are exercised. On this date, the Merlin Industries shares have a fair market value of \$22 per share.

On November 1, 2016, Ms. Bytech sells all of her Merlin Industries shares at \$28 per share.

Required: Indicate the tax effect on Ms. Bytech with respect to the granting of the options, their exercise, and the sale of the shares under each of the following independent assumptions. Your answer should include the effect on both Net Income For Tax Purposes and Taxable Income. Where relevant, identify these effects separately.

- A. Merlin Industries Ltd. is a Canadian controlled private corporation. At the time the options were granted, the Company's shares had a fair market value of \$14 per share.
- B. Merlin Industries Ltd. is a Canadian controlled private corporation. At the time the options were granted, the Company's shares had a fair market value of \$18 per share.
- C. Merlin Industries Ltd. is a Canadian public company. At the time the options were granted, the shares were trading at \$15 per share.
- D. Merlin Industries Ltd. is a Canadian public company. At the time the options were granted, the shares were trading at \$18 per share.

SSS Problem Three - 4**(Employment Income)**

Mrs. Vera Smiles is a sales representative for a Canadian controlled private corporation that manufactures office furniture. Her gross salary for the year ending December 31, 2016 is \$53,000 and, in addition, she earned commissions of \$34,500. For the 2016 taxation year, Mrs. Smiles' employer withheld the following amounts from her income:

Federal And Provincial Income Taxes	\$22,400
Registered Pension Plan Contributions	3,200
Contributions To Group Disability Plan	212
EI Premiums	955
CPP Contributions	2,544

Mrs. Smiles' employer made a \$3,200 matching contribution to her registered pension plan and a \$236 matching contribution to her group disability insurance.

Other Information:

1. During 2016, Mrs. Smiles is provided with an automobile that has been leased by her employer. The lease payments are \$1,220 per month, an amount which includes a \$127 per month payment for insurance. The car is used by her for ten months of the year and, during the period of non-use, she is required to return the car to her employer's premises. During 2016, she drives it a total of 67,000 kilometers. Of this total, 63,000 kilometers were for travel required in pursuing the business of her employer, and the remainder was for personal use. She reimbursed her employer \$1,400 for her personal use of the automobile.
2. During 2016, Mrs. Smiles was hospitalized for a month. The disability plan which provides periodic benefits to compensate for lost employment income paid her benefits of \$2,650 during this period. Mrs. Smiles began making contributions to this plan in 2015 and paid \$260 for that year.
3. On July 1, 2016, Mrs. Smiles received a \$50,000 loan from her employer. The loan requires annual interest payments at a rate of 1 percent and Mrs. Smiles pays the interest for 2016 on January 18, 2017. Assume that at the time the loan was granted and for the remainder of the year, the prescribed rate was 2 percent. The loan is still outstanding at the end of the year.
4. In 2013, Mrs. Smiles was given options to buy 200 shares of her employer's stock at a price of \$32 per share. At the time the options were issued, the shares had a fair market value of \$30 per share. On June 1, 2016, Mrs. Smiles exercises the options. At the time of exercise, the shares had a fair market value of \$45 per share. She does not plan to sell the shares for at least two years.
5. During the year, Mrs. Smiles traveled extensively on business. She had travel costs of \$3,365 in air fares, \$4,880 in travel lodging, and \$2,450 in meals while on the road. She also spent \$2,720 to entertain clients. Her employer reimbursed her fully for these costs on presentation of the receipts.

Required: Calculate Mrs. Smiles' minimum net employment income for the year ending December 31, 2016. Provide reasons for omitting items that you have not included in your calculations. Ignore all GST and PST considerations.

Chapter 3 Supplementary Self Study (SSS) Solutions

SSS Solution Three - 1

With respect to Cars B and C, employment related usage was more than 50 percent of total usage and, as a consequence, there is an available reduction in the standby charge, as well as an alternative calculation of the operating cost benefit. For Car A, the employment related use is less than 50 percent and, as a consequence, there is no alternative calculation of either the standby charge or the operating cost benefit.

Car A

Standby Charge $[(2\%)(\$30,000)(12)]$	\$7,200
Operating Cost Benefit $[(9,000)(\$0.26)]$	2,340
Total Taxable Benefit	\$9,540

Car B

Standby Charge $[(2/3)(11)(\$635)(6,000/18,337^*)]$	\$1,524
Operating Cost Benefit - Lesser Of:	
• $[(6,000)(\$0.26)] = \$1,560$	
• $[(1/2)(\$1,524)] = \762	762
Payment For Personal Use	(500)
Total Taxable Benefit	\$1,786

* $[(11)(1,667)]$

Car C

Standby Charge $[(2\%)(\$30,000)(10)(7,000/16,670^*)]$	\$2,519
Operating Cost Benefit - Lesser Of:	
• $[(7,000)(\$0.26)] = \$1,820$	
• $[(1/2)(\$2,519)] = \$1,260$	1,260
Total Taxable Benefit	\$3,779

* $[(10)(1,667)]$

SSS Solution Three - 2**Approach**

The appropriate comparison in evaluating the interest free loan arrangement would be to determine the cost to the Company of providing the loan, and then to compare this amount with the cost of providing an equivalent benefit in the form of straight salary. The following analysis calculates the Company's lowest cost route to providing Ms. Lee with the financing required, assuming she is not a shareholder.

Cost Of Providing For Interest Payments On Commercial Loan

Ms. Lee can borrow on a loan at a rate of interest of 5 percent. This means that the annual interest payments on \$100,000 would amount to \$5,000.

Because the interest on the loan can be deducted, there would be no tax consequences associated with receiving this amount of additional salary. Given this, a \$5,000 increase in salary will be sufficient to carry the loan.

The cost of the additional salary to the company would be calculated as follows:

Salary Increase	\$5,000
Reduction In Corporate Taxes (At 28 Percent)	(1,400)
Net Cost To Company - Additional Salary	\$3,600

Cost Of Providing Interest Free Loan

Ms. Lee would be assessed a taxable benefit on the loan of \$2,000 [(2%)(\\$100,000)] for the first year. However, under ITA 80.5, this would be deemed interest paid. As she is using the funds provided to produce rental income, the full amount would be deductible, resulting in no net change in taxes.

Given this, the analysis of this alternative only requires looking at the cost of the loan to the company:

Lost Earnings On Funds Loaned (At 20 Percent)	20,000
Corporate Taxes On Imputed Earnings (At 28 Percent)	(5,600)
Net Cost To Company - Loan	\$14,400

Conclusion

On the basis of the preceding analysis, it can be concluded that the Company should provide an additional \$5,000 in salary rather than providing Ms. Lee with an interest free loan of \$100,000. This alternative results in a net cost to the Company which is \$10,800 (\$14,400 - \$3,600) lower. The major factor that pushed the outcome in this direction is the very high rate of return that HER expects on invested funds.

SSS Solution Three - 3**Case A**

The required information under the assumption that Merlin Industries Ltd. is a Canadian controlled private corporation is as follows:

- Year Of Granting - No tax effect.
- Year Of Exercise - No tax effect.
- Year Of Sale - - As the option price was greater than the fair market value of the shares at the time the options were issued, the ITA 110(1)(d) deduction can be taken. The results for this year would be as follows:

Fair Market Value At Exercise [(200,000)(\$22)]	\$4,400,000
Cost of Shares [(200,000)(\$15)]	(3,000,000)
Employment Income	\$1,400,000
Taxable Capital Gain [(200,000)(\$28 - \$22)(1/2)]	600,000
Increase In Net Income For Tax Purposes	\$2,000,000
Deduction Under ITA 110(1)(d) [(1/2)(\$1,400,000)]	(700,000)
Increase In Taxable Income	\$1,300,000

Case B

As the option price at the time of the grant is less than the fair market value of the shares on that date, no deduction is available under ITA 110(1)(d). Further, as Ms. Bytech has not held the shares for two years, no deduction is available under ITA 110(1)(d.1). Given this, the required information under the assumption that Merlin Industries Ltd. is a Canadian controlled private corporation is as follows:

- Year Of Granting - No tax effect.
- Year Of Exercise - No tax effect.
- Year Of Sale - The tax effects would be as follows:

Fair Market Value At Exercise [(200,000)(\$22)]	\$4,400,000
Cost of Shares [(200,000)(\$15)]	(3,000,000)
Employment Income	\$1,400,000
Taxable Capital Gain [(200,000)(\$28 - \$22)(1/2)]	600,000
Increase In Net Income For Tax Purposes	\$2,000,000
Deduction Under ITA 110(1)(d)	N/A
Deduction Under ITA 110(1)(d.1)	N/A
Increase In Taxable Income	\$2,000,000

SSS Solution Three - 3

Case C

The required information under the assumption that Merlin Industries Ltd. is a Canadian public company is as follows:

- Year Of Granting - No tax effect.
- Year Of Exercise - As the option price was greater than the fair market value of the shares at the time the options were issued, the ITA 110(1)(d) deduction can be taken. The results for this year would be as follows:

Fair Market Value At Exercise [(200,000)(\$22)]	\$4,400,000
Cost of Shares [(200,000)(\$15)]	(3,000,000)
Employment Income	
= Increase In Net Income For Tax Purposes	\$1,400,000
Deduction Under ITA 110(1)(d) [(\$1,400,000)(1/2)]	(700,000)
Increase In Taxable Income	\$ 700,000

- Year Of Sale - The taxable capital gain would be both the increase in **Net Income For Tax Purposes** and the increase in **Taxable Income** for the year. The taxable capital gain would be calculated as follows:

Proceeds Of Disposition [(200,000)(\$28)]	\$5,600,000
Adjusted Cost Base [(200,000)(\$22)]	(2,800,000)
Capital Gain	\$1,200,000
Inclusion Rate	1/2
Taxable Capital Gain	\$ 600,000

Case D

As the option price at the time of the grant is less than the fair market value of the shares on that date, no deduction is available under ITA 110(1)(d). Further, as Merlin Industries Ltd. is a public company, no deduction could have been available under ITA 110(1)(d.1). Given this, the required information is as follows:

- Year Of Granting - No tax effect.
- Year Of Exercise - The tax effects would be as follows:

Fair Market Value At Exercise [(200,000)(\$22)]	\$4,400,000
Cost of Shares [(200,000)(\$15)]	(3,000,000)
Employment Income	
= Increase In Net Income For Tax Purposes	\$1,400,000
Deduction Under ITA 110(1)(d)	N/A
Increase In Taxable Income	\$1,400,000

- Year Of Sale - The taxable capital gain would be both the increase in **Net Income For Tax Purposes** and the increase in **Taxable Income** for the year. The taxable capital gain would be calculated as follows:

Proceeds Of Disposition [(200,000)(\$28)]	\$5,600,000
Adjusted Cost Base [(200,000)(\$22)]	(2,800,000)
Capital Gain	\$1,200,000
Inclusion Rate	1/2
Taxable Capital Gain	\$ 600,000

SSS Solution Three - 4

Mrs. Smiles' net employment income for the year would be calculated as follows:

Gross Salary	\$53,000
Commissions	34,500
Registered Pension Plan Contributions	(3,200)
Contributions To Group Disability Plan (Note One)	Nil
Disability Insurance Benefit (Note One)	2,178
Automobile Benefit (Note Two)	1,222
Loan Benefit (Note Three)	250
Stock Option Benefit (Note Four)	Nil
Reimbursed Travel Costs (Note Five)	Nil
Net Employment Income	\$87,950

Note One The contributions to the group disability plan are not deductible, but can be applied against the \$2,650 received under the plan during the year. Since the employer's contributions to this plan are not a taxable benefit, the \$2,650 in benefits received must be included in employment income. However, this benefit can be reduced by the \$472 (\$260 + \$212) in total contributions that she has made in 2015 and 2016.

Note Two Based on the fact that Mrs. Smiles' employment related usage is more than 50 percent, the automobile benefit is calculated as follows:

Standby Charge $[(2/3)(10)(\$1,220 - \$127)(4,000/16,670*)]$	\$1,748
Operating Cost Benefit - Lesser Of:	
• $[(4,000)(\$0.26)] = \$1,040$	
• $[(1/2)(\$1,748)] = \874	874
Total Before Payments	\$2,622
Payments For Personal Use	(1,400)
Taxable Benefit	\$1,222

$$*[(10)(1,667)]$$

Note Three The benefit on the low interest loan would be calculated as follows:

$$[(\$50,000)(2\% - 1\%)(2/4)] = \underline{\underline{\$250}}$$

While most students will use the quarterly calculation, the use of actual days would result in the following acceptable alternative:

$$[(\$50,000)(2\% - 1\%)(184 \div 365)] = \underline{\underline{\$252}}$$

Note Four As a Canadian controlled private corporation is involved and she is still holding the shares, Mrs. Smiles does not recognize an employment income inclusion in 2016.

Note Five Since all of her travel and entertainment costs were reimbursed based on actual receipts, there is no effect on her income. Her employer will have to apply the 50 percent limit on meals and entertainment to the reimbursed costs.

Chapter 4 Self Study Problems

Self Study Problem Four - 1

Tax Payable At Alternative Rates

Barbra and Sally Hines are common-law partners. Neither person has any tax credits other than the personal or common-law partner credit.

This problem will consider three different Cases involving alternative levels of 2016 Taxable Income for each individual as follows:

	Case One	Case Two	Case Three
Barbra's Taxable Income	\$ 42,000	\$111,000	\$222,000
Sally's Taxable Income	180,000	111,000	Nil
Combined Taxable Income	\$222,000	\$222,000	\$222,000

Required: For each Case, determine the combined federal Tax Payable for Barbra and Sally Hines for the 2016 taxation year.

SOLUTION available in printed and online Study Guide.

Self Study Problem Four - 2**(Personal Tax Credits - 5 Cases)**

In each of the following independent Cases, determine the maximum amount of 2016 personal tax credits, including transfers from a spouse or dependant, that can be applied against federal Tax Payable by the taxpayer. Ignore, where relevant, the possibility of pension income splitting.

A calculation of Tax Payable is **NOT** required, only the applicable credits.

1. Leonard Wilkins has Net Income For Tax Purposes of \$104,300, all of which is rental income. His spouse has Net Income For Tax Purposes of \$8,720. Their daughter is 13 years old, lives with them, and has Net Income For Tax Purposes of \$3,240. Their son is 24 years old and, because of a physical disability, continues to live with them. He has no income of his own. His disability is not severe enough to qualify for the disability tax credit.
2. Pete Webb has Net Income For Tax Purposes of \$74,200 all of which is employment income. His employer withheld the maximum EI premium and CPP contribution. He is married to Eva Aguilar whose Net Income For Tax Purposes is \$3,920. They have three children aged 6, 10, and 12. All of the children are in good health and none of them have income of their own.
3. Candace Hall is 78 years old and has Net Income For Tax Purposes of \$69,420. This total is made up of OAS payments of \$7,000 and pension income from her former employer. Her husband is 62 years old and has Net Income For Tax Purposes of \$5,130.
4. Gladys Crawford has Net Income For Tax Purposes of \$126,470, all of which is rental income. Her husband has Net Income For Tax Purposes of \$2,600. They have three children, ages 10, 14, and 20. All of these children are in good health and continue to live at home. The 20 year old child has Net Income For Tax Purposes of \$9,130. During the current year, Ms. Crawford pays the following medical expenses:

Gladys	\$ 5,150
Her Spouse	4,240
10 Year Old Child	2,040
14 Year Old Child	3,220
20 Year Old Child	8,840
Total	\$23,490
5. Austin Schneider was divorced from his wife several years ago. He has custody of their four children, ages 5, 8, 11, and 14. The children are all in good health. His Net Income For Tax Purposes consists of spousal support payments totaling \$62,000. While Austin received \$2,040 in Universal Child Care Benefits, he will include it in the Net Income For Tax Purposes of the child he claims as his eligible dependant. Other than the Universal Child Care Benefits, only the 14 year old child had any income for the year. The 14 year old had Net Income For Tax Purposes of \$10,350 during the year.

SOLUTION available in printed and online Study Guide.

Self Study Problem Four - 3**(Individual Tax Payable - 5 Cases)**

Ms. Wanda Sykes is 42 years old. The following five independent Cases make varying assumptions for the 2016 taxation year with respect to Ms. Sykes' marital status, number of dependants, and type of income. In all Cases, Ms. Sykes had Net Income For Tax Purposes and Taxable Income of \$78,000. In all Cases where Ms. Sykes earned employment income, her employer withheld the maximum EI premium and CPP contribution.

Case A Ms. Sykes is a single mother. She has a son, John, who is 10 years old and lives with her. During the year, Ms. Sykes received \$360 in Universal Child Care Benefits. She elected to include these in the Net Income For Tax Purposes of John, who had no other income for the year. All of Ms. Sykes' income is from spousal support payments. During 2016, Ms. Sykes attends university for 10 months of the year on a part time basis. Her tuition fees total \$5,640.

Case B Ms. Sykes is not married and has no dependants. All of her income is from employment. In December, she wins \$2,000,000 in the provincial lottery. She donates \$150,000 of this amount to the church where she prayed for a winning lottery ticket. She plans to claim \$35,000 of this donation for a tax credit in 2016. She is not eligible for the first-time donor's super credit.

Case C Ms. Sykes is married and her husband, Buff has Net Income For Tax Purposes of \$7,600. All of her income is from rental properties. They have one child, Martin. He is 10 years old, has no income of his own, and qualifies for the disability tax credit. Buff's 73 year old father, Harry, lives with them. His Net Income For Tax Purposes was \$17,600. He is not mentally or physically infirm.

Case D Ms. Sykes is married and her husband, Buff has Net Income For Tax Purposes of \$2,540. All of her income is employment income. Wanda and Buff have two children, Janice who is 10 years of age, and Mark who is 20 years of age. Both children are in good health. As Mark has been unable to find full-time employment, he still lives at home. Mark had Net Income For Tax Purposes of \$2,460 from part-time employment. Janice had no income during the year. During 2016, Ms. Sykes paid for the following medical expenses:

Wanda	\$ 2,100
Buff	360
Janice	3,645
Mark	4,520
Total	\$10,625

Case E Ms. Sykes is married and her husband, Buff is 66 years old. All of her income is from employment. Wanda and Buff have two children, a son aged 12 and a daughter aged 14. Both children are in good health and have no income of their own. Buff is disabled and qualifies for the disability tax credit. His Net Income For Tax Purposes is made up of \$720 in Universal Child Care Benefits and \$8,880 in pension income from his former employer. He is not eligible for OAS. He attends university on a full time basis for 8 months of the year and his tuition costs for 2016 are \$8,450.

Required: In each Case, calculate Ms. Sykes' minimum federal Tax Payable for 2016. Indicate any carry forwards available to her and her dependants and the carry forward provisions. Ignore any tax amounts that Ms. Sykes might have had withheld or paid in instalments.

SOLUTION available in printed and online Study Guide.

Self Study Problem Four - 4

(Individual Tax Payable - Simple)

Mr. Dennis Lane has been a widower for several years. For 2016, both his Net Income For Tax Purposes and Taxable Income were equal \$70,000, all of which is net employment income. While he received Universal Child Care Benefits of \$1,080, these were allocated to the Net Income For Tax Purposes of his eligible dependant. Mr. Lane's employer withheld \$10,100 in federal income taxes, \$955 for Employment Insurance premiums and \$2,579 in Canada Pension Plan contributions. Because of an error by his employer, an over contribution of \$35 was made for the Canada Pension Plan.

Other Information:

1. Mr. Lane made political contributions to federal political parties in the amount of \$450.
2. Mr. Lane has three children, aged 10, 12, and 15. They all live with him in his principal residence. Other than the Universal Child Care Benefits, only the 15 year old child had any income for the year. His 15 year old son had Net Income For Tax Purposes of \$8,200 during the year. Mr. Lane paid no medical expenses other than \$4,400 for hospital care for his 15 year old son.
3. Mr. Lane buys public transit passes for his oldest son and himself. The monthly cost of these passes is \$75 for each individual. Because of a family vacation, no passes were purchased in the month of July.
4. His two younger children are enrolled in an eligible arts program. The annual cost for each child is \$425.

Required: Calculate Mr. Lane's federal tax payable (refund) for 2016.

SOLUTION available in printed and online Study Guide.

Self Study Problem Four - 5**(Comprehensive Tax Payable)**

Mr. John Barth has been employed for many years as a graphic illustrator in Kamloops, British Columbia. His employer is a large publicly traded Canadian company. During 2016, his gross salary was \$82,500. In addition, he was awarded a \$20,000 bonus to reflect his outstanding performance during the year. As he was in no immediate need of additional income, he arranged with his employer that none of this bonus would be paid until 2021, the year of his expected retirement.

Other Information:

For the 2016 taxation year, the following items were relevant.

1. Mr. Barth's employer withheld the following amounts from his income:

Federal Income Tax	\$16,000
Employment Insurance Premiums	955
Canada Pension Plan Contributions	2,544
United Way Donations	2,000
Registered Pension Plan Contributions	3,200
Payments For Personal Use Of Company Car	3,600

2. During the year, Mr. Barth is provided with an automobile owned by his employer. The cost of the automobile was \$47,500. Mr. Barth drove the car a total of 10,000 kilometers during the year, of which only 4,000 kilometers were related to the business of his employer. The automobile was used by Mr. Barth for ten months of the year. During the other two months, he was out of the country and he was required to leave the automobile with one of the other employees of the corporation.
3. During the year, the corporation paid Mega Financial Planners a total of \$1,500 for providing counseling services to Mr. Barth with respect to his personal financial situation.
4. In order to assist Mr. Barth in purchasing a ski chalet, the corporation provided him with a five year loan of \$150,000. The loan was granted on October 1 at an interest rate of 1 percent. Mr. Barth paid the corporation a total of \$375 in interest for 2016 on January 20, 2017. Assume that, at the time the loan was granted and throughout the remainder of the year, the relevant prescribed rate was 2 percent.
5. Mr. Barth was required to pay professional dues of \$1,800 during the year.
6. On June 6, 2016, when Mr. Barth exercised his stock options to buy 1,000 shares of his employer's common stock at a price of \$15 per share, the shares were trading at \$18 per share. When the options were issued, the shares were trading at \$12 per share. During December, 2016, the shares were sold at \$18 per share.
7. Mr. Barth lives with his wife, Lynda. Lynda is blind and qualifies for the disability tax credit. She has Net Income For Tax Purposes of \$1,250.
8. His 22 year old dependent daughter, Marg, is a full time student at the University of British Columbia for 8 months of the year. She lives in Vancouver and has Net Income For Tax Purposes and Taxable Income of \$15,300. She had withheld from her employment income EI premiums of \$288 $[(1.88\%)(\$15,300)]$ and CPP contributions of \$584 $[(4.95\%)(\$15,300 - \$3,500)]$. Mr. Barth paid Marg's tuition for 2016 of \$6,300. She has agreed to transfer the maximum credit available to her father.

Self Study Problem Four - 5

9. Mr. Barth paid the following medical costs:

For Himself	\$ 200
For His Wife	3,550
For Marg	720
Total	\$4,470

10. Because of donations in previous years, he does not qualify for the first-time donor's super tax credit.

Required: Calculate, for the 2016 taxation year:

- A. Marg's minimum federal Tax Payable and any carry forward amounts available to her at the end of the year.
- B. Mr. Barth's minimum Taxable Income and federal Tax Payable (Refund).

SOLUTION available in printed and online Study Guide.

Self Study Problem Four - 6**(Tax Payable - Simple)**

Mr. Samuel Kern is an administrator for a publicly traded Canadian manufacturing company. His gross salary for the year ending December 31, 2016 is \$67,600. Mr. Kern's employer withheld the following amounts from his income:

Federal Income Tax	\$7,200
Employment Insurance Premiums	955
Canada Pension Plan Contributions	2,544
Registered Pension Plan Contributions	1,800
Contributions To Group Disability Plan	150

Mr. Kern's employer made a matching contribution of \$1,800 to his registered pension plan and a \$150 matching contribution for the group disability insurance.

Other Information:

1. Mr. Kern is provided with an automobile that has been leased by his employer. The lease payments are \$815 per month, an amount which includes all taxes and an \$89 monthly payment for insurance. The total operating costs of the car were \$4,600 for the year and they were paid by the employer. The car is used by him for nine months of the year and, during the months of non-use, it must be returned to the premises of his employer. During 2016, he drives it a total of 32,000 kilometers. Of this total, 29,000 kilometers were for travel required in pursuing the business of his employer and the remainder was for personal use. He reimbursed his employer \$50 per month of use for his personal use of the automobile.
2. During 2016, the disability plan provided him with benefits of \$1,650 after he was injured. Mr. Kern began making contributions to this plan in 2015 and paid \$200 for that year. The plan provides periodic benefits that compensate for lost employment income.
3. Mr. Kern was required to pay 2016 dues to his professional association in the amount of \$1,233.
4. Mr. Kern was given options to buy 200 shares of his employer's stock at a price of \$75 per share 2 years ago. At the time the options were issued, the shares were trading at \$70 per share. On June 1, 2016, Mr. Kern exercises the options. At the time of exercise, the shares are trading at \$83 per share. He is still holding the shares at the end of the year.
5. Mr. Kern donated \$500 to the Canadian Cancer Society in 2015, but forgot to claim the donation in 2015. He has found the donation receipt in his files. He is not eligible for the first-time donor's super credit.
6. Mr. Kern lives with his wife and 23 year old son, David. His wife has Net Income For Tax Purposes of \$3,660. David is a full time student at university for 8 months of the year and has Net Income For Tax Purposes of \$5,780. Mr. Kern has paid David's tuition for 2016 of \$6,700, and in return, David has agreed to transfer the maximum credit possible to his father.

Self Study Problem Four - 6

7. Mr. Kern paid the following medical costs:

For Himself	\$2,100
For His Wife	770
For David	3,260
Total	\$6,130

Required: Calculate, for the 2016 taxation year, Mr. Kern's minimum Taxable Income and federal Tax Payable (Refund). Indicate any carry forwards available to him and his dependants and the carry forward provisions. Ignore all GST considerations.

SOLUTION available in printed and online Study Guide.

Self Study Problem Four - 7**(Comprehensive Tax Payable)**

Mr. Lance Strong is a skilled carpenter who has been employed by a large public company for 2 years. For 2016, his annual salary is \$72,000. He is required to pay for his own tools, but is reimbursed for out-of-pocket travel costs when he is required to work away from his employer's municipality for more than 12 hours. His disability plan provides periodic benefits that are designed to compensate for lost employment income.

During 2016, Mr. Strong's employer withheld the following amounts from his compensation:

EI Premiums	\$ 955
CPP Contributions	2,544
RPP Contributions	4,200
Contributions To Disability Plan (Employer Makes Matching Contribution)*	430

Mr. Strong is married and has two children aged 14 and 16. Neither child has any income during 2016. His spouse has 2016 income of \$5,600. Mr. Strong's 67 year old mother lives with the family. Her Net Income For Tax Purposes of \$8,500 consists of OAS payments and investment income. She is not mentally or physically infirm.

Other Information:

1. Mr. Strong is provided with an automobile by his employer. During 2016, it is driven 32,000 kilometers, of which 15,000 are employment related. The automobile is leased by the employer at a monthly rate of \$565, including HST of \$65. The monthly rate also includes a payment for insurance of \$40 per month. The automobile was used by Mr. Strong for 10 months during 2016. During the two that he did not use the automobile, he was required to return it to his employer's garage.
2. During 2016, Mr. Strong was required to buy \$2,000 in carpentry tools in order to carry out his employment duties.
3. Mr. Strong's employer encourages its employees to take university courses by paying their tuition fees. During 8 months of 2016, Mr. Strong was in part time attendance for two university courses. The first course was devoted to 16th century liturgical chants and the second was a course in spoken French. The tuition for each course was \$600, with the employer paying the full amount. The employer was particularly interested in the French course as it would allow Mr. Strong to deal more effectively with francophone clients.
4. Mr. Strong incurred \$4,600 in travel costs during 2016, all of which were reimbursed by his employer.
5. When Mr. Strong began working for his employer in the previous year, he put his house on the market. Due to a major rezoning issue, his house did not sell until 2016. Mr. Strong purchased a heritage home that was 50 kilometers closer to his employer's main office. To assist with the relocation, on April 1, 2016, his employer provided an interest free loan of \$150,000. It must be repaid in full on April 1, 2020. Assume that during the first two quarters of 2016 the prescribed rate was 2 percent and that during the last two quarters it declined to 1 percent.
6. During 2016, Mr. Strong pays for the following eligible medical costs:

Self Study Problem Four - 7

For Himself	\$1,250
For His Spouse	2,300
For His Two Children	850
For His Mother	1,960
Total Medical Costs	\$6,360

7. During 2016, Mr. Strong gives cash of \$1,200 to his church. He also donates carpenter services with a market value of \$1,500. Because of donations in previous years, he does not qualify for the first-time donor's super tax credit.
8. Mr. Strong buys monthly transit passes for both of his children during the school year. The cost is \$60 per month per child. The passes covered 10 months during 2016.

Required:

- A. Determine Mr. Strong's minimum Net Income For Tax Purposes for the 2016 taxation year.
- B. Determine Mr. Strong's minimum Taxable Income for the 2016 taxation year.
- C. Based on your answer in Part B, determine Mr. Strong's federal Tax Payable for the 2016 taxation year. Ignore any amounts that might have been withheld by his employer or paid in instalments.

SOLUTION available in printed and online Study Guide.

Self Study Problem Four - 8**(Comprehensive Tax Payable)**

Mr. Andrew Bosworth is married and has two children. His 19 year old son attends a local university and lives at home. His tuition for the 8 months of attendance during 2016 was \$7,650. His father paid the tuition and, in addition, paid \$560 in ancillary fees and \$425 for textbooks. The ancillary fees were charged to all students attending the university. The son had 2016 Net Income For Tax Purposes of \$12,450 resulting from investments he inherited from his grandfather. The son's only tax credit is the basic personal credit for single persons. He has agreed to transfer any unused education related credits to his father.

Mr. Bosworth's daughter is 12 years old and has been blind since birth. As Mr. Bosworth's spouse is responsible for her care, she has not taken a full-time position of employment. However, she has Net Income For Tax Purposes of \$6,450 resulting from part-time employment and the Universal Child Care Benefit.

Mr. Bosworth works for a publicly traded company. During 2016, his base salary was \$180,000. In addition, he received commissions totaling \$11,500 and a bonus of \$38,000. None of the bonus will be paid until January, 2017.

During 2016, his employer withholds the following amounts from his salary:

Registered Pension Plan Contributions	\$5,200
EI Premiums	955
CPP Contributions	2,544
Contributions To The Local United Way	2,400
Life Insurance Premiums (The Employer Makes A Matching Contribution)	460

Other Information

1. Mr. Bosworth's employer provides him with an automobile that is leased for \$925 per month, including a \$75 per month payment for insurance. During 2016, the automobile is driven a total of 62,000 kilometers, of which 41,000 involve employment related activities. Mr. Bosworth paid all of the \$10,300 in 2016 operating costs and is not reimbursed by his employer. The automobile was used by Mr. Bosworth throughout 2016.
2. In 2015, Mr. Bosworth received options to acquire 5,000 shares of his employer's common stock at a price of \$9.75 per share. This was the market price of the shares at the time the options were granted. On July 1, 2016, when the shares were trading at \$12.35, Mr. Bosworth exercises all of these options. He is still holding the acquired shares at the end of the current year.
3. Mr. Bosworth is not reimbursed for advertising, entertainment or travel costs. In addition to the operating costs for his vehicle, he paid for the following employment related costs:

Meals While Traveling	\$ 6,420
Hotels	10,350
Advertising	12,400
Entertainment	6,500
Total	\$35,670

4. Mr. Bosworth's employer provides all employees with a luxury weekend at a local resort. The cost of the gift is \$2,500 for each employee.

Self Study Problem Four - 8

5. Mr. Bosworth enrolls both of his children in fitness programs. The cost for his son is \$450 for the year. For his daughter the cost is \$400 for the year.
6. Mr. Bosworth pays for the following medical expenses during 2016:
- | | |
|--|-----------------|
| For Andrew | \$ 1,200 |
| For His Spouse | 2,250 |
| For His Son | 2,340 |
| For His Daughter (including \$9,000 in attendant care) | 11,250 |
| <u>Total</u> | <u>\$17,040</u> |
7. Because of his ongoing interest in Elizabethan drama, Mr. Bosworth enrolls in a course on Shakespeare's tragedies at the local university. His tuition for this part-time attendance was \$1,670 and his required textbooks cost \$165. The duration of the course was 4 months.
8. Because he contributes every year to the United Way, Mr. Bosworth is not eligible for the first-time donor's super credit.

Required:

- A. Determine Mr. Bosworth's minimum Net Income For Tax Purposes for the 2016 taxation year.
- B. Determine Mr. Bosworth's minimum Taxable Income for the 2016 taxation year.
- C. Based on your answer in Part B, determine Mr. Bosworth's federal Tax Payable for the 2016 taxation year. Ignore any amounts that might have been withheld by his employer, any amount paid in instalments and any considerations related to HST, GST, or PST.

SOLUTION available in printed and online Study Guide.

Chapter 4 Supplementary Self Study (SSS) Problems

The solutions to these Chapter 4 SSS Problems can be found following the SSS Problems for this Chapter.

SSS Problem Four - 1

(Personal Tax Credits - 5 Cases)

In each of the following independent Cases, determine the maximum amount of 2016 personal tax credits, including transfers from a spouse or dependant, that can be applied against federal Tax Payable by the taxpayer.

A calculation of Tax Payable is **NOT** required, only the applicable credits.

1. Jack Brown has Net Income For Tax Purposes of \$97,000, all of which is employment income. His employer has withheld and remitted the required EI and CPP amounts. He is married to Janice Brown whose Net Income For Tax Purposes is \$7,250. They have three children aged 7, 9, and 11. All of the children are in good health. None of them have income of their own.
2. Marion Barkin was divorced from her husband several years ago. She has custody of their three children, ages 9, 12, and 15. The children are all in good health. Her Net Income For Tax Purposes consists of spousal support payments totaling \$48,000 per year. While she received \$1,080 in Universal Child Care Benefits, she has elected to include it in the Net Income For Tax Purposes of the child she claims as her eligible dependant. Other than the Universal Child Care Benefits, only the 15 year old child had any income for the year. The 15 year old had Net Income For Tax Purposes of \$9,500 during the year.
3. John Appleton has Net Income For Tax Purposes of \$86,500, none of which is employment income or income from self-employment. His spouse has Net Income For Tax Purposes of \$5,650. Their daughter is 15 years old, lives with them, and has Net Income For Tax Purposes of \$1,550. Their son is 22 years old and, because of a physical disability, continues to live with them. He has no income of his own. His disability is not severe enough to qualify for the disability tax credit.
4. Sarah Pale is 67 years old and has Net Income For Tax Purposes of \$52,500. This total is made up of OAS payments and pension income from her former employer. Her husband is 62 years old and has Net Income For Tax Purposes of \$4,840. Ignore the possibility of splitting Sarah's pension income.
5. Martin Land has Net Income For Tax Purposes of \$126,420, all of which is rental income. His wife has Net Income For Tax Purposes of \$1,200. They have three children, ages 14, 16, and 19. All of these children are in good health and continue to live at home. The 19 year old child has Net Income For Tax Purposes of \$7,240. During the current year, Mr. Land pays the following medical expenses:

Himself	\$ 2,450
His Spouse	3,240
14 Year Old Child	2,620
16 Year Old Child	1,450
19 Year Old Child	4,560
Total	\$14,320

SSS Problem Four - 2**(Individual Tax Payable - 7 Cases)**

There are seven independent cases which follow. Each case involves various assumptions as to the amount and type of income earned by Mr. Bob Barnes during 2016, as well as to other information that is relevant to the determination of his Tax Payable. Bob's Net Income For Tax Purposes is equal to his Taxable Income in all Cases.

In those cases where we have assumed that the income was from employment, the employer withheld the maximum EI premium and CPP contribution.

Case 1 Bob Barnes is 52 years old, has employment income of \$75,000, and makes contributions of \$4,500 to registered charities. Bob qualifies for the first-time donor's super credit. He is not married and has no dependants.

Case 2 Bob Barnes is 58 years old and has employment income of \$75,000. His common-law partner is 53 years old and has income of \$6,480. They have an adopted son who is 19 years old and lives at home. Bob and his partner have medical expenses of \$4,300. Medical expenses for the son total \$5,600. The son has Net Income For Tax Purposes of \$4,200.

Case 3 Bob Barnes is 58 years old and has income from investments of \$95,000. He is divorced and has been awarded custody of his 21 year disabled son. The son qualifies for the disability tax credit. He has Net Income For Tax Purposes of \$8,000, and is dependent on his father for support. Bob paid \$900 for a 3 month art appreciation course for his son, as well as \$1,500 for a 6 month fitness program.

Case 4 Bob and his wife Gabrielle are both 67 years of age. Gabrielle is sufficiently disabled that she qualifies for the disability tax credit. The components of the income earned by Bob and Gabrielle are as follows:

	Bob	Gabrielle
Interest	\$ 750	\$ 750
Canada Pension Plan Benefits	8,600	Nil
Old Age Security Benefits	7,000	7,000
Income From Registered Pension Plan	34,500	1,450
Total Net Income	\$50,850	\$9,200

Case 5 Bob Barnes is 46 years old and has employment income of \$142,000. His wife Gabrielle is 48 years old and has Net Income For Tax Purposes of \$8,400. They have a 20 year old son who lives at home. He is dependent because of a physical infirmity. However, he is able to attend university on a full time basis for 8 months during 2016. Bob pays his tuition fees of \$7,900, as well as \$725 for the textbooks that he requires in his program. The son has Net Income For Tax Purposes of \$10,000. He agrees to transfer any unused education related credits to his father.

Case 6 Bob Barnes is 43 years old and has rental income of \$95,000. His wife died last year. He has two children. While he received \$720 in Universal Child Care Benefits during the year, he has elected to include these in the income of his daughter Summer, who had no other income for the year. Summer is 12 and is in good health. His son, Martin is 15 and is physically infirm, but not sufficiently to qualify for the disability tax credit. He has income from part time work designing websites of \$7,250.

SSS Problem Four - 2

Case 7 Bob Barnes is 45 years old and has employment income of \$75,000. His wife Gabrielle is 37 years old and has Net Income For Tax Purposes of \$4,600. They have no children. However, they provide in home care for Gabrielle's father who is 62 years old, dependent because of a physical infirmity and has no income of his own. His disability is not severe enough to qualify for the disability tax credit. Also living with them is Bob's 67 year old father. He is in good physical and mental health and has Net Income For Tax Purposes of \$18,300.

Required: In each Case, calculate Bob Barnes' minimum federal Tax Payable for 2016. Indicate any carry forwards available to him and his dependants and the carry forward provisions. Ignore any amounts Bob might have had withheld or paid in instalments and the possibility of pension splitting.

SSS Problem Four - 3**(Comprehensive Tax Payable)**

Ms. Angelina Bradmore is a very successful salesperson for a large publicly traded company. For 2016, her base salary is \$250,000. In addition, she received commissions totaling \$12,000 during the year. For 2016, she also received a bonus of \$32,000, one-half of which was paid during 2016, with the remainder due on January 31, 2017.

During 2016, her employer withholds the following amounts from her salary:

Registered Pension Plan Contributions	\$7,500
EI Premiums	955
CPP Contributions	2,544
Contributions To The Local United Way	1,200
Life Insurance Premiums (The Employer Makes A Matching Contribution)	460

Ms. Bradmore is divorced and has custody of her 12 year old son and 10 year old daughter, both of whom live with her. She received \$720 in Universal Child Care Benefits for the year. She intends to include this amount in the Net Income For Tax Purposes of her daughter. Her son has summer job employment income of \$2,350. Her daughter, who is legally blind, has no income other than the Universal Child Care Benefits.

Other Information

- Ms. Bradmore's employer provides her with an automobile that has a cost of \$47,460, including applicable HST. During 2016, the automobile is driven 53,000 kilometres, of which 48,000 were for employment related activities. Ms. Bradmore pays all of the operating costs for the car. For 2016, these totaled \$7,950, with no reimbursement from her employer. The automobile was used by Ms. Bradmore's throughout 2016.
- Because of the high level of her salary, Ms. Bradmore is required to pay her own advertising and travel costs. In addition to the operating costs for her vehicle, she paid for the following employment related costs:

Meals While Travelling	\$ 4,500
Hotels	9,000
Advertising	11,000
Entertainment	5,000
Total	\$29,500

- Ms. Bradmore received options to acquire 2,500 shares of her employer's common stock 2 years ago. The option price was \$50 per share, the market value of the common shares at the time the options were granted. During July, 2016, after the market price of the shares reaches \$72 per share, Ms. Bradmore exercises all of these options. She is still holding the shares at the end of the year.
- Her employer provides all employees with gifts on their birthday. For 2016, Angelina received a \$250 certificate for a massage and facial at a local spa along with \$200 in cash.

SSS Problem Four - 3

5. Ms. Bradmore contributes \$5,000 to the Save The Children Fund, a registered Canadian charity. As Ms. Bradmore makes some amount of charitable contributions each year, she is not eligible for the first-time donor's super credit.
6. Ms. Bradmore pays for the following medical expenses during 2016:
- | | |
|---------------------------------------|-----------------|
| For Herself | \$ 4,800 |
| For Her Son | 3,200 |
| For Her Daughter (All Attendant Care) | 2,400 |
| <u>Total</u> | <u>\$10,400</u> |
7. During 2016, Ms. Bradmore purchases monthly public transit passes for her son for a total cost of \$985. In addition, because of his continuing problems with his weight, she enrolls him in an eligible fitness program at a cost of \$725.
8. In order to improve her ability to deal with people, Ms. Bradmore enrolled in a part time, human resources program at a local university. Her 2016 tuition totalled \$1,890 and she was required to purchase textbooks with a cost of \$220. The duration of the course was 4 months.

Required:

- A. Determine Ms. Bradmore's minimum Net Income For Tax Purposes for the 2016 taxation year.
- B. Determine Ms. Bradmore's minimum Taxable Income for the 2016 taxation year.
- C. Determine Ms. Bradmore's federal Tax Payable for the 2016 taxation year. Ignore any amounts that might have been withheld by her employer or paid in instalments.

Chapter 4 Supplementary Self Study (SSS) Solutions

SSS Solution Four - 1

The amount of the personal tax credits would be as follows:

1. **Mr. Brown** will qualify for the following credits:

Basic Personal Amount	\$11,474
Spousal (\$11,474 - \$7,250)	4,224
EI (Maximum)	955
CPP (Maximum)	2,544
Canada Employment	1,161
Total Credit Base	\$20,358
Rate	15%
Total Credits	\$ 3,054

2. **Ms. Barkin** will qualify for the following credits:

Basic Personal Amount	\$11,474
Eligible Dependant (\$11,474 - \$1,080) (See Note)	10,394
Total Credit Base	\$21,868
Rate	15%
Total Credits	\$ 3,280

Note The eligible dependant credit can be taken for any child. It should not be claimed for the 15 year old as the amount of the credit would be reduced due to his income. As Ms. Barkin has elected to allocate the Universal Child Care Benefits to her eligible dependant, the base for this credit must be reduced by the UCCB received.

3. **Mr. Appleton** will qualify for the following credits:

Basic Personal Amount	\$11,474
Spousal (\$11,474 - \$5,650)	5,824
Caregiver (See Note)	6,788
Total Credit Base	\$24,086
Rate	15%
Total Credits	\$ 3,613

Note The 22 year old disabled child qualifies for both the caregiver and infirm dependant over 17 credits. In such situations, ITA 118(4)(d), in effect, requires the use of the caregiver credit. Also note that, because the 22 year old son is physically infirm, the caregiver credit includes both the basic amount of \$4,667, as well as the \$2,121 family caregiver amount.

SSS Solution Four - 1

4. **Ms. Pale** will qualify for the following tax credits:

Basic Personal Amount	\$11,474
Spousal (\$11,474 - \$4,840)	6,634
Age [$\$7,125 - (15\%)(\$52,500 - \$35,927)$]	4,639
Pension Income	2,000
Total Credit Base	\$24,747
Rate	15%
Total Credits	\$ 3,712

Note that, because her income is below the income threshold, there will be no claw-back of Ms. Pale's OAS receipts.

5. **Mr. Land** will qualify for the following tax credits:

Basic Personal Amount	\$11,474
Spousal (\$11,474 - \$1,200)	10,274
Medical Expenses (See Note)	11,866
Total Credit Base	\$33,614
Rate	15%
Total Credits	\$ 5,042

Note The claim for medical expenses is determined as follows:

Expenses For Martin, His Spouse, And Under 18		
Dependants ($\$2,450 + 3,240 + \$2,620 + \$1,450$)		\$9,760
Reduced By The Lesser Of:		
• $[(3\%)(\$126,420)] = \$3,793$		
• 2016 Threshold Amount = \$2,237		(2,237)
19 Year Old's Medical Expenses	\$4,560	
Reduced By The Lesser Of:		
• $[(3\%)(\$7,240)] = \217		
• \$2,237	(217)	4,343
Total Medical Expense Claim		\$11,866

SSS Solution Four - 2**Case 1**

The solution for this Case would be as follows:

Tax On First \$45,282		\$ 6,792
Tax On Next \$29,718 (\$75,000 - \$45,282) At 20.5 Percent		6,092
Federal Tax Before Credits		\$12,884
Basic Personal Amount	(\$11,474)	
EI	(955)	
CPP	(2,544)	
Canada Employment	(1,161)	
Credit Base	(\$16,134)	
Rate	15%	(2,420)
Charitable Donations - Including FDSC (Note)		
[(15%)(200) + (29%)(4,500 - 200) + (25%)(1,000)]		(1,527)
Federal Tax Payable		\$ 8,937

Note As none of his income is taxed at 33 percent, this rate will not be applicable to the calculation of the charitable donations tax credit.

Case 2

The solution for this Case is as follows:

Tax On First \$45,282		\$ 6,792
Tax On Next \$29,718 (\$75,000 - \$45,282) At 20.5 Percent		6,092
Federal Tax Before Credits		\$12,884
Basic Personal Amount	(\$11,474)	
Spousal (\$11,474 - \$6,480)	(4,994)	
EI	(955)	
CPP	(2,544)	
Canada Employment	(1,161)	
Medical Expenses (See Note)	(7,537)	
Credit Base	(\$28,665)	
Rate	15%	(4,300)
Federal Tax Payable		\$ 8,584

Note The base for the medical expense tax credit would be calculated as follows:

Bob And His Partner		\$4,300
Reduced By The Lesser Of:		
• [(3%)(75,000)] = \$2,250		
• 2016 Threshold Amount = \$2,237		(2,237)
Son's Medical Expenses	\$5,600	
Reduced By The Lesser Of:		
• [(3%)(4,200)] = \$126		
• \$2,237	(126)	5,474
Total Credit Base		\$7,537

SSS Solution Four - 2

Case 3

The solution for this Case can be completed as follows:

Tax On First \$90,563		\$16,075
Tax On Next \$4,437 (\$95,000 - \$90,563) At 26 Percent		1,154
Federal Tax Before Credits		\$17,229
Basic Personal Amount	(\$11,474)	
Eligible Dependant (\$11,474 + \$2,121 - \$8,000)	(5,595)	
ITA 118(1)(e) Addition	(1,193)	
Transfer Of Son's Disability	(8,001)	
Credit Base	(\$26,263)	
Rate	15%	(3,939)
Federal Tax Payable		\$13,290

The children's fitness and arts credits are not available since the son is over 18 years of age (the age limit if disabled).

The son qualifies for the eligible dependant credit and, because of ITA 118(4)(c), Bob cannot claim either the infirm dependant over 17 tax credit or the caregiver tax credit. Note that the base for the eligible dependant credit includes the family caregiver amount.

In this situation, ITA 111(1)(e) provides an additional credit based on the amount that the caregiver credit would have exceeded the amount taken for the eligible dependant credit. Given the high income threshold for the caregiver credit, the son would qualify for the maximum amount of \$6,788 (\$4,667 + \$2,121) which includes the FCA.

This results in a further addition to the credit base of \$1,193 (\$6,788 - \$5,595).

Case 4

The solution for this Case is as follows:

Tax On First \$45,282		\$6,792
Tax On Next \$5,568 (\$50,850 - \$45,282) At 20.5 Percent		1,141
Federal Tax Before Credits		\$7,933
Basic Personal Amount	(\$11,474)	
Spousal (\$11,474 + \$2,121 - \$9,200)	(4,395)	
Age [\$7,125 - (15%)(50,850 - 35,927)]	(4,887)	
Pension	(2,000)	
Spouse's Age	(7,125)	
Spouse's Disability	(8,001)	
Spouse's Pension (= RPP Payments)	(1,450)	
Credit Base	(\$39,332)	
Rate	15%	(5,900)
Federal Tax Payable		\$ 2,033

As Gabrielle is infirm, the family caregiver amount is added to the spousal credit.

The Old Age Security and Canada Pension Plan receipts are not eligible for the pension income credit, only the Registered Pension Plan income is eligible. As Gabrielle's income is below the income threshold, there is no reduction in her age credit.

SSS Solution Four - 2

Case 5

The solution for this Case can be completed as follows:

Tax On First \$140,388		\$29,029
Tax On Next \$1,612 (\$142,000 - \$140,388) At 29 Percent		467
Federal Tax Before Credits		\$29,496
Basic Personal Amount	(\$11,474)	
Spousal (\$11,474 - \$8,400)	(3,074)	
Caregiver (\$4,667 + \$2,121)	(6,788)	
EI	(955)	
CPP	(2,544)	
Canada Employment	(1,161)	
Transfer From Son (Note)	(5,000)	
Credit Base	(\$30,996)	
Rate	15%	(4,649)
Federal Tax Payable		\$24,847

Note: The son qualifies for both the caregiver tax credit and the infirm dependant over 17 tax credit. In these circumstances, ITA 118(4)(d) effectively requires the use of the caregiver credit. As the son is infirm, the family caregiver amount is added to this credit. Since the son's \$10,000 income is below the income threshold of the caregiver tax credit, the full credit is available. The transfer from the son is as follows:

Tuition Fees	\$ 7,900
Base For Education Credit [(8 Months)(\$400)]	3,200
Base For Textbook Credit [(8 Months)(\$65)]	520
Total Amount Available	\$11,620
Maximum Transfer	(5,000)
Carry Forward (For Son's Use Only)	\$ 6,620

The son's Tax Payable is completely eliminated by his basic personal credit. He can transfer a maximum of \$5,000 of his education, tuition and textbook amounts to his father. The remaining \$6,620 can be carried forward indefinitely, but must be used by the son.

Case 6

The solution for this Case is as follows:

Tax On First \$90,563		\$16,075
Tax On Next \$4,437 (\$95,000 - \$90,563) At 26 Percent		1,154
Federal Tax Before Credits		\$17,229
Basic Personal Amount	(\$11,474)	
Eligible Dependant - Summer (\$11,474 - \$720)	(10,754)	
Family Caregiver For Martin	(2,121)	
Credit Base	(\$24,349)	
Rate	15%	(3,652)
Federal Tax Payable		\$13,577

Note Bob has claimed Summer as his eligible dependant because her income is less than Martin's. This means that there is less erosion of the base for the eligible dependant credit.

SSS Solution Four - 2

Case 7

The solution for this Case can be completed as follows:

Tax On First \$45,282		\$ 6,792
Tax On Next \$29,718 (\$75,000 - \$45,282) At 20.5 Percent		6,092
<hr/>		
Federal Tax Before Credits		\$12,884
Basic Personal Amount	(\$11,474)	
Spousal (\$11,474 - \$4,600)	(6,874)	
Caregiver - Gabrielle's Father (\$4,667 + \$2,121)	(6,788)	
Caregiver - Bob's Father		
[\$4,667 - (\$18,300 - \$15,940)]	(2,307)	
EI	(955)	
CPP	(2,544)	
Canada Employment	(1,161)	
<hr/>		
Credit Base	(\$32,103)	
Rate	15%	(4,815)
<hr/>		
Federal Tax Payable		\$ 8,069
<hr/>		

Both fathers qualify for the caregiver credit. In the case of Gabrielle's father, because he is infirm, the family caregiver amount is added to the credit. In the case of Bob's father, the family caregiver amount is not added and the basic credit is eroded by the parent's income in excess of the income threshold.

Note that Gabrielle's father is eligible for the caregiver credit because he is infirm. Since he is under 65, if he was not infirm, he would not be eligible for the caregiver credit.

SSS Solution Four - 3**Part A**

Ms. Bradmore's minimum Net Income For Tax Purposes would be calculated as follows:

Salary	\$250,000
Additions:	
Commissions	12,000
Bonus (Note 1)	16,000
Life Insurance Premiums (Employer's Contribution)	460
Automobile Benefit (Note 2)	2,847
Gift (Cash Gifts Create A Taxable Benefit)	200
Stock Option Benefit (Note 3)	55,000
Deductions:	
RPP Contributions	(7,500)
Employment Expenses (Note 4)	(18,450)
Net Income For Tax Purposes	\$310,557

Note 1 Only the \$16,000 $[(1/2)(\$32,000)]$ of the bonus that was received during the year is included in her income for the current year.

Note 2 The standby charge would be calculated as follows:

$$[(2\%)(\$47,460)(12)(5,000 \div 20,004)] = \$2,847$$

There would be no operating cost benefit as Ms. Bradmore paid for all of the operating costs.

Note 3 The total employment income inclusion would be \$55,000 $[(2,500)(\$72 - \$50)]$. As the option price was equal to the market price at the time the options were issued, one-half of this amount can be deducted in the determination of Taxable Income (Part B).

Note 4 Potentially deductible expenses are as follows:

Car Operating Costs $[(48,000 \div 53,000)(\$7,950)]$	\$ 7,200
Meals $[(50\%)(\$4,500)]$	2,250
Hotels	9,000
Subtotal for ITA 8(1)(h) and (h.1)	\$18,450
Advertising	11,000
Entertainment $[(50\%)(\$5,000)]$	2,500
Total for ITA 8(1)(f) - Limited To Commissions	\$31,950

All of these costs can be deducted under ITA 8(1)(f). However, the total deduction is limited to her commission income which is only \$12,000. Alternatively, the car operating costs, meals, and hotels, can be deducted under ITA 8(1)(h) and (h.1). As shown above, this total would be \$18,450. As Angelina cannot simultaneously use ITA 8(1)(f) and the combination of ITA 8(1)(h) and (h.1), she will minimize her Net Income For Tax Purposes by deducting \$18,450 under the latter provisions.

SSS Solution Four - 3

Part B

Ms. Bradmore's minimum Taxable Income would be calculated as follows:

Net Income For Tax Purposes	\$310,557
Stock Option Deduction [(1/2)(\$55,000)]	(27,500)
Taxable Income	\$283,057

Part C

Based on the Taxable Income calculated in Part B, Ms. Bradmore's federal Tax Payable would be calculated as follows:

Tax On First \$200,000		\$46,317
Tax On Next \$83,057 (\$283,057 - \$200,000) At 33 Percent		27,409
Tax Before Credits		\$73,726
Credits:		
Basic Personal Amount	(\$11,474)	
Eligible Dependant Including FCA		
- Daughter (Note 5)	(12,875)	
Transfer Of Daughter's Disability	(8,001)	
Disability Supplement (Note 6)	(4,667)	
EI Premiums	(955)	
CPP Contributions	(2,544)	
Canada Employment	(1,161)	
Public Transit Passes	(985)	
Tuition	(1,890)	
Education [(4)(\$120)]	(480)	
Textbook [(4)(\$20)]	(80)	
Medical Expenses (Note 7)	(8,163)	
Credit Base	(\$53,275)	
Rate	15%	(7,991)
Charitable Donations (Note 8)		(2,010)
Federal Tax Payable Before Refundable Credits		\$63,725
Refundable Children's Fitness (Note 9)		(75)
Federal Tax Payable		\$63,650

Note 5 As Ms. Bradmore has decided to include the Universal Child Care Benefits in her daughter's income, the base for the eligible dependant credit is increased by the FCA and reduced by the UCCB (\$11,474 + \$2,121 - \$720).

Note 6 Since the attendant care costs claimed as medical expenses are less than the threshold, there is no reduction in the disability supplement.

Note 7 The base for Ms. Bradmore's medical expense credit can be calculated as follows:

SSS Solution Four - 3

Eligible Medical Expenses	\$10,400
Lesser Of:	
• $[(3\%)(\$310,557)] = \$9,317$	
• 2016 Threshold Amount = \$2,237	(2,237)
Allowable Medical Costs	\$ 8,163

Note 8 The charitable donations credit for the total donations of \$6,200 (\$5,000 + \$1,200) would be calculated as follows:

15 Percent Of \$200	\$ 30
33 Percent Of The Lesser Of:	
• $\$6,200 - \$200 = \$6,000$	
• $\$283,057 - \$200,000 = \$83,057$	
• $= [(33\%)(\$6,000)]$	1,980
29 Percent Of Nil $[\$6,200 - (\$200 + \$6,000)]$	Nil
Total Credit	\$2,010

Note 9 For 2016, the based for this credit is the lesser of \$500 and the actual costs of \$725. The \$500 limit is the lesser figure.

Chapter 5 Self Study Problems

Self Study Problem Five - 1

(CCA And Tax Planning)

For its taxation year ending December 31, 2016, Northcote Inc. has determined that its Net Income For Tax Purposes, before any deduction for CCA amounts, is equal to \$328,000. The Company does not have any Division C deductions, so whatever amount is determined as Net Income For Tax Purposes will also be the amount of Taxable Income for the taxation year.

On January 1, 2016, the Company has the following UCC balances:

Class 1 (Building Acquired In 2005)	\$2,597,000
Class 8	718,000
Class 10	524,000

During 2016, the cost of additions to Class 10 amounted to \$374,000, while the proceeds from dispositions in this class totalled \$234,000. In no case did the proceeds of disposition exceed the capital cost of the assets retired and there were still assets in Class 10 on December 31, 2016.

There were no acquisitions or dispositions in either Class 1 or Class 8 during 2016.

Required:

- A. Calculate the maximum CCA that could be taken by Northcote Ltd. for the taxation year ending December 31, 2016. Your answer should include the maximum that can be deducted for each CCA class.
- B. As Northcote's tax advisor, indicate how much CCA you would advise the Company to take for the 2016 taxation year, and the specific classes from which it should be deducted. Provide a brief explanation of the reasons for your recommendation. In providing this advice, do not take into consideration the possibility that losses can be carried either forward or back.

SOLUTION available in printed and online Study Guide.

Self Study Problem Five - 2**(CCA Calculations)**

Mr. Marker has been the sole proprietor of Marker Enterprises since its establishment 10 years ago. This business closes its books on December 31 and, on January 1, 2016, the following information on its assets was contained in the records of the business:

Type Of Asset	Undepreciated Capital Cost	Original Capital Cost	CCA Rate
Building (Class 1)	115,000	190,000	4 Percent
Equipment (Class 8)	96,000	130,000	20 Percent
Vehicles (Class 10)	6,700	30,000	30 Percent
Equipment (Class 29)*	\$ 75,000	\$100,000	50 Percent

*The manufacturing and processing equipment was acquired in 2015.

Other Information:

1. During the year ending December 31, 2016, Mr. Marker's business acquired additional Class 8 equipment at a total cost of \$52,000. This new equipment replaced equipment that had an original cost of \$75,000, which was sold during the year for total proceeds of \$35,000.
2. During the year ending December 31, 2016, Mr. Marker acquired a used automobile to be used in his business for a total cost of \$8,000. Also during this year, Mr. Marker sold one of the trucks that was used in his business for proceeds of \$25,000. This truck, which had an original capital cost of \$20,000, had achieved a high value as the result of its extra features, which were no longer available on later models.
3. As the result of a decision to lease its premises in future years, Mr. Marker sold his building for total proceeds of \$260,000. Of the \$260,000 received, \$150,000 is for the land on which the building is situated. The adjusted cost base of the land was equal to the \$150,000 proceeds of disposition.

Required: Calculate the total effect of all of the preceding information on Mr. Marker's Net Income For Tax Purposes for the year ending December 31, 2016. Your answer should include the maximum CCA that can be deducted by Mr. Marker for each class. In addition, calculate the January 1, 2017 UCC balance for each Class.

SOLUTION available in printed and online Study Guide.

Self Study Problem Five - 3

(CCA Calculations Over 5 Years)

Golden Dragon Ltd. begins operations in Vancouver on September 1, 2011. These operations include an elegant sit down restaurant specializing in northern Chinese cuisine, as well as a take out operation that provides home delivery throughout the city. To facilitate this latter operation, on October 12, 2011, the Company acquires 20 small cars to be used as delivery vehicles. The cost of these cars is \$12,000 each and, for purposes of calculating CCA, they are classified as Class 10 assets.

During the first year of operations, the Company establishes a fiscal year ending on December 31. In the fiscal periods 2012 through 2016, the following transactions take place with respect to the Company's fleet of delivery cars:

2012 The Company acquires five more cars at a cost of \$12,500 each. In addition, three of the older cars are sold for total proceeds of \$27,500.

2013 There are no new acquisitions of cars during this year. However, four of the older cars are sold for total proceeds of \$38,000.

2014 In December, 2014, 13 of the original cars and 3 of the newer cars are sold for \$128,000. It was the intent of the Company to replace these cars. However, because of a delay in delivery by the car dealer, the replacement did not occur until January, 2015.

2015 In January of 2015, the Company takes delivery of 25 new delivery cars at a cost of \$16,000 each. No cars are disposed of during 2015.

2016 In March, 2016, there is a change in management at Golden Dragon Ltd. They conclude that the Company's take out operation is not in keeping with the more elegant image that the sit down restaurant is trying to maintain. As a consequence, the take out operation is closed, and the 27 remaining delivery cars are sold. Because of the large number of cars being sold, the total proceeds are only \$268,000.

Golden Dragon Ltd. takes maximum CCA in each of the years under consideration.

Required: For each of the fiscal years 2011 through 2016, calculate CCA, recapture, or terminal loss for Golden Dragon's fleet of cars. In addition, indicate the January 1 UCC for each of the years 2012 through 2017.

SOLUTION available in printed and online Study Guide.

Self Study Problem Five - 4**(CCA Calculations)**

Opening Balances The taxation year of Burton Steel Ltd. ends on December 31. On January 1, 2016, the UCC balances for the various classes of assets owned by the Company are as follows:

Class 3 - Building	\$1,562,000
Class 8 - Office Furniture And Equipment	278,000
Class 10 - Vehicles	204,000
Class 13 - Leasehold Improvements	106,250
Class 29 - Manufacturing Equipment	126,000
Class 50 - Computer Hardware	11,000

Acquisitions During the year ending December 31, 2016, the following acquisitions of assets were made.

Class 1 - Building (Note 1)	\$258,000
Class 8 - Office Furniture And Equipment	72,000
Class 10 - Vehicles (Note 2)	63,000
Class 13 - Leasehold Improvements	58,000
Class 50 - Computer Hardware	17,000

Note 1 The \$423,000 total cost of the Building was allocated \$258,000 to the building itself, and \$165,000 to the land. The Building is new and will be used 100 percent for non-residential activity, none of which involves manufacturing and processing activity. It will be allocated to a separate Class 1.

Note 2 The addition to Class 10 was made up of three passenger vehicles, with a cost of \$21,000 each.

Dispositions During this same period, the following dispositions occurred:

Class 8 - Office furniture and equipment were sold for cash proceeds of \$42,000. The original cost of these assets totalled \$38,000.

Class 10 - A delivery truck with an original cost of \$37,000 was sold for \$12,000.

Class 29 - Since Burton Steel Ltd. will only be involved in retail operations in the future, all of the manufacturing equipment was sold for total proceeds of \$89,000. The original cost of the equipment was \$504,000.

Other Information:

1. The Company leases its main office building for \$47,000 per year. The lease was negotiated on January 1, 2014 and had an original term of eight years. There are two renewal options on the lease, each for a period of two years. The Company made \$125,000 of leasehold improvements immediately after signing the lease. No further improvements were made until the current year.
2. During the year ending December 31, 2016, some of the Company's office furniture and equipment was destroyed in a small fire. At the time of the accident, the fair market value of the destroyed property was \$19,000. However, proceeds from the Company's insurance policy amounted to only \$11,000. The original cost of the destroyed property was \$18,000.

Self Study Problem Five - 4

3. Maximum CCA has always been taken by Burton Steel.

Required: Calculate the maximum CCA that can be taken by Burton Steel Ltd. on each class of assets for the year ending December 31, 2016, and calculate the UCC for each class of assets on January 1, 2017. In addition, determine the amount of any capital gain, recapture, or terminal loss that arises. Ignore GST/HST/PST considerations.

SOLUTION available in printed and online Study Guide.

Self Study Problem Five - 5

(CCA, CEC And Tax Planning)

On January 1, 2016, Kars Ltd. has the following UCC and CEC balances:

Class 8	\$163,000
Class 10	112,000
Class 12	42,000
Class 13	204,000
CEC	153,000

For the taxation year ending December 31, 2016, Kars Ltd. has determined that its Net Income For Tax Purposes, before any deductions for CCA or CEC, amounts to \$43,000. As the Company does not have any Division C deductions, Taxable Income, before any deductions for CCA or CEC, would also amount to \$43,000. In previous years, the Company has always deducted the maximum amount of CCA and CEC.

Other information related to the Company's depreciable assets is as follows:

1. All of the Class 12 assets were acquired in 2015.
2. The leasehold improvements were made in 2014 at a cost of \$240,000.
3. During 2016, the cost of additions to Class 10 amount to \$52,000, while the proceeds from dispositions in this class totaled \$29,000. In no case did the proceeds of disposition exceed the capital cost of the assets retired, and there were still assets in the class as of December 31, 2016.
4. There were no 2016 acquisitions or dispositions in Classes 8, 12, or 13. There were no eligible capital expenditures made or incurred during 2016 and no dispositions of eligible capital property.

Required:

- A. Calculate the maximum CCA and CEC write-off that could be taken by Kars Ltd. for the taxation year ending December 31, 2016.
- B. As Kars' tax advisor, indicate how much CCA and CEC you would advise them to take for the 2016 taxation year and the specific classes from which it should be deducted. Provide a brief explanation of the reason for your recommendation. In providing this advice, do not take into consideration the possibility that losses can be carried either back or forward.

SOLUTION available in printed and online Study Guide.

Self Study Problem Five - 6

(CCA And CEC Calculations)

The following information relates to Bartel Ltd. for its fiscal year that ends on December 31, 2016:

1. The Company has UCC balances on January 1, 2016 for its tangible assets as follows:

Class 1 (All Buildings Acquired In 2005)	\$590,000
Class 8	570,000
Class 10	61,000
2. During 2016, the Company purchased office furniture for \$14,000.
3. During 2016, the Company purchased a truck from its majority shareholder for \$22,000. The truck was four years old, had a fair market value of \$22,000, and the shareholder's UCC for the truck was \$26,000.
4. On January 1, 2014, the Company expanded its operations by purchasing another business. The purchase price for this business included a payment of \$92,000 for goodwill, \$120,000 for a franchise with a six year life, and \$28,000 for a franchise with an unlimited life.
5. During 2016, one of the Company's buildings was sold for proceeds of \$440,000, of which \$150,000 represented the value of the land on which the building was situated. The Building had a capital cost of \$475,000, of which \$175,000 represented the value of the land at the time of the acquisition.

The building was replaced during 2016 with a new building that cost \$500,000, of which \$125,000 represented the value of the land. The use of this building is 100 percent office space and it is allocated to a separate Class 1.
6. During 2015, the Company sold part of its original operations. The proceeds of disposition included a payment for goodwill of \$59,000.
7. Bartel Ltd. has always deducted the maximum CCA and the maximum write-off of cumulative eligible capital allowable in each year of operation.

Required: Calculate the maximum total CCA and the maximum write-off of cumulative eligible capital that can be deducted for 2016. Your answer should include the maximum that can be deducted for each CCA class.

SOLUTION available in printed and online Study Guide.

Self Study Problem Five - 7**(CCA And CEC Calculations)**

The fiscal year of the Atlantic Manufacturing Company, a Canadian public company, ends on December 31. On January 1, 2016, the UCC balances for the various classes of assets owned by the Company are as follows:

Class 1 - Building (Note 1)	\$625,000
Class 8 - Office Furniture And Equipment	155,000
Class 10 - Vehicles	118,000
Class 13 - Leasehold Improvements	61,750
Class 29 - Manufacturing Equipment	217,000

Note 1 The Class 1 building was acquired in 2005.

During the year ending December 31, 2016, the following acquisitions of assets were made:

Class 8 - Office Furniture And Equipment	\$ 27,000
Class 10 - Vehicles (Note 2)	33,000
Class 12 - Tools (Note 3)	34,000
Class 13 - Leasehold Improvements	45,000
Class 50 - Computer Hardware	28,000

Note 2 The acquired vehicle was a delivery truck.

Note 3 None of the tools that were acquired during the year cost more than \$500.

During this same period, the following dispositions occurred:

Class 8 - Used office furniture and equipment was sold for cash proceeds in the amount of \$35,000. The original cost of these assets was \$22,000.

Class 10 - A delivery truck with an original cost of \$23,000 was sold for \$8,500.

Class 29 - Since the manufacturing operations will be done by subcontractors in the future, all of the manufacturing equipment was sold for total proceeds of \$188,000. Its original cost was \$752,000.

Other Information:

1. The Company leases a building for \$27,000 per year that houses a portion of its manufacturing operations. The lease was negotiated on January 1, 2013 and has an original term of eight years. There are two renewal options on the lease. The term for each of these options is four years. The Company made \$78,000 of leasehold improvements immediately after signing the lease. No further improvements were made until the current year.
2. On February 24, 2016, one of the Company's cars was totally destroyed in an accident. At the time of the accident, the fair market value of the car was \$12,300. The proceeds from the Company's insurance policy amounted to only \$8,000. The original cost of the car was \$17,000.
3. The Atlantic Manufacturing Company was organized in 2011 and has no balance in its cumulative eligible capital account on January 1, 2016. During March, 2016, the Company granted a manufacturing licence for one of its products to a company in southern Ontario. This licensee paid \$87,000 for the right to manufacture this product for an unlimited period of time.

Self Study Problem Five - 7

4. It is the policy of the Company to deduct maximum CCA in all years.

Required: Calculate the maximum 2016 CCA that can be taken on each class of assets, the January 1, 2017 UCC balance for each class, and any other 2016 income inclusions or deductions resulting from the information provided in the problem.

SOLUTION available in printed and online Study Guide.

Self Study Problem Five - 8

(CEC With Disposal Election)

Andiron Inc. begins operations on January 1, 2014. The Company has a taxation year that ends on December 31. There are no intangible assets in its initial Balance Sheet.

During the first three years of its operations, it has the following transactions involving its CEC account:

- On July 1, 2014, Andiron acquires all of the assets of another business at a total cost of \$5,550,000. All of the assets are recorded at their fair market value as of the acquisition date. Of the total assets recorded, \$5,000,000 were classified as identifiable assets. Of the balance, \$150,000 was for an unlimited life franchise and the remaining \$400,000 was for goodwill.
- While Andiron had expected the unlimited life franchise to generate significant profits, this turned out not to be the case. Given this, the Company decides to sell the franchise. A buyer is found and the franchise is transferred on November 1, 2015 for cash consideration of \$175,000.
- During 2016, Andiron sells one of its more successful business divisions for \$2,600,000. This amount includes a \$475,000 payment for goodwill.

It is the policy of Andiron Inc. to deduct maximum amounts of CCA and CEC each year.

Required:

- A. Calculate the maximum amount that Andiron can deduct as a write-off of cumulative eligible capital for each of the years 2014 through 2016. Assume that no elections are made with respect to the CEC dispositions in any of these years.
- B. Calculate the amounts that will be included in Andiron's 2015 and 2016 Net Income For Tax Purposes as a result of the CEC dispositions. Assume that no elections are made with respect to the CEC dispositions in either of these years.
- C. How would the results in Parts A and B differ if Andiron makes all possible CEC disposal elections under ITA 14(1.01)?
- D. Compare the inclusions in Net Income For Tax Purposes that occur without the ITA 14(1.01) election with the inclusions that occur with the ITA 14(1.01) election. Explain why a taxpayer might want to make such elections.

SOLUTION available in printed and online Study Guide.

Chapter 5 Supplementary Self Study (SSS) Problems

The solutions to these Chapter 5 SSS Problems can be found following the SSS Problems for this Chapter.

SSS Problem Five - 1

(CCA Calculations Over 4 Years)

Barbara's Messenger Service begins operations on November 1, 2013. It operates an intra-city service which guarantees delivery of important documents within 3 hours. Barbara Good is the sole owner of this unincorporated business. The business will have a taxation year that ends on December 31. Barbara indicates that she plans to take maximum CCA every year.

On November 15, 2013, the business acquires 10 small cars to be used for deliveries. These vehicles have a cost of \$18,000 each.

During the year ending December 31, 2014, the business acquires 5 additional cars at a cost of \$22,000 each. In addition, 4 of the original cars are sold for proceeds of \$5,000 each.

During the year ending December 31, 2015, 8 additional cars are acquired at a cost of \$25,000 each. The remaining 6 cars that were purchased in 2013 are sold for \$2,000 each.

Barbara has found that when particularly important, high value packages are involved, some of her clients require the package to be hand delivered in an awe-inspiring style. These clients are willing to pay a very hefty surcharge for this service. In order to accommodate this, the business acquires two S Class Mercedes at a cost of \$160,000 each.

Early in 2016, Barbara receives a proposal of marriage from her wealthiest client. Barbara accepts this proposal and, because she will be moving to a different city, she decides to terminate her business on March 31, 2016. The 13 remaining small cars are sold for \$6,000 each. The S Class Mercedes are sold for \$95,000 each.

Required: For each of the taxation years 2013 through 2016, calculate the maximum available CCA deduction. In addition, determine the amount of any capital gain, recapture, or terminal loss that arises on any of the transactions that occurred during these years. Ignore GST/HST/PST considerations.

SSS Problem Five - 2

(CCA And Tax Planning)

For its taxation year ending December 31, 2016, Brownlee Inc. has determined that its Net Income For Tax Purposes, before any deductions for CCA, amounts to \$23,500. The Company does not have any Division C deductions, so whatever amount is determined as Net Income For Tax Purposes will also be the amount of Taxable Income for the 2016 taxation year.

On January 1, 2016 the Company has the following UCC balances:

Class 3	\$263,000
Class 8	72,000
Class 10	52,000

During 2016, the cost of additions to Class 10 amounted to \$38,000, while the proceeds from dispositions in this class totalled \$23,000. In no case did the proceeds of disposition exceed the capital cost of the assets retired, and there were still assets in the class as of December 31, 2016. There were no acquisitions or dispositions in either Class 3 or Class 8 during 2016.

Required:

- A. Calculate the maximum CCA that could be taken by Brownlee Company for the taxation year ending December 31, 2016. Your answer should include the maximum that can be deducted for each CCA class.
- B. As Brownlee's tax advisor, indicate how much CCA you would advise them to take for the 2016 taxation year and the specific classes from which it should be deducted. Provide a brief explanation of the reason for your recommendation. In providing this advice, do not take into consideration the possibility that losses can be carried either back or forward.

SSS Problem Five - 3

(CEC With Disposal Election)

In July, 2014, Marion Landau acquires an unincorporated business at a total cost of \$2,100,000. The identifiable assets of this business had a current fair market value of \$1,900,000, indicating that she had paid \$200,000 for the goodwill that the business had accumulated during earlier operations. Included among the identifiable assets was an unlimited life franchise with a fair market value of \$125,000. There are no other eligible capital expenditures included in this acquisition.

The basic operations of the business proved to be very profitable and, given that it is peripheral to her basic operations, Ms. Landau decides to sell the unlimited life franchise. After some fairly lengthy negotiations with the buyer, the franchise is sold on January 12, 2016 for \$175,000. All of the proceeds are received in cash on that date.

The year end of the business is December 31. It is the policy of Ms. Landau to deduct maximum amounts of CCA and CEC.

Required:

- A. What is the maximum deduction that Ms. Landau can claim for amortization of cumulative eligible capital in 2014 and 2015?
- B. Assuming Ms. Landau does not make any election with respect to the sale of the franchise, what amounts will be included in her 2016 Net Income For Tax Purposes as a result of the sale?
- C. How would the results in Part B differ if Ms. Landau makes the CEC disposal election under ITA 14(1.01)? Explain why she might wish to make this election.

Chapter 5 Supplementary Self Study (SSS) Solutions

SSS Solution Five - 1

2013 Solution

The required calculations are as follows:

Additions To Class 10 [(10 Cars)(\$18,000)]	\$180,000
One-Half Net Additions [(1/2)(\$180,000)]	(90,000)
CCA Base	\$ 90,000
CCA [(30%)(90,000)(61/365)]	(4,512)
One-Half Net Additions	90,000
Class 10 UCC For January 1, 2014	\$175,488

As the business was established on November 1, 2013, its operations were carried out for 61 days in 2013, and only a proportionate share of the annual CCA charge may be taken. We would call your attention to the fact that it is the length of the taxation year, not the period of ownership of the assets, that establishes the fraction of the year for which CCA is to be recorded.

2014 Solution

The required calculations are as follows:

Opening Balance For Class 10	\$175,488
Additions [(5 Cars)(\$22,000)]	110,000
Dispositions - Lesser Of:	
• Capital Cost = 4 @ \$18,000 = \$72,000	
• Proceeds Of Disposition = 4 @ \$5,000 = \$20,000	(20,000)
One-Half Net Additions [(1/2)(\$110,000 - \$20,000)]	(45,000)
CCA Base	\$220,488
CCA [(30%)(220,488)]	(66,146)
One-Half Net Additions	45,000
Class 10 UCC For January 1, 2015	\$199,342

2015 Solution

With respect to Class 10 cars, the required calculations are as follows:

Opening Balance For Class 10	\$199,342
Additions [(8 Cars)(\$25,000)]	200,000
Dispositions - Lesser Of:	
• Capital Cost = 6 @ \$18,000 = \$108,000	
• Proceeds Of Disposition = 6 @ \$2,000 = \$12,000	(12,000)
One-Half Net Additions [(1/2)(\$200,000 - \$12,000)]	(94,000)
CCA Base	\$293,342
CCA [(30%)(293,342)]	(88,003)
One-Half Net Additions	94,000
Class 10 UCC For January 1, 2016	\$299,339

SSS Solution Five - 1

With respect to the two S Class Mercedes, each would have to be allocated to a separate Class 10.1. Further, the addition to each Class 10.1 would be limited to \$30,000. The required calculations would be as follows:

	Mercedes 1 Class 10.1	Mercedes 2 Class 10.1
Acquisitions	\$30,000	\$30,000
One-Half Net Additions	(15,000)	(15,000)
CCA Base	\$15,000	\$15,000
CCA [(30%)(15,000)]	(4,500)	(4,500)
One-Half Net Additions	15,000	15,000
UCC For January 1, 2016	\$25,500	\$25,500

2016 Solution

The required calculations for the Class 10 vehicles are as follows:

Opening Balance For Class 10	\$299,339
Dispositions - Lesser Of:	
• Capital Cost [(5)(\$22,000) + [(8)(\$25,000)] = \$310,000	
• Proceeds Of Disposition [(13)(\$6,000)] = \$78,000	(78,000)
Ending Balance With No Remaining Assets In Class	\$221,339
Terminal Loss	(221,339)
UCC For January 1, 2017	Nil

After all of the assets in Class 10 have been retired there is still a \$221,339 balance in the UCC. This results in a terminal loss that will be deducted in full from the other income of Barbara's Messenger Service. The terminal loss will also be deducted from the UCC balance.

With respect to the two Class 10.1 assets, no recapture or terminal losses can be recorded on these assets. However, in the year of disposal, taxpayers are allowed to deduct one-half year of CCA. Given the short fiscal final year, this means that on each of the Class 10.1 vehicles there would be a CCA deduction of \$956 $[(1/2)(30\%)(\$25,500)(3/12)]$ for a total of \$1,912.

SSS Solution Five - 2**Part A**

The required calculation of the maximum CCA is as follows:

	Class 3	Class 8	Class 10
Opening Balance	\$263,000	\$72,000	\$52,000
Additions	Nil	Nil	38,000
Proceeds Of Disposition	Nil	Nil	(23,000)
One-Half Net Additions	Nil	Nil	(7,500)
CCA Base	\$263,000	\$72,000	\$59,500
CCA Rate	5%	20%	30%
Maximum CCA	\$ 13,150	\$14,400	\$17,850

This gives a maximum amount for CCA of \$45,400 for the taxation year (\$13,150 + \$14,400 + \$17,850).

Part B

Since the Company only has Net and Taxable Income before CCA of \$23,500 and the problem states that loss carry overs should not be considered, maximum CCA would not be deducted as this would produce a loss. Only \$23,500 in CCA should be taken in order to reduce the Taxable Income to nil.

With respect to the classes from which it should be taken, the usual procedure is to deduct the required amount from the classes with the lowest rates. By leaving the classes with higher rates untouched, larger amounts of CCA can be deducted in later periods as required.

Taking this approach, the recommended CCA deductions would be as follows:

Class 3 (Maximum Available)	\$13,150
Class 8 (Required Balance)	10,350
Total CCA	\$23,500

The deduction of this amount of CCA would serve to reduce Taxable Income to nil.

Note that if there were immediate plans to sell the building for more than its opening UCC, this could affect the choice of Classes to deduct CCA from as any additional CCA taken on Class 1 would have to be added to income as recaptured CCA when the building is sold.

SSS Solution Five - 3**Part A**

With respect to the eligible capital expenditures included in the 2014 acquisition, the deductions for cumulative eligible capital for 2014 and 2015 can be calculated as follows:

	CEC Balance	CEC Deductions
Acquisition [(3/4)(\$200,000 + \$125,000)]	\$243,750	
2014 CEC Amount (7 Percent)	(17,063)	\$17,063
Balance January 1, 2015	\$226,687	
2015 CEC Amount (7 Percent)	(15,868)	15,868
Balance January 1, 2016	\$210,819	\$32,931

Part B

If no election is made, three-quarters of the proceeds received for the franchise will be deducted from the CEC balance as follows:

CEC Balance Before Disposition	\$210,819
Three-Quarters Of POD [(3/4)(\$175,000)]	(131,250)
CEC Balance After Disposition	\$ 79,569

As a positive CEC balance remains, no amount will have to be included in Ms. Landau's income as a result of this disposition.

Part C

If the election is used, the CEC deduction will be based on the cost of the franchise. The calculation is as follows:

CEC Balance Before Disposition	\$210,819
Three-Quarters Of Cost [(3/4)(\$125,000)]	(93,750)
CEC Balance After Disposition	\$117,069

In addition to this different CEC balance, Ms. Landau will recognize a taxable capital gain as follows:

Proceeds Of Disposition	\$175,000
Cost Of Franchise	(125,000)
Capital Gain	\$ 50,000
Inclusion Rate	1/2
Taxable Capital Gain	\$ 25,000

The probable reason for making this election would be that Ms. Landau has unused allowable capital losses from the current or previous years. By making this election she has created a taxable capital gain which will allow for the use of up to \$25,000 in allowable capital losses.