

EXAM 6 – UNITED STATES, FALL 2017

21. (2.5 points)

The following information is available for an insurance company that was formed on January 1, 2015 (in thousands of dollars):

	<b>2016</b>	<b>2015</b>
Written Premium	399	374
Unearned Premium Reserve	72	57
Paid Losses	223	221
Undiscounted Loss Reserves	108	86
Discounted Loss Reserves	99	79
Interest on Tax-Exempt Municipal Bonds	20	26
Dividend Income	440	372

The corporate tax rate is 35%.

Calculate the company's 2016 income tax assuming that dividend income is generated exclusively from a company that is 50% owned.

- SAP Treatment: excluded from assets and therefore PHS (surplus). Purpose: assets that are considered not liquid or uncollectible, and would likely not be available in case of insolvency. GAAP Treatment: no distinction of “non-admitted”. Purpose: all assets are “available” over lifetime of company.

**EXAMINER’S REPORT**

Candidates were expected to compare the purpose of different accounting standards (SAP and GAAP) and to describe the accounting treatment for acquisition costs and non-admitted assets

**Part a**

Candidates were expected to contrast the purpose of U.S. GAAP and SAP accounting.

Common errors include:

- Simply stating who used each type of accounting (e.g., investors vs. regulators).
- For GAAP, simply stating that this is for “measuring financial performance” (SAP also measures financial performance).
- For GAAP, stating that this is used for tax purposes without provide further rationale.
- For GAAP, stating that this is used for comparability to other industries without providing further rationale.

**Part b**

Candidates were expected to describe the treatment and the purpose for the treatment under GAAP and SAP of acquisition costs and non-admitted assets.

Common errors include:

- Providing the treatment but not explaining the purpose for the treatment.
- Stating that GAAP used DAC but not stating how costs were deferred or simply stating that costs were deferred “over time” without being more specific.
- Simply stating that the SAP treatment was “conservative” or “supported solvency” without providing a rationale as to why the conservative treatment was appropriate.

**QUESTION 21**

**TOTAL POINT VALUE: 2.5**

**LEARNING OBJECTIVE: C4**

**SAMPLE ANSWERS**

Sample 1

RTI: EP: 399 - (72-57)	=	384
20% Δ UEPR: .2 (72-57)	=	3
Paid Loss: -223	=	-223
Δ Discounted Rsvs: (79-99)	=	-20
Muni Interest: 20*.15	=	3
Dividends: 440*.2 + 440*.8*.15	=	<u>140.8</u>

287.8

Regular tax =  $.35 \times 287.8 = 100.73$

AMTI =  $287.8 + .75 \times [20 \times .85 + 440 \times (1 - .2 - .8 \times 15)] = 524.95$

AMT =  $.2 \times 524.95 = 104.99$

Final Tax = 104.99

Sample 2

EP(tax-basis) =  $399 - (72 - 57) \times .8 = 387$

Tax IL =  $223 + (99 - 79) = 243$

RTI =  $387 - 243 + 20 \times .15 + 440 \times (.2 + .8 \times .15) = 287.8$ , RIT =  $.35 \times RTI = 100.73$

AMTI =  $287.8 + .75 \times (.85 \times 20 + .68 \times 440) = 524.95$ , AMIT =  $.2 \times AMTI = 104.99$

Income Tax = Max (RIT, AMIT) = \$104.99

Sample 3

Tax basis EP =  $WP - 80\% \times \Delta UEPR$

=  $399 - 80\% (72 - 47) = 387$

Tax basis IL: = paid +  $\Delta$  discounted loss reserves

=  $233 + (99 - 79) = 253$

Taxable Investment income =  $15\% (20) + 440 \times (20\% + 15\% \times 80\%) = 143.8$

RTI =  $387 - 253 + 143.8 = 277.8$

RIT =  $277.8 \times 35\% = 97.23$

AMTI =  $RTI + 75\% \text{ income escaping taxation} = 75\% (20 \times (85\%) + 440(80\% \times 85\%)) = 514.95$

AMIT =  $20\% \times 514.95 = 102.99$

Since AMIT is higher, the 2016 income tax will equal 102.99

**EXAMINER'S REPORT**

The candidates were expected to know the basic elements of income tax calculation including statutory income versus taxable income and regular and alternative minimum tax. The formulas used in the calculation are found in the syllabus text.

Common errors included

- Not calculating tax-basis earned premium correctly
- Not calculating tax-basis earned losses correctly
- Adding rather than subtracting losses in the Regular Taxable Income formula

- Using 30% rather than 20% in the formula for the amount of dividends taxed for affiliated companies
- Not including the proration adjustment for 15% remaining 80% in the formula for the amount of dividends taxed
- Not performing the Alternative Minimum Tax calculation

## QUESTION 22

**TOTAL POINT VALUE: 4.75**

**LEARNING OBJECTIVE: D**

### SAMPLE ANSWERS

**Part a: 2.25 points**

#### Sample 1

In my opinion, the amounts carried on Exhibit A on account of the items listed.

- Meet the insurance law requirements of state X.
- Are computed in accordance w/ accepted actuarial standards and principles
- Make a reasonable provision of the net unpaid loss and loss adjustment expense obligations of the company under the terms of its current contracts. The Gross loss and loss adjustment expense reserves are deficient. The carried reserves on a gross basis are 600 million, which is 20 million below the low end of my reasonable estimate.

#### Sample 2

In my opinion, the items listed in Exhibit A:

- Meet the requirements and laws of state X.
- Are computed in accordance with accepted actuarial standards and methods
- Make a reasonable provision for all net unpaid loss and LAE reserves and a deficient provision for all gross unpaid loss and LAE reserves under the terms of its contracts and obligations. The minimum gross reserves I believe to be reasonable is 620.

#### Sample 3

*[The following includes examples of the items that were considered when evaluating candidate responses]*

- Reference to Exhibit A when identifying what items are opined upon
- Mentioning the reserves meet the [insurance] laws or regulations of State X.
- Mentioning the reserves are computed in accordance with [accepted] actuarial standards and principles