## EXAM 6 – UNITED STATES, SPRING 2018

# 22. (1.75 points)

# a. (0.75 point)

In preparing the Statement of Actuarial Opinion (SAO), briefly describe three items the Appointed Actuary should consider when determining if it is reasonable to make use of another's analysis.

## b. (0.5 point)

Describe a scenario in which there is a change in assumptions, procedures, or methods for the unpaid claims analysis that would need to be disclosed in the SAO.

## c. (0.5 point)

Describe a scenario in which there is a change in assumptions, procedures, or methods for the unpaid claims analysis that would not need to be disclosed in the SAO.

### SAMPLE ANSWERS AND EXAMINER'S REPORT

QUESTION SPRING 2018 EXAM 6US, QUESTION 22	
TOTAL POINT VALUE: 1.75	LEARNING OBJECTIVE: D
SAMPLE ANSWERS	
Part a: 0.75 point	

- Part a: 0.75 point
  - The amount of reserves covered by another's analysis
    - o Whether the result is material to the total amount of loss & LAE reserve
    - Amount covered in another actuary's analysis compared to the total reserves
    - Whether the reserves are material (portion of total)
    - Impact on total opinion
  - The nature of the exposure and coverage
    - Nature of the risks included in the analysis
    - Nature of exposure
    - o Consider the line of business another analysis is opining on
    - o Nature of business
  - The way in which reasonably likely variations may affect the actuary's opinion on the total
    - The volatility of data/results in the other analysis
    - Whether adverse development of these reserves will affect appointed actuary's opinion
    - o If deviation on the other would cause material deviation in total
    - Sensitivity of the analysis to reasonable changes in estimates
  - The credentials of the individual(s) that prepared the analyses or opinions
    - Another actuary's credentials
    - o Credential and qualification of the individual
    - The qualifications of the other actuary
  - Understand the intended purpose of the analyses or opinions

### Part b: 0.5 point

- Change in methodology/assumption has a material impact on results
  - The company calculated reserves using paid LDFs and now started using Reported LDFs, and the difference between paid and reported method is material.
  - A new law goes into effect and the company now expects the impacted claims to close at higher amounts than previously. This change in assumption results in material adverse development. This change would need to be disclosed.
  - A new loss development pattern was selected for a specific line that materially impacted the estimated unpaid claims.
  - The prior method was based on data that was pulled incorrectly causing estimates to be materially overstated.
- New Modeling method added to reserve analysis has a material impact on results
  - o If the actuary switches from a traditional loss development method estimate to a catastrophe modeling approach for property exposures and the impact of the change in methodology is material.
  - Actuary start to use GLM instead of LDF method for reserve booking, result a 10M reserve increase on a 30M book.

### SAMPLE ANSWERS AND EXAMINER'S REPORT

- Replacement of method that was previously heavily relied on because assumptions are no longer valid
  - The claim department strengthened the case reserve so actuarial reserving used methods other than chain ladder. This results in material change in the reserves.
- Segregating data differently (by LOB, loss layer, geography, whatever), which creates a material change in the results
  - When the data of PD and BI coverages are treated separately (Triangles & LDFS)
    now and before the data was combined as Liability. This caused a material change
    on estimated reserves.
  - A material portion of the reserves is stated as net of salvage & subrogation, when it was previously state gross of salvage & subrogation.
- Appointed Actuary is unable to review the prior Appointed Actuary's work, must disclose prior assumptions, procedures and methods unknown
- Appointed Actuary is changing assumptions, and/or methods from the prior year and change is not known.
- Appointed Actuary was changed. Changes in assumptions, methods, and procedures likely resulted in a material change

### Part c: 0.5 point

- Periodic updating of data, factors or weights based on newly available information
  - There has been a slight change to the severity assumption used to determine reserve estimates. The change is part of the regular review process and therefore need not be discussed.
  - o Change in loss development factors based on more recent evidence.
  - o Changing new link ratios based on new data.
  - The company assumed a different expected loss ratio as compared to prior year in projection of reserves, but the effect on reserve estimate was immaterial.
  - o There was a change in discounting but the impact was immaterial.
  - There has been a change in trend selection that did not have a material impact on the results.
- The actuary is reviewing new reserve segments that were not included in the prior review
  - Adding a new line of business to the reserves. If it is small portion of book, no need to disclose.
- New method is added but impact on results is not material
  - Change in reserve technique that only impacted one small LOB with loss not material according to the material standard chosen.
  - A new procedure is used to calculate reserves (BF method instead of paid development method) and this change has an immaterial impact on the loss reserves estimated.
  - The actuary changes their loss development method from a chain-ladder approach to a modeled claim life cycle approach and the estimate required reserves are identical to the previous method.
  - o If actuary relied more on paid method than incurred methods and did not produce materially different estimates from prior review.

### SAMPLE ANSWERS AND EXAMINER'S REPORT

### **EXAMINER'S REPORT**

Candidates were expected to understand the components of the SAO, what should be considered when making use of another's analysis, and know when/why changes to the unpaid claim analysis needed to be disclosed in the SAO.

#### Part a

Candidates were expected to understand the components of the SAO to briefly describe what items should be considered when making use of another's analysis.

#### Common mistakes included:

- Responses that were not specific enough, such as "methods & assumptions used" or "data quality".
- Providing items that need to be disclosed when making use of another's analysis, such as the affiliation of the other actuary or the relationship of the actuary to the company.
   These items are not
- Stating "amount of reserve" without context of whether the reserve amount is material.

#### Part b

Candidates were expected to understand and describe a change in the unpaid claims analysis that would result in a disclosure in the SAO.

### Common mistakes included:

- Not describing a scenario, such as only saying "when there is a change in assumptions, procedures or methods" or not noting the materiality.
- Reference a claim practice or data system change as requiring disclosure, but not mentioning an actuarial reserve method or assumption change

### Part c

Candidates were expected to understand and describe a change in the unpaid claims analysis that would not result in a disclosure in the SAO.

### Common mistakes included:

 Not describing a scenario, such as only saying "when there is a change in assumptions, procedures or methods" or not noting the immateriality.