Purchase Accounting for Insurance Business Combinations under China-GAAP from an Actuarial Perspective
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BACKGROUND
Purchase GAAP accounting (PGAAP) is a common accounting requirement for both the acquiring and the acquired companies after acquisitions. The preparation of the PGAAP financial statements for the acquired company is a necessary accounting exercise for a publicly traded acquirer. However, a privately-owned acquirer may also want to prepare PGAAP financial statements to aid the monitoring process of the performance of the acquired business.

Before the PGAAP exercise begins, both the acquirer and the acquired would need to co-develop an accounting policy fitting for this PGAAP exercise. For insurers, the common practice is to follow the acquirer’s existing accounting policy. On the other hand, if the acquirer is not an insurance entity, the PGAAP accounting policy may begin with the existing accounting policy of the acquired company.

Regardless, the draft PGAAP accounting policy must be designed with input from both the acquirer and the acquired company, with discussions made alongside their respective auditing firms in the early stages. The key decisions made in the PGAAP exercise should be well-supported and the expected outcome should be well-communicated and agreed with by the management of the companies to avoid unfavorable outcome near the end of the exercise.

PGAAP GUIDANCE
Preparing PGAAP financial statements is a crucial step for business combinations. As actuarial reserves and other related items occupy the majority of the balance sheet, actuaries are heavily involved in the PGAAP process. There are numerous publications available in the market which provide adequate guidance for practitioners. However, businesses in China should only consider these guidance papers as reference material on market practice since the China Insurance Regulatory Commissioner (CIRC) has adopted China-GAAP which is close to the 2010 Exposure Draft of IFRS4 Phase II for Insurance Contracts (“2010 ED”). The reference materials outside of China may not be directly applicable.

In this article we will address several key actuarial issues, namely unit of account, book value of China-GAAP actuarial reserve at acquisition date, fair value of liability, goodwill impairment and reinsurance. Besides accounting and actuarial, the PGAAP exercise also involves other disciplines including tax and asset valuation. These items are beyond the scope of our discussion.

This article is primarily written for long-term life insurance businesses, yet the underlying issues are also applicable to other non-life insurance or short term businesses.

OVERVIEW OF CHINA-GAAP FOR BUSINESS COMBINATIONS
The general practice is that the acquirer and the acquired company must first identify the intangible assets as well as other assets and liabilities of the acquired entity. The acquired company is then able to develop an initial fair value balance sheet at the date of acquisition. Assets are marked to market value while liabilities are measured at fair value, and the acquired company’s selected intangible assets such as deferred acquisition cost (DAC), unearned profit liability (UPL) and goodwill are written-off.

Under current China-GAAP accounting standards, actuarial reserves are not reported using fair value. Instead, they are reported as the sum of best estimate liability (BEL), risk adjustment (RA) and residual margin (RM). Although BEL is based on the company’s projected cash flows with best estimate assumptions, the discount rate is not the market rate at the valuation date plus liquidity premium. For other business with benefits depending on investment return, the discount rate is the future best estimate investment return. The RA can be considered as a provision for adverse deviation (PAD) based on BEL. It is common that the RM is locked-in at issue and is not updated after the issuance date.

For short duration contracts, the actuarial reserves are the pre-claims liability and the claims liability. The pre-claims liability is the unearned premium reserve less the unamortized acquisition costs, which is believed to be a reasonable approximation of the present value of fulfillment cash flows (PVFCF, i.e., BEL + RA).
and the RM. The claims liability is the sum of the claims reserve and the incurred but not reported reserve (IBNR) and these two quantities are measured as the PVFCF\(^6\) (i.e., BEL + RA).

Please note that the acquired company only needs to prepare a fair value balance sheet at the date of acquisition. Going forward, the acquired company may follow the local GAAP accounting guidance for preparing GAAP reserves for in-force and future new businesses. Thus, the acquirer would need to use the value of business acquired (VOBA) asset as an intangible asset to reconcile the difference between fair value of liability (FVL) and book value of liability (BVL) of the in-force business at the acquisition date.

BVL would then be calculated using existing accounting guidance with updated assumptions at the acquisition date. All previous assumptions are replaced. VOBA may then be amortized using projected revenue streams, for example, future gross premiums or estimated gross margins, after the acquisition date. All previously reported revenue streams and locked-in assumptions are ignored going forward.

**UNIT OF ACCOUNT**

The first consideration for PGAAP accounting policy under China-GAAP is the determination of unit of account. This definition may affect the number of VOBA balances for future amortization.

BEL, RA and RM are normally calculated on a cohort basis (or unit of account basis). Before the acquisition, the acquired company may set up units of account on direct business based on combinations of group of contracts and issuance year. Each unit has its own RM for amortization. This categorization is necessary as different products may have different best estimate assumptions (e.g., lapse rates). Additionally, different issuance years may have different discount rates and liquidity assumptions, thus affecting the respective BEL and RA. As RM is the residual determined at the policy inception date, differences in best estimate assumptions and discount rates for determining BEL and RA would also indirectly affect RM.

The acquiring company acquires the entire block of in-force business at the same time. Issuance year of the in-force business may not be a consideration for determining the unit of account. Some companies may use a broad stroke and consider all traditional business as one unit of account and the unit-linked business as another unit of account for determining VOBA amortization.

**DEFINITION OF BOOK VALUE OF LIABILITY AT ACQUISITION DATE**

The second issue is the definition of BVL for the acquired business and its effect on RM and VOBA.

Under China-GAAP, \( BVL = BEL + RA + RM \)
While it is a widely accepted practice to revise the BEL and RA of the acquired business in accordance with the acquirer’s assumptions and parameters at the acquisition date, there is limited guidance on whether the RM at the acquisition date should be re-determined.

One possibility is to use the acquired company’s outstanding RM balance before acquisition as the initial RM balance in the initial PGAAP balance sheet. Future amortization of the RM would then follow the original schedule.

The advantage of this approach is to avoid changes in the current financial reporting structure for RM. The disadvantage of holding a RM on the liability side is that it would also inflate the VOBA on the asset side. Given that the amortization schedules of RM and VOBA could be different, the difference may lead to unnecessary noise.

An alternative is to set RM to zero for the in-force business such that the BVL is only the sum of BEL and RA. The advantages of this approach are (a) simplicity as there would not be any amortization of RM and (b) VOBA is not inflated and has a reduced risk of not being recoverable. The disadvantage is that VOBA may be negative depending on the relationship between FVL and BVL (i.e., the sum of BEL and RA in this case).

According to 2010 ED paragraph 42:

> “An insurer shall measure a portfolio of insurance contracts acquired in a business combination at the higher of the following:

(a) the fair value of the portfolio. The excess of that fair value over the present value of the fulfillment cash flows establishes the residual margin at initial recognition.

(b) the present value of the fulfillment cash flows. If that amount exceeds the fair value of the portfolio, that excess increases the initial carrying amount of goodwill recognized in the business combination.”

Accordingly, the acquired company should establish RM for the in-force business only if the FVL exceeds the PVFCF (i.e., the sum of BEL and RA). The initial RM is defined as the difference between FVL and PVFCF.

If the sum of BEL and RA is greater than FVL, the acquired company may need to set up an intangible asset, VOBA, on the asset side of the PGAAP balance sheet.

**FAIR VALUE OF LIABILITY AT ACQUISITION DATE**

The third issue is the appropriate method for determining FVL for in-force business.

There are numerous ways to determine the fair value of insurance liabilities at the date of acquisition. Besides the replicating portfolio approach, insurers may use the stochastic simulation method where cash flows are projected under thousands of interest rate and equity scenarios. The sum of risk adjustment and the average of the present values of net cash flows (discounted using risk-free rates plus liquidity premium) is then defined as FVL. As the parameters (such as discount rate) for determining China-GAAP actuarial reserve are not market data oriented, the China-GAAP actuarial reserve is unlikely to be equal to the FVL.

The third method is the price allocation method where the final purchase price is allocated between the net assets, the value of in-force and the value of future new business capacity. Given that the value of the net assets is determined using available market value of backing assets, the allocation of the remaining purchase price is more of an art than science between the value of in-force and the value of new business capacity. This method is appropriate only if the transaction is an orderly normal transaction. It may not be appropriate if the transaction is a distressed or an overly optimistic transaction.

Regardless of the approach, if the FVL is greater than the sum of BEL and RA, the company may initiate a RM in accordance with paragraph 42 of 2010 ED rather than having a counter-intuitive negative VOBA.
GOODWILL IMPAIRMENT

The fourth issue is the reasonableness of the purchase price allocation if it is used to determine FVL.

With respect to the ceded business, the acquired company may need to re-evaluate the reserve credit of the ceded business after the acquisition. The residual margin of the previous reserve credit may need to be written off and be refreshed by parameters such as PVFCF after non-performance risk and the FVL for the ceded business.

Some practitioners may not take into account the non-performance risk when comparing PVFCF with FVL. It may be a practical approach if the degree of reinsurance is immaterial. However, it may lead to a potential understatement of the China-GAAP reserve if the volume of reinsurance is material.

CONCLUSION

By now we have highlighted a few key issues for practitioners to consider when preparing PGAAP financial statements under China-GAAP. There are other issues, such as reasonableness of the liquidity premium, potential idiosyncrasies between the financial reporting of the acquired block of business versus new issues, and practical means of allocating VOBA, if any, among major blocks of acquired business. We will address these issues in a future article.

Disclaimer: The views reflected in this article are the views of the author and do not necessarily reflect the views of the global EY organisation or its member firms.

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ENDNOTE

1 In the United States, most of the guidance is provided by Financial Accounting Standard Board (FASB) and the American Academy of Actuaries (AAA) for insurance company business combinations.

2 Residual margin (RM) is also known as contractual service margin (CSM).

3 Please see 2010 ED paragraph BC132 for more details.

4 Some companies may use RM to absorb the change in BEL and RA due to a change in estimated cash flows.

5 Definition of short duration contract can be found in paragraph 54 of the 2010 ED.

6 Please see paragraph 55 of 2010 ED for more details.