

The Full Focus of Getting a Commutation Done

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Background on Commutations and Commutation Process

- Any commutation presentation may not give all the answers, but it can at least consider understanding the various questions.
- More 'Art' than 'Science'
- Commutation doesn't necessarily end a given relationship. In some cases, it can enhance a relationship with mutual benefits to both parties.

Background on Commutations and Commutation Process

- Differences in the 'Commutation Landscape' over last 15 Years
 - Companies have embraced commutations as a solution and many have entire departments working toward achieving solutions through commutations
 - Sophistication of modelling by all parties including actuarial projections
 - Realization of the degree/magnitude underlying soft market years
 - Increase in the number of financially troubled companies
- Many times, the sense of urgency to agree to a final commutation is not as relevant as other facets of insurance operations.
 - Actual emergence since initial commutation discussions may tell more relevant story
 - Situations may change for cedent and reinsurer
- Approval and discussion processes within a company often need to be adapted when commutation estimate is different from held loss reserves.

Consideration for Commutations – Beyond the Numbers

- It is always worthwhile to understand the motivations of both parties that consider entering into a commutation beyond just the financial reasons.
- Benefits to entering into a commutation – CLAIMS RELATED
 - Potential court cases avoided; Resolve potential disputes with reinsurers
 - Peace of mind from no future claim payments ("advantage" reinsurer)
 - All or many open claims are already in the reinsurance layer. Resolves internal uncertainty with corresponding underlying claims handling ("advantage" reinsurer)

Consideration for Commutations – Beyond the Numbers

- Benefits to entering into a commutation – OPERATIONS RELATED
 - Removal of reserves eases issues with credit counter party consideration ("advantage" reinsurer)
 - Changes in historical relationship made easier with finality
 - Reduce administrative costs
 - Alleviates loss of know how due to retirement or loss of key staff or negates problem of not having access to legacy underwriting or reinsurance documentation
 - Creates capacity for writing and administering other business
 - Increased freedom of investment strategy from cash received ("advantage" cedent)
 - Leaner reporting (Sox compliance, etc.)

Consideration for Commutations – Beyond the Numbers

- Benefits to entering into a commutation – OTHER ITEMS
 - Final exit from a LOB (Accompanying press release perhaps) - "advantage" reinsurer
 - Might be best way to collect outstanding recoverables for slow or non-payer ("advantage" cedent)
 - Same business assumed is being ceded (in one pocket, out the other)
 - Could resolve internal company liquidity needs ("advantage" cedent)
 - Best/last chance to collect on insolvent retrocessions already written off ("advantage" cedent)
 - Difficulty with auditing and uncertainty with losses below retentions ("advantage" reinsurer)
 - Simple reinsurance structures can be an asset when selling a portfolio or entity ("advantage" cedent)

Background – Things To Be Considered in "Pricing"

- General Differences in Projections for Runoff Reserving likely apply
 - Future development for existing claims does not necessarily behave like the past
 - 'Triangle' type traditional reserving methodologies may not show appropriate future development or need too many adjustments to show experience well
- Are Definitions of Business Fully Understood?
 - Simple ratios such as paid to incurred loss ratios or closed to reported claim ratios can verify some changes and be benchmarked to Industry data.
 - Big settlements or commutations to underlying business
 - Movements of IBNR to case
 - Closed Claims

Background – Methodologies/Considerations in "Pricing"

- Definitions of terms
 - 'Inward' versus 'Outward' Commutations
 - 'Cedent' versus 'Retrocessionaire'
- Need to understand the future and past development for a particular block of business, often part of a much larger reviewed portfolio.

Background – Additional Items to Consider in Final Exchange

- Outstanding Balances for Claims already paid (but cash not yet exchanged between the parties)
- Sliding Scale or other loss sensitive commissions
 - Does the commutation payment of discounted dollars defeat the 'spirit' of the commission structure?
- Reinstatement Premiums (for amounts not yet paid but which will be paid in the future)
- Caps and Limits specified within the treaty language
- Necessary sign off procedures from other retrocessional carriers involved (or possible establishment of direct sign off between interested parties if deal was fronted)

Background – Understanding the Block of Business Being Commuted (with Supplementation of Individual Claims)

- Many consider (especially for runoff business) performing individual claim projection analysis for those claims that remain open:
 - Workers Compensation, PIP performed at claim level with few late reported claims and consideration of actuarial assumptions
 - Claims Made Liability (D&O, Med Mal) can work closely with Claims Department projections to project the ultimate exposure for the few claims that remain open at a given point in time
- Individual Claim methodologies don't work as well for lines of business with continual reporting of new claims:
 - Less mature business
 - Occurrence Based Other Liability
 - Asbestos & Environmental exposure

Background – Understanding the Block of Business Being Commuted....(Continued)

- 2002 Call Paper on Runoff WC Reserving “Reserving for Runoff Operations-
-A Real Life Claims Specific Methodology for Reserving a Workers
Compensation Runoff Entity” by James B. Kahn
- Commutations not specifically discussed, but concepts of reserve reviews
can apply directly. Reserves for commutation almost always a “runoff”
block.
- Workers Compensation – Both Claims and Actuarial Assumptions Used
- Any line of business with an individual claims approach needs open
communication with Claims Department

Workers Compensation Example

- No true IBNR claims so number of claims will decrease over time and become more manageable
- Set up for lifetime reserves can be performed relatively easily with a selected mortality table and accompanying assumptions
- Payment over many years allows for making adjustments to parameters, escalation scenarios, etc. Claims estimate of payments or averages can be used
- Benefits set by statute – adjust for statutes and differences among states on a claim by claim basis
- Shift in open claimants may eventually go more towards those who have suffered PT injuries and/or will not agree to settlements – will there be a change in philosophy going forward?
- Definitions of Closed claims – changes could impact definition of reopened claims and result in final calculation adjustments

Workers Compensation Example (Continued)

- Call paper example underwent many changes in recent history that resulted in difficulty using traditional reserving methods (Past doesn't resemble future).
 - Big settlement push following acquisition/new TPA
 - 2nd Injury Fund recoveries due had been in pipeline for 3 years. More than historical observations
 - Big ALAE expenditures for 2 years to handle tort reform
 - Commutations and insolvencies of retrocessional carriers

Utilization of Mortality Tables

- Using probability estimates for mortality with each claimant, you will never reach the full limit for unpaid reserves as a non-zero probability exists that claimant will not reach stated limit
- Impaired mortality assumptions from claims department usually handled with 'rated age' assumption

Development of WC Reserve – Claims Rollup

- Medical
- Indemnity
- ALAE
- Recoveries/Second Injury Funds
- Discount
- Reinsurance Cessions

- Settlements
- Reopened Claims

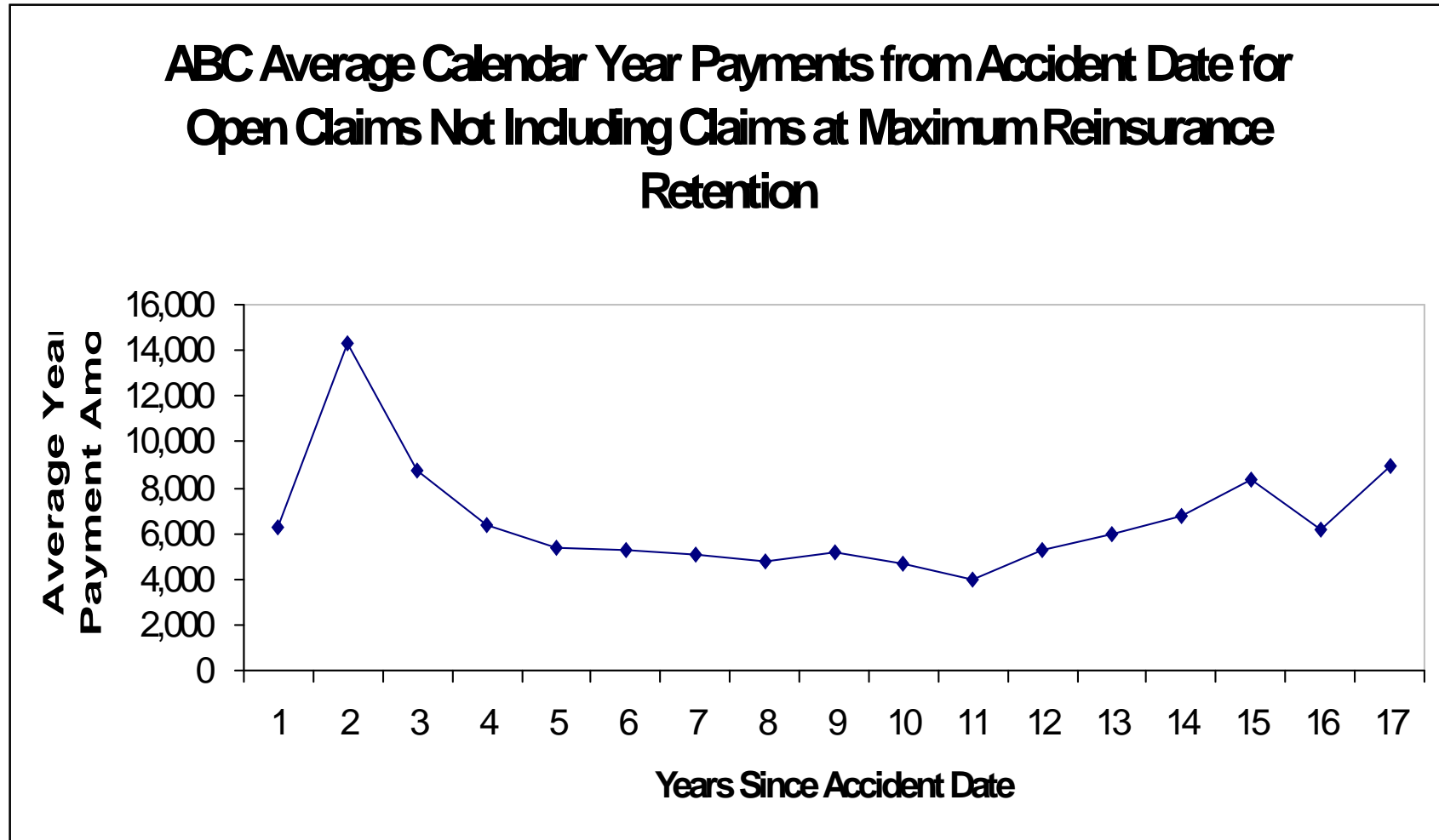
Indemnity Reserve

- In its simplest form, indemnity reserves should be remaining months of lifetime times an amount determined by statute
- Straight average of past years may overstate given the early vocational rehabilitation costs for some claimants
- Selected yearly paid amounts from claims department or specified by statute
- COLA applies in some states, and may have varying degrees of caps per claimant
- Social Security Disability offsets vary by claimant
- For Lifetime claimants, it is not very difficult to get to amounts in excess of \$1M for relatively young claimants

ALAE Reserve

- Will need to know how ALAE is treated in cessions
- Unlike other LOBs, older WC claims may not have as high a % of ALAE to loss as less mature claims
- Decrease in ALAE as a percentage of loss over the course of time is counter to common thought as claims begin to mature (Reverse Salzmann)
- In theory, you would expect a runoff block of business to have fewer claims willing to accept settlements over time – in such a case, may result in fewer ALAE fees going forward
- Estimates can vary between claims input, selected percentage of loss benchmarks, etc.

Medical Reserve



Medical Reserve

- Looked at historical CY payment by AY of remaining body of open claims
- After first 4 years following an accident, medical claims appear to follow a “U-Shaped” payment pattern over time as forces of inflation and utilization interact – similar patterns seen for virtually all Accident Years
- A runoff block may be at or beyond the initial “u” bottom and be escalating
- Adjust claims for escalation of medical costs. Should also be aware of impact of healing and repetitive treatment costs as opposed to initial surgeries and intensive early treatments
- Scenario Testing – See sensitivity of different escalation scenarios after recoveries and reinsurance cessations

Discount

- Biggest additional adjustment made for commutation presentation from nominal reserving procedure in Call Paper example
- Often one of the biggest points of discussion between cedent and reinsurer when dealing with commutations
- Can have pretty significant discount for WC especially when using mortality tables and long life expectancies
- Flat interest rate can be used, and is easy to explain and calculate, but what is the long term average? If a certain number of basis points above risk free rate, then how many? Are low interest rates 'forever'?
- Sometimes, can establish “yield curve” using published treasury instruments, but same economic uncertainty as flat interest rate.
- With yield curves, you can also consider a “spread above risk-free rate” or incorporate another measure of adjustment such as blending risk-free rates with corporate bond rates to produce an adjusted yield curve

Other Potential Misconceptions To Runoff Reserving Projections

- HIGHER LDFs OR HIGHER ESCALATION SELECTED BY COUNTER PARTY WILL LEAD TO A HIGHER ESTIMATE OF RESERVE LIABILITY
- Numerical Example
 - 1 Claim only
 - Treaty Structure = \$250,000 xs \$250,000
 - Paid Loss to Date = \$400,000
 - Cedent Selected CDF = 2.50
 - Reinsurer Selected CDF = 1.25
 - Ground Up Ultimate Cedent = \$1,000,000
 - Ground Up Ultimate Reinsurer = \$500,000
 - **XS Exposure Cedent = \$250,000**
 - **XS Exposure Reinsurer = \$250,000**

Other Potential Misconceptions To Runoff Reserving Projections

- THE OLDER A CLAIM (OR BLOCK OF BUSINESS) IS, THE GREATER THE PERCENTAGE OF ALAE WILL BE
- Numerical Example – Same particulars as last example but **ALAE Pro Rata**
 - Treaty Structure = \$250,000 xs \$250,000
 - Paid ALAE to date (and assume no further development) = \$100,000
 - Ground Up Ultimate Cedent = \$1,000,000
 - Ground Up Ultimate Reinsurer = \$500,000
 - Ceded Ultimate Loss % Cedent = $\$250,000/\$1,000,000 = 25\%$
 - Ceded Ultimate Loss % Reinsurer = $\$250,000/\$500,000 = 50\%$
 - Paid to date Ceded Loss % = $\$(400,000-250,000)/\$400,000 = 37.5\%$
 - Paid to date Ceded ALAE = $37.5\%*\$100,000 = \$37,500$
 - **Ceded Ultimate ALAE Cedent = $25%*\$100,000 = \$25,000$**
 - **Ceded Ultimate ALAE Reinsurer = $50%*\$100,000 = \$50,000$**

Other Potential Misconceptions To Runoff Reserving Projections

- HIGHER YEARLY PAYMENTS (OR HIGHER ESCALATION RATES) WILL LEAD TO A DEEPER DISCOUNT FACTOR
- Numerical Example
 - 1 Claim only
 - Treaty Structure = \$1,000,000 xs \$1,000,000
 - Remaining Payout Period = 25 years
 - Interest Rate = 3%
 - Paid Loss to Date = \$1,000,000
 - Cedent Projected Yearly Payout = \$50,000
 - Reinsurer Projected Yearly Payout = \$100,000
 - **Discounted Reserve Cedent = $(\$50,000) \cdot (1.03)^{-1} + \dots + (\$50,000) \cdot (1.03)^{-20} = \$743,874$**
 - **Discounted Reserve Reinsurer = $(\$100,000) \cdot (1.03)^{-1} + \dots + (\$100,000) \cdot (1.03)^{-10} = \$853,020$**

Other Potential Misconceptions To Runoff Reserving Projections

- ACCIDENT YEAR MEDICAL ESCALATION RATES MAY BE THE MOST APPROPRIATE RATE TO APPLY TO OPEN WC CLAIMS
- Numerical Example
 - Sample takes place in Accident Year N, which only has 1 claim with Payout of \$1 each year for 40 years. \$1, \$1, \$1, = \$40
 - Sample then takes place in Accident Year N+1, which only has 1 claim but with Payout of \$2 each year for 40 years. \$2, \$2, \$2, = \$80
 - Accident Year Trend in this example = $(\$80/\$40)-1.0=100\%$
 - When looking at Calendar Year Trend in each example at year 11 (selected runoff year) going forward, trend is either $(\$1/\$1)-1.0 = 0\%$ or $(\$2/\$2)-1.0 = 0\%$

Other Potential Misconceptions To Runoff Reserving Projections

- ACCIDENT YEAR MEDICAL ESCALATION RATES MAY BE THE MOST APPROPRIATE RATE TO APPLY TO OPEN WC CLAIMS (CONTINUED)
- Figures shown below are illustrative in terms of selections (those colored blue and red are selections, black figures are based on actuals).
- Color Key to figures below:
 - Black – Actual observed paid averages for selected claim sample.
 - Blue – Projections using selected AY trend at year following accident
 - Red – Applies 4% calendar year trend for each year starting 9 years after accident

	YEARS SINCE ACCIDENT														
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
Accident Year N	6,241	14,355	8,736	6,408	5,340	5,256	5,089	4,748	4,938	5,135	5,341	5,554	5,777	6,008	6,248
Accident Year N+1	6,990	16,078	9,610	6,921	5,660	5,571	5,369	4,985	5,185	5,392	5,608	5,832	6,066	6,308	6,560
Selected % Increase for Year Since Accident	12.0	12.0	10.0	8.0	6.0	6.0	5.5	5.0							

	YEARS SINCE ACCIDENT															TOTAL
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	
Accident Year N	6,498	6,758	7,028	7,309	7,602	7,906	8,222	8,551	8,893	9,249	9,619	10,003	10,403	10,820	11,252	225,287
Accident Year N+1	6,823	7,096	7,380	7,675	7,982	8,301	8,633	8,978	9,338	9,711	10,100	10,503	10,924	11,361	11,815	238,753
																AY Trend 5.98%

Thank you

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