

THE IMPACT OF DATA ON PROGRAM SUBMISSIONS

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A DIVISION OF ARROWHEAD GENERAL INSURANCE AGENCY, INC.

OUR GOAL TODAY IS:

- Help you to understand why data is so important to making a program submission today.
- We will discuss the types of data the carriers expect or need to see in a submission.
- We will explain the standard data that will be expected or requested by all carriers for all new submissions and how carriers use it to answer their questions of acceptability.
- We will then discuss the holes in what carriers typically require and how you can use data to your advantage in ways the carriers do not typically see and increase your probability of success.
- We will discuss what data you should collect, how to collect that data and how to use it.
- Finally, we will discuss the types of data you need to collect to build and utilize Benchmarking to manage your book to profitability

WHY IS DATA SO IMPORTANT TODAY AND HOW DID WE GET HERE?

- Decreased carrier margins and increased competition in the marketplace. (i.e., carriers must make money on UW instead of investment these days)
- Increased DOI regulation and the inability to get filings on admitted products approved without statistical support.
- High cost of making and adjusting filings on Admitted Business.
- Migration towards rule based underwriting systems.
- Increased corporate transparency requirements and segregation of duties.
- Increased focus on data analytics and predictive models.

REQUIREMENTS OF ALL PROGRAM SUBMISSIONS, WHETHER NEW OR EXISTING THAT MUST BE INCLUDED IF YOU ARE GOING TO BE SUCCESSFUL IN GAINING CARRIER APPROVAL!

- Policy Administration – Who will handle the rating and selection of accounts and the processing of policies and endorsements? How will they be transmitted and how will they be stored?
- Premium collection, control and distribution – Who will collect the premium on what billing plans. How will the premium be retained, transferred and reconciled?
- Claim Administration – Who will handle claims and what specific expertise or approach will be used to control claims.
- Loss Control – What will be done with what intent and by whom?
- Marketing – What will enable you to achieve the level of submissions necessary to reach the minimum targeted premium levels?
- Underwriting Argument – You must answer the question of why you will be able to write business in a competitive environment and achieve an underwriting profit. **You must provide some form of a mathematical argument for why and how you will achieve a profit margin!**
- Data Collection - What data will be collected by what methods on both the policy side and the claims side. How will that data be collected, how will it be used and how will it be shared.

WHAT QUESTIONS ARE THE CARRIERS TRYING TO ANSWER WITH DATA THAT DEFINES WHAT DATA REQUIREMENTS MUST BE MET?

- How large is the book and how spread is the book in terms of line and geographic distribution?
- Does the carrier have the tools in place (filings, claims handling, licenses, etc) to write the program without significant development cost and time?
- If you have an existing book, is the book profitable or unprofitable and is it trending positive or negative?***
- If you do not currently control the book how can they determine whether:
 - The book will be profitable?
 - The book will be large enough to justify the costs and time required to bring it to fruition?
 - How do you or can you differentiate yourself from the competition & industry results?
 - How can you use data to control your results and make your book profitable over time?

WHAT REPORTS WILL BE REQUESTED FROM THE MAJORITY OF CARRIERS FOR ALL PROGRAMS?

- Distribution of premium by line and by state. Some will go further and ask for the average premium by line by policy and the counts of policies.
- Written and earned premium by line by year over the same period where loss data is available.
- Loss Development Triangles. Distribution of loss by line valued on a regular basis (quarterly or annually are standard) for the prior five years or more.
- What is the cost structure of the program and what is the permissible loss ratio based on that cost structure?
- Historical Rate information and projection of expected future rates. What is the trend in recent rate changes

Policy Year	2016	Valued Aug 31, 2018
Paid Loss (Net of Salvage/Subrogation)		Total UY
194	Commercial Auto Liability	\$ 4,880,933
212	Auto Physical Damage	\$ 3,145,473
170	Other Liability	\$ 19,039
090	Inland Marine	\$ 219,644
021	Fire & Allied Lines	\$ -
Total Paid Loss		\$ 8,265,088
Paid ALAE		Total UY
194	Commercial Auto Liability	\$ 1,130,531
212	Auto Physical Damage	\$ 166,227
170	Other Liability	\$ 7,827
090	Inland Marine	\$ 16,848
021	Fire & Allied Lines	
Total Paid ALAE		\$ 1,321,433
Total Paid to Date		Total UY
194	Commercial Auto Liability	\$ 6,011,464
212	Auto Physical Damage	\$ 3,311,700
170	Other Liability	\$ 26,865
090	Inland Marine	\$ 236,493
021	Fire & Allied Lines	
Total Paid to Date (Loss & ALAE)		\$ 9,586,521
Case Loss Reserves		Total UY
194	Commercial Auto Liability	\$ 7,021,211
212	Auto Physical Damage	\$ 95,401
170	Other Liability	\$ 11,000
		\$
090	Inland Marine	0
021	Fire & Allied Lines	\$ -
Total Case Loss		\$ 7,127,612
Case ALAE Reserves		Total UY
194	Commercial Auto Liability	\$ 859,556
212	Auto Physical Damage	\$ 3,659
170	Other Liability	\$ 2,500
		\$
090	Inland Marine	0
021	Fire & Allied Lines	\$ -
Total Case ALAE		\$ 865,715
Total Outstanding		Total UY
194	Commercial Auto Liability	\$ 7,880,767
212	Auto Physical Damage	\$ 99,060
170	Other Liability	\$ 13,500
		\$
090	Inland Marine	0
021	Fire & Allied Lines	\$ -
Total Outstanding (Loss & ALAE)		\$ 7,993,328
Total Incurred (Crosscheck)		L/R Net Earned Prem Total UY
194	Commercial Auto Liability	47.9% \$ 29,008,026 \$ 13,892,231
212	Auto Physical Damage	34.6% \$ 9,858,853 \$ 3,410,760
170	Other Liability	2.2% \$ 1,864,325 \$ 40,365
090	Inland Marine	16.8% \$ 1,406,992 \$ 236,493
021	Fire & Allied Lines	0.0% \$ 40,410 \$ -
Total Incurred		41.7% \$ 42,178,606 \$ 17,579,849

WHAT REPORTS WILL BE REQUESTED FROM THE MAJORITY OF CARRIERS FOR ALL PROGRAMS?

- Large Loss Reports. Listing and explanation of all claims that represent ½ of the amount that is considered material in a given line.
- If the book consists of significant subsets of class, they will ask for the loss and premium data to be presented by subset (often including the demographics by exposure type whether exposure might mean TIV, count, payroll, receipts, etc.)
- Examples:
- If your book is restaurants, they will want the data separated between fast food, diners, Brew Pubs, elegant dining, etc
- If your book is contractors, they will want the data separated between Carpenters, Plumbers, Heating and cooling, full service residential, full service comm'l, etc.

2017	Losses XS \$50,000 Incurred			Valued Aug 31, 2018	
Policy No	Insured	Incurred	Loss Description	Loss Date	Report Date
0001	Trucker 01	\$ 50,000	IV Squeezed OV	24-Aug-17	25-Aug-17
0002	Trucker 02	\$ 51,041	Opposite Direction OV Error	05-Dec-17	13-Dec-17
0003	Trucker 03	\$ 58,411	Accident Avoidance	03-Oct-17	04-Oct-17
0004	Trucker 04	\$ 59,932	Flying Objects off IV	18-Oct-17	19-Oct-17
0005	Trucker 05	\$ 64,250	OV Out of Lane	26-Oct-17	30-Oct-17
0006	Trucker 06	\$ 72,742	IV Struck OV	08-Apr-18	09-Apr-18
0007	Trucker 07	\$ 77,420	Multi-Vehicle Pile Up	18-Oct-17	20-Oct-17
0008	Trucker 08	\$ 84,850	IV Failure to Yield/Stop	01-Jun-18	04-Jun-18
0009	Trucker 09	\$ 87,766	IV Struck OV	05-Sep-17	12-Sep-17
0010	Trucker 10	\$ 92,500	Same Direction Fault Disputed	09-May-18	09-May-18
0011	Trucker 11	\$ 96,976	IV Struck OV	02-Nov-17	03-Nov-17
0012	Trucker 12	\$ 110,500	IV Struck OV	10-Jun-18	11-Jun-18
0013	Trucker 13	\$ 115,325	Stationary Object	28-Sep-17	07-Feb-18
0014	Trucker 14	\$ 118,857	Other Crash Type	20-Nov-17	21-Nov-17
0015	Trucker 15	\$ 121,089	IV Failure to Yield/Stop	07-Oct-17	09-Oct-17
0016	Trucker 16	\$ 124,491	Multi-Vehicle Pile Up	10-May-18	10-May-18
0017	Trucker 17	\$ 129,380	Other Crash Type	11-Jul-17	11-Jul-17
0018	Trucker 18	\$ 143,853	IV & OV Out of Lanes	09-Nov-17	09-Nov-17
0019	Trucker 19	\$ 148,251	Other Crash Type	24-May-17	24-May-17
0020	Trucker 20	\$ 155,807	IV Struck OV	26-Apr-18	04-May-18
0021	Trucker 21	\$ 170,509	Pedestrian	05-Aug-17	08-Aug-17
0022	Trucker 22	\$ 177,944	Same Direction IV Error	07-Sep-17	08-Sep-17
0023	Trucker 23	\$ 181,983	IV Struck OV	02-Aug-17	04-Aug-17
0024	Trucker 24	\$ 196,237	Multi-Vehicle Pile Up	16-Nov-17	17-Nov-17
0025	Trucker 25	\$ 201,000	Same Direction IV Error	07-Jun-18	08-Jun-18
0026	Trucker 26	\$ 210,500	Same Direction Fault Disputed	24-Feb-18	07-Mar-18
0027	Trucker 27	\$ 233,489	IV Struck OV	13-Jul-17	14-Jul-17
0028	Trucker 28	\$ 332,087	IV Struck OV	18-Jan-18	23-Jan-18
0029	Trucker 29	\$ 521,306	IV Failure to Yield/Stop	16-Jun-17	19-Jun-17
Earned Prem		\$29,472,135			
Total AL Loss		\$8,557,344		% of Inc Loss	% of Earned Premium
Inc AL Loss on claims XS \$50,000		\$4,188,495		48.95%	14.21%
Inc on claims XS \$100K		\$3,392,607		39.65%	11.51%
Inc on claims XS \$250K		\$853,393		9.97%	2.90%
Inc on claims XS \$500K		\$521,306		6.09%	1.77%
				% of Inc Loss	% of Earned Premium
Incurred XS \$50,000		\$2,738,495		32.00%	9.29%
Incurred XS \$100,000		\$1,592,607		18.61%	5.40%
Incurred XS \$250,000		\$353,393		4.13%	1.20%
Incurred XS \$500,000		\$271,306		3.17%	0.92%

	Historical Loss Ratio - All Classes							
	Auto Liability				Physical Damage			
	Earned	Limited	Limited L/R	Unlimited	Unlimited L/R	Earned	Unlimited	Unlimited L/R
Vehicle Type								
Light/Medium Truck	\$20,806,164	\$5,784,729	28%	\$8,391,431	40%	\$5,015,446	\$1,867,561	37%
Heavy/X-Heavy Truck	\$38,142,284	\$10,319,676	27%	\$17,547,003	46%	\$9,766,783	\$3,534,347	36%
Truck Tractor	\$211,112,159	\$71,952,130	34%	\$150,360,107	71%	\$52,100,996	\$24,225,228	46%
All Trailers	\$22,564,325	\$972,727	4%	\$3,809,777	17%	\$16,801,168	\$8,029,581	48%
Road Type								
Freeway Rural	\$30,601,523	\$11,306,877	37%	\$26,785,897	88%	\$7,347,584	\$5,547,375	75%
State Highway	\$103,830,361	\$30,000,588	29%	\$63,552,357	61%	\$33,722,594	\$14,914,525	44%
Surface Rural	\$7,639,953	\$1,466,753	19%	\$4,362,484	57%	\$2,146,040	\$887,341	41%
Surface Suburban	\$64,542,098	\$21,306,178	33%	\$44,232,299	69%	\$16,793,706	\$5,923,896	35%
Freeway Urban	\$46,997,850	\$13,293,809	28%	\$21,631,955	46%	\$12,651,505	\$6,277,275	50%
Urban	\$36,591,379	\$11,014,613	30%	\$18,855,345	52%	\$7,536,990	\$3,189,402	42%
Off Road/Restricted	\$2,421,768	\$446,429	18%	\$463,111	19%	\$597,698	\$65,778	11%
Spare/Replacement	\$0	\$194,014		\$224,870		\$2,888,275	\$851,127	29%
Annual Mileage								
0 - 2,500 Miles	\$6,762,886	\$2,720,959	40%	\$5,581,897	83%	\$2,363,642	\$689,638	29%
2,501 - 7,500 Miles	\$9,084,321	\$1,572,078	17%	\$2,679,845	29%	\$2,816,164	\$845,419	30%
7,501 - 12,500 Miles	\$10,781,969	\$2,693,381	25%	\$4,454,103	41%	\$3,067,272	\$1,022,240	33%
12,501 - 20,000 Miles	\$19,917,350	\$4,886,723	25%	\$9,921,101	50%	\$5,337,284	\$1,667,011	31%
20,001 - 30,000 Miles	\$44,843,190	\$13,587,024	30%	\$23,792,282	53%	\$12,172,306	\$3,916,890	32%
30,001 - 45,000 Miles	\$62,571,354	\$19,042,992	30%	\$35,921,895	57%	\$17,726,532	\$7,456,352	42%
45,001 - 60,000 Miles	\$48,089,797	\$13,946,688	29%	\$34,526,807	72%	\$14,977,556	\$6,297,185	42%
60,001 - 80,000 Miles	\$43,918,359	\$12,621,362	29%	\$21,242,596	48%	\$13,538,500	\$6,943,060	51%
80,001 - 100,000 Miles	\$32,202,900	\$12,244,175	38%	\$27,134,246	84%	\$8,362,851	\$6,718,119	80%
100,001 - 120,000 Miles	\$11,771,123	\$4,642,101	39%	\$12,232,988	104%	\$2,397,315	\$1,769,570	74%
Over 120,000 Miles	\$2,033,902	\$461,157	23%	\$1,899,792	93%	\$490,659	\$208,951	43%
Non-Operating	\$647,780	\$610,623	94%	\$720,767	111%	\$434,311	\$122,283	28%
Driver Age								
Under 21	\$313,613	\$12,243	4%	\$6,566	2%	\$159,382	\$10,124	6%
21 - 24	\$2,930,590	\$1,208,916	41%	\$911,213	31%	\$903,468	\$257,544	29%
25 - 29	\$11,593,415	\$4,449,752	38%	\$6,451,612	56%	\$3,902,909	\$2,344,734	60%
30 - 39	\$49,582,028	\$19,409,936	39%	\$35,757,585	72%	\$14,742,300	\$8,705,090	59%
40 - 49	\$124,680,486	\$39,406,471	32%	\$83,846,952	67%	\$33,617,164	\$15,269,354	45%
50 - 65	\$88,217,686	\$21,707,460	25%	\$46,955,812	53%	\$26,092,880	\$9,654,358	37%
66 - 72	\$6,793,431	\$1,165,158	17%	\$1,475,548	22%	\$1,853,681	\$664,708	36%
Over 72	\$2,665,084	\$566,246	21%	\$1,814,637	68%	\$733,227	\$194,597	27%
Not Assigned	\$5,848,598	\$1,093,848	19%	\$2,833,913	48%	\$1,679,381	\$556,208	33%
Driver Points								
0 - 1 Points	\$221,369,368	\$66,052,896	30%	\$133,111,443	60%	\$65,643,167	\$29,785,659	45%
2 Points	\$22,793,418	\$8,372,132	37%	\$15,435,424	68%	\$6,545,245	\$3,404,199	52%
3 Points	\$8,049,151	\$2,565,935	32%	\$5,753,285	71%	\$2,162,721	\$1,181,257	55%
4+ Points	\$2,614,915	\$645,594	25%	\$1,741,705	67%	\$582,466	\$382,480	66%
Not Assigned	\$37,798,080	\$11,392,704	30%	\$24,066,462	64%	\$8,750,794	\$2,903,122	33%
Vehicle Configuration								
Agri Products	\$32,821,487	\$7,584,444	23%	\$19,025,875	58%	\$10,377,117	\$3,792,742	37%
Bulk Products	\$15,291,059	\$3,901,002	26%	\$10,322,167	68%	\$5,962,351	\$2,482,867	42%
Containers	\$17,205,885	\$4,788,347	28%	\$8,369,131	49%	\$3,402,730	\$1,562,770	46%
Dirt, Rock, Sand, Gravel	\$58,909,550	\$20,381,275	35%	\$40,661,088	69%	\$17,903,143	\$7,672,390	43%
Dry Van	\$46,506,602	\$15,765,633	34%	\$31,884,188	69%	\$11,264,375	\$5,760,091	51%
Equipment Haulers	\$9,487,913	\$2,844,792	30%	\$7,052,564	74%	\$3,544,080	\$621,700	18%
Flatbeds	\$30,184,961	\$9,091,067	30%	\$18,666,178	62%	\$8,009,038	\$3,868,590	48%
Forest Products	\$16,982,996	\$4,221,978	25%	\$8,177,332	48%	\$6,604,019	\$2,711,204	41%
Household Goods - Moving	\$3,350,729	\$890,245	27%	\$890,245	27%	\$781,672	\$277,137	35%
Mobile Home Transit	\$2,730,703	\$624,109	23%	\$1,097,927	40%	\$445,250	\$125,159	28%
Refrigerated	\$25,650,400	\$9,667,115	38%	\$18,410,341	72%	\$6,623,703	\$5,104,775	77%
Refuse, Recyclables, Scrap	\$7,844,247	\$2,095,079	27%	\$4,588,438	58%	\$1,683,966	\$785,551	47%
Vehicle Transporters	\$8,264,195	\$2,161,418	26%	\$2,982,460	36%	\$2,243,450	\$1,260,958	56%
Specialty Auto	\$5,119,527	\$2,316,218	45%	\$3,950,338	77%	\$1,190,255	\$417,990	35%
Other	\$12,274,676	\$2,696,539	22%	\$3,976,181	32%	\$3,649,241	\$1,212,794	33%
Total 2006 - 2018	\$292,624,932	\$89,029,262	30%	\$180,108,319	62%	\$83,684,392	\$37,656,717	45%

WHAT REPORTS WILL BE REQUESTED FROM THE MAJORITY OF CARRIERS FOR ALL PROGRAMS?

In all cases the carrier will be asking you to prove the connection between the results of your book or the industry in total, and your past and/or projected plan for pricing and selection. You must be able to say, “these results came from this pricing/selection approach and our future results will be “X” because of this pricing and selection approach”.

WHAT ARE THE POTENTIAL HAZARDS OF PROVIDING ONLY THE DATA TYPICALLY REQUESTED BY CARRIERS?

- Carriers see hundreds of submissions a year and based on the path of least resistance, will only consider risks with full data and proven results. **They do not have the time to break your data down to find solutions to poor historic results – that's your job!**
- Data from your submission will be handed to an actuarial group who will project the results using standard trending and development tools. They will typically do the valuations using industry data to support the trend and development factors which may or may not be valid in your book.

WHAT ARE THE POTENTIAL HAZARDS OF PROVIDING ONLY THE DATA TYPICALLY REQUESTED BY CARRIERS?

- Many carrier actuaries follow a set of standard practices in loss projection and do not approach your results from the standpoint of problem solving. They are not looking at how to make your book profitable. They are only measuring if it has been profitable. They will attempt to tell you what overall rate change you may need to make the book profitable as currently written, but rarely will they help you find the changes that may be necessary in selection to correct poor historic results without major rate increases.
- You allow the carrier to arrive at their own conclusion and to dictate what rating and selection changes must be made.

HOW CAN YOU IMPROVE YOUR ODDS OF SUCCESS?

- **WHAT ADDITIONAL DATA CAN YOU PROVIDE TO CONTROL THE DECISION MAKING OF THE CARRIER?**
- **WHAT IS THE MATHEMATICAL ARGUMENT FOR WHY THIS PROGRAM WILL BE PROFITABLE?**

ARGUMENTS THAT WILL NOT WORK!

- We have hired underwriters with a long history and experience in this class.
- We work with a limited number of producers who screen submissions and only send us the good business.
- Except for a couple unusual claim's, the book has been profitable.
- We have been writing this book for the past 12 months and while it is a long tail line, our loss ratio is only 10% so we know the book is profitable.
- I have access to several important members of large industry groups. They can tell us who is good and who is not and will allow us great penetration into the best business in the industry.
- ALL WE NEED IS A PRODUCT WITH BROAD COVERAGES AND A LOWER PREMIUM AND WE CAN WRITE A TON OF BUSINESS?

WHAT WILL WORK?

- We are going to accept as a minimum assumption that your proposal already provides answers to the following questions:

HOW LARGE IS THE MARKET AND BY WHAT METHOD WILL YOU PENETRATE THE MARKET TO REACH YOUR PRODUCTION TARGETS?
WEB SITES, DIRECT MAILINGS, ASSOCIATION TIES, ETC?

HOW WILL THE PROGRAM BE ADMINISTERED WITH RESPECT TO QUOTE AND ACCEPTANCE, POLICY ISSUANCE, ENDORSEMENTS
TRANSACTIONS, AUDITS, CANCELLATIONS, NON-RENEWAL NOTICES, FILINGS, ETC, ETC?

HOW WILL PREMIUM BE COLLECTED, RECONCILED, TRANSMITTED?

HOW WILL CLAIMS BE ADJUSTED, BY WHOM AND HOW WILL THE DATA FROM THE CLAIMS BE COLLECTED, RETAINED AND SHARED?

WHAT TYPE OF LOSS CONTROL, SAFETY OR INSPECTION SERVICES/PRACTICES WILL BE EMPLOYED AND DISTRIBUTED AND WHAT IS
THE EXPECTED IMPACT OF THOSE PROCESSES?

WHAT DATA WILL BE COLLECTED, HOW WILL IT BE COLLECTED, WHERE WILL IT BE STORED, HOW CAN ITS QUALITY BE MAINTAINED
AND HOW WILL ACCESS BE GRANTED TO ALL THOSE WHO NEED IT?

DEFINE THE PERMISSIBLE TARGET

- **Premium – Expenses = Permissible Loss Ratio**

EXPENSES INCLUDE AT LEAST:

COST OF CLAIMS (ALE AND PROJECTED ULAE)

COST OF ACQUISITION (COMMISSION PAYABLE TO RETAIL AGENTS, WHOLESALERS, TRADE GROUPS, AND THE GA COMMISSION)

COST FOR LOSS CONTROL (PAID BY CARRIER, GA, OR BY POLICYHOLDERS)

COST OF MARKETING IF NOT INCLUDED IN GA COMMISSION.

CARRIER ADMIN ALLOWANCE (INCLUDES CARRIER PROFIT MARGIN OR CAPITAL COSTS

OUTSIDE FEES TO TRADE GROUPS, MONITORING AGENCIES, DATA PROVIDERS, ETC

EASIEST

- Assumes you are targeting a short tail non-catastrophic class of business such as a direct damage IM line, small limit liability or simply low loss potential lines and you have 3-5 years of validated loss experience with a stable market and stable pricing structure projected forward. Your UW model or math argument is as simple as:

NEED DATA PROVING THE HISTORIC LOSS PER EXPOSURE UNIT TRENDED TO FUTURE.

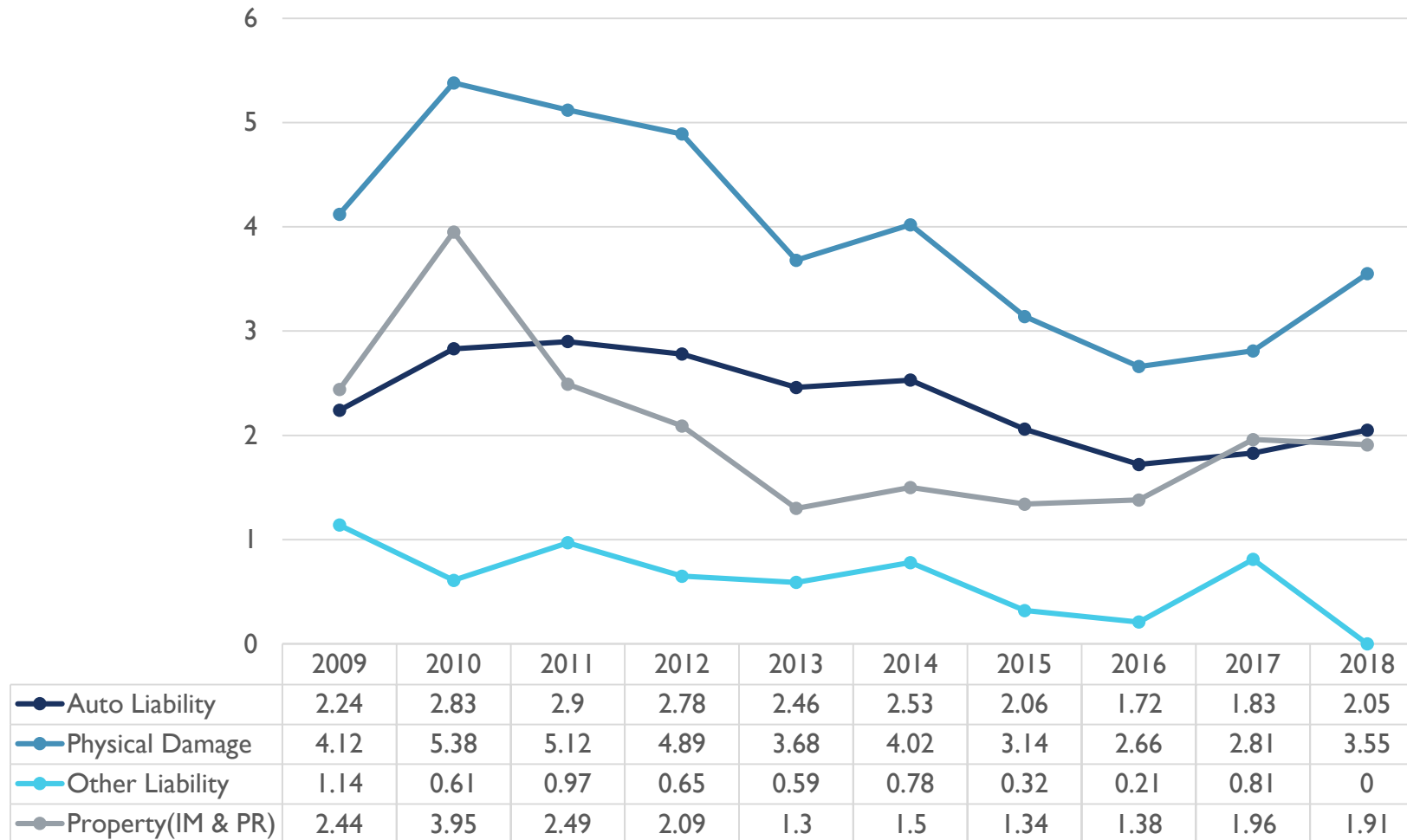
NEED TO DEMONSTRATE A MARKETING PLAN THAT WILL YIELD ENOUGH GROSS PROGRAM PREMIUM TO SUPPORT THE COSTS ASSOCIATED WITH BUILDING THE PROGRAM.

NEED A RATE PLAN THAT WILL YIELD PREMIUM PER UNIT OF EXPOSURE MULTIPLIED BY THE NUMBER OF TOTAL EXPOSURES YOU PROJECT WRITING THAT IS GREATER THAN PROGRAM EXPENSES – PERMISSIBLE LOSS RATIO.

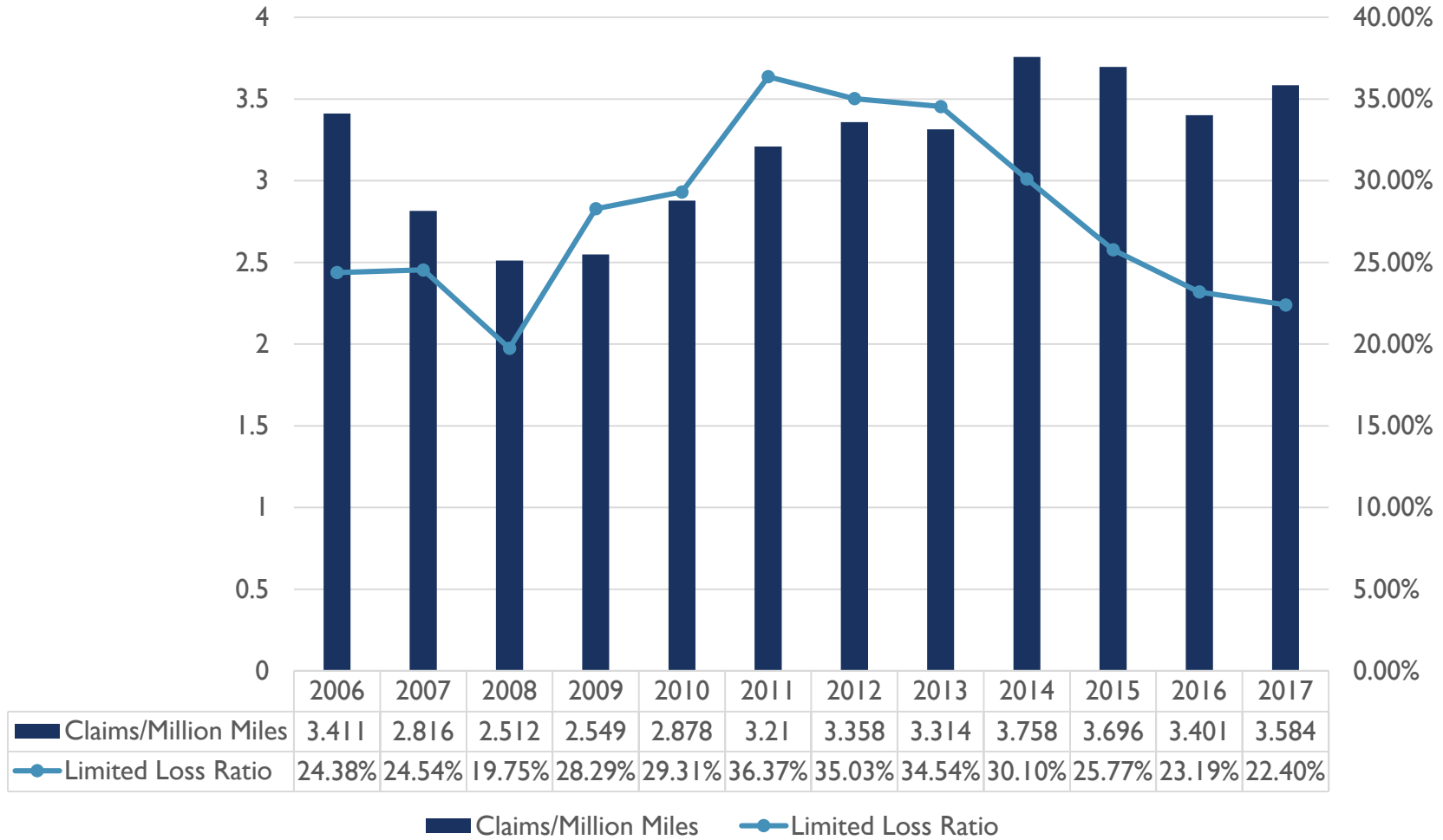
WHEN ITS NOT EASY,WHAT APPROACHES CAN YOU USE?

- **Loss Layering** – Can the key line of business be separated between a Frequency and an Excess or Catastrophe layer of loss? Rate for limited loss and allocate for XS loss.
- **Splinter Classes** – Break down the governing class into sub classes or groups where there are distinct operational differences that yield material differences in generated risk.
- **Analysis of claims to define Cause of Loss and Frequency Patterns** - Purpose of doing this is to find ammunition for building the model. If we write only risks with these characteristics we will avoid the losses that represent “X” percent of the losses in the class and thereby make the book profitable.
- **Unique Approach to Closing Claims at Lower Average Cost Per Claim** - Be able to demonstrate why you will be able to close claims at a lower cost per claim than your competitors
- **Benchmarking of key indicators** – Select key indicators and build a progressive plan that demonstrates what should occur at defined points in time if the rating plan is working as planned.

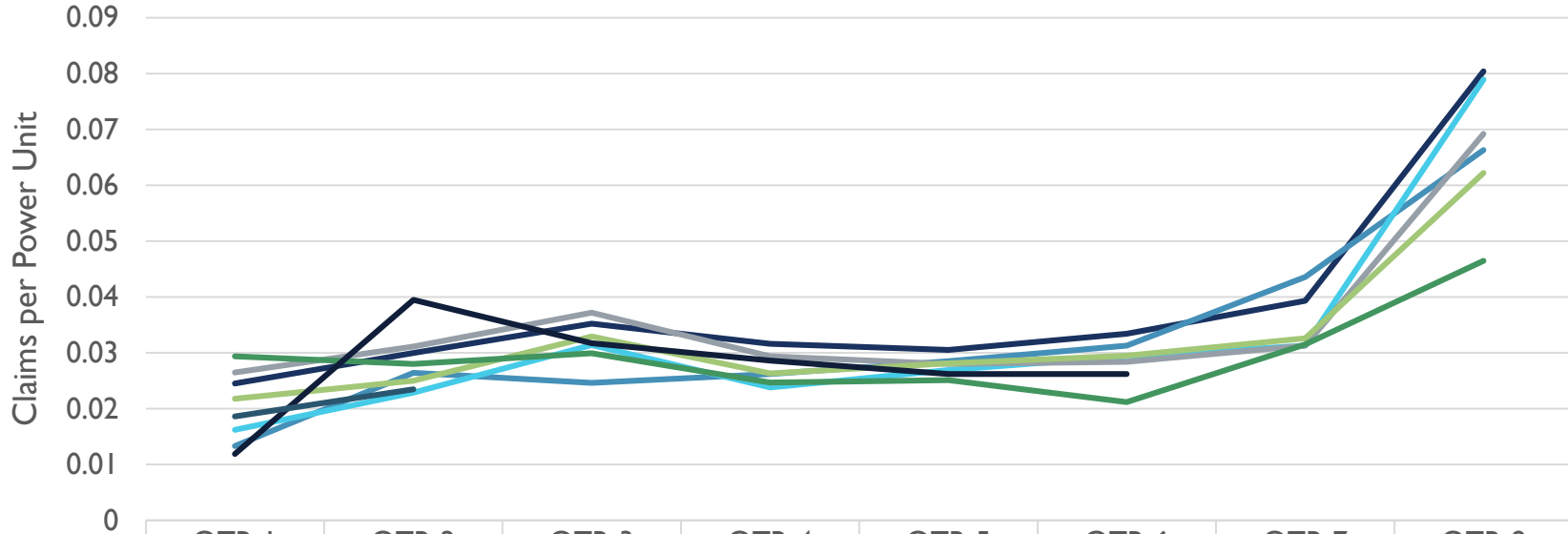
Reported Claims per \$100,000 in Earned Premium by LOB Incurred Losses Greater than Zero



Auto Liability Claims/Million Miles Excluding Late Reported Claims



Auto Liability Claims per Power Unit by Quarter of Exposure



	QTR 1	QTR 2	QTR 3	QTR 4	QTR 5	QTR 6	QTR 7	QTR 8
2011	0.0245	0.03	0.0352	0.0316	0.0305	0.0334	0.0393	0.0804
2012	0.0133	0.0264	0.0246	0.0262	0.0285	0.0313	0.0436	0.0663
2013	0.0162	0.0229	0.0314	0.0238	0.0269	0.0294	0.0313	0.0789
2014	0.0265	0.0311	0.0372	0.0294	0.028	0.0284	0.0313	0.0692
2015	0.0218	0.025	0.0329	0.0263	0.0281	0.0295	0.0326	0.0622
2016	0.0294	0.028	0.0299	0.0247	0.0251	0.0212	0.0315	0.0465
2017	0.0119	0.0395	0.0317	0.0286	0.0262	0.0262		
2018	0.0186	0.0235						

2011 2012 2013 2014 2015 2016 2017 2018

Averaged by Loss Type by Incident

Average Paid									
Policy Year	AL-BI	AL-PD	Med Pay	PIP-Inc Loss	PIP-Med Exp	Pollution-PD	UM/UIM BI	UM/UIM PD	Grand Total
2009	\$ 107,885	\$ 5,465	\$ 2,986		\$ 7,445	\$ 11,926	\$ 44,249		\$ 25,600
2010	\$ 71,665	\$ 5,479	\$ 2,431				\$ 1,204		\$ 16,664
2011	\$ 106,338	\$ 6,320	\$ 6,410	\$ 4,703	\$ 5,112		\$ 59,032		\$ 24,640
2012	\$ 88,499	\$ 6,121	\$ 3,052				\$ 4,052	\$ 1,242	\$ 22,263
2013	\$ 124,324	\$ 5,558	\$ 4,398						\$ 30,057
2014	\$ 67,363	\$ 5,093	\$ 2,500			\$ 2,327	\$ 9,457	\$ 4,144	\$ 17,391
2015	\$ 20,990	\$ 5,852	\$ 3,189		\$ 3,000	\$ 3,220	\$ 2,899		\$ 8,850
2016	\$ 8,049	\$ 6,089	\$ 3,069				\$ 13,185		\$ 6,601
2017	\$ 1,128	\$ 4,347	\$ 1,526	\$ 442	\$ 462		\$ -		\$ 3,653

Automobile Liability - Loss Ratio for Loss Limited to \$100,000

Policy Year	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
1st QTR	17.9%	21.8%	18.2%	7.8%	14.8%	16.3%	10.4%	17.6%	15.3%	16.3%	10.5%	16.4%	17.3%	21.8%	30.1%	18.5%
2nd QTR	21.5%	20.3%	27.8%	9.9%	17.2%	17.3%	14.1%	17.4%	24.2%	25.9%	38.7%	20.7%	21.3%	15.9%	26.1%	23.5%
3rd QTR	23.5%	22.3%	24.0%	14.1%	20.2%	21.9%	16.6%	21.3%	23.2%	30.1%	36.5%	27.2%	25.0%	21.1%	19.1%	23.9%
4th QTR	22.9%	24.2%	24.6%	17.7%	22.8%	25.3%	18.3%	24.5%	25.1%	30.8%	37.2%	26.0%	28.1%	21.7%	24.1%	22.4%
5th QTR	23.0%	25.8%	26.2%	18.2%	21.5%	22.9%	17.7%	23.4%	28.2%	30.3%	31.9%	27.0%	27.8%	26.8%	24.0%	20.5%
6th QTR	23.4%	26.4%	25.9%	19.5%	21.1%	22.9%	17.2%	26.0%	31.7%	32.1%	32.3%	30.0%	25.2%	27.0%	23.1%	23.6%

Of Policies Renewing in 2017 - Average AL per Power Unit

	2016 # PU	2016 Ave PU	2017 # PU	2017 Ave PU	% Change
Jan	460	\$ 3,174.95	468	\$ 3,389.82	6.8%
Feb	367	\$ 3,617.47	387	\$ 3,833.88	6.0%
Mar	420	\$ 3,193.53	425	\$ 3,401.31	6.5%
Apr	449	\$ 3,184.10	464	\$ 3,304.28	3.8%
May	410	\$ 3,451.00	419	\$ 3,729.00	8.1%
Jun	485	\$ 3,466.88	478	\$ 3,684.46	6.3%