2020 Fall National Meeting
Virtual Meeting

PROPERTY AND CASUALTY INSURANCE (C) COMMITTEE
Tuesday, December 8, 2020
2:30 – 3:30 p.m. ET / 1:30 – 2:30 p.m. CT / 12:30 – 1:30 p.m. MT / 11:30 a.m. – 12:30 p.m. PT

ROLL CALL

Vicki Schmidt, Chair Kansas James J. Donelon Louisiana
Mike Chaney, Vice Chair Mississippi Kathleen A. Birrane Maryland
Jim L. Ridling Alabama Tynesia Dorsey Oklahoma
Ricardo Lara California Glen Mulready Ohio
Andrew N. Mais Connecticut Larry D. Deiter South Dakota
David Altmairer Florida Mike Kreidler Washington
Colin M. Hayashida Hawaii James A. Dodrill West Virginia

NAIC Support Staff: Aaron Brandenburg/Jennifer Gardner

AGENDA

1. Consider Adoption of its Task Force and Working Group Reports Attachment One
   — Commissioner Vicki Schmidt (KS)
   a. Casualty Actuarial and Statistical (C) Task Force—Commissioner Grace Arnold (MN)
   b. Surplus Lines (C) Task Force—Commissioner James J. Donelon (LA)
   c. Title Insurance (C) Task Force—Commissioner Michael S. Pieciak (VT)
   d. Workers’ Compensation (C) Task Force—Commissioner James J. Donelon and Warren Byrd (LA)
   e. Cannabis Insurance (C) Working Group—Commissioner Ricardo Lara (CA)
   f. Catastrophe Insurance (C) Working Group—Commissioner Mike Chaney (MS)
   g. Climate Risk and Resilience (C) Working Group—Commissioner Mike Kreidler (WA)
   h. Lender-Placed Insurance Model Act (C) Working Group—Commissioner David Altmairer (FL)
   i. Pet Insurance (C) Working Group—Don Beatty (VA)
   j. Terrorism Insurance Implementation (C) Working Group—Martha Lees (NY)
   k. Transparency and Readability of Consumer Information (C) Working Group—George Bradner (CT)

2. Consider Adoption of the Real Property Lender-Placed Insurance Model Act Attachment Two
   — Commissioner David Altmairer (FL)

3. Consider Adoption of the Regulatory Review of Predictive Models White Paper Attachment Three
   — Phil Vigliaturo (MN)

4. Consider Adoption of 2021 Proposed Charges—Commissioner Vicki Schmidt (KS) Attachment Four

5. Consider Adoption of Model Law Request Related to Non-admitted Insurance Model Act (#870)—Commissioner James J. Donelon (LA) Attachment Five

6. Hear Report on Private Flood Insurance Data Call Results—Aaron Brandenburg (NAIC)

7. Discuss Any Other Matters Brought Before the Committee—Commissioner Vicki Schmidt (KS)

8. Adjournment
Virtual Meeting
(in lieu of meeting at 2020 Fall National Meeting)

CASUALTY ACTUARIAL AND STATISTICAL (C) TASK FORCE
Tuesday, November 10, 2020
2:00 – 3:00 p.m. ET / 1:00 – 2:00 p.m. CT / 12:00 – 1:00 p.m. MT / 11:00 a.m. – 12:00 p.m. PT

Summary Report

The Casualty Actuarial and Statistical (C) Task Force met Nov. 10, 2020. During this meeting, the Task Force:

1. Adopted its Summer National Meeting minutes.

2. Adopted its Oct. 26, Oct. 13 and Sept. 16 minutes, which included the following action:
   a. Adopted the white paper, Regulatory Review of Rate Models.
   b. Adopted its 2021 proposed charges.
   c. Adopted a comment letter on U.S. Qualification Standards. The comment letter was sent to the American Academy of Actuaries’ (Academy’s) Committee on Qualifications prior to its Oct. 31 deadline.

3. Adopted the report of the Actuarial Opinion (C) Working Group, which met Oct. 30, Oct. 22, Sept. 24 and Sept. 10, and took the following action:


7. Discussed the Actuarial Standards Board’s (ASB’s) exposure draft of Actuarial Standard of Practice (ASOP) No. 38—Catastrophe Modeling (for All Practice Areas) and the third exposure draft of a proposed ASOP Setting Assumptions. The Task Force decided not to comment as a group.

8. Heard a presentation from the Academy regarding the activities of its Committee on Property and Liability Financial Reporting (COPLFR) and its Casualty Practice Council.

9. Heard reports from the CAS and the SOA on property/casualty (P/C) actuarial research.

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Meeting Summary Report

The Surplus Lines (C) Task Force met Nov. 18, 2020. During this meeting, the Task Force:

1. Adopted its Summer National Meeting minutes.

2. Adopted the report of the Surplus Lines (C) Working Group, which met Sept. 29 in regulator-to-regulator session pursuant to paragraph 3 (specific companies, entities or individuals) of the NAIC Policy Statement on Open Meetings and once during an open session. During the meeting, the Working Group approved four applications for the NAIC Quarterly Listing of Alien Insurers.


4. Discussed a memorandum on revisions to the NAIC Trust Agreement for Alien Excess or Surplus Lines Insurers and referred the issue to the Surplus Lines (C) Working Group to develop and propose updates to the trust agreement.
Meeting Summary Report

The Title Insurance (C) Task Force conducted an e-vote that concluded Nov. 24, 2020. During this e-vote, the Task Force:

1. Adopted its 2019 Fall National Meeting and 2020 Summer National Meeting minutes.

The Title Insurance (C) Task Force met Oct. 21, 2020. During this meeting, the Task Force:

1. Adopted its 2021 proposed charges. The proposed charges include adding a charge to its existing charges to explore issues and solutions related to the COVID-19 pandemic. The proposed charges also include elevating the existing charge to revise the Title Insurance Consumer Shopping Tool to include fraud topics, such as closing protection letters and wire fraud, to an essential work item for 2021.
Virtual Meeting
(in lieu of meeting at the 2020 Fall National Meeting)

WORKERS’ COMPENSATION (C) TASK FORCE
November 16, 2020

Meeting Summary Report

The Workers’ Compensation (C) Task Force met Nov. 16, 2020. During this meeting, the Task Force:

1. Adopted its Oct. 26 and Summer National Meeting Minutes which included the following action:
   a. Adopted its 2021 proposed charges.

2. Heard a presentation on workers’ compensation treatment guidelines and formularies. Information presented included:
   1) what qualifies as an evidence-based guideline and the criteria used to determine what is evidence-based; 2) reasons why a formulary that includes a patient’s condition and phase of care is the most medically responsible approach; and 3) the similarities and differences between the American College of Occupational and Environmental Medicine (ACOEM) guidelines and the Official Disability Guidelines (ODG).
The Catastrophe Insurance (C) Working Group met Nov. 17, 2020. During this meeting, the Working Group:

1. Heard federal updates, which included information regarding:
   a. A one-year extension of the National Flood Insurance Program (NFIP).
   b. The Nov. 10 U.S. Department of Housing and Urban Development’s (HUD’s) proposed amendment to the Federal Housing Administration (FHA) regulations that would allow lenders to accept private flood insurance policies on FHA-insured properties located in Special Flood Hazard Areas (SFHAs).

2. Discussed hurricane response during this year’s hurricane season. States reporting included Alabama, Louisiana and Mississippi. Each of the three states experienced more than one named storm this year. Alabama has been struggling with multiple deductibles regarding the storms. Louisiana and Mississippi shared information regarding how they deal with the multiple deductible issues. Louisiana experienced three hurricanes involving flooding this year. Mississippi experienced more wind damage than expected this year along its coast, as well as damage from storm surge.

3. Heard a summary of the NAIC/Federal Emergency Management Agency (FEMA) regional roundtables that have been held with various regions. Events have been held with FEMA Region 7 states and FEMA Region 4 states. The NAIC and FEMA will hold another event in February 2021 with FEMA Regions 8, 9 and 10. These roundtables allow state insurance regulators and FEMA to make recommendations and discuss solutions related to insuring for catastrophe risk.
The Lender-Placed Insurance Model Act (C) Working Group of the Property and Casualty Insurance (C) Committee conducted an e-vote that concluded Dec. 2, 2020. The following Working Group members participated: Elizabeth Kelleher Dwyer, Vice Chair (RI); Alex Romero (AK); Ken Allen (CA); Sharon Shipp (DC); Ron Henderson (LA); Mike Chaney (MS); Cuc Nguyen (OK); Mark Worman (TX); and Rebecca Nichols (VA).

1. **Adopted its Nov. 13 Minutes**

The Working Group conducted an e-vote to consider adoption of its Nov. 13 minutes (Attachment __). The motion passed with a majority of the Working Group members voting in favor of adopting the minutes.

Having no further business, the Lender-Placed Insurance Model Act (C) Working Group adjourned.

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Lender-Placed Insurance Model Act (C) Working Group
Virtual Meeting
November 13, 2020

The Lender-Placed Insurance Model Act (C) Working Group of the Property and Casualty Insurance (C) Committee met Nov. 13, 2020. The following Working Group members participated: David Altmaier, Chair (FL); Elizabeth Kelleher Dwyer, Vice Chair, and Matt Gendron (RI); Alex Romero (AK); Ken Allen and Lynne Wehmueller (CA); Sharon Shipp (DC); Warren Byrd and Ron Henderson (LA); Mike Chaney and David Browning (MS); Mike Andring (ND); Cuc Nguyen (OK); J’ne Byckovski and Mark Worman (TX); and Rebecca Nichols (VA).

1. **Adopted its Oct. 19 Minutes**

The Working Group met Oct. 19 and took the following action: 1) heard from commenters on the most recent version of the proposed Real Property Lender-Placed Insurance Model Act; and 2) exposed the model for a 15-day public comment period ending Nov. 3.

Birny Birnbaum (Center for Economic Justice—CEJ) recommended revising a sentence in the minutes to read: “He said, when tracking expenses are included in LPI rates, these expenses are not charged to the entire portfolio but to only 1,000 or 2,000 borrowers out of 100,000 borrowers.” The Working Group agreed to this change.

Mr. Birnbaum also suggested that a sentence be revised to read: “Mr. Birnbaum said there is no evidence of that assertion and CEJ has provided evidence to the contrary.” The Working Group did not agree to this change.

Mr. Byrd made a motion, seconded by Ms. Nichols, to adopt the Working Group’s Oct. 19 minutes (Attachment 1). The motion passed unanimously.

2. **Discussed Comments Received on the Real Property Lender-Placed Insurance Model Act**

Commissioner Altmaier said comments were received from a joint industry group, the CEJ and the National Consumer Law Center (NCLC). He said Superintendent Dwyer has made changes that may appease interested parties and said that version of the model was distributed.

Superintendent Dwyer discussed the changes, including:

- Adding manufactured and mobile homes to the Scope.
- Revising 3H from lender-placed insurance (LPI) “is purchased unilaterally by the lender or servicer …” to “may be purchased unilaterally by the lender or servicer …”
- Adding a new definition – “Master lender-placed insurance policy” means a group policy issued to a lender or servicer providing coverage for all loans in the lender or servicer’s loan portfolio as needed.
- Adding a new definition – “Person” means an individual or entity.
- Adding the following to Section 5A(2): “The insurer shall inquire of the insured, at least once, as to the LKCA and if it is not able to obtain the LKCA from the insured or in another manner may proceed as set forth below.”
- Making non-substantive changes to Section 6A to make it read more clearly.
- Changing “will” to “shall” in Section 6B.
- Removing references to implementation expenses in Section 6F.
- Adding reference to the Electronic Transaction Act in Section 8.
- Adding Section 9B referencing review of rates. This was subsequently revised to read: “The Commissioner shall review the rates to determine whether the rates are excessive, inadequate or unfairly discriminatory. This analysis shall include a determination as to whether expenses included by the insurer in the rate are appropriate.”
- Making edits to Section 9F adding reference to insurers “with at least $100,000 in direct written premium for lender-placed insurance in this state during the prior calendar year.”

Commissioner Chaney inquired about Section 9B referring to rate review. Superintendent Dwyer said a state could remove this section if it did not want to review rates.
Mr. Allen said many of these changes address concerns California had. He said he would prefer the model require dual interest coverage and add a section on disclosures. He also said the loss ratio threshold of 35% might be too low and that a penalty section should be in the model.

Mr. Birnbaum said he has four suggestions to revise the model. He recommended the definition of “implementation expenses” be removed. The Working Group agreed with this suggestion. He said Section 9B should read “shall” instead of “may,” and he suggested revisions to make the language clearer. He suggested a drafting note after Section 9G that states: “The 35% trigger for re-filing rates is not intended to be nor should be interpreted as a loss ratio standard for determining whether rates are excessive or inadequate. The loss ratio standard in this section is solely directed to prompt a re-filing of rates by the insurer.” Commissioner Altmaier said Florida would interpret Section 9G in this way. The Working Group agreed to add the drafting note.

Chrys Lemon (McIntyre & Lemon) said he supports Superintendent Dwyer’s changes. Eddie Rodriguez (Assurant) suggested Section 9B should read: “The Commissioner shall review the rates to determine whether the rates are excessive, inadequate or unfairly discriminatory. This analysis shall include a determination as to whether expenses included by the insurer in the rate are appropriate.” The Working Group agreed to this language.

3.  **Adopted the Revised Real Property Lender-Placed Insurance Model Act**

Commissioner Altmaier said states held hearings on LPI in 2012, and a lot of effort has since been put into settlements and the Real Property Lender-Placed Insurance Model Act.

Superintendent Dwyer made a motion, seconded by Commissioner Chaney, to adopt the Real Property Lender-Placed Insurance Model Act with revisions made during the meeting. The motion passed unanimously.

Having no further business, the Lender-Placed Insurance (C) Working Group adjourned.
The Lender-Placed Insurance Model Act (C) Working Group of the Property and Casualty Insurance (C) Committee met Oct. 19, 2020. The following Working Group members participated: David Altmaier, Chair (FL); Elizabeth Kelleher Dwyer, Vice Chair (RI); Eric DeMesa and Tina Zhao (CA); Angela King (DC); Warren Byrd (LA); Mike Chaney (MS); Mike Andring (ND); Mark Worman (TX); Rebecca Nichols (VA).

1. Discussed Comments on the Draft Model

Commissioner Altmaier noted that the Working Group has not met in quite some time but said he would like to review comments received on the draft model related to lender-placed homeowners insurance and possibly consider the model for adoption to present to the Property and Casualty Insurance (C) Committee at the Fall National Meeting.

Birny Birnbaum (Center for Economic Justice—CEJ) said there are two main issues he would like to discuss. He said there is a need for a prohibition on the lender-servicer having a financial interest in the placement of lender-placed insurance (LPI) other than the protection of the property serving as collateral for the mortgage. He said reverse competition exists in this market, and insurers compete for business by providing considerations to the lender-servicer, unrelated to insurance. He said this drives up the cost of insurance. He said there were kickbacks following the 2008 financial crisis when borrowers were overcharged, and money went to lender-servicers instead of protecting property serving as collateral. Mr. Birnbaum said LPI insurers continue to seek kickbacks.

Mr. Birnbaum said insurance tracking is a responsibility of the lender-servicer and not an appropriate expense to include in LPI rates. He said tracking involves setting up a database on the required insurance, gathering information from insurers and borrowers of required insurance, using the database to update the system, and sending notices to borrowers. He said these lender-servicer responsibilities apply to every loan in the portfolio. The lender-servicer is compensated through loan interest fees or servicer fees. He said federal regulations have been issued by the Consumer Financial Protection Bureau (CFPB), and Fannie Mae and Freddie Mac have servicer guidelines having to do with tracking activities. Mr. Birnbaum said a portfolio-wide expense is the responsibility of the lender-servicer. He said it is unfair to charge the small percentage of borrowers for tracking costs related to all borrowers. If every borrower maintained the required insurance and there were no claims, the servicer would still be required to perform the tracking function. He said insurers do not need individual tracking data to manage their exposure. He said the cancellation rate is high with LPI, and insurers underwrite by evaluating characteristics of the loan portfolio and then estimate a placement rate for LPI. He said Fannie guidelines specify what servicers must do in verifying that the insurer coverage meets Fannie requirements. He said individual tracking information is not required to underwrite or price LPI. New York has prohibited the inclusion of tracking expenses in LPI rates. However, LPI insurers continue to operate in New York but charge servicers amounts for tracking that better reflect the cost of tracking and exclude those expenses from LPI rates. Mr. Birnbaum stated the prohibition of tracking expenses from LPI rates does not limit the ability of state insurance regulators to evaluate LPI rates. He also noted a second issue of the model requiring dual interest coverage. He said consumers should have rights in an insurance claim, and single interest coverage excludes such rights for consumers.

Commissioner Chaney asked for additional information about dual interest coverage. Mr. Birnbaum said single interest coverage is typically found in auto insurance or collateral protection products. He said it is typically blanket coverage for which there is no separate charge to borrowers, so the lender has the only interest. He said there are no rights regarding a claim for the borrower, but in LPI, it is the borrower’s home, so an individual having single interest coverage with damage to the property has no rights to challenge the lender if the borrower wants to make a claim. He said with dual interest coverage, the borrower has some rights under the policy. Commissioner Chaney said in the 2012 hearings, some people abandoned their homes, and the homes were foreclosed. Mr. Birnbaum said the majority of policies are dual coverage in homeowners. He said the bank already owns foreclosed homes, and it is a real-estate owned (REO) property with REO insurance at that point. He said making a requirement for dual interest does not reduce the lender’s rights, but it does give borrowers rights in the event the borrower wants to make a claim on the insurance they have been charged for.

Superintendent Dwyer asked if the industry believes the Fannie Mae and Freddie Mac guidelines and CFPB Regulation X do not apply. Chrys Lemon (McIntyre & Lemon) said Regulation X and Fannie Mae and Freddie Mac guidelines focus on lenders
Mr. Lemon said multistate agreements were entered into five years ago, and most states have entered into those agreements that reflect the current regulatory setting. He said the draft model reflects the settlements. He said what the CEJ said about insurance tracking is not accurate, and it is important for states to control rate-making authority and process. He said he is in favor of the Working Group voting on the draft.

Commissioner Chaney asked what it costs to track coverage. Mr. Birnbaum said there is a range of cost for insurance tracking between 40 cents and 50 cents to 80 cents and 90 cents per loan per month. He said this is around $10 per loan per year, so a portfolio with 100,000 loans would have $1 million in tracking expenses. He said, when tracking expenses are included in LPI rates, these expenses are not charged to the entire portfolio but to only 1,000 or 2,000 borrowers out of 100,000 borrowers. Commissioner Chaney asked if the expense is so low per loan, how do individuals have trouble paying it. Mr. Birnbaum said it is a lot, and that is why lenders are fighting to maintain kickbacks. He said if tracking costs are allowed to be in the LPI premium and then the servicer passes the charge to the borrower, then it is a kickback because the servicer is getting free or low-cost tracking services and is being paid again by the LPI insurer, and this is being paid for by the low percentage of borrowers being charged for the LPI insurance. Mr. Lemon said the servicer is not compensated. Mr. Birnbaum said there is no evidence of that assertion.

Mr. DeMesa said California has an issue with tracking expenses and has submitted a redline version of a modified model.

Commissioner Chaney said he is going to move to adopt the model but will wait so the industry can respond to Superintendent Dwyer’s inquiry. Superintendent Dwyer said she will likely vote against the model. Commissioner Altmaier said he believes all policies are dual interest in Florida. He said he has talked to his actuarial staff about tracking expenses, and he does not believe it would be appropriate to prohibit tracking expenses in Florida as the state wishes to retain the ability to review expenses in rate filings and judge whether expenses are appropriate to pass to consumers. He noted that the absence of a prohibition is not permission as the state insurance regulator might find the expense inappropriate and reject it.

Commissioner Altmaier said the draft model would be exposed for a 15-day public comment period ending Nov. 3. He said the Working Group will meet in November to consider adoption of the model.

Having no further business, the Lender-Placed Insurance (C) Working Group adjourned.

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Pet Insurance (C) Working Group
E-Vote
December 2, 2020

The Pet Insurance (C) Working Group of the Property and Casualty Insurance (C) Committee conducted an e-vote that concluded Dec. 2, 2020. The following Working Group members participated: Don Beatty, Chair (VA); Kendra Zoller, Vice Chair (CA); Katie Hegland (AK); George Bradner (CT); Shirley Corbin (MD); LeAnn Cox (MO); Michael McKenney (PA); Kathy Stajduhar (UT); and David Forte (WA).

1. **Adopted its Nov. 24 Minutes**

The Working Group conducted an e-vote to consider adoption of its Nov. 24 minutes (Attachment __). The motion passed with a majority of the Working Group members voting in favor of adopting the minutes.

Having no further business, the Pet Insurance (C) Working Group adjourned.

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The Pet Insurance (C) Working Group of the Property and Casualty Insurance (C) Committee met Nov. 24, 2020. The following Working Group members participated: Don Beatty, Chair, and Phyllis Oates (VA); Kendra Zoller, Vice Chair (CA); Katie Hegland (AK); Kristin Fabian (CT); Angela King (DC); Warren Byrd (LA); Shirley Corbin (MD); Michael McKenney (PA); Elizabeth Kelleher Dwyer and Matt Gendron (RI); Kathy Stajduhar (UT); Jamie Gile (VT); and David Forte (WA).

1. **Adopted its Nov. 6 Minutes**

The Working Group met Nov. 6 to discuss Section 7 and Section 8 of the proposed Pet Insurance Model Act.

Mr. McKenney made a motion, seconded by Mr. Forte, to adopt the Working Group’s Nov. 6 minutes (Attachment 1). The motion passed unanimously.

2. **Discussed Section 7, Section 8 and Section 9 of the Draft Pet Insurance Model Law**

Mr. Beatty said the Working Group started discussing Section 7 of the draft model law and has since received written comments from the North American Pet Health Insurance Association (NAPHIA). Kate Jensen (NAPHIA) said some insurers have offered policies only covering illness for a certain time period. She said Section 7 would require coverage for all preexisting conditions. This would increase the cost of the policy and, therefore, the price for many consumers, leading to fewer consumers purchasing the product. She said the model should rely on clear disclosures to help consumers understand what they are purchasing. She said the industry wants the policy to be clear.

Ms. Oates said she has concerns about requiring a pet owner to be the one to detect clinical signs. She said if there are preexisting condition exclusions, it should be based on documented conditions for which the preexisting condition has been identified.

Jules Benson (Nationwide) said he agrees with NAPHIA that Section 7 should be removed.

Mr. McKenney asked why preexisting conditions should be covered. He said insurance is not meant to be available for a person to purchase after a known event. He said preexisting conditions should be addressed in the Disclosures section instead of Section 7A.

Mr. Forte said he does not want to place the burden on the insured to know a pet’s condition. Mr. Benson said relying on a veterinarian may not be broad enough to avoid covering all preexisting conditions. He said if someone knows of a condition, even without documentation, that should count as a preexisting condition. He said he understands the concern about clinical signs. The industry does not want surprises for consumers, but it wants to avoid adverse selection.

Brenden Bridgeland (Center for Insurance Research—CIR) said the current language in Section 7A is unclear when it says: “A pet insurer shall not exclude coverage on the basis of a preexisting condition provision for a period beyond six months following the insured’s effective date of coverage.” He said life and health insurance policies usually reference the application that asks for medical conditions. He said he believes Section 7A is needed instead of language on clinical signs. He said if there is no diagnosis, then the condition should be covered.

Lisa Brown (American Property Casualty Insurance Association—APCIA) said Section 7A is confusing, narrow and prescriptive. She said the APCIA would prefer preexisting conditions be handled through consumer disclosures as proposed by Mr. McKenney.

Jack Chaskey (Westmont Associates) said the six-month language in Section 7A could drive prices up. He said he agrees that the section should be eliminated. Mr. Forte asked if there are a lot of denial of claims due to preexisting conditions within the first six months. Mr. Chaskey said preexisting conditions are identified at the time of the application and then excluded.

Mr. McKenney said if coverage is required for preexisting conditions, it may become an underwriting standard to exclude certain older pets. Mr. Bryd asked if a veterinarian conducts an exam before a policy is issued. Ms. Jenson said product offerings differ. For some, a customer might pay for an upfront veterinarian visit, but many do not. He said there should be flexibility
with policies. Mr. Byrd asked if there is no exam, could there be a dispute over what the pet owner should have known. Ms. Jenson said the carrier has the burden of proof to determine a preexisting condition, and this is why a clear definition is needed. She said the definition offered in the model is close to what is in California law. Mr. Byrd said he worries about what an owner should have known if a veterinarian says there is a condition that should be exhibiting symptoms.

Ms. Zoller said California created definitions to align with industry practices, and she said she is not aware of complaints. She said California would want the 30-day free look language in the model if Section 7A is eliminated. She said California actuaries indicate the free look cost is small.

Mr. Forte asked how to address the situation where a person does not know of a preexisting condition, but then a veterinarian discovers it. Mr. McKenney said this is a concern and why the definition is important. Mr. Gendron asked if it is fair if a certain breed of dog is given a higher rating and also has conditions excluded. Mr. Benson said a rating is based on populations and not typically adjusted based on a single condition.

Mr. McKenney made a motion, seconded by Ms. Stajduhar, to change the language in Section 7A to read: “A) A pet insurer may issue policies that provide coverage and may issue policies that exclude coverage on the basis of one or more preexisting conditions with appropriate disclosure to the consumer.”

Ms. Fabian asked if the “and” should be “or.” Mr. McKenney said his language allows for a single pet insurer to include or exclude coverage for preexisting conditions. Ms. Zoller said this language is already in the definitions and is not needed in the section. A voice vote was held, with all states voting in favor except for California, which voted against.

Mr. Bridgeland said the onus on proof of a preexisting condition should not be on the consumer. Mr. Beatty said the definition of “preexisting condition” would be revisited.

Ms. Jenson said NAPHIA prefers to eliminate Section 7B because it is confusing and not intuitive. She said the language is too prescriptive concerning waiting periods as products differ. She said this should be handled through upfront disclosures. Mr. Benson said waiting periods are helpful because some diseases cannot be assessed until a veterinarian conducts an exam.

Mr. Gendron asked if some waiting periods are more than 30 days. Ms. Jenson said waiting periods can vary within a policy. An accident would not have a long waiting period, but certain diseases could have a waiting period up to six months. Different policies also have different waiting periods.

Mr. Gendron said if a disease that shows up after policy inception but before the end of a 6-month waiting period would be excluded. Ms. Jenson said the waiting period applies and is trying to address adverse selection. Mr. Benson said insurers are trying to offer a range of policies and control their prices. He said if a condition is identified in the waiting period, then it becomes a preexisting condition. Mr. Gendron said this needs clarification within the model. Mr. Benson said the consumer has an option of having a veterinarian examine the pet to get the waiting period removed.

Mr. McKenney said it is important to retain Section 7B and that there should be a standard for waiting periods. Mr. Beatty asked that interested parties offer comments and propose a solution to the issues found in Section 7B.

The Working Group agreed to leave Section 9 as is.

Having no further business, the Pet Insurance (C) Working Group adjourned.
The Pet Insurance (C) Working Group of the Property and Casualty Insurance (C) Committee met Nov. 6, 2020. The following Working Group members participated: Don Beatty, Chair, Jessica Baggarley and Phyllis Oates (VA); Kendra Zoller, Vice Chair, and Risa Salat-Kolm (CA); Katie Hegland (AK); Kristin Fabian (CT); Warren Byrd (LA); Rasheda Chairs and Shirley Corbin (MD); LeAnn Cox and Carrie Couch (MO); Michael McKenney (PA); Matt Gendron (RI); and John Haworth and Eric Slavich (WA). Also participating were: Vanessa Darrah (AZ); Michele MacKenzie (ID); Brenda Johnson, Heather Droge, and Tate Flott (KS); Tracy Burns (NE); and Larry D. Dieter and Maggie Dell (SD).

1. **Adopted its Oct. 21 Minutes**

The Working Group met Oct. 21 to discuss Section 6 of the proposed Pet Insurance Model Act.

Mr. Byrd made a motion, seconded by Mr. Gendron, to adopt the Working Group’s Oct. 21 minutes (Attachment --). The motion passed unanimously.

2. **Discussed Section 7 and Section 8 of the Draft Pet Insurance Model Law**

Mr. Beatty said the group would discuss comments received from the North American Pet Health Insurance Association (NAPHIA) on Section 7—Preexisting Conditions and Section 8—Reimbursement Benefits. Mr. Gendron said the use of the term “clinical signs” in the proposed definition of preexisting condition would not be clear and obvious for consumers. Jules Benson (Nationwide) said the use of “clinical signs” is about how a clinician views the signs of illness presented by the pet. Mr. Gendron said he would be concerned with the use of this term for consumers who would not have the same training as a clinician to understand the meaning of “clinical signs.” Mr. Haworth said the proposed definition of clinical signs is too broad in scope regarding the inclusion of observed signs from any individual, not just clinicians. Mr. Byrd agreed that the phrase “observed by any individual” is too broad. Mr. Benson said the way that veterinarians put together the picture of clinical health is not just what is seen in the exam room, but also the health history that comes from owners or other individuals such as a pet groomer who found signs of illness. Mr. Byrd asked if those observations would be included in the pet’s medical records, which would be covered in the definition by the phrase “recorded in the pet’s medical record.” Mr. Haworth said he is concerned that the current language of the “clinical sign” definition may allow certain signs of illness to be misclassified as a preexisting condition and, therefore, not be covered. Mr. Benson said the burden of proof for relating a clinical sign to a preexisting condition is already on the insurer.

Mr. McKenney said there needs to be clarification on inception date and effective date in the definition of preexisting conditions. Mr. Benson said that there are some policies that are treated as single-year policies and that the coverage for a condition does not roll over if a new policy is purchased. Mr. McKenney said the model law should be establishing uniformity with the definition of “preexisting condition” and how policies treat coverage for those conditions. Kate Jensen (NAPHIA) said that even with the different types of policies, the term “effective date” should still be used within this definition. Ms. Corbin said there would not be the same guidelines for preexisting conditions on new business and renewal business. Mr. Beatty said if the subsequent policies would not cover a condition found during the first policy term, then the insurer would need to send out a non-renewal notice because the policy is not being renewed on the same terms and conditions. Lisa Brown (American Property Casualty Insurance Association—APCIA) said it may be that those policies are written as non-renewable, such as a limited duration pet policy. Ms. MacKenzie said if policies are going to be written on a non-renewable basis, then it needs to be printed on the first page of the policy. Ms. Jensen said she would like time to consult with NAPHIA members about the types of policies currently being written to bring more clarity to this discussion.

Mr. Gendron asked if a consumer has creditable coverage and chooses to switch to a new insurance company, how would preexisting conditions be treated. Ms. Jensen said many of these issues would appear in the disclosures and the rating information. She said limiting what could be covered under pet insurance policies, inserting time frames for coverage or requiring certain coverages would constrain innovation and drive up the cost of coverage. Mr. Beatty said state insurance regulators do not want a scenario where people can game the system. However, he said most complaints received from consumers are because coverage was denied even though the consumer had no way of knowing the pet had a preexisting condition. He asked if there were some agreeable time frame that would eliminate this issue. Ms. Jensen said this issue is why...
NAPHIA believes waiting periods are important in pet insurance and that the model should not be restrictive with its time frames relating to preexisting conditions. She said it is important to have a solid definition of “preexisting condition” within the model. Ms. MacKenzie said some policies have eligibility requirements that require exams prior to a pet being eligible for coverage. She said she has also seen language that states a preexisting condition in a prior policy would be considered preexisting in a policy with a new insurer. Ms. Jensen said that while eligibility exams are one way to determine coverage, they can be a cost barrier for consumers. She said NAPHIA wants to preserve flexibility in the market and that mandating time frames and eligibility requirements would prevent insurers from offering a range of pet insurance products.

Ms. Jensen said NAPHIA’s overall position is that Section 7 and Section 8 are not needed in this model law. She said there is confusion about what is required in Section 8 of the model and what is already required in Section 4—Disclosures. She said the model should refrain from including overly prescriptive policy provisions that have impact premiums and availability of coverage. She said the policy should inform consumers upfront about exactly what they are buying but still allow the industry to offer a range of products and features with their policies.

Ms. MacKenzie said Idaho has received a pet insurance filing that has reference to in-network and out-of-network providers. She said she asked for a schedule of benefits and a provider directory. Mr. Byrd said he has not seen those types of policies yet. Mr. Beatty said the Working Group should get more information on if the industry is moving to network providers and balance billing. Mr. Byrd agreed that more information is needed to see if the industry is shifting to those types of policies and if so, he said it should be addressed in the model. Ms. Jensen said if these types of policies exist currently, it would be very rare. Jack Chaskey (Westmont Associates) said he has seen those types of policies and that those would be innovative policies in this line of business.

Mr. Beatty said the phrasing in Section 8(A) that states “Provide reimbursement for the covered veterinary expenses incurred by the insured without limitation” does not seem to exist with other types of insurance policies. He said the insurance policy itself would explain what would be paid and the “without limitation” term is too extreme. Ms. Brown said if Section 8 remains in the model, it should address that “without limitations” would be limited by co-insurance. Mr. Byrd agreed that “without limitations” is a broad term.

The Working Group will continue discussion of submitted comments during future meetings.

Having no further business, the Pet Insurance (C) Working Group adjourned.

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The Pet Insurance (C) Working Group of the Property and Casualty Insurance (C) Committee met Oct. 21, 2020. The following
Working Group members participated: Don Beatty, Chair (VA); Kendra Zoller, Vice Chair, and Risa Salat-Kolm (CA); Kristin
Fabian (CT); Tom Travis (LA); Sheri Cullen (MA); Linas Glemza, Rasheda Chairs and Shirley Corbin (MD); LeAnn Cox and
Jenna Thomas (MO); Michael McKenney (PA); Matt Gendron (RI); Kathy Stajduhar (UT); Anna Van Fleet (VT); and David
Forte and Eric Slavich (WA). Also participating were: Ken Williamson (AL); Brenda Johnson and Tate Flott (KS); Tracy Burns
(NE); and Maggie Dell (SD).

1. Adopted its Sept. 30 Minutes

Mr. Forte made a motion, seconded by Mr. McKenney, to adopt the Working Group’s Sept. 30 minutes (Attachment 2). The
motion passed unanimously.

2. Discussed Section 6 of the Draft Pet Insurance Model Law

Mr. Beatty said on the last conference call, the Working Group voted to refer the licensing portion of the model to the Producer
Licensing (D) Task Force. He said there has been discussion between the leadership of the Task Force and the Working Group
since the Working Group’s prior conference call. He asked Mr. Gendron to give an update on those discussions and the position
of the Task Force.

Mr. Gendron said the co-chairs of the Producer Licensing (D) Task Force believe the Task Force is the appropriate group to
deal with the licensing issue, and the Task Force would take up the issue if presented with a formal proposal from a state
insurance regulator. Mr. Forte asked if the outcome of the Task Force’s decisions on pet insurance licensing would then be
included in the Pet Insurance Model Law. Mr. Gendron clarified that the model would not be dependent on the actions of the
Task Force. Rather the model would include a drafting note that instructs states to review the NAIC State Licensing Handbook
and guidance provided by the Task Force when considering adoption of the model. Ms. Zoller said the current producer
licensing guidance is that pet insurance producers would be required to have a limited lines license. Mr. Gendron said the Task
Force would view this issue as a priority in 2021. Ms. Zoller said the licensing issue was originally a referral from the Task
Force. Mr. Gendron said in 2018, the Task Force made a referral to the Property and Casualty Insurance (C) Committee to
further develop the topic of pet insurance and draft a white paper and model law on pet insurance with the intent that the topic
of licensing would again be taken up by the Task Force. Mr. McKenney said he would like the topics of pet retailers to get
attention elsewhere in the model if Section 6—Licensing is removed. Kate Jensen (North American Pet Health Insurance
Association—NAPHIA) said NAPHIA’s position is that while the Task Force is the appropriate group to deal with the licensing
issue, the issue of non-licensed entities, such as pet retailers, should be addressed by this model. She asked if all of Section 6
should be removed or if the section could still address the actions of non-licensed entities. Mr. Gendron said the non-licensed
entities are tied into what a limited lines license would allow a producer to do; therefore, the entire section should be handled
by the Task Force. Ms. Jensen said pet retailers should not be selling insurance; therefore, they would not require a license.
She said this issue should be addressed elsewhere in the model law if Section 6 is removed. Paul Williams (Unum) said there
is a lot of interest by employers and employees to have pet insurance offered as an employment benefit. He said allowing life
and health insurers to be licensed to sell pet insurance would allow for the expansion of the scope and availability of pet
insurance.

Mr. Gendron made a motion, seconded by Mr. McKenney, to remove Section 6 in the current draft model and replace it with
a drafting note that reads: “When each state considers adopting this model, they should review the NAIC State Licensing
Handbook and other guidance adopted by the Producer Licensing (D) Task Force with respect to licensing issues.” The motion
passed unanimously.

The Working Group will continue discussion of submitted comments for Sections 7 through 9 on the next conference call.

Having no further business, the Pet Insurance (C) Working Group adjourned.

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The Pet Insurance (C) Working Group of the Property and Casualty Insurance (C) Committee met via conference call Sept. 30, 2020. The following Working Group members participated: Don Beatty, Chair, Jessica Baggarley and Phyllis Oates (VA); Kendra Zoller, Vice Chair, and Risa Salat-Kolm (CA); Katie Hegland (AK); Kristin Fabian (CT); Warren Byrd (LA); Sheri Cullen (MA); Linas Glemza and Rasheda Chairs (MD); LeAnn Cox (MO); Michael McKenney (PA); Matt Gendron (RI); Kathy Stajduhar (UT); Anna Van Fleet and Jamie Gile (VT); and David Forte and Eric Slavich (WA). Also participating were: Colleen Pawluczyk (DE); Brenda Johnson and Heather Droge (KS); Troy Smith (MT); Chris Aufenthie (ND); Tracy Burns (NE); Fred Brinkman (NJ); Rick Campbell and Rodney Beetch (OH); Ron Kreiter (OK); and J'ne Byckovski and Laura Machado (TX).

1. Discussed Sections 5 and 6 of the Draft Pet Insurance Model Law

Mr. Beatty asked that submitted comments for Section 5 of the draft Pet Insurance Model Law be addressed. Mr. Forte said the inclusion of Section 5 in the model might be prohibitive to the majority of states adopting the model law. He recommended the removal of Section 5 or the use of more neutral language that points back to the laws and regulations that are already in place. Mr. McKenney, Mr. Gendron and Mr. Byrd agreed. Kate Jensen (North American Pet Health Insurance Association—NAPHIA) agreed that the language in Section 5 should refer to the language that appears in each state’s laws.

Ms. Zoller made a motion, seconded by Mr. Byrd, to change the language of Section 5 to “[v]iolations of this Act shall be subject to the penalties pursuant to [insert state administrative code].” The motion passed unanimously.

Mr. Forte said the Working Group should consider whether this group is appropriate for declaring licensure for pet insurance. He said the Producer Licensing (D) Task Force made a referral to the Property and Casualty Insurance (C) Committee to look at pet insurance before the Task Force takes up the issue again and makes a decision about licensure. He said the white paper, A Regulator’s Guide to Pet Insurance, fulfilled the referral request, and the Producer Licensing (D) Task Force is the appropriate group for determining pet insurance licensure. He said if the Working Group does determine that it should include the licensure issue in its model law, Washington’s position as a pet insurance producer should have complete authority. He said pet insurance policy terms are longer than other limited lines, the claim activity is significantly different than other limited lines, and pet insurance policies are filled with property and casualty insurance principles. He said basic insurance knowledge is shown through the licensure, and each company should provide the product training. Mr. Byrd asked what role, if any, a customer service representative or salesclerk would play in the sale of pet insurance. Mr. Forte said the line would be compensation. Mr. Byrd said referral fees can be paid. Mr. Forte said there has been a lot of concerns and market actions concerning unlicensed pet insurance sales in Washington. Mr. McKenney said current insurance producer laws dictate what pet retailers and unlicensed people can do regarding sales and referrals. Mr. Gendron said the discussion within the group speaks to the complexity of the licensing issue. He agreed that the Working Group would not be the correct group to handle the licensing issue. Ms. Zoller said the Producer Licensing (D) Task Force was previously working on the pet insurance licensing issue, but this issue was never resolved; therefore, the licensing language that appears in the model was developed. Mr. Gendron said the Producer Licensing Handbook addresses pet insurance as a non-core limited line. Mr. McKenney said he agrees that the Working Group is not the correct group to determine licensing. He said if the Working Group does take up the issue, he believes it should address the language that would allow a veterinarian to be licensed to sell a product for which the payments go back to the veterinarian.

Ms. Jensen said NAPHIA urges the Working Group to keep some licensing structure in this Pet Insurance Model Law. She said other model laws within the Property and Casualty Insurance (C) Committee include licensing provisions in their model laws. She said it would be appropriate for this model law to include a basic licensing structure that includes high level requirements. She said NAPHIA favors a limited lines license for pet insurance producers. She said NAPHIA proposes a robust training program that covers pet insurance products, as well as general insurance principles, including ethical sales practices, consumer protections, and disclosures. She said the limited lines license would encourage more people to join the pet insurance industry and expand the availability of the products. She said NAPHIA agrees that pet retailers should not be involved in or compensated for the sale of pet insurance products. She clarified that pet retailers are not currently selling pet insurance.
Mr. Byrd asked if a pet retailer has information available on pet insurance. He asked whether a customer asking for a recommendation on which company to purchase a policy through would step over the line into inducement and sale of a pet insurance policy. Ms. Jensen said NAPHIA has submitted a definition of “pet retailer” that would define the line between referral and sale of pet insurance. Dr. Gail Golab (American Veterinary Medical Association—AVMA) said veterinarians do not sell insurance, but they want to be able to advise clients that pet insurance products are available. She said they would not be discussing policy details that would require an insurance license to discuss. She said there is concern about requiring training for veterinarians for pet insurance products since the sale of policies without such training is not currently allowed in the language of the model law.

Brendan Bridgeland (Center for Insurance Research—CIR) said a limited producer license may not be sufficient for someone selling the policy to fully describe policy details, such as how a preexisting condition is covered. He said this would tie into the need for a free look period for the consumer to fully understand the product before buying. He said he believes there should be no financial incentives and no pet insurance policies being sold in veterinary offices. Mr. McKenney asked if the free look period would be beneficial to help consumers understand if the producer with the license to sell the product does not fully understand. Mr. Bridgeland said this is a newer product that most people would not be familiar with. Mr. McKenney and Mr. Byrd said they do not believe a free look period should be provided.

Jack Chaskey (Companion Protect) said there should be a licensing section within the model law, and the wording of the section should be similar to the wording found in the Producer Licensing Model Act (#218). He said the limited lines content is relevant and more effective for consumers. He said continuing education (CE) requirements for a full property and casualty license do not often address pet insurance; although, CE specific to pet insurance could be developed. Mr. Bridgeland said this is a newer product that most people would not be familiar with.

Mr. Beatty said the issue of licensing would best be handled by the Producer Licensing (D) Task Force. Mr. Forte asked if licensing could be referred to the Task Force and then inserted into the Pet Insurance Model Act once a decision has been made. Ms. Salat-Kolm said it is important that the model addresses the transaction of insurance and the need for a license during certain sales activities, whether it be a full property and casualty license or a limited lines license.

Mr. Forte made a motion, seconded by Mr. McKenney, to make a referral to the Producer Licensing (D) Task Force to take up the issue of the need for a limited lines license versus full property and casualty license for pet insurance. The motion passed with Rhode Island abstaining.

The Working Group will continue discussion of submitted comments for Section 6 on the next conference call.

Mr. Beatty opened the comment period for Section 7 through Section 9 of the draft model law.

Having no further business, the Pet Insurance (C) Working Group adjourned.

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Virtual Meeting
(in lieu of meeting at the 2020 Fall National Meeting)

TRANSPARENCY AND READABILITY OF CONSUMER INFORMATION (C) WORKING GROUP
Tuesday, November 17, 2020

Summary Report

The Transparency and Readability of Consumer Information (C) Working Group met Nov. 17, 2020. During this meeting, the Working Group:

1. Sent its Oct. 29, Oct. 13 and Sept. 21 minutes to Working Group members for an e-vote, which included the following action:
   a. Discussed the need for consumer disclosures regarding significant premium increases on property/casualty (P/C) insurance products.
   b. Discussed existing statutes, regulations and checklists in place for several member states.
   c. Adopted its Summer National Meeting minutes.

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REAL PROPERTY LENDER-PLACED INSURANCE MODEL ACT

Table of Contents

Section 1. Purpose
Section 2. Scope
Section 3. Definitions
Section 4. Term of Insurance Policy
Section 5. Calculation of Coverage and Payment of Premiums
Section 6. Prohibited Practices
Section 7. Non-Circumvention
Section 8. Evidence of Coverage
Section 9. Filing, Approval and Withdrawal of Forms and Rates
Section 10. Enforcement
Section 11. Regulatory Authority
Section 12. Judicial Review
Section 13. Penalties
Section 15. Effective Date

Section 1. Purpose

The purpose of this Act is to:

A. Promote the public welfare by regulating lender-placed insurance on real property.

B. Create a legal framework within which lender-placed insurance on real property may be written in this state.

C. Help maintain the separation between lenders/servicers and insurers/insurance producers.

D. Minimize the possibilities of unfair competitive practices in the sale, placement, solicitation and negotiation of lender-placed insurance.

Section 2. Scope

A. This Act applies to insurers and insurance producers engaged in any transaction involving lender-placed insurance as defined in this Act.

B. All lender-placed insurance written in connection with mortgaged real property, including manufactured and mobile homes, is subject to the provisions of this Act, except:

(1) Transactions involving extensions of credit primarily for business, commercial or agricultural purposes.

(2) Insurance offered by the lender or servicer and elected by the mortgagor at the mortgagor's option.
(3) Insurance purchased by a lender or servicer on real estate owned property.

(4) Insurance for which no specific charge is made to the mortgagor or the mortgagor's account.

Drafting Note: Nothing in this Act shall be construed to create or imply a private cause of action for violation of this Act, and the commissioner shall have authority to enforce this Act subject to the laws of this state. Furthermore, nothing in this Act shall be construed to extinguish any mortgagor rights available under common law or other state statutes.

Section 3. Definitions

As used in this Act:

A. “Affiliate” shall mean a person that directly, or indirectly through one or more intermediaries, controls or is controlled by, or is under common control with, the person specified.

B. “Individual lender-placed insurance” means coverage for individual real property evidenced by a certificate of coverage under a master lender-placed insurance policy or a lender-placed insurance policy for individual real property.

C. “Insurance Producer” means a person or entity (or its Affiliates) required to be licensed under the laws of this state to sell, solicit or negotiate insurance.

D. “Insurer” means an insurance company, association or exchange authorized to issue lender-placed insurance in [insert applicable state] (or its Affiliates).

E. “Investor” means a person or entity (and its Affiliates) holding a beneficial interest in loans secured by real property.

F. “Lapse” means the moment in time in which a mortgagor has failed to secure or maintain valid and/or sufficient insurance upon mortgaged real property as required by a mortgage agreement.

G. “Lender” means a person or entity (and its Affiliates) making loans secured by an interest in real property.

H. “Lender-placed insurance” means insurance obtained by a lender or servicer when a mortgagor does not maintain valid and/or sufficient insurance upon mortgaged real property as required by the terms of the mortgage agreement. It may be purchased unilaterally by the lender or servicer, who is the named insured, subsequent to the date of the credit transaction, providing coverage against loss, expense or damage to collateralized property as a result of fire, theft, collision or other risks of loss that would either impair a lender, servicer or investor's interest or adversely affect the value of collateral covered by limited dual interest insurance. It is purchased according to the terms of the mortgage agreement as a result of the mortgagor's failure to provide evidence of required insurance.

I. “Loss ratio” means the ratio of incurred losses to earned premium.
J. “Master lender-placed insurance policy” means a group policy issued to a lender or servicer providing coverage for all loans in the lender or servicer's loan portfolio as needed.

K. “Mortgage agreement” means the written document that sets forth an obligation or a liability of any kind secured by a lien on real property and due from, owing or incurred by a mortgagor to a lender on account of a mortgage loan, including the security agreement, Deed of Trust and any other document of similar effect, and any other documents incorporated by reference.

L. “Mortgage loan” means a loan, advance, guarantee or other extension of credit from a lender to a mortgagor.

M. “Mortgage transaction” means a transaction by the terms of which the repayment of money loaned or payment of real property sold is to be made at a future date or dates.

N. “Mortgagee” means the person who holds mortgaged real property as security for repayment of a mortgage agreement.

O. “Mortgagor” means the person who is obligated on a mortgage loan pursuant to a mortgage agreement.

P. “Person” means an individual or entity.

Q. “Real Estate Owned Property” means property owned or held by a lender or servicer following foreclosure under the related Mortgage agreement or the acceptance of a deed in lieu of foreclosure.

R. “Replacement Cost Value (RCV)” is the estimated cost to replace covered property at the time of loss or damage without deduction for depreciation. RCV is not market value, but it is instead the cost to replace covered property to its pre-loss condition.

S. “Servicer” means a person or entity (and its Affiliates) contractually obligated to service one or more mortgage loans for a Lender or Investor. The term “Servicer” includes entities involved in subservicing arrangements.

Section 4. Term of Insurance Policy

A. Lender-placed insurance shall become effective no earlier than the date of lapse of insurance upon mortgaged real property subject to the terms of a mortgage agreement and/or any other state or federal law requiring the same.

B. Individual lender-placed insurance shall terminate on the earliest of the following dates:

1. The date insurance that is acceptable under the mortgage agreement becomes effective, subject to the mortgagor providing sufficient evidence of such acceptable insurance.

2. The date the applicable real property no longer serves as collateral for a mortgage loan pursuant to a mortgage agreement.
(3) Such other date as specified by the individual policy or certificate of insurance.

(4) Such other date as specified by the lender or servicer.

(5) The termination date of the policy.

C. An insurance charge shall not be made to a mortgag for lender-placed insurance for a term longer than the scheduled term of the lender-placed insurance, nor may an insurance charge be made to the mortgagor for lender-placed insurance before the effective date of the lender-placed insurance.

Section 5. Calculation of Coverage and Payment of Premiums

A. Any lender-placed insurance coverage, and subsequent calculation of premium, should be based upon the replacement cost value of the property as best determined as follows:

(1) The dwelling coverage amount set forth in the most recent evidence of insurance coverage provided by the mortgagee (“last known coverage amount” or “LKCA”), if known to the lender or servicer.

(2) The insurer shall inquire of the insured, at least once, as to the LKCA; and if it is not able to obtain the LKCA from the insured or in another manner, the insurer may proceed as set forth below.

(3) If the LKCA is unknown, the replacement cost of the property serving as collateral as calculated by the insurer, unless the use of replacement cost for this purpose is prohibited by other state or federal law.

(4) If the LKCA is unknown and the replacement cost is not available or its use is prohibited, the unpaid principal balance of the mortgage loan.

B. In the event of a covered loss, any replacement cost coverage provided by an insurer in excess of the unpaid principal balance of the mortgage loan shall be paid to the mortgagor.

C. An insurer shall not write lender-placed insurance for which the premium rate differs from that determined by the schedules of the insurer on file with the commissioner as of the effective date of any such policy.

Section 6. Prohibited Practices

A. An insurer or insurance producer shall not issue lender-placed insurance on mortgaged property that the insurer or insurance producer or an Affiliate of the insurer or insurance producer owns, performs the servicing for, or owns the servicing right to the mortgaged property.
B. An insurer or insurance producer shall not compensate a lender, insurer, investor or servicer (including through the payment of commissions) on lender-placed property insurance policies issued by the insurer.

C. An insurer or insurance producer shall not share lender-placed insurance premium or risk with the lender, investor or servicer that obtained the lender-placed insurance.

D. An insurer or insurance producer shall not offer contingent commissions, profit sharing, or other payments dependent on profitability or loss ratios to any person affiliated with a servicer or the insurer in connection with lender-placed insurance.

E. An insurer shall not provide free or below-cost outsourced services to lenders, investors or servicers, and an insurer will not outsource its own functions to lenders, insurance producers, investors or servicers on an above-cost basis.

F. An insurer or insurance producer shall not make any payments, including but not limited to the payment of expenses to a lender, insurer, investor or servicer for the purpose of securing lender-placed insurance business or related outsourced services.

Section 7. Non-Circumvention

Nothing in this Act shall be construed to allow an insurance producer or an insurer solely underwriting lender-placed insurance to circumvent the requirements set forth within this Act. Any such part of any requirements, limitations or exclusions provided herein apply in any part to any insurer or insurance producer involved in lender-placed insurance.

Section 8. Evidence of Coverage

Lender-placed insurance shall be set forth in an individual policy or certificate of insurance. A copy of the individual policy, certificate of insurance, or other evidence of insurance coverage shall be mailed, first class mailed, or delivered in person to the last known address of the mortgagor or delivered in accordance with [inset reference to Electronic Transaction Act]. Notwithstanding any other statutory or regulatory required information, the individual policy or certificate of insurance coverage shall include the following information:

A. The address and identification of the insured property.

B. The coverage amount or amounts if multiple coverages are provided.

C. The effective date of the coverage.

D. The term of coverage.

E. The premium charge for the coverage.

F. Contact information for filing a claim.

G. A complete description of the coverage provided.
Section 9. Filing, Approval and Withdrawal of Forms and Rates

A. All policy forms and certificates of insurance to be delivered or issued for delivery in this state and the schedules of premium rates pertaining thereto shall be filed with the Commissioner.

B. The Commissioner shall review the rates to determine whether the rates are excessive, inadequate or unfairly discriminatory. This analysis shall include a determination as to whether expenses included by the insurer in the rate are appropriate.

C. All insurers shall re-file lender-placed property insurance rates at least once every four (4) years.

D. All insurers writing lender-placed insurance shall have separate rates for lender-placed insurance and voluntary insurance obtained by a mortgage servicer on real estate owned property.

E. Upon the introduction of a new lender-placed insurance program, the insurer shall reference its experience in existing programs in the associated filings. Nothing in this Act shall limit an insurer's discretion, as actuarially appropriate, to distinguish different terms, conditions, exclusions, eligibility criteria or other unique or different characteristics. Moreover, an insurer may, where actuarially acceptable, rely upon models or, in the case of flood filings where applicable experience is not credible, on Federal Emergency Management Agency (FEMA) National Flood Insurance Program (NFIP) data.

F. No later than April 1 of each year, each insurer with at least $100,000 in direct written premium for lender-placed insurance in this state during the prior calendar year shall report to the Commissioner the following information for the prior calendar year:

1. Actual loss ratio.
2. Earned premium.
3. Any aggregate schedule rating debit/credit to earned premium.
4. Itemized expenses.
5. Paid losses.
6. Loss reserves, including case reserves and reserves for incurred but not reported losses.

This report shall be separately produced for each lender-placed program and presented on both an individual-jurisdiction and countrywide basis.

G. Except in the case of lender-placed flood insurance, to which this paragraph does not apply, if an insurer experiences an annual loss ratio of less than 35% in any lender-placed program for two consecutive years, it shall submit a rate filing (either
adjusting its rates or supporting their continuance) to the Commissioner no more than 90 days after the submission of the data required in F. above.

Drafting Note: The 35% trigger for re-filing rates is not intended to be, nor should be interpreted as, a loss ratio standard for determining whether rates are excessive or inadequate. The loss ratio standard in this section is solely directed to prompt a re-filing of rates by the insurer.

H. Except as specifically set forth in this Section, rate and form filing requirements shall be subject to the insurance laws of this state.

Section 10. Enforcement

The Commissioner shall have all rights and powers to enforce the provisions of this Act as provided by section(s) [insert section(s) number] of the Insurance Code of this state.

Section 11. Regulatory Authority

The commissioner may, after notice and hearing, promulgate reasonable regulations and orders to carry out and effectuate the provisions of this Act.

Section 12. Judicial Review

A. A person subject to an order or final determination of the commissioner under Section 8 or Section 13 may obtain a review of the order or final determination by filing in the [insert title] Court of [insert county] County, within [insert number] days from the date of the service of the order, a written petition praying that the order of the commissioner be set aside. A copy of the petition shall be served upon the commissioner, and the commissioner shall certify and file in the court a transcript of the entire record in the proceeding, including all the evidence taken and the report and order or final determination of the commissioner. Upon filing of the petition and transcript, the court shall have jurisdiction of the proceeding; and the questions determined shall determine whether the filing of the petition shall operate as a stay of the order or final determination of the commissioner, and they shall have power to make and enter upon the pleadings, evidence and proceedings set forth in the transcript a decree modifying, affirming or reversing the order or final determination of the commissioner, in whole or in part. The findings of the commissioner as to the facts, if supported by [insert type] evidence, shall be conclusive.

Drafting Note: Insert appropriate language to accommodate to local procedure the effect given the commissioner's determination.

B. To the extent that the order or final determination of the commissioner is affirmed, the court shall issue its own order commanding obedience to the terms of the order or final determination of the commissioner. If either party applies to the court for leave to adduce additional evidence and shows to the satisfaction of the court that the additional evidence is material and that there were reasonable grounds for the failure to adduce such evidence in the proceeding before the commissioner, the court may order the additional evidence to be taken before the commissioner and be adduced upon the hearing in the manner and upon the terms and conditions the court may deem proper. The commissioner may modify the findings of fact, or make new findings by reason of the additional evidence so taken, and shall file such modified or new findings that are supported by [insert type] evidence with a
recommendation if any, for the modification or setting aside of the original order or final determination, with the return of the additional evidence.

**Drafting Note:** Insert appropriate language to accommodate to local procedure the effect given the commissioner’s determination. In a state where final judgment, order or final determination or decree would not be subject to review by an appellate court, provision should therefore be inserted here.

C. An order issued by the commissioner under Section 13 shall become final:

(1) Upon the expiration of the time allowed for filing a petition for review if no petition has been duly filed within that time except that the commissioner may thereafter modify or set aside the order to the extent provided in Section 13.

(2) Upon the final decision of the court if the court directs that the order of the commissioner be affirmed or the petition for review be dismissed.

D. No order of the commissioner under this Act or order of a court to enforce the same shall relieve or absolve any person affected by the order from liability under any other laws of this state.

**Drafting Note:** States may delete this section if the substance of it already exists in state law.

**Section 13. Penalties**

An insurer that violates an order of the commissioner while the order is in effect may, after notice and hearing and upon order of the commissioner, be subject at the discretion of the commissioner to either or both of the following:

A. Payment of a monetary penalty of not more than $1,000 for each violation, but not to exceed an aggregate penalty of $100,000, unless the violation was committed flagrantly in a conscious disregard of this Act, in which case the penalty shall not be more than $25,000 for each violation, but not to exceed an aggregate penalty of $250,000.

B. Suspension or revocation of the insurer’s license.

**Drafting Note:** States may delete or modify this section if the substance of it already exists in state law.

**Section 14. Severability Provisions**

If any provision of this Act, or the application of the provision to any person or circumstance, is for any reason held to be invalid, the remainder of the Act and the application of such provision to other persons or circumstances shall not be affected thereby.

**Section 15. Effective Date**

This Act shall take effect [insert effective date].
Comments from the Center for Economic Justice

To the NAIC Property Casualty (C) Committee

Regarding the Proposed Lender Place Insurance Real Property Model Act

December 3, 2020

CEJ writes to comment on the model proposed by the Lender Placed Insurance Model Act Working Group for adoption by the C Committee. The proposed model codifies current unfair industry practices and fails to address the well-documented consumer protection needs of vulnerable consumers.

LPI is a difficult product for some insurance regulators to understand because it is tied to mortgage lending and mortgage servicing. In the instance of the proposed LPI model, we believe a large part of the problem is that some insurance regulators – who only regulate insurance – do not understand the roles and responsibilities of mortgage servicers and, consequently, do not have the knowledge to identify industry misinformation.

For a product like LPI, it would be helpful for working group members to be those regulators who have supervisory responsibility over both insurance and banking or, at a minimum, for the working group to reach out to those financial regulators who do understand the roles and responsibilities of lenders and mortgage servicers.

History of LPI Abuses and Need for Stronger Consumer Protections

For those regulators unfamiliar with the problems with lender-placed insurance, a brief history may be relevant. As the financial crisis of 2008 was unfolding, the abuses with force-placed insurance (lender-placed insurance or “LPI”) grew to massive levels. Mortgage servicers force-placed high-cost LPI on the most financially-vulnerable borrowers – at more than six times the frequency prior to the crisis – and charging amounts twice as great as borrowers would have paid for voluntary coverage. The servicers were hugely benefitting from these force-placements by receiving billions of dollars in kickbacks from the LPI insurers.
The kickbacks were financed by borrowers who were force-placed. Despite LPI being a group insurance product, LPI loss ratios were half of the homeowners loss ratio countrywide and by state.1 Some of the worst kickbacks were stopped – not by insurance regulators, but through litigation and actions by federal agencies and the federal housing organizations. The notable exception was the New York Department of Financial Services which carried out a thorough investigation, halted the abusive practices early on through consent orders and filled in consumer protection gaps by promulgating a comprehensive regulation to address the abuses with LPI.2 Minnesota and California regulators also took actions.

Eventually, insurance regulators, through the NAIC, called a multi-state market conduct examination and reached a settlement with the largest LPI insurers who control the LPI market. The settlement was apparently the template for the proposed LPI Real Property model. The settlement – which was not subject to review by the public or experts in mortgage servicing – memorialized some of the consumer protections achieved by the NY DFS, litigants and federal agencies. But, the settlement not only failed to address the remaining gaps in consumer protection, it created new loopholes for LPI insurer kickbacks and inflated premiums.

After years of discussion, the proposed model fails to provide the needed consumer protections against unfair and abusive LPI practices and to stop the kickback culture – from LPI insurers to lenders and mortgage servicers – that is the business model of LPI insurers. The model, enthusiastically supported by lenders and insurers, simply memorializes current industry practices instead of addressing consumer protection issues. We discuss the shortcomings of the proposed model below.

Best We Can Hope For?

We recognize that, given the views of some members of the working group, the model before you is the best that can be hoped for from a consumer protection perspective. That is a sad commentary on the ability and willingness of insurance regulators to balance the interests of consumers and industry. Most discouraging about the working group’s product is that facts and evidence seem irrelevant to the working group. Industry made a number of false claims during the deliberations – unsupported by any evidence and refuted by CEJ with reams of evidence.3 Yet, the industry claims appear to have been accepted.

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1 https://content.naic.org/sites/default/files/inline-files/committees_c_120809_public_hearing_lender_placed_insurance_presentation_birnbaum_1.pdf
2 http://nyrules.elaws.us/nyccr/title11_chapterix_part227
3 For example, attached are CEJ’s 11/1/2020 comments to the working group.
Results like those of the proposed model undermine the state-based system of insurance regulation in at least two ways. First, these results raise the real fear that some regulators favor industry over consumers regardless of the merits of the argument. Such bias in regulatory decision-making undermines the confidence of consumers in the regulator.

Second, failure by the states to address problems in insurance markets invites action by others – federal agencies, Congress and others. We saw this in the aftermath of the 2008 financial crisis when the massive scope of the LPI abuses became known. Insurance regulators failed to act and, instead, government and quasi-government agencies stepped in with consumer protections.

Proposed Model Endorses Industry Practices, Fails to Improve Consumer Protections

The problems with the proposed model are severe and include:

1. Fails to identify and address reverse competition as a problem in LPI markets.

For those unfamiliar with “reverse competition,” another NAIC model provides a succinct definition and explanation:

“Reverse competition” means competition among insurers that regularly takes the form of insurers vying with each other for the favor of persons who control, or may control, the placement of the insurance with insurers. Reverse competition tends to increase insurance premiums or prevent the lowering of premiums in order that greater compensation may be paid to persons for such business as a means of obtaining the placement of business. In these situations, the competitive pressure to obtain business by paying higher compensation to these persons overwhelms any downward pressures consumers may exert on the price of insurance, thus causing prices to rise or remain higher than they would otherwise.4

LPI markets are characterized by reverse competition, yet the proposed model fails to specifically identify and address this structural market problem. The biggest example is the failure to prohibit the inclusion of insurance-tracking expenses – a loan portfolio-wide responsibility of lenders/servicers for which they are already compensated – in LPI rates and premium charges. By permitting the inclusion of such expenses in LPI rates, regulators are endorsing a kickback in the form of free or below-cost services from the insurer to the lender/servicer.

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Just as important, the failure to prohibit the inclusion of tracking expenses in LPI rates assigns the burden of such expenses to the small number of borrowers – 1 to 3% of all borrowers – for whom LPI is placed. It is not only profoundly unfair to charge a small subset of borrowers for expenses associated with all borrowers, but this kickback inflates LPI charges beyond reasonable levels and has a disproportionate impact on the most financially vulnerable consumers who are disproportionately members of communities of color.

2. **Fails to prohibit the use of single interest real property**

One type of distinction among different flavors of LPI is who are the named insureds on the certificate issued under the LPI group policy. One type is called single-interest, which means that the lender or servicer is the only named insured and the only party with rights when it comes to making a claim. The second type is dual-interest for which the borrower is named as an additional insured and, consequently, has some rights to file a claim under the policy.

Dual interest is critically important for LPI real property because the interests of the lender/servicer and the borrower may diverge. The lender/servicer may only have an interest in recouping the unpaid balance of the loan, while the borrower has an interest in repairing the property for continued habitation. Most, but not all, LPI real property is dual interest, and a requirement that LPI real property coverage be dual interest would not burden the industry. Yet, some LPI real property continues to be sold as single interest to the detriment of vulnerable borrowers. The proposed model fails to require dual interest coverage.

3. **Fails to require any disclosures to consumers warning of missing evidence of required insurance and placement of LPI.**

While many lenders and servicers are required to provide these disclosures through federal rules that apply to mortgages originated or owned by federal agencies or quasi-federal agencies, all loans secured by real property are not covered by these federal requirements. As a result, the absence of disclosure provisions in the model leaves a huge disclosure gap for other than federally-originated, owned or insured mortgages. The result will be no disclosure requirement for certain types of mortgage loans.
Insurance Regulatory Failure

We conclude as we began. When bogus industry arguments are accepted despite no supporting evidence and piles of evidence refuting the claims, the objectivity and balance of the regulatory process is called into question. In the instance of the proposed LPI model, we believe a large part of the problem is that some insurance regulators – who only regulate insurance – do not understand the roles and responsibilities of mortgage servicers and, consequently, do not have the knowledge to identify industry misinformation. For a product like LPI, it would be helpful for working group members to be those regulators who have supervisory responsibility over both insurance and banking or, at a minimum, for the working group to reach out those financial regulators who do understand the roles and responsibilities of lenders and mortgage servicers.
Supplemental Comments from the Center for Economic Justice

To the NAIC Lender Place Insurance Model Act Working Group

November 9, 2020

CEJ writes to supplement our November 3, 2020 comments to working group with two points.

First, we ask that our comments as well as those of regulators and other stakeholders, be given a fair hearing in the same manner that stakeholder comments have been presented and discussed for other NAIC work products. For example, for amendments to the annuity suitability model regulation, the artificial intelligence principles, the group capital calculation and the amendments to the anti-rebating provisions of the Unfair Trade Practices Model Act – to name just a few – working group members considered individual stakeholder-suggested edits and gave stakeholders the opportunity to present those suggestions.

Given that at least one working group member wanted to adopt the draft during the most recent call – despite over two years from the last call and no discussion of specific proposed language – we are concerned that discussion of the many controversial and anti-consumer provisions of the draft model may not be forthcoming. Our concern is heightened by industry claims that “all the relevant topics related to the Model Act have been thoughtfully discussed and addressed over the past several years.” While the draft codifies current anti-consumer industry practices, there has been no discussion for over two years and the prior discussion did not “thoughtfully” consider all issues raised by consumer stakeholders and regulators.

We ask for the opportunity to present each of our suggested changes to the draft.

Second, we respond to the industry misdirection and misinformation in their November 3, 2020 comment letter. Industry argues that neither Regulation X nor the Fannie Mae/Freddie Mac servicing guidelines are relevant to the working group’s consideration. But that is incorrect as both are directly relevant to the issue of reasonable expenses in LPI rates.
Regulation X and the Fannie/Freddie servicing guidelines – as well as the statutes and
treatises cited in CEJ’s November 3, 2020 comments – make clear that the activities that
comprise insurance tracking are the responsibility of servicers for which servicers are
compensated by borrowers and mortgage owners through the servicing fee servicers deduct from
borrowers’ mortgage payments. Despite industry claims to the contrary, there is no reasonable
dispute about these facts and the complete lack of evidence provided by industry to support its
arguments makes this clear.

Industry argues that the working group should ignore all these statutes, regulations,
servicing guidelines and treatises because they are not promulgated by insurance regulators and
address the roles and responsibilities of lenders and servicers. This is, of course, an absurd
argument regarding what expenses insurance regulators should consider reasonable for LPI rates.
By the twisted industry logic, insurance regulators should not regulate LPI because continuous
insurance coverage is required by statutes, regulations and guidelines directed at servicers.

The relevant issue is whether tracking costs are a legitimate expense to include in LPI
rates and premiums and, consequently, charged to borrowers. Regulation X and the servicing
guidelines mandate a list of activities for servicers regarding insurance required to protect the
mortgage collateral. These statutes, regulations and servicing guidelines list the activities that
comprise insurance tracking and clearly make those activities the responsibility of the loan
servicer. Borrowers and mortgage owners pay the loan servicer for insurance tracking and other
duties by letting the servicer retain a portion of the borrower’s loan payment each month (a
“servicing fee” usually ranging from 25 to 50 basis points).

If, for some reason, the working group members have any doubt that insurance tracking
activities are the responsibility of servicers and for which servicers are already compensated,
then CEJ suggests the working group reach out to Fannie Mae, Freddie Mac, the Federal
Housing Finance Authority or the Consumer Financial Protection Bureau to confirm the facts
CEJ has presented.

As pointed out in our November 3, 2020 comments, the inclusion of insurance tracking
expenses in LPI rates inflates LPI charges to borrowers by a substantial amount and unfairly
penalizes the most financially-vulnerable borrowers.
The Center for Economic Justice (CEJ) offers the following comments on the draft NAIC Lender-Place Insurance Real Property Model Act.

I. Summary of Comments

There are four major problems with the exposure draft.

1. It fails to recognize and acknowledge the reverse-competition in lender-placed insurance (LPI) markets that has led to consumer abuses by LPI insurers and mortgage servicers\(^1\) and that drives the need for enhanced consumer protections.

2. It fails to explicitly prohibit the inclusion of tracking expenses in LPI rates and premium charges. Insurance tracking activities and related expenses are the responsibility of the servicer for which the servicer is paid by the owner of the mortgage. By including tracking expenses in LPI rates, the entire costs of tracking for all borrowers is assessed on the small percentage of borrowers who are force-placed and massively inflates the premium through inclusion of expenses unrelated to the provision of insurance.

3. It fails to prohibit single-interest LPI for real property.

4. It establishes an absurdly low minimum loss ratio.

5. It includes an invitation to kickback abuse with inclusion of “implementation expenses.”

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\(^1\) Servicers are the entities who administer or service mortgage loans after the loan is originated. See Pinkowish, *Residential Mortgage Lending Principles and Practice*, Sixth Edition at page 501: After closing a mortgage loan, the next step in the residential lending process involves servicing . . . . All residential mortgage loans require servicing. Loan servicing includes the responsibilities, functions and day-to-day operations that an organization performs after the closing and over the term or repayment of loan.”

In most cases, servicers are separate entities from the owners of mortgage loans. Some lenders originate, maintain ownership and service the loans they own, but most mortgages are owned by either investors (through mortgage-backed securities) or by federal agencies or quasi-public entities, like Fannie Mae, Freddie Mac, Ginnie Mae or the Veterans Administration and are serviced by others for a fee – the servicing fee. In our comments, “servicers” refers to any entity that services a mortgage loan whether or not that entity is the owner of the mortgage.
The current draft does not reflect an objective review of the LPI product or market and is not supported by evidence or reason. We have previously submitted our suggested revisions in redline.

In October 2018, CEJ made a presentation to the Florida Office of Insurance Regulation (FL OIR) discussing the proposed NAIC LPI model. That presentation, attached, to these comments, is attached and documents the evidence in support of CEJ’s positions.

We supplement that presentation by addressing comments raised during the October 19, 2020 call.

II. Tracking Expenses Must Be Excluded From LPI Rates

Servicers are responsible for, and are compensated by mortgage owners, for insurance tracking. Tracking expenses or insurance tracking refers to a variety of servicer responsibilities and related activities to ensure continuous insurance coverage of the property serving as collateral for the loan. Insurance tracking is part of the escrow administration function of servicing\(^2\) and includes

- Initially entering insurance information obtained at closing into the mortgage servicing system of record – the database used to track a borrower’s mortgage.
- As required by statute or regulation or requested by borrowers, establishing escrow accounts for borrowers to collect funds from mortgage payments for insurance and disburse those funds to the borrower’s insurer for policy renewal.
- Gathering information from insurers, agents and borrowers regarding evidence of required insurance and updating the insurance information in the mortgage servicing system of record.
- Corresponding with borrowers regarding missing evidence of required insurance and warning of LPI placement if the evidence is not provided.
- Maintaining call and mail centers or other means to accept and respond to borrower questions and communications regarding required insurance and why insurance was force-placed.

While is it typical for servicers to contract out some or all of these insurance tracking functions, these functions are the servicer’s responsibility, for which the servicer is compensated. This fact is supported by extensive evidence, including:

\(^2\) Pinkowish at pages 507: “The escrow administration function ensures the protection of the security interest by determining whether adequate coverage is in place and is current with a mortgage-payable clause for required insurance or credit guarantees.”
• Federal statutes and regulations;
• Fannie Mae and Freddie Mac servicing requirements;
• Texts on mortgage lending and mortgage servicing; and
• Common sense.

The FL OIR presentation quotes from the Fannie Mae Standard Mortgage contract to demonstrate that the need for insurance tracking follows from the mortgage contract requirement of the lender to maintain insurance.

The largest owners of mortgages – and the largest users of mortgage servicers – are the quasi-public agencies Fannie Mae and Freddie Mac. Fannie and Freddie contract with servicers to service the mortgages that Fannie and Freddie own and pay the servicers to do so. Fannie and Freddie have extensive servicing guides which set out the responsibilities of their mortgage servicers for insurance tracking. For example, the Fannie requirements are found at Section B-2-013 and B-6-014 of the Fannie Servicing Guide and are excerpted in the FL OIR presentation.

Federal law and regulations also specify the lender/servicer responsibility to ensure insurance is and remains in place. The FL OIR presentation cites the Flood Disaster Protection Act provisions requiring lenders to ensure flood insurance is in place and maintained for the term of the loan if the property is located in a designated flood hazard area.5

Regulation Z (12 CFR 1024.37), promulgated by the Consumer Financial Protection Bureau and excerpted in the FL OIR presentation describes the requirements for a servicer regarding force-placed insurance and clearly indicates that insurance tracking is the responsibility of the servicer. The regulation sets out requirements of the servicer for notifying a borrower regarding missing insurance and the various steps a servicer must take before the servicer can assess a charge for lender-placed insurance.6

The textbook *Residential Mortgage Lending Principles and Practice, Sixth Edition*, describes the responsibilities of mortgage servicers, how servicers are paid for activities and how insurance tracking is part of the escrow administration function of servicers.7

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5 42 USC 4012(b)
6 https://www.consumerfinance.gov/policy-compliance/rulemaking/regulations/1024/37/
7 See Pinkowish at pages 506 and 509. See also National Consumer Law Center, *Mortgage Servicing and Loan Modifications, First Edition.*
Common Sense

It is also common sense that insurance tracking is a servicer responsibility and the expenses for insurance tracking are not reasonably included in LPI rates and premium:

- By including tracking expenses in LPI rates and premium, the costs of tracking are assessed on the small percentage (1% to 4%) of borrowers who are force-placed. Yet the insurance tracking activities touch all borrowers in the portfolio.

- If all borrowers maintained required insurance, the servicer would still be required to perform insurance tracking to ensure the coverage was in place and to disburse escrow for premium renewal as needed. Yet, in this situation, there would be no premium for LPI because no coverage under the master policy would be required. And if the costs of insurance tracking were included in LPI rates, then the insurer would be on the hook to provide all these services without compensation.

- If insurance tracking is an insurance expense because it is necessary for the insurer to be able to provide LPI as claimed by industry, then there could be no blanket LPI coverage for which no tracking is performed. Yet, such blanket LPI products are common.

- If insurance tracking is an insurance expense because it is necessary for the insurer to be able to provide LPI as claimed by industry, then there could be no LPI coverage provided in New York or Rhode Island since both states have directed LPI insurers to exclude tracking expenses from LPI rates.

The cost of insurance tracking is significant. Permitting insurance tracking expenses in LPI rates dramatically inflates LPI rates and unfairly penalizes the most financially-vulnerable borrowers.

Servicers typically outsource insurance tracking to third parties – the LPI insurer or the LPI insurer’s managing general agent. The insurers and MGAs providing the service typically charge a fee for that service. The fee is expressed as an amount per tracked loan per month. This fee charged by the LPI insurer or MGA is far below the actual cost of providing that service. The losses incurred for insurance tracking by the LPI insurer are recouped through inflated LPI rates. Stated differently, while the servicer may pay $X in LPI premium, the net cost to the servicer is a fraction of $X because the insurer has kicked back part of that premium in the form of below-cost services.

Attached to these comments is an affidavit in a LPI lawsuit in which the defendant lender’s loan service manager states that the fee for insurance tracking paid to the LPI insurer is substantially less than the market cost of those services:
18. The OSC Agreement includes a comprehensive schedule of services and administrative functions that OSC agreed to provide the Bank with respect to its loan portfolio FPI processes. In consideration of these services, the OSC Agreement includes a fee schedule imposing (i) a monthly fee of $0.28 for each loan monitored within the portfolio; (ii) the actual cost of postage and delivery fees incurred in connection with borrower correspondence regarding an FPI event; and (iii) an hourly rate of $150.00 for tasks that require additional programming support.

19. The Bank’s loan portfolio subject to these loan monitoring services consists of approximately eighteen thousand (18,000) loans, although that figure fluctuates.

20. Following the OSC Agreement Amendment, Affiant investigated the fees charged by comparable vendors as OSC. Affiant determined that the marketplace for insurance-portfolio tracking services can be broadly characterized into two tiers of service. In the higher tier, the tracking services are such that the Bank is not necessary for virtually any step of the process. From my investigation, a reasonable range of cost for higher tier services is approximately $0.80 to $0.90 per loan per month. In the lower tier, the services provided require substantial interaction and effort by bank employees. From my investigation, a reasonable range of cost for lower-tier services is approximately $0.40 to 0.50 per loan per month.

This affidavit not only documents one example of the LPI insurer kickback to the lender in the form of the below-cost provision of tracking services, but also acknowledges that tracking is a lender/servicer responsibility and that the lender/servicer can obtain those services from providers in the market separate from the provision of LPI.

The lender represented in the affidavit has a relatively small portfolio of serviced loans – around 18,000. In contrast, top mortgage servicers have servicing portfolios of hundreds of thousands or millions of loans. For perspective, there are over 50 million mortgage loans outstanding. In my experience, the fees charged for insurance tracking are far lower than $0.28 per loan per month for larger servicers. Testimony in the 2012 New York Department of Financial Services investigative hearing on LPI revealed insurance tracking fees of zero to a few cents per loan per month.

The table below shows the significant impact of the tracking kickback assuming:

- a loan portfolio size of one million;
- a tracking fee charge of $0.10 per loan per month;
- actual tracking costs of $0.50 and $0.90 per loan per month;
- an LPI placement rate of 1.56% -- the actual placement rate reported by Assurance in its second quarter 2020 earnings release supplement; and
- an average LPI premium of $1,500.00
**Impact of Free or Below-Cost Tracking Services on LPI Costs to Force-Placed Borrowers**

<table>
<thead>
<tr>
<th>Subsidized Tracking Impact on LPI Charges</th>
<th>Scenario 1</th>
<th>Scenario 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Loans Tracked</td>
<td>1,000,000</td>
<td>1,000,000</td>
</tr>
<tr>
<td>2 Tracking Fee Charged per loan per month</td>
<td>$0.10</td>
<td>$0.10</td>
</tr>
<tr>
<td>3 True Cost of Tracking Services per loan per month</td>
<td>$0.90</td>
<td>$0.50</td>
</tr>
<tr>
<td>4 Subsidy/Kickback</td>
<td>$0.80</td>
<td>$0.40</td>
</tr>
<tr>
<td>5 Total Annual Kickback</td>
<td>$9,600,000</td>
<td>$4,800,000</td>
</tr>
<tr>
<td>(line 1 x line 4 x 12 months)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>6 Placement Rate -- 1.56% is Assurant's actual 20Q2 rate</td>
<td>1.56%</td>
<td>1.56%</td>
</tr>
<tr>
<td>7 Average LPI Premium</td>
<td>$1,500</td>
<td>$1,500</td>
</tr>
<tr>
<td>8 Total LPI Premium</td>
<td>$23,400,000</td>
<td>$23,400,000</td>
</tr>
<tr>
<td>(line 1 x line 6 x line 7)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>9 Tracking Kickback as % of Premium</td>
<td>41%</td>
<td>21%</td>
</tr>
<tr>
<td>(line 5 / line 8)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>10 Tracking Cost borne by each LPI-placed borrower</td>
<td>$615</td>
<td>$308</td>
</tr>
</tbody>
</table>

The calculations show that a subsidy of “just” 40 cents per loan per month represents from 21% to 41% or $308 to $608 of a $1,500 premium. Stated differently, these kickbacks unfairly inflate the charges to borrowers by 26% to 70%.

**Insurers and Trades Have Provide No Evidence to Support Their Claims or To Justify Insurance Tracking as a Legitimate LPI Expense.**

Industry has made the two principle arguments regarding tracking expenses without providing any evidence to support their arguments. First, they argue that tracking is an insurer, not a servicer responsibility, and that servicers are not compensated for insurance tracking activities. CEJ has provided extensive evidence to authoritatively refute these insurer claims. It is simply not feasible to objectively review the respective evidence provided by CEJ and industry and not dismiss these industry claims.

The second industry argument is that tracking is necessary for the insurers’ risk and exposure management and, consequently, tracking expenses are reasonably included in LPI rates. Again, CEJ has provided evidence to refute these assertions.

First, the largest LPI insurer, Assurant, admits that the provision of LPI and insurance tracking are separate. On its website, Assurant describes “Lender-Placed Insurance & Related Services:”

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Assurant is the industry's leading provider of lender-placed hazard, flood, wind and REO insurance, and related services. Our core services provide insurance tracking and follow-up on behalf of our partners to ensure customers have current homeowners insurance. We offer inbound and outbound customer support, including easy self-service options. And, when necessary, we protect mortgage servicers interest with our lender-placed insurance products.

Second, the “exposure management” argument is a blatant misrepresentation to regulators. Insurers do not need individual tracking data – nor could they rely upon such data – to manage their exposure. Unlike voluntary insurance where today’s insureds are a good proxy for the exposures in three or six months, that is not the case with LPI. With LPI, the cancellation rate is high – 50% or more – which means that today’s exposures are going to be different from the insureds in six months.

LPI insurers underwrite, price and manage LPI exposures by evaluating characteristics of the loan portfolio – location of loans, size of loans, types of lenders, presence of escrow or not. It is by assessing characteristics of the loan portfolio that LPI insurers can estimate the placement rate of LPI. The evidence to support this is found in the schedule rating worksheets of LPI insurers, shown in the FL OIR presentation.

In the case of the Assurant Schedule Rating Plan, Assurant states, “in recognition of the unique risk characteristics of the mortgagee.” The mortgagee is the lender/servicer and not the borrower. The Schedule Rating Plan factors are all related to characteristics of the loan portfolio – quality of loan underwriting, source of loans, delinquency rate, average loan to value, mix of fixed and variable loans, mix of government and conventional loans, percentage of loans escrowed for insurance – and nothing related to individual borrower’s property characteristics or rating.

Again, common sense refutes this industry argument. If inclusion of insurance tracking expenses were necessary for exposure management, then it could not be possible for Assurant or any LPI insurer to offer LPI in New York or Rhode Island where tracking expenses must be excluded from LPI rates. Yet, Assurant and LPI insurer do offer LPI in New York and Rhode Island, demonstrating that inclusion of tracking expenses is in LPI rates for LPI insurers to manage their risk or exposure.

In addition, if insurance tracking and individual loan insurance information was required for exposure management, how could a LPI insurer ever be able to write new business or secure reinsurance since, in those situations, it would either not have individual loan insurance information or the information would rapidly change over a short period of time. But, in fact, LPI insurers do compete for and secure new business and do obtain reinsurance. This is possible because risk and exposure management are based on characteristics of the loan servicing portfolio and general economic conditions.

Prohibiting Tracking Expenses in LPI Rates Does Not Limit Regulators’ Ability to Evaluate LPI Insurer Expenses

An argument has been put forth that including a provision in the model to prohibit the inclusion of insurance tracking expenses in LPI rates will somehow restrict a regulator’s ability to assess the reasonableness of expense provisions proposed by LPI insurers in rate filing. Again, no evidence has been provided to support this claim.
It is unclear how prohibiting one type of expense limits a regulator’s ability to examine proposed expense provisions in a LPI rate filing and no explanation or examples have been provided.

In fact, the exposure draft prohibits and permits a variety of different types of expenses. The draft prohibits certain compensation to a lender, insurer, investor or servicer. The draft prohibits contingent commission and profit-sharing to any person affiliated with the servicer or the insurer. The draft prohibits the provision of free-or below-cost outsourced services. The draft permits implementation expenses.

All of these provisions assume the regulator has the ability to identify different types of LPI insurer expenses and permit or exclude those expenses in approved LPI rates. Consequently, there is no basis for the claim that a regulator could not identify one type of expenses – insurance tracking – and require the insurer to exclude that expense from approved rates.

**The Omission of Any Disclosure Requirements in the Exposure Draft Confirms That Insurance Tracking is a Servicer Responsibility**

Unlike the current Creditor-Placed Insurance Model Act which includes a section for “Disclosures to the Debtor,” the LPI Model Act exposure draft includes no disclosure provisions. Clearly, consumer disclosures – such as those in Regulation Z, cited above – regarding missing evidence of required insurance and possible LPI placement and charges are part of insurance tracking. If insurance tracking was, in fact, an insurer responsibility, then it would be the insurer, not the servicer, who is responsible for providing these consumer disclosures. The fact that industry has argued against including disclosure provisions in the NAIC model contradicts the argument that tracking is an insurer responsibility and expense.

**III. Prohibit Single Interest Coverage**

The model fails to require that LPI policies provide dual interest coverage. While dual interest coverage is most common, there remain instances of single interest LPI home insurance. Such single interest coverage eliminates any borrower rights in the event of a LPI claim.

It is critical for LPI to provide dual interest coverage – in which the borrower is an additional insured on the coverage – to give the borrower important rights in the event of a LPI claim. It is important because the interests of the borrower and servicer do not align. The servicer may only have interest in obtaining a claim settlement sufficient to pay off the loan, while the borrower has an interest in repairing the property.

Requiring dual interest coverage is a basic consumer protection and should not be controversial.
IV.  Loss Ratio Standard

The proposed loss ratio standard of 35% is far, far too low and fails to reflect the cost structure of LPI. The table below highlights some of the key differences affecting sales, underwriting and administrative expenses for LPI versus homeowners insurance. LPI is a group master policy issues to a servicer covering all properties automatically as needed if a borrower’s voluntary coverage lapses. A single LPI policy may provide coverage for hundreds of thousands of loans and thousands of individual property coverages.

<table>
<thead>
<tr>
<th>LPI</th>
<th>Homeowners</th>
</tr>
</thead>
<tbody>
<tr>
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<td>Automated Coverage Issuance Based on Servicer’s Tracking Data and Instructions</td>
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</tr>
<tr>
<td>Servicer is Named Insured, Servicer Pays Premium to Insurer</td>
<td>Consumer is Named Insured, Consumer Pays Premium to Insurer</td>
</tr>
</tbody>
</table>

Every non-claim aspect and expense category is less expensive as a percentage of premium than for homeowners insurance. There is no mass marketing of LPI. LPI is marketed to tens or hundreds of lenders/servicers, not to tens of millions of consumers. There is no detailed underwriting or complex pricing algorithms for LPI as there is for homeowners insurance because of the lack of underwriting of individual properties for LPI. Rather, LPI is underwritten on the basis of loan servicing portfolio characteristics.

Given the characteristics of LPI, non-claim expenses for LPI should be significantly less as a percentage of premium than non-claim expenses for homeowners – and LPI loss ratios should be higher than homeowners loss ratios. Yet, the opposite has occurred and continues to occur – LPI loss ratios are half those of homeowners insurance and LPI expense ratios are two or more times greater than those of homeowners.

Because of reverse competition in LPI markets, LPI insurers seek the high rates to compete for the servicer’s business by providing considerations to the servicer to secure that business. An insurance regulator can minimize the harm of this reverse competition by approving only those rates sufficient to cover expected loss and loss settlement costs, a reasonable profit and the reasonable expenses for sale and administration of LPI. The characteristics of LPI – the long history of kickbacks by LPI insurers to servicers – clearly indicate that LPI loss ratios should be higher and not lower than those for homeowners insurance.
The proposed 35% is absurdly low on its face and no support or explanation has been provided for that value. Such a low minimum standard would lead to even higher LPI rates because typical LPI rate filings propose expected loss ratios greater than 35% -- even with inflated expenses.

Given that varying catastrophe risk exposure across the states, this minimum loss ratio provision should be deleted and replaced with a maximum expense provision. Failing that, a minimum 60% loss ratio provision should be used, consistent with other NAIC credit-related insurance model loss ratio standards. Failing that, the minimum loss ratio standard provision should be removed and rate review should default to a standard prior approval review to ensure rates are not excessive, not inadequate and not unfairly discriminatory.

V. Implementation Expense

The provision to permit “implementation expenses” should be deleted for a number of reasons. First, the implementation expense issue is being addressed at the Innovation and Technology Task Force through its work to review the anti-rebating provisions in the NAIC Unfair Trade Practices Act. True “implementation expense” issues should be addressed in that forum.

Second, the proposed provision undercuts the general anti-kickback provision by permitting the insurer to provide a consideration to the lender/servicer in exchange for the lender/servicer selecting the LPI vendor. We are puzzled by this provision since paying a lender/servicer for “implementation expense” is clearly a consideration and a kickback as the LPI vendor is rebating something of value to the insured in exchange for securing the business.

Third, in addition to being a glaring kickback, this provision promotes unfair competition because the largest LPI vendor has the greatest ability to provide the greatest “implementation expense reimbursement.”

Fourth, the fact that Assurant was able to convince a number of regulators to include this gaping kickback loophole in the regulatory settlement agreement is powerful evidence of the need for an absolute ban on any consideration by the insurer to the servicer other than the protection of the property servicing as collateral for the loan. Permitting things like “implementation expenses” if they can be satisfactorily explained will lead to consumer abuse and unreasonable rates and charges -- the insurer will always explain or shade the explanation in an effort to make any expense seem in compliance with statutory requirements and they are in the cat bird seat of information asymmetry - - they know all the details and how to frame things to get by the regulator, while the regulators, particularly in states where the insurance regulator is separate from the banking regulator, have limited knowledge of mortgage servicing and limited time and resources to do forensic accounting for each rate filing.

Fifth, an exception for “implementation expenses” – or tracking expenses – will lead to a lack of uniformity across the states, based in large part on the size and resources of the state to understand and review justifications provided by the LPI insurer. While there are many reasons for rate filing considerations to vary by state – catastrophe exposure, underwriting restrictions – differences in what constitutes a reasonable general, administrative or sales expense for insurance typically sold through countrywide agreements is surely not an expense that should vary by state.
VI. Reverse Competition

LPI markets are characterized by reverse competition, which means that the insurers compete for the lender’s or servicer’s business because these entities have the market power to steer the ultimate consumer to the insurer. In a reverse-competitive market, the insurers compete for the lender's or servicer's business by offering a variety of considerations to the lender, the cost of which drives up the cost of the insurance to the ultimate consumer.

Evidence from regulatory and journalist investigations, class action lawsuits and regulatory settlements indicates that the LPI premium charges from LPI insurers to mortgage servicers are inflated far above the reasonable cost of providing LPI coverage to protect the properties serving as collateral for the mortgage loans. A significant amount of the inflated LPI premiums charged by the LPI insurer to the mortgage servicer is kicked back to the mortgage servicer through a variety of mechanisms, including the provision of free or below-cost services. The mortgage servicer typically charges borrowers the same amount for LPI as the mortgage servicer paid in premium to the LPI insurer, thereby causing borrowers to pay for the kickbacks.

The NAIC recognized reverse competition in credit-related insurance markets. The Credit Personal Property Insurance Model Act includes, as one of its purposes, to “address the problems arising from reverse competition in credit insurance markets.” LPI is a credit-related insurance product. The NAIC model also defines and explains reverse competition:9

“Reverse competition” means competition among insurers that regularly takes the form of insurers vying with other for the favor of persons who control, or may control, the placement of the insurance with insurers. Reverse competition tends to increase premiums or prevent the lowering of premiums in order that greater compensation may be paid to persons for such business as a means of obtaining the placement of business. In these situations, the competitive pressure to obtain business by paying higher compensation to the persons overwhelms any downward pressure consumers may exert on the price of insurance, thus causing prices to rise and remain higher than they would otherwise.”

From 2011 to 2013, the New York State Department of Financial Services conducted an investigation of LPI providers and markets. Among other things, the NYDFS investigation revealed:

- The premiums charged to homeowners for force-placed insurance are two to ten times higher than premiums for voluntary insurance, even though the scope of the coverage is more limited.

- The loss ratios for force-placed insurance seldom exceed 25 percent. Nevertheless, rate filings made by insurers with NYDFS reflected loss ratio estimates of 55 to 58 percent.

- Insurers and banks have built a network of relationships and financial arrangements that have driven premium rates to inappropriately high levels ultimately paid for by consumers and investors.

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Force-placed insurers have competed for business from banks and mortgage servicers through “reverse competition”: i.e., rather than competing for business by offering lower prices, insurers have created incentives for banks and mortgage servicers to buy force-placed insurance with high premiums by enabling banks and mortgage services, through complex arrangements, to share in the profits associated with the higher prices.

In addition to regulatory settlements with LPI insurers to stop the consumer abuses, the NY DFS has promulgated a regulation which, among other consumer protections, prohibits the inclusion of insurance tracking expenses in LPI rates.

Based on the above, it is important and reasonable to include in the LPI model a purpose to address problems arising from reverse competition, the definition of reverse competition and provisions which, in fact, protect consumers from reverse competition.
Key Issues in Development of NAIC Lender-Placed Insurance Model Law

Discussion with Florida Office of Insurance Regulation

October 31, 2018

Birny Birnbaum
Center for Economic Justice
The Center for Economic Justice

CEJ is a non-profit consumer advocacy organization dedicated to representing the interests of low-income and minority consumers as a class on economic justice issues. Most of our work is before administrative agencies on insurance, financial services and utility issues.

On the Web: www.cej-online.org
About Birny Birnbaum

Birny Birnbaum is the Director of the Center for Economic Justice, a non-profit organization whose mission is to advocate on behalf of low-income consumers on issues of availability, affordability, accessibility of basic goods and services, such as utilities, credit and insurance.

Birny, an economist and former insurance regulator, has authored reports and testimony for numerous public agencies and consumer organizations, covering a wide variety of topics, including analysis of insurance markets, insurers’ use of big data, market regulation, force-placed insurance, homeowners and flood insurance, consumer credit insurance, title insurance and insurance credit scoring. He has served for many years as a designated Consumer Representative at the National Association of Insurance Commissioners. He is a member of the Federal Advisory Committee on Insurance, chairing the Subcommittee on Affordability and Availability of Insurance.

Birny served as Associate Commissioner for Policy and Research and the Chief Economist at the Texas Department of Insurance. In that role, Birny was responsible for review and approval of rate filings, the development of data collection programs for market surveillance and the analysis of competition in numerous insurance markets.

Prior to his work at the TDI, Birny served as Chief Economist at the Texas Office of Public Insurance Counsel where he provided expert testimony in rate and rule hearings on behalf of insurance consumers before the TDI. While at OPIC, Birny performed the first auto insurance redlining study in Texas.

Birny was educated at Bowdoin College and the Massachusetts Institute of Technology. He holds the AMCM certification.
Summary

Contrast CEJ and Industry arguments on the basis of facts and evidence.

1. Tracking Expenses Are Not Insurance Expenses and Must Be Excluded from LPI Rates and LPI Charges to Borrowers.

2. All Kickbacks Must Be Prohibited to Stop the Kickback Mentality of LPI Insurers and Lenders/Servicers. So-Called “Implementation Expenses” Are Just Another Kickback and Must Not Be Permitted.


4. The Model Must Include Disclosure Requirements and Such Requirement Should Track Those of the CFPB Mortgage Servicing Rule.

5. A Servicer’s LPI Charge to a Borrower is Not an Insurance Premium.
## Key Features of LPI Vs. Homeowners Insurance

LPI is a Group Master Policy Issued to Servicer Covering All Properties Automatically As Needed If Borrower’s Voluntary Coverage Lapses.

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1. Tracking Expenses Are Not Insurance Expenses and Must Be Excluded from LPI Rates and LPI Charges to Borrowers.

a. Insurance is Required by the Lender and Mortgage Contract, Not the Insurance Policy. Tracking of Insurance Follows From the Mortgage Contract Requirement.

**Fannie Mae Standard Contract: Property Insurance.** Borrower shall keep the improvements now existing or hereafter erected on the Property insured against loss by fire, hazards included within the term “extended coverage,” and any other hazards including, but not limited to, earthquakes and floods, **for which Lender requires insurance.** This insurance shall be maintained in the amounts (including deductible levels) and for the periods **that Lender requires.** What Lender requires pursuant to the preceding sentences can change during the term of the Loan. The insurance carrier providing the insurance shall be chosen by Borrower subject to Lender’s right to disapprove Borrower’s choice, which right shall not be exercised unreasonably.

If Borrower fails to maintain any of the coverages described above, Lender may obtain insurance coverage, at Lender’s option and Borrower’s expense. Lender is under no obligation to purchase any particular type or amount of coverage. Therefore, such coverage shall cover Lender, but might or might not protect Borrower, Borrower’s equity in the Property, or the contents of the Property, against any risk, hazard or liability and might provide greater or lesser coverage than was previously in effect. Borrower acknowledges that the cost of the insurance coverage so obtained might significantly exceed the cost of insurance that Borrower could have obtained. **Any amounts disbursed by Lender under this Section 5 shall become additional debt of Borrower secured by this Security Instrument.** These amounts shall bear interest at the Note rate from the date of disbursement and shall be payable, with such interest, upon notice from Lender to Borrower requesting payment.
b. Tracking is a Responsibility of the Lender/Servicer

i. Fannie/Freddie Servicing Guidelines

Fannie Mae Servicing Guidelines, Section B

The servicer must ensure at all times that any required property insurance coverage is maintained to protect Fannie Mae’s interest in the mortgage loan.

The servicer must

- Verify annually that the selected insurance carrier, policy amount and type of coverage meet Fannie Mae’s requirements
- Ensure property premiums are paid
- Immediately obtain new coverage to meet Fannie Mae’s requirement if the borrower allows the insurance coverage to lapse. See B-6-01, Lender-Place Insurance Requirements for additional information.
Fannie Mae Servicer Responsibilities Related to Lender-Placed Insurance

If the servicer cannot obtain evidence of acceptable property or flood insurance for a property securing a mortgage loan, the servicer must obtain lender-placed insurance in compliance with Fannie Mae’s insurance requirements.

The servicer must

- Only issue lender-placed insurance coverage after it makes unsuccessful attempts to obtain evidence of insurance in accordance with applicable law.
- Not use a lender-placed insurance carrier that is an affiliated entity, as defined below, for a lender-placed insurance policy, including any captive insurance or reinsurance arrangements with an affiliated entity.
- Exclude any lender-placed insurance commissions or payments (including any incentive based compensation regardless of its designation as commission, bonus, fees, or other types of payments from the servicer’s lender-placed insurance carrier; for example, underwriting bonuses or other payments based on insurance loss ratios) earned on a lender-placed insurance policy by the servicer, broker, or any affiliated entity, as defined below, from the lender-placed insurance premiums charged to the borrower or submitted for reimbursement from Fannie Mae.
- In compliance with applicable law, terminate any lender-placed insurance, and refund all lender-placed insurance premiums and fees charged during any period of coverage overlap.
ii. Flood Disaster Protection Act, 42 USC 4012(b)1.

Each Federal entity for lending regulation . . . . shall by regulation direct regulated lending institutions—

(A) not to make, increase, extend, or renew any loan secured by improved real estate or a mobile home located or to be located in an area that has been identified by the Administrator as an area having special flood hazards and in which flood insurance has been made available under the National Flood Insurance Act of 1968 . . . unless the building or mobile home and any personal property securing such loan is covered for the term of the loan by flood insurance in an amount at least equal to the outstanding principal balance of the loan or the maximum limit of coverage made available under the Act with respect to the particular type of property, whichever is less;
iii. Regulation Z (12 CFR 1024) Mortgage Servicing Requirements

Section 1037:

(b) Basis for charging borrower for force-placed insurance. A servicer may not assess on a borrower a premium charge or fee related to force-placed insurance unless the servicer has a reasonable basis to believe that the borrower has failed to comply with the mortgage loan contract's requirement to maintain hazard insurance.

(c) Requirements before charging borrower for force-placed insurance -

(1) In general. Before a servicer assesses on a borrower any premium charge or fee related to force-placed insurance, the servicer must:

(i) Deliver to a borrower or place in the mail a written notice containing the information required by paragraph (c)(2) of this section at least 45 days before a servicer assesses on a borrower such charge or fee;

(ii) Deliver to the borrower or place in the mail a written notice in accordance with paragraph (d)(1) of this section; and
(iii) By the end of the 15-day period beginning on the date the written notice described in paragraph (c)(1)(ii) of this section was delivered to the borrower or placed in the mail, not have received, from the borrower or otherwise, evidence demonstrating that the borrower has had in place, continuously, hazard insurance coverage that complies with the loan contract's requirements to maintain hazard insurance.

(d) Reminder notice -

(1) In general. The notice required by paragraph (c)(1)(ii) of this section shall be delivered to the borrower or placed in the mail at least 15 days before a servicer assesses on a borrower a premium charge or fee related to force-placed insurance. A servicer may not deliver to a borrower or place in the mail the notice required by paragraph (c)(1)(ii) of this section until at least 30 days after delivering to the borrower or placing in the mail the written notice required by paragraph (c)(1)(i) of this section.
(e) Renewing or replacing force-placed insurance -

(1) In general. Before a servicer assesses on a borrower a premium charge or fee related to renewing or replacing existing force-placed insurance, a servicer must:

(i) Deliver to the borrower or place in the mail a written notice containing the information set forth in paragraph (e)(2) of this section at least 45 days before assessing on a borrower such charge or fee; and

(ii) By the end of the 45-day period beginning on the date the written notice required by paragraph (e)(1)(i) of this section was delivered to the borrower or placed in the mail, not have received, from the borrower or otherwise, evidence demonstrating that the borrower has purchased hazard insurance coverage that complies with the loan contract's requirements to maintain hazard insurance.
Charging a borrower before end of notice period. Notwithstanding paragraphs (e)(1)(i) and (ii) of this section, if not prohibited by State or other applicable law, if a servicer has renewed or replaced existing force-placed insurance and receives evidence demonstrating that the borrower lacked insurance coverage for some period of time following the expiration of the existing force-placed insurance (including during the notice period prescribed by paragraph (e)(1) of this section), the servicer may, promptly upon receiving such evidence, assess on the borrower a premium charge or fee related to renewing or replacing existing force-placed insurance for that period of time.

Cancellation of force-placed insurance. Within 15 days of receiving, from the borrower or otherwise, evidence demonstrating that the borrower has had in place hazard insurance coverage that complies with the loan contract's requirements to maintain hazard insurance, a servicer must:

1. Cancel the force-placed insurance the servicer purchased to insure the borrower's property; and

2. Refund to such borrower all force-placed insurance premium charges and related fees paid by such borrower for any period of overlapping insurance coverage and remove from the borrower's account all force-placed insurance charges and related fees for such period that the servicer has assessed to the borrower.
(h) Limitations on force-placed insurance charges -

(1) In general. Except for charges subject to State regulation as the business of insurance and charges authorized by the Flood Disaster Protection Act of 1973, all charges related to force-placed insurance assessed to a borrower by or through the servicer must be bona fide and reasonable.

(2) Bona fide and reasonable charge. A bona fide and reasonable charge is a charge for a service actually performed that bears a reasonable relationship to the servicer's cost of providing the service, and is not otherwise prohibited by applicable law.

Summary: The Servicer is responsible for ensuring required insurance is in place and is responsible for any tracking associated with this requirement.
c. The Lender/Servicer is Paid by Mortgage Owners to Perform Tracking

Servicers are paid a fee by mortgage owners/investors to service the mortgage loan. Thomas Pinkowish, author of the text *Resident Mortgage Lending*, 6th Edition, writes that for a loan servicer to fulfill these responsibilities, the servicer will typically have separate departments to perform five essential functions:

1. Payment Processing
2. Loan Accounting
3. Escrow Administration
4. Customer Service
5. Delinquency and Collection
Pinkowish describes the escrow administration department activities related to insurance and the role of LPI:

“The escrow administration department ensures the protection of the security interest by determining whether adequate coverage is in place and is current with a mortgagee-payable clause for required insurances or credit guarantees. This may include the following: hazard, flood, private mortgage, FHA, VA, or other state/federal housing agency insurance or credit guarantee. It monitors in a similar manner the status of real estate tax payments for all towns in which the servicer has loans.

The escrow administration accomplishes this in one of three ways: it either collects funds from the borrower and disburses payments for all required taxes and policies; it monitors the status of tax payments and required policies, “force-placing” them if it receives notification of cancellation; or, a less common approach is to take out a blanket or umbrella insurance policy – a mortgage impairment policy – to cover any losses sustained as a result of individual loan tax liens or insurance lapses of coverage.”
d. Including Tracking in LPI Rates and LPI Charges to Borrowers Causes Lenders/Servicers to Be Paid Twice for Tracking

Since mortgage owners/investors pay a fee to servicers that covers, among other things, insurance tracking, including insurance tracking in LPI rates and LPI charges to borrowers pays the servicer twice for the same activity.

In addition, including tracking in LPI rates and LPI charges to borrowers means that only those borrowers charged for LPI pay for the insurance tracking expenses in LPI rates – with the outcome that, say, 2% of borrowers pay for an expense properly associated with the entire portfolio of borrowers.

Even if no borrower failed to maintain required insurance, the servicer would still be required to perform insurance tracking to cover the possibility of such a lapse.
e. Tracking is Not Used for Risk or Exposure Management

i. Schedule Rating Shows Underwriting Based on Aggregate Loan Portfolio Characteristics, Not Individual Loan Tracking Info
G. SCHEDULE RATING PLAN
In recognition of the unique risk characteristics of each mortgagee, the rates may be modified in accordance with the following schedule to reflect characteristics of the risk not contemplated in the base rates.

The maximum rate modification is (+) or (-) 25%.

1) Criteria

<table>
<thead>
<tr>
<th>Quality of Loan Underwriting</th>
<th>Range of Modification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Debit</td>
<td>Credit</td>
</tr>
<tr>
<td>(+20%)</td>
<td>(-20%)</td>
</tr>
</tbody>
</table>

(1) Quality of Underwriting
(2) Source of Real Estate Loans - Direct and Indirect
(3) Overall Delinquency Ratio
(4) Average Loan to Value

b) Quality of Loan Portfolio +15% to -15%

(1) Mix - Government and Conventional
(2) Mix - Fixed and Variable
(3) Escrowed for Payment of Insurance

c) Transactional Efficiency +10% to -10%

Systems Compatibility, Data Quality/Accuracy, Automation, Reconciliation Capabilities, Service Standards

d) Management Experience +10% to -10%

2) The credits or debits shall be summed and, if applicable, capped by the maximum modification to determine the schedule rate modification.

3) All schedule credits and all schedule debits shall be based on evidence that is contained in the file at the time the schedule credit or debit is applied.

4) The effective date of any schedule credit or debit shall not be any date prior to our receipt of the evidence supporting the credit or debit.

5) Any modification developed under this plan shall be for the term of the policy, subject to company review. If the modification proves to be inequitable because of materially changed conditions, a new modification based upon such changed conditions shall be established. The new modification will apply to all new and renewal certificates effective on or after the date of such change.

6) To be eligible, a minimum policy premium of $1,000 applies.
The following debits and credits will be applied to the appropriate base rates to recognize special characteristics of the risk not contemplated in our base rates. The maximum modification allowed is ± 25%. Documentation supporting qualification for scheduled rating will be maintained by this the policy term, new debits/credits will be calculated and applied on future coverage requests.

<table>
<thead>
<tr>
<th>Risk Characteristics</th>
<th>Range of Modification</th>
<th>Lender Rating</th>
</tr>
</thead>
<tbody>
<tr>
<td>30+ day contractual delinquency rate measured as a % of total active mortgage loans.</td>
<td>-15%</td>
<td>0.00%</td>
</tr>
<tr>
<td></td>
<td>+15%</td>
<td></td>
</tr>
<tr>
<td>Foreclosure loans measured as a % of total active mortgage loans.</td>
<td>-10%</td>
<td>0.00%</td>
</tr>
<tr>
<td></td>
<td>+10%</td>
<td></td>
</tr>
<tr>
<td>Named Insured choice to purchase coverage for the lesser of value of improvements or unpaid principal balance.</td>
<td>-10%</td>
<td>0.00%</td>
</tr>
<tr>
<td></td>
<td>+10%</td>
<td></td>
</tr>
<tr>
<td>Operating Expenses Associated with Lender Placed Program</td>
<td>-15%</td>
<td>0.00%</td>
</tr>
<tr>
<td></td>
<td>+15%</td>
<td></td>
</tr>
<tr>
<td>Loss History for Hazard Insurance Protection</td>
<td>-15%</td>
<td>0.00%</td>
</tr>
<tr>
<td></td>
<td>+15%</td>
<td></td>
</tr>
<tr>
<td>Concentration of exposures in high risk (catastrophe prone) areas.</td>
<td>-15%</td>
<td>0.00%</td>
</tr>
<tr>
<td></td>
<td>+15%</td>
<td></td>
</tr>
<tr>
<td>Average property values.</td>
<td>-15%</td>
<td>0.00%</td>
</tr>
<tr>
<td></td>
<td>+15%</td>
<td></td>
</tr>
<tr>
<td>TOTAL</td>
<td></td>
<td>0.00%</td>
</tr>
</tbody>
</table>

Maximum Debit or Credit to be applied is 25%
Qualifier - Minimum Size of Account Must Equal $500,000 Annual W.P. or 50,000 loans
<table>
<thead>
<tr>
<th>Factors</th>
<th>Decrease</th>
<th>Increase</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Loan Portfolio Size</td>
<td>1%</td>
<td>Over 20,000</td>
</tr>
<tr>
<td>2. Loan Origination Type</td>
<td>5%</td>
<td>100% Direct</td>
</tr>
<tr>
<td>3. Geographical Concentration</td>
<td>15%</td>
<td>90% Low Risk Area</td>
</tr>
<tr>
<td>4. #Foreclosed/REO Properties</td>
<td>5%</td>
<td>1% or less</td>
</tr>
<tr>
<td>5. #Foreclosed Commercial Properties</td>
<td>5%</td>
<td>1% or less</td>
</tr>
<tr>
<td>6. Delinquency Ratios</td>
<td>5%</td>
<td>National Average</td>
</tr>
<tr>
<td>7. Combined Ratio History</td>
<td>5%</td>
<td>Below 95.0%</td>
</tr>
<tr>
<td>8. Combined Ratio History</td>
<td>10%</td>
<td>Between 95.1% - 97.5%</td>
</tr>
<tr>
<td>9. Combined Ratio History</td>
<td>15%</td>
<td>Between 97.6% - 100.0%</td>
</tr>
<tr>
<td>10. Combined Ratio History</td>
<td>20%</td>
<td>Above 100.0%</td>
</tr>
<tr>
<td>11. General Management Capability</td>
<td>1%</td>
<td>Average of #'s 3+4+5+6 above</td>
</tr>
</tbody>
</table>
ii. UW based on Aggregate Loan Portfolio Characteristics Makes Sense / UW based on Individual Loan Tracking Does Not

1. If Tracking was required for exposure management / underwriting, no company would be able to write new business or secure reinsurance because it would not have individual policy data. Fact is that LPI insurers do secure new business and do obtain reinsurance, despite the fact that the number and location of LPI-insured properties can and does change quickly over time. How is this possible? Risk and exposure management based on loan portfolio characteristics – LPI insurers know what loan portfolio characteristics – and general economic conditions – are associated with higher or lower placement rates in what locations.
2. With no individual property underwriting and take all comers, LPI portfolio today is no guaranty – or necessarily even a good indication of – LPI portfolio in six months as LPI coverages come on and off the books for a variety of factors. Unlike traditional homeowners with the ability to underwrite and a reasonable expectation that today’s exposures will be very similar to those in nine months, same argument cannot be made for LPI with no underwriting of individual properties
iii. Existence of Blanket LPI – LPI Coverage Based on Total Exposure (e.g., total outstanding principal balance) with no tracking and individual charges to borrowers – demonstrates tracking *not* required for sale and administration of LPI.
f. If Blanket Coverage is Available, Why is Tracking Done?

- To enable mortgage owners to reimburse servicers for LPI charges unpaid by borrowers (and, consequently, the requirements by Fannie/Freddie/Mortgage-Backed Security Investors for insurance tracking by servicers.)

- To charge for LPI only those borrowers who have lapsed coverage.
g. Tracking Not a “Marketing” Expense

Communication with Borrowers, Voluntary Insurers and Agents Regarding Required Insurance is Lender/Servicer Responsibility.
h. Distinction Between Who *Performs* Tracking and Who is *Responsible* for Tracking; Between Who *Performs* Tracking and Who *Pays or Should Pay* for Tracking;

i. Fact That Servicer Outsources Tracking to Vendor Providing LPI Does Not Make Tracking a LPI Expense.

ii. Fact That Servicer Outsources Tracking Does Not Change Fact That Mortgage Owner/Investor Has Paid Servicer to Track Loans for Insurance to Protect the Owner/Investor’s Interest.
2. All Kickbacks Must Be Prohibited to Stop the Kickbacks by LPI Insurers to Lenders/Servicers. So-called “Implementation Expenses” Are Just Another Kickback and Must Not Be Permitted.

a. LPI Market is Glaring Example of Reverse Competition – Competition for Business Based on Kickbacks – “Commissions,” “Expense Reimbursement,” Captive Reinsurance, Affiliated Business Arrangements, Free and Below-Cost Services
b. LPI Insurers’ Business Model – Use Kickbacks to Secure Business Even If Such Kickbacks Are Prohibited – Getting Caught is Infrequent and Cost of Doing Business.

i. In lieu of “commissions” to servicer-affiliated agencies, LPI insurer buys the agency for an amount equal to prepaid commissions

ii. Original NY and FL settlements – “exception” became massive loophole (since closed by NY DFS) – did not result in lower LPI rates or lower LPI charges to borrowers

ASIC shall not provide free or below-cost outsourced services to Servicers or their affiliates, provided, however, that outsourced services do not include expenses associated with tracking functions that ASIC incurs for its own benefit to identify and protect itself from (a) exposure to lost premium and losses on properties on which no other insurance coverage is in effect or (b) administrative costs associated with providing and subsequently canceling LPI on properties on which LPI is not required;
c. Current Proposed Loophole Expansive, Impossible to Enforce and License for Kickbacks

The prohibitions and requirements set forth in this paragraph shall not preclude an insurer or insurance producer from **reimbursing implementation expenses incurred by a lender/servicer.** Implementation expenses that are reimbursed shall be supported by documentary or other physical or electronic evidence (including but not limited to invoices and work orders) of their expenditure by the lender/servicer. Such expenses must bear a direct relationship to the implementation of the insurer’s or insurance producer’s lender-placed insurance program at program inception.

i. No rationale for permitting implementation expenses – makes no more sense here than it would to permit State Farm to reimburse some consumers for “implementing” his or her auto or homeowners policy.
ii. Insurance regulators have no more knowledge of “implementation expenses” than they have had of any of the other inappropriate expenses because mortgage servicing is not an area of insurance regulator expertise. Insurers and servicers have employed regulatory arbitrage — insurance regulators’ lack of knowledge about loan servicing — to exploit loopholes like “implementation expenses” and “tracking for own benefit” to continue the kickback structure of LPI markets.

iii. Practically, impossible to implement this regulatory requirement – insurer can call a kickback an implementation expense and, absent forensic accounting, impossible to detect.

iv. Absolute, total prohibition against any considerations by LPI insurer to servicer —other than the protection of the collateral pledged for the loan – essential for addressing reverse competition and stopping kickbacks paid for by borrowers.

a. Settlement – negotiation – to avoid litigation.

b. Negotiation between two parties with no public input.

c. Not a rulemaking process with opportunity for interested parties to inform the discussion.

d. Insurance regulators’ history of permitting loopholes with unintended consequences.

e. Continues to permit and authorize kickbacks

5. Litigation and Filed-Rate Doctrine Defense
OIR Questions in Italics

The focus of our conversation on October 31, 2018, centered around whether tracking or implementation expenses should be included in rates for Lender Placed Insurance. The regulatory settlement agreements executed by LPI insurers did not preclude tracking expenses in LPI rates on the theory that reasonable expenses should and could be included. However, questions have been raised about exactly how those expenses are incurred and by whom, who pays for and is paid for such services and whether those expenses should be paid out of the LPI premium or the loan transaction. To help answer these questions, and to prepare for the follow up call on November 28, 2018 it would be helpful for both parties to provide written answers to the questions below. Please refer to the discussion document provided for the October 31, 2018 call.

CEJ Response: It is unclear why the regulatory settlement agreements did or did not include anything because the discussions were not public nor open to public comment. The reason that tracking expenses – as explicitly defined in the CEJ proposal to the NAIC LPI working group – must be excluded from LPI rates – and, consequently, LPI charges to borrowers – is because these expenses are not associated with the provision of LPI and, consequently, are unreasonable to include in LPI rates. Tracking expenses are as unreasonable to include in LPI rates as:

- expenses associated with disbursing funds from borrowers’ escrow accounts for hazard insurance (“escrow administration”), or
- expenses associated with monitoring claim-related repairs on voluntary insurance policies (“loss drafts”), or
- expenses associated with loading information from the loan application into the servicing system of record databased (“onboarding”).

Activities not related to the actual provision of LPI are unreasonable to include in LPI rates and, consequently, in LPI charges to borrowers. The table below identifies various activities associated with tracking voluntary insurance and placing LPI and whether those activities are the responsibility of the servicer (who may outsource the activity) or of the insurer. It is only those activities identified as the responsibility of the insurer that are reasonable expenses to include in LPI rates.
### Servicing and Insurance Activities Related to LPI

<table>
<thead>
<tr>
<th>Activity</th>
<th>Servicing vs. Insurance</th>
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<tbody>
<tr>
<td><strong>Tracking Insurance</strong></td>
<td></td>
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<tr>
<td>Flood Zone Determination</td>
<td>Servicing</td>
</tr>
<tr>
<td>Loading Insurance Information into Database</td>
<td>Servicing</td>
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<tr>
<td>Maintaining/Monitoring Insurance Tracking Database</td>
<td>Servicing</td>
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<tr>
<td>Contacting Borrowers, Problems with Insurance</td>
<td>Servicing</td>
</tr>
<tr>
<td>Customer Service Borrowers Insurance Evidence</td>
<td>Servicing</td>
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<tr>
<td>Contacting Insurers/Agents Insurance Evidence</td>
<td>Servicing</td>
</tr>
<tr>
<td><strong>Placing Insurance</strong></td>
<td></td>
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<tr>
<td>Notifying Insurer to Issue Binder or Policy</td>
<td>Servicing</td>
</tr>
<tr>
<td><strong>Issuing Temporary Binder</strong></td>
<td>Insurance</td>
</tr>
<tr>
<td>Determining Coverage Amount</td>
<td>Servicing</td>
</tr>
<tr>
<td><strong>Servicer Payment to Insurer</strong></td>
<td>Insurance</td>
</tr>
<tr>
<td>Billing Borrower for LPI Premium</td>
<td>Servicing</td>
</tr>
<tr>
<td>Setting up Escrow when necessary for LPI</td>
<td>Servicing</td>
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<tr>
<td><strong>Refunds to Servicer</strong></td>
<td>Insurance</td>
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<tr>
<td>Refunds to Borrower</td>
<td>Servicing</td>
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<tr>
<td><strong>Issuing Permanent Policy</strong></td>
<td>Insurance</td>
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<tr>
<td>Customer Service about Insurance Placement</td>
<td>Servicing</td>
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<tr>
<td>Customer Service about Borrower Refunds</td>
<td>Servicing</td>
</tr>
<tr>
<td><strong>Customer Service about LPI Claims</strong></td>
<td>Insurance</td>
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</tbody>
</table>

The kickback mechanism can be illustrated as follows. Let’s assume that the true cost of providing LPI coverage through a group policy in which individual coverages are issued at the direction of the servicer is $X. But, the LPI insurer charges a premium amount to the servicer of $2X. The servicer then assesses a charge to the borrower styled as LPI of $2X. But the true cost of the LPI to servicer is not $2X, but $X because the LPI vendor provides considerations worth another $X to the servicer. This was historically done through “commissions,” “expense reimbursements,” “captive reinsurance” and below-cost or free services unrelated to the provision of LPI. Since most of these standard kickback mechanisms have been prohibited, the go-to kickback mechanism is free or below-cost services. That is why the language in the NY and FL settlements allowing “tracking for the insurers’ purpose” was revised by NY – it was exploited by the LPI vendors to include all types of tracking expenses in LPI rates.
1. Slide 5 of the attached presentation asserts that any amounts disbursed by the Lender for LPI premium shall become additional debt of Borrower secured by property and subject to interest from date of disbursement. Please confirm that when the borrower reimburses the LPI premium to the Lender either directly or via the servicer, this provision does not apply. Please also confirm and clarify that if the property goes to foreclosure, the LPI premium payment is reimbursed from the mortgage guarantor, such as generally Fannie Mae or Freddie Mac.

CEJ Response: This description is essentially correct. To be more specific, for non-blanket coverage, the LPI insurer charges a premium to the servicer – who is the named insured – for coverage issued under the LPI master policy. There is then a separate transaction in which the servicer assesses a charge to the borrower allegedly for LPI.

The charge to the borrower is added to the borrower’s escrow account for insurance and taxes. Once the LPI charge is added to the borrower’s escrow account, the monthly mortgage payment is typically revised to an amount sufficient to pay off / accumulate the LPI charge over the year. While the LPI charge remains part of the escrow, there is no additional debt or interest. The LPI charge becomes additional debt if the loan goes into default. So, if a borrower makes the monthly payments covering the LPI charge, no additional debt or interest is added to the loan.

If the loan goes into default and becomes REO (real-estate owned), the servicer will proceed to foreclosure and eventually sell the property. The owners of the loan or the guarantors of the loan are responsible for reimbursing the servicer for all costs incurred by the servicer in servicing the loan and which have not been reimbursed to date – including unpaid LPI charges.

2. The following questions relate to slides 14 and 16 and the conclusion that since mortgage owners/investors pay a fee to servicers for insurance tracking, inclusion of these expenses in LPI rates means the borrower pays for this service twice.

A) Slide 14 indicates Lender/Servicer is paid by Mortgage Owners to perform tracking. Please document if this is a separate fee from the loan agreement or if it has another source and if so what is source of the funds and to whom is it paid.

CEJ Response: As described in the text on mortgage lending (“Pinkowish”), a servicer is paid a fee for performing nearly all servicing activities. Exceptions – meaning additional charges beyond the servicing fee – may occur for foreclosure-related activities. But escrow administration is clearly part of the services covered by the servicing fee. And the purpose of escrow administration is, among other things, to ensure the property serving as collateral is protected. So, escrow administration includes not only monitoring voluntary insurance, but collecting periodic payments from borrowers (in the escrow account) to pay the voluntary insurance premium and property taxes when due. The servicer can only carry out the insurance responsibilities if the servicer is tracking insurance coverage. Again, the fact that the servicer contracts out this responsibility to a LPI vendor does not make the expenses associated with responsibility a LPI expense.
B) Document whether insurance tracking is done by the Lender only, by the Servicer only or if contractually done by another party, including the LPI insurer.

CEJ Response: The documentation for this will be found in agreements between the servicer (or lender if the lender is servicing its own loans) and the LPI vendor. Historically, the largest banks were also the largest mortgage servicers (Wells Fargo, Bank of America, Chase, Citi). Much of the servicing of loans owned by others has moved to non-bank servicers like Nationstar and Ocwen.

However, if the Lender uses a servicer, then any agreement for loan tracking services will be between the servicer and the LPI vendor providing loan tracking.

It is also important to note that Assurant is in a class by itself in the LPI market. Assurant provides LPI for some 75% of mortgage loans, counts the largest servicers among its clients and has publicly stated that it requires the servicer to outsource tracking to Assurant as a condition of providing LPI.

The remainder of the market – which includes thousands of small and medium sized banks and credit unions – are served by a handful of LPI vendors typically structured as a managing general agency that shops for an LPI insurer. If you review the websites for these second tier LPI vendors – National General\(^1\), Proctor Financial\(^2\), SWBC, Loan Protector\(^3\), Miniter\(^4\) – you’ll see that these vendors offer LPI without tracking, offer tracking only, offer LPI with tracking and several other options. You will also see options for blanket LPI coverage without tracking or individual charges to borrowers.

C) Please document whether the tracking expenses included in an LPI rate filing are those amounts paid by the insurance company for tracking activities they perform for the servicer or if there are separate tracking activities that the insurance company does, and are these tracking expenses done by the servicer not related to company activities and actual expense.

CEJ Response: Respectfully, this question is asking Assurant to admit the company engages in kickbacks in order to win and maintain business. The explanations given by various LPI vendors over time as justification for using these expenses are factually incorrect, but difficult for insurance regulators not versed in the details of mortgage servicing to spot. That misinformation was successful in thwarting regulatory intent with the original NY and FL LPI settlements and was successful again in the multi-state settlement which, again, codified kickbacks by allowing the inclusion of expenses in LPI rates for activities unrelated to the provision of LPI.

\(^1\) http://www.nationalgeneral.com/lenderservices/
\(^2\) http://www.pfic.com/insurance-products/
\(^3\) https://www.loanprotector.com/insurance-solutions/
\(^4\) https://www.miniter.com/our-services/information-for-loan-servicers/
D) Slide 16 indicates mortgage owners/investors pay a fee to servicers that covers insurance tracking and so to include insurance tracking in LPI rates means borrowers pay the servicer twice for the same activity. Please explain in detail how this result occurs and what the contractual relationship of the parties is and who pays whom for what services which result in double paying by the borrower.

**CEJ Response:** In simple terms, the income to a mortgage owner is the interest on the loan paid by the borrower. The mortgage owner pays the servicer a fee which is taken out of this interest payment. The typical mortgage servicing fee is 0.25% of outstanding loan balance. So, if the mortgage interest rate is 5.00%, the servicer collects the payment and remits 4.75% of the interest portion of the monthly payment plus the principal repayment portion of the monthly payment.

As discussed above, and explain by Pinkowish, this fee covers escrow administration and, consequently, covers insurance tracking. So the servicer is paid, through the servicing fee, for insurance tracking (as well as other activities related to protecting the property serving as collateral for the loan). If the LPI rates include tracking expenses, then the servicer is paid twice for tracking because the servicer is reimbursed—either by the borrower or mortgage owner or mortgage guarantor—for LPI premiums the servicer has paid. Thus, the servicer is paid twice for tracking—once through the servicing fee and once through the amounts paid to the servicer for “LPI.”

3. The second paragraph of Slide 16 indicates that including tracking in LPI rates means that only those borrowers charged for LPI insurance pay for these services instead of charging all borrowers for tracking expenses. Is the basic proposal, then, to remove tracking expenses from LPI premium and instead have all borrowers pay tracking expenses as part of the loan transaction? We specifically request that Assurant respond to this concept and identify any concerns that would be created by changing how tracking is done and paid for and by whom and the feasibility of this concept.

**CEJ Response:** All borrowers already pay for tracking because the interest payment borrowers make covers the servicing fee paid to servicers which covers the insurance tracking activities. This is clearly reasonable and appropriate because while insurance tracking is used to identify a small percentage of properties whose insurance has lapsed and for whom LPI is placed, the vast majority of tracking activity is related to monitoring insurance to be able to disburse funds from escrow to pay renewal premiums.

The argument to exclude tracking expenses from LPI rates is based on the fact that tracking is not related to the provision of LPI and, consequently, is an unreasonable expense. It is also unfair for several reasons:

- it causes services to be paid twice for tracking,
- it imposes this second tracking expense on a small number of borrowers for whom LPI is placed even though tracking is a portfolio-wide expense and
- it creates unfair competition because the largest LPI vendor has far more resources to provide considerations to servicers as an inducement to win or maintain business. This is obvious from a market in which one LPI vendor has a 75% market share.
Attached is the financial supplement to the 2018 Q3 Assurant quarterly financial report. The supplement shows, on page 16, that Assurant tracks 35.1 million mortgage loans out of countrywide total of about 50 million mortgages. This is increase of 5.6 million loans tracked – over 10% of the entire market – since 2010Q1 when Assurant tracked 29.5 million loans. Despite the tremendous shifts in mortgage servicing among large banks and non-bank servicers, Assurant has gowned its market share.

Of course, the most compelling evidence of the kickback structure of LPI markets are the low loss ratios – loss ratios for LPI half of those for homeowners, despite no individual underwriting, group policies covering hundreds of thousands of properties and lesser coverage (no contents or additional living expenses). The low loss ratios are not a function of significantly higher reinsurance costs nor higher average claim costs since average claim costs for LPI are about the same as for homeowners insurance. Despite demonstrably lower expenses for marketing and underwriting a group policy compared to hundreds of thousands of individual property policies, actual expense ratios for LPI are far higher than for homeowners. This can only be explained by the fact that kickbacks are being included in expense provisions in filings submitted by LPI insurers.

4. Questions on Tracking and Exposure management:

A) Slide 17 concludes that tracking is not used for exposure management because schedule rating has charges based on Aggregate Loan Portfolio Characteristics, not individual loan tracking information. Does pricing for characteristics mean tracking is not used for risk or exposure management?

**CEJ Response:** First, the schedule rating examples are evidence – facts – that demonstrate that tracking is not used for “exposure management” or “risk management.” Assurant’s claims, in contrast, are claims unsupported by empirical evidence. While some of the false claims made by Assurant are difficult for insurance regulators to spot since a knowledge of mortgage servicing is needed, the false nature of the “risk management” claims should be easy for insurance regulators to spot.

During the October 31, 2018 call, Assurant's alleged two rationales for including tracking as a LPI expense -- to keep track of amounts owed them by the servicer and for reinsurance requirements (“we provide 50 reinsurers data on our exposures”). The Assurant arguments confuse their exposure with their in-force coverages.
Assurant's exposure is comprised of all the properties serving as collateral for loans in the servicer's portfolio because coverage may be issued from the master policy for any of these properties if voluntary coverage lapses. That is why risk management and underwriting is performed on the basis of loan servicing portfolio characteristics and not individual loan tracking data. While there will be significant churn in the actual properties insured over, say, a 12 month period within a particular portfolio, the aggregate characteristics of the portfolio provide information for accurate exposure management. Based on, for example, the type of loans, whether escrowed or not, the average size of loans, percentage in late pay status and other characteristics identified in scheduled rating worksheets, Assurant (or reinsurers) can accurately gauge their risk exposure -- even though they don't know with any certainty what specific properties will actually be insured in six months.

In contrast, policy administration is what insurers use to keep track of coverages issued, premiums charged and premiums owed. In the case of LPI -- depending on the particular servicer loan portfolio -- perhaps 1% to 3% of exposures (properties on all loans) will have coverage in place at any given time. An insurer uses a policy administration system to keep track of insurance in place and premiums charged and premiums owed -- that is not the purpose or use of insurance tracking. Insurance tracking is designed to identify whether and which properties in the entire portfolio have required insurance coverage. An insurer does not use insurance tracking to keep track of premium owed by the servicer to the insurer. While a LPI insurer like Assurant may require that the servicer utilize Assurant for tracking because Assurant wants to be sure that lapsed loans are accurately identified, that requirement by Assurant does not alter the fact that tracking is a servicer responsibility and not an appropriate expense in LPI rates or LPI charges to borrowers.

Regarding reinsurance, the reports that Assurant routinely provides to reinsurers -- and which Assurant uses for claims in the event of catastrophes -- are, again, policy administration reports showing which specific properties have LPI in place. Insurance tracking is not part of our used for claim settlement because tracking covers all loans in a portfolio while claims can only occur with coverage in force at the relevant time and information on that coverage in force comes from policy administration and not insurance tracking. And while it is useful for a reinsurer to know the characteristics of an entire loan portfolio so the reinsurer can perform its own risk and exposure management, at the time of a catastrophe, the reinsurer is interested in the actual properties with coverage in place because it is only those properties -- not the entire portfolio subject to insurance tracking -- that may cause claim costs sufficient to trigger reinsurance payments.
CEJ Response to FL OIR LPI Follow Up Questions  
November 26, 2018  
Page 8

B) Assurant indicated that exposure management is used based on trends in the actual LPI portfolio of actual insureds. Please confirm this is true and if true how is the potential liability that the master policy coverage could significantly change, such as in times of financial crisis, accounted for?

CEJ Response: We expect Assurant will not provide any actual evidence that might be reviewed by CEJ. CEJ would point regulators to information Assurant provides to investment analysts as evidence supporting CEJ’s explanation that risk management is based on portfolio characteristics. On the same page 16 of the 2018 Q3 Assurant earnings release supplement, you will see that Assurant provides data on loans tracked, average placement rate, average insured value, percentage of REO properties and spread of exposure by region. “Spread of exposure refers to the location of loans in the loan tracking portfolio, not to the spread of LPI coverages in place – “Geographical spread of exposure is based on the Company's assessment of total insured value for all of Global Housing.”

C) Assurant also indicated that in a rate filing, the tracking expense is needed for exposure management. Please confirm this is true and that the actual tracking expense used in a rate filing does not include escrow management or loan draft cost on voluntary policies

CEJ Response: Again, we expect Assurant will not provide any actual evidence that might be reviewed by CEJ. However, it is unclear what OIR seeks by asking Assurant to “confirm that this is true” and that expenses proposed in the rate filing does not include escrow management or loss draft expenses. Asked differently, what evidence should Assurant provide to make this confirmation? A statement by Assurant “confirming” this is clearly not evidence. We again point regulators to the empirical evidence – despite a product that should have far lower administrative, sales, underwriting and policy issuance expenses as a percentage of premium than homeowners insurance, expense provisions in LPI rate filings are significantly higher. This can only be explained by proposed expense loads in LPI rate filings including amounts for activities unrelated to the provision of LPI.

D) Finally, Assurant further indicated that one of the reasons that tracking expenses should be included in LPI rates is that Assurant performs exposure management better. Please explain this and explain what activities Assurant engages in that the servicer does not and what are they doing relative to tracking expense that is better.

CEJ Response: We have refuted this claim, above.
5. Explain how implementation expenses are a kickback since implementation expenses can be due to an insurer obtaining a new book of business with attendant IT system and other costs that over time need to be recovered.

**CEJ Response:** The proposed model and multi-state regulatory settlement include the following exception to the anti-kickback provision of the model:

The prohibitions and requirements set forth in this paragraph shall not preclude an insurer or insurance producer from reimbursing implementation expenses incurred by a lender/servicer.

First, the implementation expenses referenced are those of the lender/servicer, not the insurer. The insurer’s implementation expenses would be part of general, administrative or sales expense – just as they would be for any insurer for any line of business.

Second, this provision undercuts the general anti-kickback provision by permitting the insurer to provide a consideration to the lender/servicer in exchange for the lender/servicer selecting the LPI vendor. We are a bit puzzled by this provision and the question, since paying a lender/servicer for “implementation expense” is clearly a consideration and a kickback – the LPI vendor is rebating something of value to the insured in exchange for securing the business. If this were proposed for any other line of business, there would be no question of its illegality as a rebate. Suppose Allstate started offering implementation rebates – cash payments – to consumers who purchased a telematics auto insurance policy to cover the consumer’s “implementation costs.”

Third, in addition to being a glaring kickback, this provision promotes unfair competition because the largest LPI vendor has the greatest ability to provide the greatest “implementation expense reimbursement.”

Fourth, the fact that Assurant was able to convince a number of regulators to include this gaping kickback loophole in the regulatory settlement agreement is powerful evidence of the need for an absolute ban on any consideration by the insurer to the servicer other than the protection of the property servicing as collateral for the loan. Permitting things like "implementation expenses" if they can be satisfactorily explained will lead to consumer abuse and unreasonable rates and charges -- the insurer will always explain or shade the explanation in an effort to make any expense seem in compliance with statutory requirements and they are in the cat bird seat of information asymmetry -- they know all the details and how to frame things to get by the regulator, while the regulators, particularly in states where the insurance regulator is separate from the banking regulator, have limited knowledge of mortgage servicing and limited time and resources to do forensic accounting for each rate filing.

Fifth, what “implementation expenses” of the servicer do regulators believe are reasonably included in LPI rates? Suppose the servicer incurs costs to connect its mortgage servicing system to the LPI vendor’s data system? That is a cost of the servicer and part of the servicer’s calculus to use a tracking vendor or switch from an existing tracking vendor.
Sixth, an exception for “implementation expenses” – or tracking expenses – will lead to a lack of uniformity across the states, based in large part on the size and resources of the state to understand and review justifications provided by the LPI insurer. While there are many reasons for rate filing considerations to vary by state – catastrophe exposure, underwriting restrictions – differences in what constitutes a reasonable general, administrative or sales expense for insurance typically sold through countrywide agreements is surely not an expense that should vary by state.

6. Please explain the “loophole” concern discussed on Slide 27 regarding an LPI Insurer buying an agency since the model law indicates that an insurer or producer cannot issue LPI on servicing done by the insurer, insurer producer or affiliate of insurer or insurer producer.

CEJ Response: Attached is a prospectus for Carrington Mortgage issued in Ireland. The prospectus explains that Carrington sold its insurance agency to a third party for an amount equal to expected commissions from LPI. So, instead of an affiliated agency receiving LPI commissions – now a prohibited act – Carrington received these same commissions as an upfront payment with the LPI insurer continuing to pay “commissions” to the third party. Below are relevant excerpts from the prospectus describing the transaction and the warning to investors that the transaction may be found to be illegal.

It would be useful for insurance regulators to examine transactions in which LPI vendors have purchased servicer-affiliated insurance agencies or other servicer-affiliated businesses to determine if such purchases were a consideration for securing the LPI business of the servicer.

Excerpts from Carrington Mortgage Prospectus

Page 219 of PDF
14. DEFERRED REVENUE
Effective November 28, 2012, Carrington Insurance Agency, LLC (“CIA”), formerly known as Telsi Insurance Agency, LLC, entered into a contract to transfer their rights, title and interests to insurance commissions placed on or after the aforementioned effective date. The contract stipulates a minimum required production of $125.0 million in policies placed by CIA at a commission rate of 17%, in exchange for $21.25 million in cash paid to CIA on the effective date. CIA recorded the cash received as deferred revenue which is earned as new policies are placed by CIA. The deferred revenue amount in the accompanying consolidated statements of financial condition was approximately $19.0 million at September 30, 2013 (unaudited) and $21.2 million at December 31, 2012, respectively.

Page 230 of PDF
Insurance Services
Carrington Insurance Agency, LLC (“CIA”), a wholly owned subsidiary of CRES, acts as the insurance agent for placing insurance coverage to protect loans and foreclosed properties serviced by CMS, and maximizing claims recoveries form insurance underwriters for REO properties. CIA receives a commission amount equal to 15% of the net policy amount paid. During the nine months ended September 30, 2013 and 2012 (unaudited), and for the years ended December 31, 2012 and 2011, CIA received approximately $3.0 million, $2.4 million, $3.3 million and $4.5 million, respectively, for performing these services.
Certain regulators, including the New York State Department of Financial Services, have undertaken investigations into the business of lender placed insurance, also known as “force-placed insurance”. Specifically, these regulators have taken the position that where a loan servicer imposes a force placed policy, and the force placed insurance provider pays a commission to an insurance agency affiliated with the servicer imposing the policy, such commission may constitute an improper “kickback”. Should any regulator decide to take action, we may be forced to pay restitution, potentially including the return all or a portion of the pre-paid fees paid to us by obligors under forced-place insurance policies. In addition, in connection with the sale of our insurance agency business, we may be required to refund to the purchaser up to $18,994,510, as of September 30, 2013, of the consideration received from such sale if target levels of net written premiums are not produced within specified periods. Please see “Management’s Discussion and Analysis of Financial Condition and Results of Operations—Contractual Obligations”.

On November 28, 2012, CRES and Carrington Insurance Agency, LLC entered into an asset purchase agreement with a third party buyer to sell certain assets and liabilities of Carrington Insurance Agency, LLC’s insurance agency business for total consideration of $21,250,000. Under the agreement, the sellers may be required to refund to the buyer up to $18,994,510, as of September 30, 2013, of the consideration received from such sale if target levels of net written premiums are not produced within specified periods. Please see “Risk Factors—Risks 82 Relating to Our Business—Real Estate—We may be subject to significant losses relating to refunds from our insurance referral program.”.

Certain regulators, including the New York State Department of Financial Services, have undertaken investigations into the business of lender placed insurance, also known as “force-placed insurance.” Specifically, these regulators have taken the position that where a loan servicer imposes a force placed policy, and the force placed insurance provider pays a commission to an insurance agency affiliated with the servicer imposing the policy, such commission may constitute an improper “kickback.” Should any regulator decide to take action, we may be forced to pay restitution, potentially including the return all or a portion of the pre-paid fees paid to us by obligors under forced-place insurance policies.
7. Please explain how this “loophole” on Slide 27 relative to below cost outsourced services is a loophole and how NY DFS closed the loophole.

The New York DFS promulgated a regulation to memorialize the provisions of the 2013 settlements between NY DFS and LPI insurers (Assurant, Balboa, QBE). The settlements and the original NY DFS regulation included the provision:

10. The New York FPI Companies shall not provide free or below-cost outsourced services to servicers, lenders, or their affiliates, provided, however, that outsourced services do not include expenses associated with tracking functions that the New York FPI Companies incur for their own benefit to identify and protect themselves from:(a) exposure to lost premium and losses on properties on which no other insurance coverage is in effect or
(b) administrative costs associated with providing and subsequently canceling force-placed insurance on properties on which force-placed insurance is not required. (emphasis added)

The NY DFS quickly found problems with the settlement language so when the initial LPI rule was promulgated, it included:

227.1 Definitions
(f)(1) Insurance tracking means all activities related to determining whether a borrower has in place hazard insurance that complies with the mortgage loan contract’s requirements to maintain hazard insurance, including:
(i) developing and maintaining a database used by a servicer to track required hazard insurance on borrowers’ loans;
(ii) maintaining hazard insurance information on behalf of a servicer, including in a servicer’s mortgage servicing system;
(iii) inputting insurance information on new loans into an insurance tracking database or a servicer’s mortgage servicing system;
(iv) all communications by a servicer or on behalf of a servicer with a borrower’s voluntary hazard insurer or voluntary hazard insurance producer;
(v) all communications by a servicer or on behalf of a servicer with a borrower concerning required hazard insurance, including the written notices required by section 227.2 of this Part and communications concerning charging the borrower’s account for insurance; and
(vi) all call center and other customer service operations related to the communications described in subparagraphs (1)(iv) and (1)(v) of this paragraph.

(2) The term insurance tracking shall not include:
(i) issuing force-placed insurance or monitoring the continuing need for force-placed insurance after (a) voluntary hazard insurance covering residential real property has lapsed or been cancelled, or (b) an insurer, insurance producer or affiliate has not received evidence of existing insurance coverage that complies with section 227.4 of this Part; or
(ii) performing administrative services associated with cancelling force-placed insurance on properties on which force-placed insurance is not required.

227.6 Prohibited Practices
(g) No insurer, insurance producer, or affiliate shall provide insurance tracking to a servicer or a person or entity affiliated with a servicer for a reduced fee or no separately identifiable charge.
Section 227.7 Minimum Loss Ratio and Rate Filings

(f) An insurer shall not include as an expense in a force-placed insurance rate filing any expense incurred in connection with insurance tracking.

CEJ Conclusion

Since the 1996 adoption of the NAIC Creditor-Placed Insurance Model Act, over 20 years have passed of giving the benefit of the doubt to insurers through that Model Act and we've seen the horrific results -- billions of dollars of kickbacks from LPI insurers to servicers at the height of the financial crisis exacerbating the pressure on victims of predatory lending.

It's long-past time to give the benefit of the doubt to consumers. We know what the downside of permitting tracking and implementation expenses in the model law will be -- more of the same kickbacks from LPI insurers to servicers that inflate LPI rates and LPI charges to the most vulnerable consumers. What is the downside of not including these exemptions -- of crystal clear prohibitions against any consideration by the LPI insurer other than protection of the property serving as collateral for the loan? Prohibiting these "expenses" in LPI rates and LPI charges to borrowers will not stop LPI vendors from performing these activities -- it will simply move the expenses to the proper place outside of the insurance transaction. Given the huge disparity in potential harm to consumers vs. potential harm to insurers and servicers, it should be an easy choice to give the benefit of the doubt to consumers and prohibit all considerations by the LPI insurer to the servicer.

Attachments

1. CEJ Presentation to Florida Office of Insurance Regulation, October 31, 2018
2. Assurant 2018 Q3 Financial Supplement
3. Assurant 2010 Q4 Financial Supplement
4. Carrington Holding Company Prospectus
UNITED STATES DISTRICT COURT  
NORTHERN DISTRICT OF FLORIDA  
TALLAHASSEE DIVISION

SIMEON PENTON, on behalf of himself and all others similarly situated,

Plaintiff,

v. Case No. 4:18-cv-00450-MW-CAS
JURY TRIAL DEMANDED

CENTENNIAL BANK,

Defendant.

AFFIDAVIT IN SUPPORT OF DEFENDANT’S MOTION TO DISMISS FOR LACK OF SUBJECT MATTER JURISDICTION

BEFORE ME, the undersigned authority, duly authorized to administer oaths, personally appeared CHAD BROWN ("Affiant") who, after being first duly sworn, deposes and says:

1. Affiant is competent, of the age of majority, and has the authority and personal knowledge necessary to make this Affidavit.

2. Affiant is the Loan Servicing Manager and Vice-President of Defendant, Centennial Bank (the “Bank”).

3. Affiant’s job responsibilities include the administration and management of various functions relating to the servicing of secured loans
in the Bank’s portfolio. Affiant is familiar with the policies and procedures of the Bank relating to the processing and servicing of loans, including with respect to force-placement of insurance coverage (“FPI”) to protect the Bank’s interest in real or personal property a borrower pledges to secure repayment of a loan.

4. Affiant has reviewed the books and records of the Bank as such books and records relate to borrowers like Plaintiff, Simeon Penton (“Penton”) for which the Bank has force-placed insurance coverage during the relevant Class Period\(^1\) potentially spanning from 2011 through October 2018. The books and records related to these borrower loan accounts, which include force-placed insurance premiums, were made in the normal course of regularly conducted business activity, at or near the time of the occurrence of the events, created by or from a person with personal knowledge of the events, and in connection with the Bank’s regular practice of making such a record. These books and records accurately reflect the total premium added to an individual borrowers’ loan account upon the Bank’s force-placement of insurance coverage, including any adjustments later recorded following

\(^1\)Unless otherwise indicated, capitalized terms have the same meaning ascribed in the Second Amended Complaint (ECF 57).
any cancellation of coverage and ensuing reimbursement of the Bank by the insurer for the prorated portion of the premium corresponding to the cancelled period of the policy (the “Net Written Premium”).

The Bank’s Lending Relationship with Penton

5. On September 7, 2005, Penton executed and delivered a promissory note to the Bank’s predecessor, Gulf State Community Bank in the original principal sum of $200,000.00 that matured on September 7, 2007 (the “Note”). The Bank renewed the credit extended pursuant to the Note on various occasions. To secure repayment of the Note, Penton executed and delivered a mortgage (the “Mortgage”) pursuant to which Penton granted the Bank a mortgage lien encumbering the following-described real property:

UNIT NUMBER 103 OF MARINER’S VIEW CONDOMINIUMS AS PER THAT CERTAIN DECLARATION OF CONDOMINIUM RECORDED IN OFFICIAL RECORDS BOOK 865, PAGE 369 OF THE PUBLIC RECORDS OF FRANKLIN COUNTY, FLORIDA (the “Property”)

A true and correct copy of the Note and Mortgage is attached as Composite Exhibit 2-A.
cure inadequate coverage. Determination of adequacy of coverage differs only slightly between flood and other hazard policies, again due to NFIP implementing regulations. These regulations mandate coverage in the amount of the lesser of (i) $250,000.00; (ii) the outstanding principal balance of the loan; and (iii) insurable value of the collateralized structures. The Bank’s flood coverage calculations conform to this regulatory mandate. See Composite Exhibit 2-B at p. 2.

9. Following is a sequence of events representative of Penton’s FPI experience with the Bank: (i) the Bank’s vendor notifies Penton that the Bank had not received evidence of flood coverage providing forty-five days to provide the Bank such evidence; (ii) at the conclusion of the forty-five day notice, the Bank force-placed adequate coverage per the NFIP regulations based on the outstanding loan balance and insurable value of the collateralized structure; (iii) Penton provided the Bank evidence of coverage that was inadequate based on the Bank’s calculation; (iv) the Bank partially cancelled the FPI coverage it had obtained and gave Penton notice that the coverage provided remained inadequate providing forty-five days to provide evidence of adequate coverage; and (v) at the conclusion of the forty-five day period when Penton had not provided evidence of adequate
coverage, the Bank force-placed for the difference. See Composite Exhibit 2-B

Net Written Premiums

10. The Bank’s vendor in charge of portfolio insurance monitoring maintains cross-reference information to evaluate the placement of force-placed insurance. Because there is no reasonably practicable method for searching the entirety of the Bank’s portfolio, the Bank has compiled its records first by assessing all force-placed insurance events.

11. Over the period from January 1, 2011 through October 1, 2018, the Bank’s books and records relating to borrower loan accounts that include force-placed insurance premiums are substantially voluminous, and it would impose a staggering administrative burden to examine these books and records because they involve approximately 6,971 different borrower loan accounts and approximately 15,575 separate force-placed coverage events. A true and correct copy of the Bank’s spreadsheet itemizing the details of the various coverage events memorialized in the Bank’s books and records is attached as Exhibit 2-C (the “FPI Summary”).

12. During the Class Period, the Bank experienced a total of 15,575 force-placed coverage events include every conceivable form of insurance
coverage for the Bank’s loan portfolio, from hazard, wind, and flood insurance for real property collateral to coverage for personal property like automobiles and other vehicles, and business insurance. A total of 2,620 of the events concerned non-real property insurance.

13. Among the 15,575 separate force-placed coverage events, 5,142 of these events resulted in full reimbursement of the force-placed insurance premium the Bank funded such that the loan account balances for these borrowers do not include any cost for force-placed insurance relating to these events. Excluding full-reimbursement events, there are 10,433 coverage events and 4,380 distinct account numbers within the Class Period. 
See Exhibit 2-C

14. Further excluding non-real estate insurance, the balance of 8,700 force-placed coverage events resulted in Net Written Premiums that the Bank paid in the total amount of $11,494,507.94. See Exhibit 2-C.

15. The following table summarizes a break-down of the 8,700 events and $11,494,507.94 figure by one of three potential account dispositions: (1) the account has been closed or written off and the bank recovered its incurred costs for the force-placed coverage event (the “Paid” events); (2) the account has been closed and the bank charged off a net loss
on the account (the “Unpaid” events); or (3) the account remains open and active or the disposition is not yet settled or determinable from the bank’s records (the “Active-Owe” events):

<table>
<thead>
<tr>
<th></th>
<th>Real Estate</th>
<th>Non-Real Estate</th>
<th>All Insurance</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Paid</strong></td>
<td>Count</td>
<td>$3,056,272.66</td>
<td>$533,843.55</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>$3,056,272.66</td>
<td>$533,843.55</td>
</tr>
<tr>
<td><strong>Unpaid</strong></td>
<td>Count</td>
<td>$2,925,983.99</td>
<td>$375,386.04</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>$2,925,983.99</td>
<td>$375,386.04</td>
</tr>
<tr>
<td><strong>Active-Owe</strong></td>
<td>Count</td>
<td>$5,512,251.29</td>
<td>$699,833.96</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>$5,512,251.29</td>
<td>$699,833.96</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>Count</td>
<td>$11,494,507.94</td>
<td>$1,609,063.55</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>$11,494,507.94</td>
<td>$1,609,063.55</td>
</tr>
</tbody>
</table>

16. During the Class Period, and focusing solely on real-property insurance coverage events, Centennial recovered all amounts owed on closed accounts attributable to approximately 62.54% of the coverage events and 51.09% of the net written premiums that it initially paid.

**FPI Servicing Costs**

17. In October 2015, the Bank entered into an agreement (the “OSC Agreement”) with Overby-Seawell Company (“OSC”) pursuant to which the Bank engaged OSC to serve as its insurance tracking vendor and perform the duties Southern Pioneer had previously performed for the Bank with respect to FPI.
18. The OSC Agreement includes a comprehensive schedule of services and administrative functions that OSC agreed to provide the Bank with respect to its loan portfolio FPI processes. In consideration of these services, the OSC Agreement includes a fee schedule imposing (i) a monthly fee of $0.28 for each loan monitored within the portfolio; (ii) the actual cost of postage and delivery fees incurred in connection with borrower correspondence regarding an FPI event; and (iii) an hourly rate of $150.00 for tasks that require additional programming support.

19. The Bank’s loan portfolio subject to these loan monitoring services consists of approximately eighteen thousand (18,000) loans, although that figure fluctuates.

20. Following the OSC Agreement Amendment, Affiant investigated the fees charged by comparable vendors as OSC. Affiant determined that the marketplace for insurance-portfolio tracking services can be broadly characterized into two tiers of service. In the higher tier, the tracking services are such that the Bank is not necessary for virtually any step of the process. From my investigation, a reasonable range of cost for higher-tier services is approximately $0.80 to $0.90 per loan per month. In the lower tier, the services provided require substantial interaction and effort by bank
employees. From my investigation, a reasonable range of cost for lower-tier services is approximately $0.40 to $0.50 per loan per month. Affiant would characterize the Bank's current vendor as providing services in the lower tier.

FURTHER AFFIANT SAYETH NAUGHT.

STATE OF ARKANSAS
FAULKNER COUNTY

CHAD BROWN, AFFIANT

The foregoing instrument was sworn to and acknowledged before me this _ day of _ , 2020 by CHAD BROWN, Loan Servicing Manager and Vice-President of Centennial Bank who ( ) provided as identification bearing identification number or who ( ) is personally known to me.

[NOTARIAL SEAL]
Casualty Actuarial and Statistical (C) Task Force

Regulatory Review of Predictive Models

White Paper

Table of Contents

I. Introduction ................................................................................................................................................................... 2
II. What is a “Best Practice?” ............................................................................................................................................. 2
III. Some Issues in Reviewing Today’s Predictive Models ................................................................................................. 3
IV. Do Regulators Need Best Practices to Review Predictive Models? .............................................................................. 5
V. Scope ............................................................................................................................................................................. 5
VI. Confidentiality ............................................................................................................................................................... 6
VII. Best Practices for Regulatory Review of Predictive Models ......................................................................................... 6
VIII. Proposed Changes to the Product Filing Review Handbook .......................................................................................... 8
IX. Proposed State Guidance ............................................................................................................................................. 12
X. Other Considerations ................................................................................................................................................... 13

Appendix A – Best Practice Development ............................................................................................................................. 14
Appendix B – Information Elements and Guidance for a Regulator to Meet Best Practices’ Objectives (When Reviewing GLMs) ........................................................................................................................................... 15
Appendix C – Glossary of Terms ........................................................................................................................................... 46
Appendix D – Sample Rate-Disruption Template .................................................................................................................. 53
I. INTRODUCTION

Insurers’ use of predictive analytics along with big data has significant potential benefits to both consumers and insurers. Predictive analytics can reveal insights into the relationship between consumer behavior and the cost of insurance, lower the cost of insurance for many, and provide incentives for consumers to better control and mitigate loss. However, predictive analytic techniques are evolving rapidly and leaving many state insurance regulators, who must review these techniques, without the necessary tools to effectively review insurers’ use of predictive models in insurance applications.

When a rate plan is truly innovative, the insurer must anticipate or imagine the reviewers’ interests because reviewers will respond with unanticipated questions and have unique educational needs. Insurers can learn from the questions, teach the reviewers, and so forth. When that back-and-forth learning is memorialized and retained, filing requirements and insurer presentations can be routinely organized to meet or exceed reviewers’ needs and expectations. Hopefully, this white paper helps bring more consistency to the art of reviewing predictive models within a rate filing and make the review process more efficient.

The Casualty Actuarial and Statistical (C) Task Force has been charged with identifying best practices to serve as a guide to state insurance departments in their review of the predictive models underlying rating plans. There were two charges given to Task Force by the Property and Casualty Insurance (C) Committee at the request of the Big Data (EX) Working Group:

- Draft and propose changes to the Product Filing Review Handbook to include best practices for review of predictive models and analytics filed by insurers to justify rates.
- Draft and propose state guidance (e.g., information, data) for rate filings based on complex predictive models.

This white paper will identify best practices for the review of predictive models and analytics filed by insurers with regulators to justify rates and will provide state guidance for the review of rate filings based on predictive models. Upon adoption of this white paper by the Executive (EX) Committee and Plenary, the Task Force will make a recommendation to incorporate these best practices into the Product Filing Review Handbook and will forward that recommendation to the Speed to Market (EX) Working Group.

As discussed further in the body of the white paper, this document is intended as guidance for state insurance regulators as they review predictive models. Nothing in this document is intended to, or could, change the applicable legal and regulatory standards for approval of rating plans. This guidance is intended only to assist state insurance regulators as they review models to determine whether modeled rates are compliant with existing state laws and/or regulations. To the extent these best practices are incorporated into the Product Filing Review Handbook, the handbook provides that it is intended to “add uniformity and consistency of regulatory processes, while maintaining the benefits of the application of unique laws and regulations that address the state-specific needs of the nation’s insurance consumers.”

II. WHAT IS A “BEST PRACTICE”?

A best practice is a form of program evaluation in public policy. At its most basic level, a practice is a “tangible and visible behavior… [based on] an idea about how the actions…will solve a problem or achieve a goal.” 2 Best practices are used to maintain quality as an alternative to mandatory legislated standards and can be based on self-assessment or benchmarking. 3 Therefore, a best practice represents an effective method of problem solving. The “problem” regulators want to solve is probably better posed as seeking an answer to this question: How can regulators determine whether predictive models, as used in rate filings, are compliant with state laws and/or regulations?

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1 In this white paper, references to “model” or “predictive model” are the same as “complex predictive model” unless qualified.
**Key Regulatory Principles**

In this white paper, best practices are based on the following principles that promote a comprehensive and coordinated review of predictive models across the states:

1. State insurance regulators will maintain their current rate regulatory authority and autonomy.
2. State insurance regulators will be able to share information to aid companies in getting insurance products to market more quickly across the states.4
3. State insurance regulators will share expertise and discuss technical issues regarding predictive models to make the review process in any state more effective and efficient.
4. State insurance regulators will maintain confidentiality, in accordance with state law, regarding predictive models.

Best practices are presented to state insurance regulators for the review of predictive models and to insurance companies as a consideration in filing rating plans that incorporate predictive models. As a byproduct of identifying these best practices, general and specific information elements were identified that could be useful to a regulator when reviewing a rating plan that is wholly or in part based on a generalized linear model (GLM). For the states that are interested, the information elements are identified in Appendix B, including comments on what might be important about that information and, where appropriate, providing insight as to when the information might identify an issue the regulator needs to be aware of or explore further. Lastly, provided in this white paper are glossary terms (see Appendix C) and references (contained in the footnotes) that can expand a state insurance regulator’s knowledge of predictive models (GLMs specifically).

**III. SOME ISSUES IN REVIEWING TODAY’S PREDICTIVE MODELS**

The term “predictive model” refers to a set of models that use statistics to predict outcomes.5 When applied to insurance, the model is chosen to estimate the probability or expected value of an outcome given a set amount of input data; for example, models can predict the frequency of loss, the severity of loss, or the pure premium. The GLM6 is a commonly used predictive model in insurance applications, particularly in building an insurance product’s rating plan.

Depending on definitional boundaries, predictive modeling can sometimes overlap with the field of machine learning. In this modeling space, predictive modeling is often referred to as predictive analytics.

Before GLMs became vogue, rating plans were built using univariate methods. Univariate methods were considered intuitive and easy to demonstrate the relationship to costs (loss and/or expense). Today, many insurers consider univariate methods too simplistic because they do not take into account the interaction (or dependencies) of the selected input variables.

Today, the majority of predictive models used in personal automobile and home insurance rating plans are GLMs.7 According to many in the insurance industry, GLMs introduce significant improvements over univariate-based rating plans by automatically adjusting for correlations among input variables. However, it is not always easy to understand the complex predictive model output’s relationship to cost. This creates a problem for the state insurance regulator when model results are difficult to explain to someone (e.g., a consumer) who has little to no expertise in modeling techniques.

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4 The states can share information if they can maintain confidentiality and legally share such information. Information about a classification plan documented in one state could be shared with another state.
5 A more thorough exploration of different predictive models will be found in many books on statistics, including:
6 The GLM is a flexible family of models that are unified under a single method. Types of GLMs include logistic regression, Poisson regression, gamma regression, and multinomial regression.
Generalized Linear Models

A GLM consists of three elements: 8

- A target variable, $Y$, which is a random variable that is independent and is assumed to follow a probability distribution from the exponential family, defined by a selected variance function and dispersion parameter.
- A linear predictor, $\eta = X\beta$.
- A link function $g$, such that $E(Y) = \mu = g^{-1}(\eta)$.

As can be seen in the description of the three GLM components above, it may take more than a casual introduction to statistics to comprehend the construction of a GLM. As stated earlier, a downside to GLMs is that it is more challenging to interpret a GLM's output than that of a univariate model.

To further complicate the regulatory review of models in the future, modeling methods are evolving rapidly and are not limited just to GLMs. As computing power grows exponentially, it is opening the modeling world to more sophisticated forms of data acquisition and data analysis. Insurance actuaries and data scientists seek increased predictiveness by using even more complex predictive modeling methods. Examples of these methods include predictive models utilizing random forests, decision trees, neural networks, or combinations of available modeling methods (often referred to as “ensembles”). These evolving techniques will make a state insurance regulator’s understanding and oversight of filed rating plans that incorporate predictive models even more challenging.

In addition to the growing complexity of predictive models, many state insurance departments do not have in-house actuarial support or have limited resources to contract out for support when reviewing rate filings that include the use of predictive models. The Big Data (EX) Working Group identified the need to provide the states with guidance and assistance when reviewing predictive models underlying filed rating plans. 9 The Working Group circulated a proposal addressing aid to state insurance regulators in the review of predictive models as used in personal automobile and home insurance rate filings. This proposal was circulated to all Working Group members and interested parties on Dec. 19, 2017, for a public comment period ending Jan. 12, 2018.10 The Working Group’s effort resulted in new charges for the Casualty Actuarial and Statistical (C) Task Force (see Section I—Introduction) to identify best practices that provide guidance to the states in their review of predictive models.

Credibility of GLM Output

If the underlying data is not credible, then no model will improve that credibility, and segmentation methods could make credibility worse. GLM software provides point estimates and allows the modeler to consider standard errors and confidence intervals. GLMs effectively assume that the underlying datasets are 100% credible, no matter their size. If some segments have little data, the resulting uncertainty would not be reflected in the GLM parameter estimates themselves (although it might be reflected in the standard errors, confidence intervals, etc.). Even though the process of selecting relativities often includes adjusting the raw GLM output, the resultant selections are typically not credibility-weighted with any complement of credibility.11,12 And, selected relativities based on GLM model output may differ from GLM point estimates. Lack of credibility for particular estimates could be discerned if standard errors are large relative to the point estimates and/or if the confidence intervals are broad.

Because of this presumption in credibility, which may or may not be valid in practice, the modeler—and the state insurance regulator reviewing the model—would need to engage in thoughtful consideration when incorporating GLM output into a rating plan to ensure that model predictiveness is not compromised by any lack of actual credibility. Another consideration is the availability of data, both internal and external, that may result in the selection of predictor variables that have spurious correlation with the target variable. Therefore, to mitigate the risk that model credibility or predictiveness is lacking, a

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8 Information on model elements can be found in most books on statistics.
10 All comments received by the end of January 2018 were posted to the NAIC website March 12, 2018, for review.
11 Sometimes insurers do review complements of credibility and further weight the GLM output with those complements. While this may not be a standard practice today, new techniques could result in this becoming more standard in the future.
12 GLMs provide confidence intervals, credibility methods do not. There are techniques such as penalized regression that blend credibility with a GLM and improve a model’s ability to generalize.
complete filing for a rating plan that incorporates GLM output should include validation evidence for the rating plan, not just the statistical model.

IV. DO REGULATORS NEED BEST PRACTICES TO REVIEW PREDICTIVE MODELS?

It might be better to revise the question of “Do regulators need best practices to review predictive models?” to “Are best practices in the review of predictive models of value to regulators and insurance companies?” The answer is “yes” to both questions.

Regulatory best practices need to be developed that do not unfairly or inordinately create barriers for insurers, and ultimately consumers, while providing a baseline of analysis for state insurance regulators to review the referenced filings. Best practices will aid regulatory reviewers by raising their level of model understanding. Also, with regard to scorecard models and the model algorithm, there is often not sufficient support for relative weight, parameter values, or scores of each variable. Best practices can potentially aid in addressing this problem.

Best practices are not intended to create standards for filings that include predictive models. Rather, best practices will assist the states in identifying the model elements they should be looking for in a filing that will aid the regulator in understanding why the company believes that the filed predictive model improves the company’s rating plan and, therefore, makes that rating plan fairer to all consumers in the marketplace. To make this work, state insurance regulators and the industry need to recognize that:

- Best practices provide guidance to state insurance regulators in their essential and authoritative role over the rating plans in their respective state.
- Every state may have a need to review predictive models, whether that occurs during the approval process of a rating plan or during a market conduct exam. Best practices help the state insurance regulator identify elements of a model that may influence the regulatory review as to whether modeled rates are appropriately justified, compliant with state laws and/or regulations, and whether to act on that information.
- Best practices provide a framework for the states to share knowledge and resources to facilitate the technical review of predictive models.
- Best practices can lead to improved quality in predictive model reviews across the states, aiding speed to market and competitiveness of the state’s insurance marketplace.
- Best practices aid training of new state insurance regulators and/or regulators new to reviewing predictive models. This is especially useful for those regulators who do not actively participate in NAIC discussions related to the subject of predictive models.
- Each state insurance regulator adopting best practices will be better able to identify the resources needed to assist their state in the review of predictive models.

V. SCOPE

The best practices identified in this white paper were derived from a ground-up study and analysis of how GLMs are used in personal automobile and home insurance rating plans. These three components (GLM, PPA, and HO) were selected as the basis to develop best practices for the regulatory review of predictive models because many state insurance regulators are familiar with, and have expertise in, such filings. In addition, the legal and regulatory constraints (including state variations) are likely to be more evolved, and challenging, for personal automobile and home insurance. It is through a review of these personal lines and the knowledge needed to review GLMs used in their rate filings that will provide meaningful best practices for state insurance regulators. The identified best practices should be readily transferrable when the review involves other predictive models applied to other lines of business or for an insurance purpose other than rating.

13 See Appendix B.

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VI. CONFIDENTIALITY

Each state determines the confidentiality of a rate filing and the supplemental material to the filing, when filing information might become public, the procedure to request that filing information be held confidentially, and the procedure by which a public records request is made. Regulatory reviewers are required to protect confidential information in accordance with applicable state law. State insurance regulators should be aware of their state laws on confidentiality when requesting data from insurers that may be proprietary or a trade secret. However, insurers should be aware that a rate filing might become part of the public record. It is incumbent on an insurer to be familiar with each state’s laws regarding the confidentiality of information submitted with its rate filing.

State authority, regulations and/or rules governing confidentiality always apply when a state insurance regulator reviews a model used in rating. When the NAIC or a third party enters the review process, the confidential, proprietary, and trade secret protections of the state on behalf of which a review is being performed will continue to apply.

VII. BEST PRACTICES FOR THE REGULATORY REVIEW OF PREDICTIVE MODELS

Best practices will help the state insurance regulator understand if a predictive model is cost-based, if the predictive model is compliant with state law, and how the model improves a company’s rating plan. Best practices can also improve the consistency among the regulatory review processes across the states and improve the efficiency of each regulator’s review, thereby helping companies get their products to market faster. With this in mind, the regulator’s review of predictive models should:

1. Ensure that the selected rating factors, based on the model or other analysis, produce rates that are not excessive, inadequate, or unfairly discriminatory.
   a. Review the overall rate level impact of the proposed revisions to rate level indications provided by the filer.
   b. Determine whether individual input characteristics to a predictive model and their resulting rating factors are related to the expected loss or expense differences in risk.
   c. Review the premium disruption for individual policyholders and how the disruptions can be explained to individual consumers.
   d. Review the individual input characteristics to, and output factors from, the predictive model (and its sub-models), as well as associated selected relativities, to ensure they are compatible with practices allowed in the state and do not reflect prohibited characteristics.

2. Obtain a clear understanding of the data used to build and validate the model, and thoroughly review all aspects of the model, including assumptions, adjustments, variables, sub-models used as input, and resulting output.
   a. Obtain a clear understanding of how the selected predictive model was built.
   b. Determine whether the data used as input to the predictive model is accurate, including a clear understanding how missing values, erroneous values, and outliers are handled.
   c. Determine whether any adjustments to the raw data are handled appropriately, including, but not limited to, trending, development, capping, and removal of catastrophes.
   d. Obtain a clear understanding of how often each risk characteristic used as input to the model is updated and whether the model is periodically refreshed, to help determine whether the model output reflects changes to non-static risk characteristics.

3. Evaluate how the model interacts with and improves the rating plan.
   a. Obtain a clear understanding of the characteristics that are input to the predictive model (and its sub-models).
   b. Obtain a clear understanding of how the insurer integrates the model into the rating plan and how it improves the rating plan.
   c. Obtain a clear understanding of how the model output interacts with non-modeled characteristics/variables used to calculate a risk’s premium.
4. Enable competition and innovation to promote the growth, financial stability, and efficiency of the insurance marketplace.
   
a. Enable innovation in the pricing of insurance through the acceptance of predictive models, provided such models are in compliance with state laws and/or regulations, particularly prohibitions on unfair discrimination.

b. Protect the confidentiality of filed predictive models and supporting information in accordance with state laws and/or regulations.

c. Review predictive models in a timely manner to enable reasonable speed to market.
VIII. PROPOSED CHANGES TO THE PRODUCT FILING REVIEW HANDBOOK

The Task Force was charged to propose modifications to the 2016 Product Filing Review Handbook to reflect best practices for the regulatory review of GLM predictive analytics. The following are the titled sections in Chapter Three—The Basics of Property and Casualty Rate Regulation.

**Product Filing Review Handbook, August 2016**

**CHAPTER THREE**

The Basics of Property and Casualty Rate Regulation

No changes are proposed to the following sections of Chapter Three: Introduction; Rating Laws; Rate Standards; Rate Justification and Supporting Data; Number of Years of Historical Data; Segregation of Data; Data Adjustments; Premium Adjustments; Losses and LAE (perhaps just DCC) Adjustments; Catastrophe or Large Loss Provisions; Loss Adjustment Expenses; Data Quality; Rate Justification: Overall Rate Level; Contingency Provision; Credibility; Calculation of Overall Rate Level Need: Methods (Pure Premium and Loss Ratio Methods); Rate Justification: Rating Factors; Calculation of Deductible Rating Factors; Calculation of Increased Limit Factors; and Credibility for Rating Factors.

The following are the proposed changes to the remainder of Chapter Three:

**Interaction between Rating Variables (Multivariate Analysis)**

If each rating variable is evaluated separately, statistically significant interactions between rating variables may not be identified and, thus, may not be included in the rating plan. Care should be taken to have a multivariate analysis when practical. In some instances, a multivariate analysis is not possible. But, with computing power growing exponentially, insurers believe they have found many ways to improve their operations and competitiveness through use of complex predictive models in all areas of their insurance business.

**Approval of Classification Systems**

With rate changes, companies sometimes propose revisions to their classification system. Because the changes to classification plans can be significant and have large impacts on the consumers’ rates, regulators should focus on these changes.

Some items of proposed classification can sometimes be deemed to be contrary to state laws and/or regulations, such as the use of education or occupation. You should be aware of your state’s laws and regulations regarding which rating factors are allowed, and you should require definitions of all data elements that can affect the charged premium. Finding rating or underwriting characteristics that may violate state laws and/or regulations is becoming more difficult for regulators with the increasing and innovative ways insurers use predictive models.

**Rating Tiers** – (No change is proposed.)

**Rate Justification: New Products** – (No change is proposed.)

**Predictive Modeling**

The ability of computers to process massive amounts of data (referred to as “big data”) has led to the expansion of the use of predictive modeling in insurance ratemaking. Predictive models have enabled insurers to build rating, marketing, underwriting, and claim models with significant predictive ability.

Data quality within, and communication about, models are of key importance with predictive modeling. Depending on definitional boundaries, predictive modeling can sometimes overlap with the field of machine-learning. In the modeling space, predictive modeling is often referred to as “predictive analytics.”

Insurers’ use of predictive analytics along with big data has significant potential benefits to consumers and insurers. Predictive analytics can reveal insights into the relationship between consumer behavior and the cost of insurance, lower the cost of insurance for many, and provide incentives for consumers to better control and mitigate loss. However, predictive analytic
techniques are evolving rapidly and leaving many state insurance regulators without the necessary tools to effectively review insurers’ use of predictive models in insurance applications. To aid the regulator in the review of predictive models, best practices have been developed.

The term “predictive model” refers to a set of models that use statistics to predict outcomes. When applied to insurance, the model is chosen to estimate the probability or expected value of an outcome given a set amount of input data; for example, models can predict the frequency of loss, the severity of loss, or the pure premium.

To further complicate regulatory review of models in the future, modeling technology and methods are evolving rapidly. Generalized linear models (GLMs) are relatively transparent and their output and consequences are much clearer than many other complex models. But as computing power grows exponentially, it is opening the modeling world to more sophisticated forms of data acquisition and data analysis. Insurance actuaries and data scientists seek increased predictiveness by using even more complex predictive modeling methods. Examples of these methods are predictive models utilizing logistic regression, K-nearest neighbor classification, random forests, decision trees, neural networks, or combinations of available modeling methods (often referred to as “ensembles”). These evolving techniques will make the regulators’ understanding and oversight of filed rating plans even more challenging.

**Generalized Linear Models**

The GLM is a commonly used predictive model in insurance applications, particularly in building an insurance product’s rating plan. Because of this and the fact most property/casualty regulators are most concerned about personal lines, the NAIC has developed an appendix in its white paper for guidance in reviewing GLMs for personal automobile and home insurance.

**What is a “Best Practice”?**

A best practice is a form of program evaluation in public policy. At its most basic level, a practice is a “tangible and visible behavior…[based on] an idea about how the actions…will solve a problem or achieve a goal.” Best practices can maintain quality as an alternative to mandatory legislated standards and can be based on self-assessment or benchmarking. Therefore, a best practice represents an effective method of problem solving. The “problem” regulators want to solve is probably better posed as seeking an answer to this question: How can regulators determine whether predictive models, as used in rate filings, are compliant with state laws and/or regulations? However, best practices are not intended to create standards for filings that include predictive models.

Best practices are based on the following principles that promote a comprehensive and coordinated review of predictive models across the states:

- State insurance regulators will maintain their current rate regulatory authority and autonomy.
- State insurance regulators will be able to share information to aid companies in getting insurance products to market more quickly across the states.
- State insurance regulators will share expertise and discuss technical issues regarding predictive models to make the review process in any state more effective and efficient.
- State insurance regulators will maintain confidentiality, in accordance with state laws and/or regulations, regarding predictive models.

**Best Practices for the Regulatory Review of Predictive Models**

Best practices will help the regulator understand if a predictive model is cost-based, if the predictive model is compliant with state laws and/or regulations, and how the model improves the company’s rating plan. Best practices can also improve the consistency among the regulatory review processes across the states and improve the efficiency of each regulator’s review, thereby assisting companies in getting their products to market faster. With this in mind, the regulator’s review of predictive models should:

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14 Refer to Appendix B in the NAIC white paper, *Regulatory Review of Predictive Models*.
1. Ensure that the selected rating factors, based on the model or other analysis, produce rates that are not excessive, inadequate, or unfairly discriminatory.
   a. Review the overall rate level impact of the proposed revisions to rate level indications provided by the filer.
   b. Determine whether individual input characteristics to a predictive model and their resulting rating factors are related to the expected loss or expense differences in risk.
   c. Review the premium disruption for individual policyholders and how the disruptions can be explained to individual consumers.
   d. Review the individual input characteristics to, and output factors from, the predictive model (and its sub-models), as well as associated selected relativities, to ensure they are compatible with practices allowed in the state and do not reflect prohibited characteristics.

2. Obtain a clear understanding of the data used to build and validate the model, and thoroughly review all aspects of the model, including assumptions, adjustments, variables, sub-models used as input, and resulting output.
   a. Obtain a clear understanding of how the selected predictive model was built.
   b. Determine whether the data used as input to the predictive model is accurate, including a clear understanding how missing values, erroneous values, and outliers are handled.
   c. Determine whether any adjustments to the raw data are handled appropriately, including, but not limited to, trending, development, capping, and removal of catastrophes.
   d. Obtain a clear understanding of how often each risk characteristic, used as input to the model, is updated and whether the model is periodically refreshed, so model output reflects changes to non-static risk characteristics.

3. Evaluate how the model interacts with and improves the rating plan.
   a. Obtain a clear understanding of the characteristics that are input to a predictive model (and its sub-models).
   b. Obtain a clear understanding how the insurer integrates the model into the rating plan and how it improves the rating plan.
   c. Obtain a clear understanding of how model output interacts with non-modeled characteristics/variables used to calculate a risk’s premium.

4. Enable competition and innovation to promote the growth, financial stability, and efficiency of the insurance marketplace.
   a. Enable innovation in the pricing of insurance through acceptance of predictive models, provided such models are in compliance with state laws and/or regulations, particularly prohibitions on unfair discrimination.
   b. Protect the confidentiality of filed predictive models and supporting information in accordance with state laws and/or regulations.
   c. Review predictive models in a timely manner to enable reasonable speed to market.

**Confidentiality**

Each state determines the confidentiality of a rate filing and the supplemental material to the filing, when filing information might become public, the procedure to request that filing information be held confidentially, and the procedure by which a public records request is made. Regulatory reviewers are required to protect confidential information in accordance with applicable state laws and/or regulations. State insurance Regulators should be aware of their state laws and/or regulations on confidentiality when requesting data from insurers that may be proprietary or trade secret. However, insurers should be aware that a rate filing might become part of the public record. It is incumbent on an insurer to be familiar with each state’s laws and/or regulations regarding the confidentiality of information submitted with their rate filing.

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State authority, regulations and rules governing confidentiality always apply when a regulator reviews a model used in rating. When the NAIC or a third party enters into the review process, the confidential, proprietary, and trade secret protections of the state on behalf of which a review is being performed will continue to apply.

**Advisory Organizations** – (No change is proposed.)

**Workers’ Compensation Special Rules** – (No change is proposed.)

**Premium Selection Decisions** – (No change is proposed.)

**Installment Plans** – (No change is proposed.)

**Policy Fees** – (No change is proposed.)

**Potential Questions to Ask Oneself as a Regulator** – (No change is proposed.)

**Questions to Ask a Company**

If you remain unsatisfied that the company has satisfactorily justified the rate change, then consider asking additional questions of the company. Questions should be asked of the company when it has not satisfied statutory or regulatory requirements in the state or when any current justification is inadequate and could have an impact on the rate change approval or the amount of the approval.

If there are additional items of concern, the company can be notified so it can make appropriate modifications in future filings.

The NAIC white paper, *Regulatory Review of Predictive Models*, documents questions that a state insurance regulator may want to ask when reviewing a model. These questions are listed as “information elements” in Appendix B of the white paper. **Note:** Although Appendix B focuses on GLMs for personal automobile and home insurance, many of the “information elements” and concepts they represent may be transferable to other types of models, other lines of business, and other applications beyond rating.

**Additional Ratemaking Information**

The Casualty Actuarial Society (CAS) and the Society of Actuaries (SOA) have extensive examination syllabi that contain a significant amount of ratemaking information, on both the basic topics covered in this chapter and on advanced ratemaking topics. The CAS and SOA websites (https://www.casact.org and https://www.soa.org, respectively) contain links to many of the papers included in the syllabi. Recommended reading is the *Foundations of Casualty Actuarial Science*, which contains chapters on ratemaking, risk classification, and individual risk rating.

**Other Reading**

Additional background reading is recommended:

  - Chapter 1: Introduction
  - Chapter 3: Ratemaking
  - Chapter 6: Risk Classification
  - Chapter 9: Investment Issues in Property-Liability Insurance
  - Chapter 10: Only the section on Regulating an Insurance Company, pp. 777–787

- **CAS:** Statements of Principles, especially regarding property/casualty ratemaking.

- **CAS:** “Basic Ratemaking.”

Summary

Rate regulation for property/casualty lines of business requires significant knowledge of state rating laws, rating standards, actuarial science, statistical modeling, and many data concepts.

- Rating laws vary by state, but the rating laws are usually grouped into prior approval, file and use or use and file (competitive), no file (open competition), and flex rating.
- Rate standards typically included in the state rating laws require that “rates shall not be inadequate, excessive, or unfairly discriminatory.”
- A company will likely determine its indicated rate change by starting with historical years of underwriting data (earned premiums, incurred loss and loss adjustment expenses, and general expenses) and adjusting that data to reflect the anticipated ultimate level of costs for the future time period covered by the policies. Numerous adjustments are made to the data. Common premium adjustments are on-level premium, audit, and trend. Common loss adjustments are trend, loss development, catastrophe/large loss provisions, and an adjusting and other (A&O) loss adjustment expense provision. A profit/contingency provision is also calculated to determine the indicated rate change.
- Once an overall rate level is determined, the rate change gets allocated to the classifications and other rating factors.
- Individual risk rating allows manual rates to be modified by an individual policyholder’s own experience.
- Advisory organizations provide the underlying loss costs for companies to be able to add their own expenses and profit provisions (with loss cost multipliers) to calculate their insurance rates.
- The CAS’ Statement of Principles Regarding Property and Casualty Insurance Ratemaking provides guidance and guidelines for the numerous actuarial decisions and standards employed during the development of rates.
- NAIC model laws and regulations include special provisions for workers’ compensation business, penalties for not complying with state laws and/or regulations, and competitive market analysis to determine whether rates should be subject to prior-approval provisions.
- Best practices for reviewing predictive models are provided in the NAIC white paper, Regulatory Review of Predictive Models. The best practices and many of the information elements and underlying concepts may be transferrable to other types of models, other lines of insurance, and applications beyond rating.

While this chapter provides an overview of the rate determination/actuarial process and regulatory review, state statutory or administrative rule may require the examiner to employ different standards or guidelines than the ones described.

IX. PROPOSED STATE GUIDANCE

This white paper acknowledges that different states will apply the guidance within this white paper differently, based on variations in the legal environment pertaining to insurance regulation in those states, as well as the extent of available resources, including staff members with actuarial and/or statistical expertise, the workloads of those staff members, and the time that can be reasonably allocated to predictive-model reviews. The states with prior-approval authority over personal lines rate filings often already require answers in connection with many of the information elements expressed in this white paper. However, the states—including those with and without prior-approval authority—may also use the guidance in this white paper to choose which model elements to focus on in their reviews and/or to train new reviewers, as well as to gain an enhanced understanding
of how predictive models are developed, supported, and deployed in their markets. Ultimately, the insurance regulators within each state will decide how best to tailor the guidance within this white paper to achieve the most effective and successful implementation, subject to the framework of statutes, regulations, precedents, and/or processes that comprise the insurance regulatory framework in that state.

X. OTHER CONSIDERATIONS

During the development of state guidance for the review of predictive models used in rate filings, important topics that may impact the review arose that were not within the scope of this white paper. The topics are listed below without elaboration and not in any order of importance. **Note:** This not an exhaustive list. These topics may need to be addressed during the regulator’s review of a predictive model. It may be that one or more of the following topics will be addressed by an NAIC committee in the future:

- Provide guidance for state insurance regulators to identify when a rating variable or rating plan becomes too granular.
- Provide guidance for state insurance regulators on the importance of causality versus correlation when evaluating a rating variable’s relationship to risk, in general and in relation to Actuarial Standard of Practice (ASOP) No. 12, *Risk Classification (for All Practice Areas).*
- Provide guidance for state insurance regulators on the value and/or concerns of data mining, including how data mining may assist in the model building process, how data dredging may conflict with standard scientific principles, how data dredging may increase “false positives” during the model building process, and how data dredging may result in less accurate models and/or models that are unfairly discriminatory.
- Provide guidance and/or tools for state insurance regulators to determine how a policy premium is calculated and to identify the most important risk characteristics that underlie the calculated premium.
- Provide guidance for state insurance regulators when reviewing consumer-generated data in insurance transactions, including disclosure to the consumer, ownership of data, and verification of data procedures.
- Provide guidance, research tools, and techniques for state insurance regulators to monitor consumer market outcomes resulting from insurers’ use of data analytics underlying rating plans.
- Provide guidance for state insurance regulators to expand the best practices and information elements contained in this white paper to non-GLM models and insurance applications other than for personal automobile and home insurance rating plans.
- Provide guidance for state insurance regulators to determine whether individual input characteristics to a model or a sub-model, as well as associated relativities, are not unfairly discriminatory or a “proxy for a protected class.”
- Provide guidance for state insurance regulators to identify and minimize unfair discrimination manifested as “disparate impact.”
- Provide guidance for state insurance regulators that seek a causal or rational explanation why a rating variable is correlated to expected loss or expense, and why that correlation is consistent with the expected direction of the relationship.
APPENDIX A – BEST PRACTICES DEVELOPMENT

The development of best practices is a method for reviewing public policy processes that have been effective in addressing particular issues and could be applied to a current problem. This process relies on the assumptions that top performance is a result of good practices and these practices may be adapted and emulated by others to improve results.\(^{17}\)

The term “best practice” can be a misleading one due to the slippery nature of the word “best.” When proceeding with policy research of this kind, it may be more helpful to frame the project as a way of identifying practices and/or processes that have worked exceptionally well and the underlying reasons for their success. This allows for a mix-and-match approach for making recommendations that might encompass pieces of many good practices.\(^{18}\)

Researchers have found that successful best-practice analysis projects share five common phases:

1. **Define Scope**

   The focus of an effective analysis is narrow, precise, and clearly articulated to stakeholders. A project with a broader focus becomes unwieldy and impractical. Furthermore, Bardach urges the importance of realistic expectations in order to avoid improperly attributing results to a best practice without taking into account internal validity problems.

2. **Identify Top Performers**

   Identify outstanding performers in this area to partner with and learn from. In this phase, it is key to recall that a best practice is a tangible behavior or process designed to solve a problem or achieve a goal (i.e., reviewing predictive models contributes to insurance rates that are not unfairly discriminatory). Therefore, top performers are those who are particularly effective at solving a specific problem or regularly achieve desired results in the area of focus.

3. **Analyze Best Practices**

   Once successful practices are identified, analysts will begin to observe, gather information, and identify the distinctive elements that contribute to their superior performance. Bardach suggests it is important at this stage to distill the successful elements of the process down to their most essential idea. This allows for flexibility once the practice is adapted for a new organization or location.

4. **Adapt**

   Analyze and adapt the core elements of the practice for application in a new environment. This may require changing some aspects to account for organizational or environmental differences while retaining the foundational concept or idea. This is also the time to identify potential vulnerabilities of the new practice and build in safeguards to minimize risk.

5. **Implement and Evaluate**

   The final step is to implement the new process and carefully monitor the results. It may be necessary to make adjustments, so it is likely prudent to allow time and resources for this. Once implementation is complete, continued evaluation is important to help ensure the practice remains effective.


APPENDIX B – INFORMATION ELEMENTS AND GUIDANCE FOR A REGULATOR TO MEET BEST PRACTICES’ OBJECTIVES (WHEN REVIEWING GLMS)

This appendix identifies the information a state insurance regulator may need to review a predictive model used by an insurer to support a personal automobile or home insurance rating plan. The list is lengthy but not exhaustive. It is not intended to limit the authority of a regulator to request additional information in support of the model or filed rating plan. Nor is every item on the list intended to be a requirement for every filing. However, the items listed should help guide a regulator to sufficient information that helps determine if the rating plan meets state-specific filing and legal requirements.

Documentation of the design and operational details of the model will help ensure the business continuity and transparency of the models used. Documentation should be sufficiently detailed and complete to enable a qualified third party to form a sound judgment on the suitability of the model for the intended purpose. The theory, assumptions, methodologies, software, and empirical bases should be explained, as well as the data used in developing and implementing the model. Relevant testing and ongoing performance testing need to be documented. Key model limitations and overrides need to be pointed out so that stakeholders understand the circumstances under which the model does not work effectively. End-user documentation should be provided and key reports using the model results described. Major changes to the model need to be documented and shared with regulators in a timely and appropriate manner. Information technology (IT) controls should be in place, such as a record of versions, change control, and access to the model.19

Many information elements listed below are probably confidential, proprietary, or trade secret and should be treated as such, in accordance with state laws and/or regulations. Regulators should be aware of their state laws and/or regulations on confidentiality when requesting data from insurers that may be proprietary or trade secret. For example, some proprietary models may have contractual terms (with the insurer) that prevent disclosure to the public. Without clear necessity, exposing this data to additional dissemination may compromise the model’s protection.20

Although the list of information is long, the insurer should already have internal documentation on the model for more than half of the information listed. The remaining items on the list require either minimal analysis (approximately 25%) or deeper analysis to generate for a regulator (approximately 25%).

The “Level of Importance to the Regulator’s Review” is a ranking of information a regulator may need to review which is based on the following level criteria:

**Level 1** – This information is necessary to begin the review of a predictive model. These data elements pertain to basic information about the type and structure of the model, the data and variables used, the assumptions made, and the goodness of fit. Ideally, this information would be included in the filing documentation with the initial submission of a filing made based on a predictive model.

**Level 2** – This information is necessary to continue the review of all but the most basic models, such as those based only on the filer’s internal data and only including variables that are in the filed rating plan. These data elements provide more detailed information about the model and address questions arising from review of the information in Level 1. Insurers concerned with speed to market may also want to include this information in the filing documentation.

**Level 3** – This information is necessary to continue the review of a model where concerns have been raised and not resolved based on review of the information in Level 1 and Level 2. These data elements address even more detailed aspects of the model. This information does not necessarily need to be included with the initial submission, unless specifically requested by a particular state, as it is typically requested only if the reviewer has concerns that the model may not comply with state laws and/or regulations.

**Level 4** – This information is necessary to continue the review of a model where concerns have been raised and not resolved based on the information in Level 1, Level 2, and Level 3. This most granular level of detail is addressing the basic building blocks of the model and does not necessarily need to be included by the filer with the initial submission, unless specifically requested by a particular state. It is typically requested only if the reviewer has serious concerns that the model may produce rates or rating factors that are excessive, inadequate, and/or unfairly discriminatory.

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20 There are some models that are made public by the vendor and would not result in a hindrance of the model’s protection.
Lastly, although the best practices presented in this white paper will readily be transferrable to review of other predictive models, the information elements presented here might be useful only with deeper adaptations when starting to review different types of predictive models. If the model is not a GLM, some listed items might not apply; e.g., not all predictive models generate p-values or F tests. Depending on the model type, other considerations might be important but are not listed here. When information elements presented in this appendix are applied to lines of business other than personal automobile and home insurance or other type of models, unique considerations may arise. In particular, data volume and credibility may be lower for other lines of business. Regulators should be aware of the context in which a predictive model is deployed, the uses to which the model is proposed to be put, and the potential consequences the model may have on the insurer, its customers, and its competitors. This white paper does not delve into these possible considerations, but regulators should be prepared to address them as they arise.
A. SELECTING MODEL INPUT

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| 1.      | Available Data Sources                                                               |                                               | Request details of data sources, whether internal to the company or from external sources. For insurance experience (policy or claim), determine whether data are aggregated by calendar, accident, fiscal, or policy year and when it was last evaluated. For each data source, get a list of all data elements used as input to the model that came from that source. For insurance data, get a list all companies whose data is included in the datasets.  

Request details of any non-insurance data used (customer-provided or other), whether the data was collected by use of a questionnaire/checklist, whether data was voluntarily reported by the applicant, and whether any of the data is subject to the federal Fair Credit Reporting Act (FCRA). If the data is from an outside source, find out what steps were taken to verify the data was accurate, complete, and unbiased in terms of relevant and representative time frame, representative of potential exposures, and lacking in obvious correlation to protected classes.  

**Note:** Reviewing source details should not make a difference when the model is new or refreshed; refreshed models would report the prior version list with the incremental changes due to the refresh. |
<p>| A.1.a   | Review the details of sources for both insurance and non-insurance data used as input to the model (only need sources for filed input characteristics included in the filed model). | 1                                             | Accuracy of insurance data should be reviewed. It is assumed that the data in the insurer’s data banks is subject to routine internal company audits and reconciliation. “Aggregated data” is straight from the insurer’s data banks without further modification (i.e., not scrubbed or transformed for the purposes of modeling). In other words, the data would not have been specifically modified for the purpose of model building. The company should provide some form of reasonability check that the data makes sense when checked against other audited sources. |
| A.1.b   | Reconcile aggregated insurance data underlying the model with available external insurance reports. | 4                                             |                                                                                                                                                                                                                                                                                                                                     |</p>
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<td>A.1.c</td>
<td>Review the geographic scope and geographic exposure distribution of the raw data for relevance to the state where the model is filed.</td>
<td>2</td>
<td>Many models are developed using a countrywide or a regional dataset. The company should explain how the data used to build the model makes sense for a specific state. The regulator should inquire which states were included in the data underlying the model build, testing, and validation. The company should provide an explanation where the data came from geographically and that it is a good representation for a state; i.e., the distribution by state should not introduce a geographic bias. However, there could be a bias by peril or wind-resistant building codes. Evaluate whether the data is relevant to the loss potential for which it is being used. For example, verify that hurricane data is only used where hurricanes can occur.</td>
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<tr>
<td>2. Sub-Models</td>
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<tr>
<td>A.2.a</td>
<td>Consider the relevance of (i.e., whether there is bias) of overlapping data or variables used in the model and sub-models.</td>
<td>1</td>
<td>Check if the same variables/datasets were used in the model, a sub-model, or as stand-alone rating characteristics. If so, verify the insurance company has processes and procedures in place to assess and address double-counting or redundancy.</td>
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<td>A.2.b</td>
<td>Determine if the sub-model was previously approved (or accepted) by the regulatory agency.</td>
<td>1</td>
<td>If the sub-model was previously approved/accepted, that may reduce the extent of the sub-model’s review. If approved, obtain the tracking number(s) (e.g., state, SERFF) and verify when and if it was the same model currently under review. Note: A previous approval does not necessarily confer a guarantee of ongoing approval; e.g., when statutes and/or regulations have changed or if a model’s indications have been undermined by subsequent empirical experience. However, knowing whether a model has been previously approved can help focus the regulator’s efforts and determine whether the prior decision needs to be revisited. In some circumstances, direct dialogue with the vendor could be quicker and more useful.</td>
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<td>Section</td>
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<tr>
<td>A.2.c</td>
<td>Determine if the sub-model output was used as input to the GLM; obtain the vendor name, as well as the name and version of the sub-model.</td>
<td>1</td>
<td>To accelerate the review of the filing, it may be desirable to request (from the company), the name and contact information for a vendor representative. The company should provide the name of the third-party vendor and a contact in the event the regulator has questions. The “contact” can be an intermediary at the insurer (e.g., a filing specialist), who can place the regulator in direct contact with a subject-matter expert (SME) at the vendor. Examples of such sub-models include credit/financial scoring algorithms and household composite score models. Sub-models can be evaluated separately and in the same manner as the primary model under evaluation. A sub-model contact for additional information should be provided. Sub-model SMEs may need to be brought into the conversation with regulators (whether in-house or third-party sub-models are used).</td>
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<tr>
<td>A.2.d</td>
<td>If using catastrophe model output, identify the vendor and the model settings/assumptions used when the model was run.</td>
<td>1</td>
<td>To accelerate the review of the filing, get contact information for the SME that ran the model and an SME from the vendor. The “SME” can be an intermediary at the insurer (e.g., a filing specialist), who can place the regulator in direct contact with the appropriate SMEs at the insurer or model vendor. For example, it is important to know hurricane model settings for storm surge, demand surge, and long-term/short-term views.</td>
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<tr>
<td>A.2.e</td>
<td>Obtain an explanation of how catastrophe models are integrated into the model to ensure no double-counting.</td>
<td>1</td>
<td>If a weather-based sub-model is input to the GLM under review, loss data used to develop the model should not include loss experience associated with the weather-based sub-model. Doing so could cause distortions in the modeled results by double-counting such losses when determining relativities or loss loads in the filed rating plan. For example, redundant losses in the data may occur when non-hurricane wind losses are included in the data while also using a severe convective storm model in the actuarial indication. Such redundancy may also occur with the inclusion of fluvial or pluvial flood losses when using a flood model or inclusion of freeze losses when using a winter storm model.</td>
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### 3. Adjustments to Data

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<th>Section</th>
<th>Information Element</th>
<th>Level of Importance to the Regulator’s Review</th>
<th>Comments</th>
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<tbody>
<tr>
<td>A.2.f</td>
<td>If using output of any scoring algorithms, obtain a list of the variables used to determine the score and provide the source of the data used to calculate the score.</td>
<td>1</td>
<td>Any sub-model should be reviewed in the same manner as the primary model that uses the sub-model’s output as input. Depending on the result of item A.2.b, the importance of this item may be decreased.</td>
</tr>
<tr>
<td>A.3.a</td>
<td>Determine if premium, exposure, loss, or expense data were adjusted (e.g., developed, trended, adjusted for catastrophe experience, or capped). If so, how? Do the adjustments vary for different segments of the data? If so, identify the segments and how the data was adjusted.</td>
<td>2</td>
<td>The rating plan or indications underlying the rating plan may provide special treatment of large losses and non-modeled large loss events. If such treatments exist, the company should provide an explanation how they were handled. These treatments need to be identified and the company/regulator needs to determine whether model data needs to be adjusted. For example, should large bodily injury (BI) liability losses in the case of personal automobile insurance be excluded, or should large non-catastrophe wind/hail claims in home insurance be excluded from the model’s training, test and validation data? Look for anomalies in the data that should be addressed. For example, is there an extreme loss event in the data? If other processes were used to load rates for specific loss events, how is the impact of those losses considered? Examples of losses that can contribute to anomalies in the data are large losses or flood, hurricane, or severe convective storm losses for personal automobile comprehensive or home insurance.</td>
</tr>
<tr>
<td>A.3.b</td>
<td>Identify adjustments that were made to aggregated data (e.g., transformations, binning and/or categorizations). If any, identify the name of the characteristic/variable and obtain a description of the adjustment.</td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>A.3.c</td>
<td>Ask for aggregated data (one dataset of pre-adjusted/scrubbed data and one dataset of post-adjusted/scrubbed data) that allows the regulator to focus on the univariate distributions and compare raw data to adjusted/binned/transformed/etc. data.</td>
<td>4</td>
<td>This is most relevant for variables that have been “scrubbed” or adjusted. Though most regulators may never ask for aggregated data and do not plan to rebuild any models, a regulator may ask for this aggregated data or subsets of it. It would be useful to the regulator if the percentage of exposures and premium for missing information from the model data by category are provided. This data can be displayed in either graphical or tabular formats.</td>
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<td>A.3.d</td>
<td>Determine how missing data was handled.</td>
<td>1</td>
<td>This is most relevant for variables that have been “scrubbed” or adjusted. The regulator should be aware of assumptions the modeler made in handling missing, null, or “not available” values in the data. For example, it would be helpful to the reviewer if the modeler were to provide a statement as to whether there is any systemic reason for missing data. If adjustments or recoding of values were made, they should be explained. It may also be useful to the regulator if the percentage of exposures and premium for missing information from the model data are provided. This data can be displayed in either graphical or tabular formats.</td>
</tr>
<tr>
<td>A.3.e</td>
<td>If duplicate records exist, determine how they were handled.</td>
<td>1</td>
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<tr>
<td>A.3.f</td>
<td>Determine if there were any material outliers identified and subsequently adjusted during the scrubbing process.</td>
<td>3</td>
<td>Look for a discussion of how outliers were handled. If necessary, the regulator may want to investigate further by getting a list (with description) of the types of outliers and determine what adjustments were made to each type of outlier. To understand the filer’s response, the regulator should ask for the filer’s materiality standard.</td>
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4. Data Organization

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<th>Section</th>
<th>Information Element</th>
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<tr>
<td>A.4.a</td>
<td>Obtain documentation on the methods used to compile and organize data, including procedures to merge data from different sources or filter data based on particular characteristics and a description of any preliminary analyses, data checks, and logical tests performed on the data and the results of those tests.</td>
<td>2</td>
<td>This should explain how data from separate sources was merged and/or how subsets of policies, based on selected characteristics, are filtered to be included in the data underlying the model and the rationale for that filtering.</td>
</tr>
<tr>
<td>A.4.b</td>
<td>Obtain documentation on the insurer’s process for reviewing the appropriateness, reasonableness, consistency, and comprehensiveness of the data, including a discussion of the rational relationship the data has to the predicted variable.</td>
<td>2</td>
<td>An example is when by-peril or by-coverage modeling is performed; the documentation should be for each peril/coverage and make rational sense. For example, if “murder” or “theft” data are used to predict the wind peril, the company should provide support and a rational explanation for their use.</td>
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<tr>
<td>A.4.c</td>
<td>Identify material findings the company had during its data review and obtain an explanation of any potential material limitations, defects, bias, or unresolved concerns found or believed to exist in the data. If issues or limitations in the data influenced modeling analysis and/or results, obtain a description of those concerns and an explanation how modeling analysis was adjusted and/or results were impacted.</td>
<td>1</td>
<td>“None” or “N/A” may be an appropriate response.</td>
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### B. BUILDING THE MODEL

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<tr>
<td>1.</td>
<td>High-Level Narrative for Building the Model</td>
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<tr>
<td>B.1.a</td>
<td>Identify the type of model underlying the rate filing (e.g., GLM, decision tree, Bayesian GLM, gradient-boosting machine, neural network, etc.). Understand the model’s role in the rating system and provide the reasons why that type of model is an appropriate choice for that role.</td>
<td>1</td>
<td>It is important to understand if the model in question is a GLM and, therefore, these information elements are applicable; or if it is some other model type, in which case other reasonable review approaches may be considered. There should be an explanation of why the model (using the variables included in it) is appropriate for the line of business. If by-peril or by-coverage modeling is used, the explanation should be by-peril/by-coverage. <strong>Note:</strong> If the model is not a GLM, the information elements in this white paper may not apply in their entirety.</td>
</tr>
<tr>
<td>B.1.b</td>
<td>Identify the software used for model development. Obtain the name of the software vendor/developer, software product, and a software version reference used in model development.</td>
<td>3</td>
<td>Changes in software from one model version to the next may explain if such changes, over time, contribute to changes in the modeled results. The company should provide the name of the third-party vendor and a “contact” in the event the regulator has questions. The “contact” can be an intermediary at the insurer (e.g., a filing specialist) who can place the regulator in direct contact with the appropriate SME at the vendor. Open-source software/programs used in model development should be identified by name and version the same as if from a vendor.</td>
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<tr>
<td>B.1.c</td>
<td>Obtain a description how the available data was divided between model training, test, and/or validation datasets. The description should include an explanation why the selected approach was deemed most appropriate, whether the company made any further subdivisions of available data, and reasons for the subdivisions (e.g., a portion separated from training data to support testing of components during model building). Determine if the validation data was accessed before model training was completed and, if so, obtain an explanation of why that came to occur. Obtain a discussion of whether the model was rebuilt using all the data or if it was only based on the training data.</td>
<td>1</td>
<td>The reviewer should be aware that modelers may break their data into three or just two datasets. Although the term “training” is used with little ambiguity, “test” and “validation” are terms that are sometimes interchanged, or the word “validation” may not be used at all. It would be unexpected if validation and/or test data were used for any purpose other than validation and/or test, prior to the selection of the final model. However, according to the CAS monograph, “Generalized Linear Models for Insurance Rating”: “Once a final model is chosen, … we would then go back and rebuild it using all of the data, so that the parameter estimates would be at their most credible.” The reviewer should note whether a company employed cross-validation techniques instead of a training/test/validation dataset approach. If cross-validation techniques were used, the reviewer should request a description of how cross-validation was done and confirm that the final model was not built on any particular subset of the data, but rather the full dataset.</td>
</tr>
<tr>
<td>B.1.d</td>
<td>Obtain a brief description of the development process, from initial concept to final model and filed rating plan.</td>
<td>1</td>
<td>The narrative should have the same scope as the filing.</td>
</tr>
<tr>
<td>B.1.e</td>
<td>Obtain a narrative on whether loss ratio, pure premium, or frequency/severity analyses were performed and, if separate frequency/severity modeling was performed, how pure premiums were determined.</td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>B.1.f</td>
<td>Identify the model’s target variable.</td>
<td>1</td>
<td>A clear description of the target variable is key to understanding the purpose of the model. It may also prove useful to obtain a sample calculation of the target variable in Excel format, starting with the “raw” data for a policy, or a small sample of policies, depending on the complexity of the target variable calculation.</td>
</tr>
<tr>
<td>B.1.g</td>
<td>Obtain a description of the variable selection process.</td>
<td>1</td>
<td>The narrative regarding the variable selection process may address matters such as the criteria upon which variables were selected or omitted, identification of the number of preliminary variables considered in developing the model versus the number of variables that remained, and any statutory or regulatory limitations that were taken into account when making the decisions regarding variable selection. The modeler should comment on the use of automated feature selection algorithms to choose predictor variables and explain how potential overfitting that can arise from these techniques was addressed.</td>
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<td>B.1.h</td>
<td>In conjunction with variable selection, obtain a narrative on how the company determined the granularity of the rating variables during model development.</td>
<td>3</td>
<td>The narrative should include discussion of how credibility was considered in the process of determining the level of granularity of the variables selected.</td>
</tr>
<tr>
<td>B.1.i</td>
<td>Determine if model input data was segmented in any way (e.g., by-coverage, by-peril, or by-form basis). If so, obtain a description of data segmentation and the reasons for data segmentation.</td>
<td>1</td>
<td>The regulator would use this to follow the logic of the modeling process.</td>
</tr>
<tr>
<td>B.1.j</td>
<td>If adjustments to the model were made based on credibility considerations, obtain an explanation of the credibility considerations and how the adjustments were applied.</td>
<td>2</td>
<td>Adjustments may be needed, given that models do not explicitly consider the credibility of the input data or the model’s resulting output; models take input data at face value and assume 100% credibility when producing modeled output.</td>
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### 2. Medium-Level Narrative for Building the Model

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<tr>
<td>B.2.a</td>
<td>At crucial points in model development, if selections were made among alternatives regarding model assumptions or techniques, obtain a narrative on the judgment used to make those selections.</td>
<td>3</td>
<td>Evaluate the addition or removal of variables and the model fitting. It is not necessary for the company to discuss each iteration of adding and subtracting variables, but the regulator should gain a general understanding of how these adjustments were done, including any statistical improvement measures relied upon.</td>
</tr>
<tr>
<td>B.2.b</td>
<td>If post-model adjustments were made to the data and the model was rerun, obtain an explanation on the details and the rationale for those adjustments.</td>
<td>2</td>
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<tr>
<td>B.2.c</td>
<td>Obtain a description of the testing that was performed during the model-building process, including an explanation of the decision-making process to determine which interactions were included and which were not.</td>
<td>3</td>
<td>There should be a description of the testing that was performed during the model-building process. Examples of tests that may have been performed include univariate testing and review of a correlation matrix. The number of interaction terms that could potentially be included in a model increases far more quickly than the number of “main effect” variables (i.e., the basic predictor variables that can be interacted together). Analyzing each possible interaction term individually can be unwieldy. It is typical for interaction terms to be excluded from the model by default, and only included where they can be shown to be particularly important. So, as a rule of thumb, the regulator’s emphasis should be on understanding why the insurer included the interaction terms it did, rather than on why other candidate interactions were excluded. In some cases, however, it could be reasonable to inquire about why a particular interaction term was excluded from a model—for example, if that interaction term was ubiquitous in similar filings and was known to be highly predictive, or if the regulator had reason to believe that the interaction term would help differentiate dissimilar risks within an excessively heterogeneous rating segment.</td>
</tr>
<tr>
<td>B.2.d</td>
<td>For the GLM, identify the link function used. Identify which distribution was used for the model (e.g., Poisson, Gaussian, log-normal, Tweedie). Obtain an explanation of why the link function and distribution were chosen. Obtain the formulas for the distribution and link functions, including specific numerical parameters of the distribution. If changed from the default, obtain a discussion of applicable convergence criterion.</td>
<td>1</td>
<td>Solving the GLM is iterative and the modeler can check to see if fit is improving. At some point, convergence occurs; however, when it occurs can be subjective or based on threshold criteria. If the software’s default convergence criteria were not relied upon, an explanation of any deviation should be provided.</td>
</tr>
<tr>
<td>B.2.e</td>
<td>Obtain a narrative on the formula relationship between the data and the model outputs, with a definition of each model input and output. The narrative should include all coefficients necessary to evaluate the predicted pure premium, relativity, or other value, for any real or hypothetical set of inputs.</td>
<td>2</td>
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<tr>
<td>B.2.f</td>
<td>If there were data situations in which GLM weights were used, obtain an explanation of how and why they were used.</td>
<td>3</td>
<td>Investigate whether identical records were combined to build the model.</td>
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3. Predictor Variables

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<tr>
<td>B.3.a</td>
<td>Obtain a complete data dictionary, including the names, types, definitions, and uses of each predictor variable, offset variable, control variable, proxy variable, geographic variable, geodemographic variable, and all other variables in the model used on their own or as an interaction with other variables (including sub-models and external models).</td>
<td>1</td>
<td>Types of variables might be continuous, discrete, Boolean, etc. Definitions should not use programming language or code. For any variable(s) intended to function as a control or offset, obtain an explanation of its purpose and impact. Also, for any use of interaction between variables, obtain an explanation of its rationale and impact.</td>
</tr>
<tr>
<td>B.3.b</td>
<td>Obtain a list of predictor variables considered but not used in the final model, and the rationale for their removal.</td>
<td>4</td>
<td>The purpose of this requirement is to identify variables the company finds to be predictive but ultimately may reject for reasons other than loss-cost considerations (e.g., price optimization). Also, look for variables the company tested and then rejected. This item could help address concerns about data dredging. The reasonableness of including a variable with a given significance level could depend greatly on the other variables the company evaluated for inclusion in the model and the criteria for inclusion or omission. For instance, if the company tested 1,000 similar variables and selected the one with the lowest p-value of 0.001, this would be a far, far weaker case for statistical significance than if that variable was the only one the company evaluated. Note: Context matters.</td>
</tr>
<tr>
<td>B.3.c</td>
<td>Obtain a correlation matrix for all predictor variables included in the model and sub-model(s).</td>
<td>3</td>
<td>While GLMs accommodate collinearity, the correlation matrix provides more information about the magnitude of correlation between variables. The company should indicate what statistic was used (e.g., Pearson, Cramer’s V ). The regulatory reviewer should understand what statistic was used to produce the matrix but should not prescribe the statistic.</td>
</tr>
<tr>
<td>B.3.d</td>
<td>Obtain a rational explanation for why an increase in each predictor variable should increase or decrease frequency, severity, loss costs, expenses, or any element or characteristic being predicted.</td>
<td>3</td>
<td>The explanation should go beyond demonstrating correlation. Considering possible causation may be relevant, but proving causation is neither practical nor expected. If no rational explanation can be provided, greater scrutiny may be appropriate. For example, the regulator should look for unfamiliar predictor variables and, if found, the regulator should seek to understand the connection that variable has to increasing or decreasing the target variable.</td>
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## B.3.e
If the modeler made use of one or more dimensionality reduction techniques, such as a principal component analysis (PCA), obtain a narrative about that process, an explanation why that technique was chosen, and a description of the step-by-step process used to transform observations (usually correlated) into a set of linearly uncorrelated variables. In each instance, obtain a list of the pre-transformation and post-transformation variable names, as well as an explanation of how the results of the dimensionality reduction technique was used within the model.

### Comments
For models that are built using multistate data, validation data for some segments of risk is likely to have low credibility in individual states. Nevertheless, some regulators require model validation on state-only data, especially when analysis using state-only data contradicts the countrywide results. State-only data might be more applicable but could also be impacted by low credibility for some segments of risk.  
**Note:** It may be useful to consider geographic stability measures for territories within the state.

## 4. Adjusting Data, Model Validation, and Goodness-of-Fit Measures

### B.4.a
Obtain a description of the methods used to assess the statistical significance/goodness-of-fit of the model to validation data, such as lift charts and statistical tests. Compare the model’s projected results to historical actual results and verify that modeled results are reasonably similar to actual results from validation data.

### Comments
For models that are built using multistate data, validation data for some segments of risk is likely to have low credibility in individual states. Nevertheless, some regulators require model validation on state-only data, especially when analysis using state-only data contradicts the countrywide results. State-only data might be more applicable but could also be impacted by low credibility for some segments of risk.  
**Note:** It may be useful to consider geographic stability measures for territories within the state.

### B.4.b
For all variables (discrete or continuous), review the appropriate parameter values and relevant tests of significance, such as confidence intervals, chi-square tests, p-values, or F tests. Determine if model development data, validation data, test data, or other data was used for these tests.

### Comments
Typical p-values greater than 5% are large and should be questioned. Reasonable business judgment can sometimes provide legitimate support for high p-values. Reasonableness of the p-value threshold could also vary depending on the context of the model; e.g., the threshold might be lower when many candidate variables were evaluated for inclusion in the model. Overall lift charts and/or statistical tests using validation data may not provide enough of the picture. If there is concern about one or more individual variables, the reviewer may obtain, for each discrete variable level, the parameter value, confidence intervals, chi-square tests, p-values, and any other relevant and material tests. For variables that are modeled continuously, it may be sufficient to obtain statistics around the modeled parameters; e.g., confidence intervals around each level of an AOI curve might be more than what is needed.
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<th>Section</th>
<th>Information Element</th>
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<td>B.4.c</td>
<td>Identify the threshold for statistical significance and explain why it was selected. Obtain a reasonable and appropriately supported explanation for keeping the variable for each discrete variable level where the p-values were not less than the chosen threshold.</td>
<td>1</td>
<td>The explanation should clearly identify the thresholds for statistical significance used by the modeler. Typical p-values greater than 5% are large and should be questioned. Reasonable business judgment can sometimes provide legitimate support for high p-values. Reasonableness of the p-value threshold could also vary depending on the context of the model; e.g., the threshold might be lower when many candidate variables were evaluated for inclusion in the model. Overall lift charts and/or statistical tests using validation data may not provide enough of the picture. If there is concern about one or more individual variables, the reviewer may obtain, for each discrete variable level, the parameter value, confidence intervals, chi-square tests, p-values, and any other relevant and material tests.</td>
</tr>
<tr>
<td>B.4.d</td>
<td>For overall discrete variables, review type 3 chi-square tests, p-values, F tests and any other relevant and material test. Determine if model development data, validation data, test data, or other data was used for these tests.</td>
<td>2</td>
<td>Typical p-values greater than 5% are large and should be questioned. Reasonable business judgment can sometimes provide legitimate support for high p-values. Reasonableness of the p-value threshold could also vary depending on the context of the model; e.g., the threshold might be lower when many candidate variables were evaluated for inclusion in the model. Overall lift charts and/or statistical tests using validation data may not provide enough of the picture. If there is concern about one or more individual variables, the reviewer may obtain, for each discrete variable level, the parameter value, confidence intervals, chi-square tests, p-values, and any other relevant and material tests. For variables that are modeled continuously, it may be sufficient to obtain statistics around the modeled parameters; e.g., confidence intervals around each level of an AOI curve might be more than what is needed.</td>
</tr>
<tr>
<td>B.4.e</td>
<td>Obtain evidence that the model fits the training data well, for individual variables, for any relevant combinations of variables, and for the overall model.</td>
<td>2</td>
<td>For a GLM, such evidence may be available using chi-square tests, p-values, F tests and/or other means. The steps taken during modeling to achieve goodness-of-fit are likely to be numerous and laborious to describe, but they contribute much of what is generalized about a GLM. The regulator should not assume to know what the company did and ask, “How?” Instead, the regulator should ask what the company did and be prepared to ask follow-up questions.</td>
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<tr>
<td>B.4.f</td>
<td>For continuous variables, provide confidence intervals, chi-square tests, p-values, and any other relevant and material test. Determine if model development data, validation data, test data, or other data was used for these tests.</td>
<td>2</td>
<td>Typical p-values greater than 5% are large and should be questioned. Reasonable business judgment can sometimes provide legitimate support for high p-values. Reasonableness of the p-value threshold could also vary depending on the context of the model; e.g., the threshold might be lower when many candidate variables were evaluated for inclusion in the model. Overall lift charts and/or statistical tests using validation data may not provide enough of the picture. If there is concern about one or more individual variables, the reviewer may obtain, for each discrete variable level, the parameter value, confidence intervals, chi-square tests, p-values and any other relevant and material tests. For variables that are modeled continuously, it may be sufficient to obtain statistics around the modeled parameters; for example, confidence intervals around each level of an AOI curve might be more than what is needed.</td>
</tr>
<tr>
<td>B.4.g</td>
<td>Obtain a description how the model was tested for stability over time.</td>
<td>2</td>
<td>Evaluate the build/test/validation datasets for potential time-sensitive model distortions (e.g., a winter storm in year 3 of 5 can distort the model in both the testing and validation datasets). Obsolescence over time is a model risk (e.g., old data for a variable or a variable itself may no longer be relevant). If a model being introduced now is based on losses from years ago, the reviewer should be interested in knowing whether that model would be predictive in the proposed context. Validation using recent data from the proposed context might be requested. Obsolescence is a risk even for a new model based on recent and relevant loss data. The reviewer may want to inquire as to the following: What steps, if any, were taken during modeling to prevent or delay obsolescence? What controls exist to measure the rate of obsolescence? What is the plan and timeline for updating and ultimately replacing the model? The reviewer should also consider that as newer technologies enter the market (e.g., personal automobile) their impact may change claim activity over time (e.g., lower frequency of loss). So, it is not necessarily a bad thing that the results are not stable over time.</td>
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<tr>
<td>B.4.h</td>
<td>Obtain a narrative on how potential concerns with overfitting were addressed.</td>
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<td>B.4.i</td>
<td>Obtain support demonstrating that the GLM assumptions are appropriate.</td>
<td>3</td>
<td>A visual review of plots of actual errors is usually sufficient. The reviewer should look for a conceptual narrative covering these topics: How does this particular GLM work? Why did the rate filer do what it did? Why employ this design instead of alternatives? Why choose this particular distribution function and this particular link function? A company response may be at a fairly high level and reference industry practices. If the reviewer determines that the model makes no assumptions that are considered to be unreasonable, the importance of this item may be reduced.</td>
</tr>
<tr>
<td>B.4.j</td>
<td>Obtain 5-10 sample records with corresponding output from the model for those records.</td>
<td>4</td>
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</tr>
</tbody>
</table>

### 5. “Old Model” Versus “New Model”

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<thead>
<tr>
<th>Section</th>
<th>Information Element</th>
<th>Level of Importance to Regulator’s Review</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>B.5.a</td>
<td>Obtain an explanation of why this model is an improvement to the current rating plan. If it replaces a previous model, find out why it is better than the one it is replacing; determine how the company reached that conclusion and identify metrics relied on in reaching that conclusion. Look for an explanation of any changes in calculations, assumptions, parameters, and data used to build this model from the previous model.</td>
<td>2</td>
<td>The regulator should expect to see improvement in the new class plan’s predictive ability or other sufficient reason for the change.</td>
</tr>
<tr>
<td>B.5.b</td>
<td>Determine if two Gini coefficients were compared and obtain a narrative on the conclusion drawn from this comparison.</td>
<td>3</td>
<td>This information element requests a comparison of Gini coefficient from the prior model to the Gini coefficient of proposed model. It is expected that there should be improvement in the Gini coefficient. A higher Gini coefficient indicates greater differentiation produced by the model and how well the model fits that data. This is relevant when one model is being updated or replaced. The regulator should expect to see improvement in the new class plan’s predictive ability. One example of a comparison might be sufficient. <strong>Note:</strong> This comparison is not applicable to initial model introduction. Reviewer can look to CAS monograph, “Generalized Linear Models for Insurance Rating.”</td>
</tr>
<tr>
<td>B.5.c</td>
<td>Determine if double-lift charts were analyzed and obtain a narrative on the conclusion drawn from this analysis.</td>
<td>3</td>
<td>One example of a comparison might be sufficient. <strong>Note:</strong> “Not applicable” is an acceptable response.</td>
</tr>
</tbody>
</table>
### B.5.d
If replacing an existing model, obtain a list of any predictor variables used in the old model that are not used in the new model. Obtain an explanation of why these variables were dropped from the new model. Obtain a list of all new predictor variables in the new model that were not in the prior old model.

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<tr>
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<tbody>
<tr>
<td>B.5.d</td>
<td>If replacing an existing model, obtain a list of any predictor variables used in the old model that are not used in the new model. Obtain an explanation of why these variables were dropped from the new model. Obtain a list of all new predictor variables in the new model that were not in the prior old model.</td>
<td>2</td>
<td>It is useful to differentiate between old and new variables, so the regulator can prioritize more time on variables not yet reviewed.</td>
</tr>
</tbody>
</table>

### 6. Modeler Software
B.6.a Request access to SMEs (e.g., modelers) who led the project, compiled the data, and/or built the model.

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<thead>
<tr>
<th>Section</th>
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</thead>
<tbody>
<tr>
<td>B.6.a</td>
<td>Request access to SMEs (e.g., modelers) who led the project, compiled the data, and/or built the model.</td>
<td>4</td>
<td>The filing should contain a contact that can put the regulator in touch with appropriate SMEs and key contributors to the model development to discuss the model.</td>
</tr>
</tbody>
</table>
### C. THE FILED RATING PLAN

<table>
<thead>
<tr>
<th>Section</th>
<th>Information Element</th>
<th>Level of Importance to Regulator’s Review</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. General Impact of Model on Rating Algorithm</td>
<td></td>
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</tr>
<tr>
<td>C.1.a</td>
<td>In the actuarial memorandum or explanatory memorandum, for each model and sub-model (including external models), look for a narrative that explains each model and its role (i.e., how it was used) in the rating system.</td>
<td>1</td>
<td>The “role of the model” relates to how the model integrates into the rating plan as a whole and where the effects of the model are manifested within the various components of the rating plan. This is not intended as an overarching statement of the model’s goal, but rather a description of how specifically the model is used. This item is particularly important, if the role of the model cannot be immediately discerned by the reviewer from a quick review of the rate and/or rule pages. (Importance is dependent on state requirements and ease of identification by the first layer of review and escalation to the appropriate review staff.)</td>
</tr>
<tr>
<td>C.1.b</td>
<td>Obtain an explanation of how the model was used to adjust the filed rating algorithm.</td>
<td>1</td>
<td>Models are often used to produce factor-based indications, which are then used as the basis for the selected changes to the rating plan. It is the changes to the rating plan that create impacts. The regulator should consider asking for an explanation of how the model was used to adjust the rating algorithm.</td>
</tr>
<tr>
<td>C.1.c</td>
<td>Obtain a complete list of characteristics/variables used in the proposed rating plan, including those used as input to the model (including sub-models and composite variables) and all other characteristics/variables (not input to the model) used to calculate a premium. For each characteristic/variable, determine if it is only input to the model, whether it is only a separate univariate rating characteristic, or whether it is both input to the model and a separate univariate rating characteristic. The list should include transparent descriptions (in plain language) of each listed characteristic/variable.</td>
<td>1</td>
<td>Examples of variables used as inputs to the model and used as separate univariate rating characteristics might be criteria used to determine a rating tier or household composite characteristic.</td>
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<td>Section</td>
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<tr>
<td>2. Relevance of Variables and Relationship to Risk of Loss</td>
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</tbody>
</table>
| C.2.a | Obtain a narrative regarding how the characteristics/rating variables included in the filed rating plan relate to the risk of insurance loss (or expense) for the type of insurance product being priced. | 2 | The narrative should include a discussion of the relevance each characteristic/rating variable has on consumer behavior that would lead to a difference in risk of loss (or expense). The narrative should include a rational relationship to cost, and model results should be consistent with the expected direction of the relationship. 
Note: This explanation would not be needed if the connection between variables and risk of loss (or expense) has already been illustrated. |
| 3. Comparison of Model Outputs to Current and Selected Rating Factors | | | |
| C.3.a | Compare relativities indicated by the model to both current relativities and the insurer’s selected relativities for each risk characteristic/variable in the rating plan. | 1 | “Significant difference” may vary based on the risk characteristic/variable and context. However, the movement of a selected relativity should be in the direction of the indicated relativity; if not, an explanation is necessary as to why the movement is logical. |
| C.3.b | Obtain documentation and support for all calculations, judgments, or adjustments that connect the model’s indicated values to the selected relativities filed in the rating plan. | 1 | The documentation should include explanations for the necessity of any such adjustments and each significant difference between the model’s indicated values and the selected values. This applies even to models that produce scores, tiers, or ranges of values for which indications can be derived. 
Note: This information is especially important if differences between model-indicated values and selected values are material and/or impact one consumer population more than another. |
| C.3.c | For each characteristic/variable used as both input to the model (including sub-models and composite variables) and as a separate univariate rating characteristic, obtain a narrative regarding how each characteristic/variable was tempered or adjusted to account for possible overlap or redundancy in what the characteristic/variable measures. | 2 | Modeling loss ratios with these characteristics/variables as control variables would account for possible overlap. The insurer should address this possibility or other considerations; e.g., tier placement models often use risk characteristics/variables that are also used elsewhere in the rating plan. 
One way to do this would be to model the loss ratios resulting from a process that already uses univariate rating variables. Then the model/composite variables would be attempting to explain the residuals. |
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<tbody>
<tr>
<td>4.</td>
<td>4. Responses to Data, Credibility, and Granularity Issues</td>
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</tr>
<tr>
<td>C.4.a</td>
<td>Determine what, if any, consideration was given to the credibility of the output data.</td>
<td>2</td>
<td>The regulator should determine at what level of granularity credibility is applied. If modeling was by-coverage, by-form, or by-peril, the company should explain how these were handled when there was not enough credible data by coverage, form, or peril to model.</td>
</tr>
<tr>
<td>C.4.b</td>
<td>If the rating plan is less granular than the model, obtain an explanation of why.</td>
<td>2</td>
<td>This is applicable if the company had to combine modeled output in order to reduce the granularity of the rating plan.</td>
</tr>
<tr>
<td>C.4.c</td>
<td>If the rating plan is more granular than the model, obtain an explanation of why.</td>
<td>2</td>
<td>A more granular rating plan may imply that the company had to extrapolate certain rating treatments, especially at the tails of a distribution of attributes, in a manner not specified by the model indications. It may be necessary to extrapolate due to data availability or other considerations.</td>
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<tr>
<td>5.</td>
<td>5. Definitions of Rating Variables</td>
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<td></td>
</tr>
<tr>
<td>C.5.a</td>
<td>Obtain a narrative regarding adjustments made to model output (e.g., transformations, binning and/or categorizations). If adjustments were made, obtain the name of the characteristic/variable and a description of the adjustment.</td>
<td>2</td>
<td>If rating tiers or other intermediate rating categories are created from model output, the rate and/or rule pages should present these rating tiers or categories. The company should provide an explanation of how model output was translated into these rating tiers or intermediate rating categories.</td>
</tr>
<tr>
<td>6.</td>
<td>6. Supporting Data</td>
<td></td>
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<tr>
<td>C.6.a</td>
<td>Obtain aggregated state-specific, book-of-business-specific univariate historical experience data, separately for each year included in the model, consisting of loss ratio or pure premium relativities and the data underlying those calculations for each category of model output(s) proposed to be used within the rating plan. For each data element, obtain an explanation of whether it is raw or adjusted and, if the latter, obtain a detailed explanation for the adjustments.</td>
<td>4</td>
<td>For example, were losses developed/undeveloped, trended/untrended, capped/uncapped, etc.? Univariate indications should not necessarily be used to override more sophisticated multivariate indications. However, they do provide additional context and may serve as a useful reference.</td>
</tr>
<tr>
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<tr>
<td>C.6.b</td>
<td>Obtain an explanation of any material (especially directional) differences between model indications and state-specific univariate indications.</td>
<td>4</td>
<td>Multivariate indications may be reasonable as refinements to univariate indications, but possibly not for bringing about significant reversals of those indications. For instance, if the univariate indicated relativity for an attribute is 1.5 and the multivariate indicated relativity is 1.25, this is potentially a plausible application of the multivariate techniques. If, however, the univariate indicated relativity is 0.7 and the multivariate indicated relativity is 1.25, a regulator may question whether the attribute in question is negatively correlated with other determinants of risk. Credibility of state-level data should be considered when state indications differ from modeled results based on a broader dataset. However, the relevance of the broader dataset to the risks being priced should also be considered. Borderline reversals are not of as much concern. If multivariate indications perform well against the state-level data, this should suffice. However, credibility considerations need to be taken into account as state-level segmentation comparisons may not have enough credibility.</td>
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7. Consumer Impacts

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<tbody>
<tr>
<td>C.7.a</td>
<td>Obtain a listing of the top five rating variables that contribute the most to large swings in renewal premium, both as increases and decreases, as well as the top five rating variables with the largest spread of impact for both new and renewal business.</td>
<td>4</td>
<td>These rating variables may represent changes to rating factors, be newly introduced to the rating plan, or have been removed from the rating plan.</td>
</tr>
<tr>
<td>C.7.b</td>
<td>Determine if the company performed sensitivity testing to identify significant changes in premium due to small or incremental change in a single risk characteristic. If such testing was performed, obtain a narrative that discusses the testing and provides the results of that testing.</td>
<td>3</td>
<td>One way to see sensitivity is to analyze a graph of each risk characteristic’s/variable’s possible relativities. Look for significant variation between adjacent relativities and evaluate if such variation is reasonable and credible.</td>
</tr>
<tr>
<td>C.7.c</td>
<td>For the proposed filing, obtain the impacts on renewal business and describe the process used by management, if any, to mitigate those impacts.</td>
<td>2</td>
<td>Some mitigation efforts may substantially weaken the connection between premium and expected loss and expense and, hence, may be viewed as unfairly discriminatory by some states.</td>
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<tr>
<td>Section</td>
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<tr>
<td>C.7.d</td>
<td>Obtain a rate disruption/dislocation analysis, demonstrating the distribution of percentage and/or dollar impacts on renewal business (created by rerating the current book of business) and sufficient information to explain the disruptions to individual consumers.</td>
<td>2</td>
<td>The analysis should include the largest dollar and percentage impacts arising from the filing, including the impacts arising specifically from the adoption of the model or changes to the model as they translate into the proposed rating plan.</td>
</tr>
<tr>
<td></td>
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<td></td>
<td>While the default request would typically be for the distribution/dislocation of impacts at the overall filing level, the regulator may need to delve into the more granular variable-specific effects of rate changes if there is concern about particular variables having extreme or disproportionate impacts, or significant impacts that have otherwise yet to be substantiated. See Appendix D for an example of a disruption analysis.</td>
</tr>
<tr>
<td>C.7.e</td>
<td>Obtain exposure distributions for the model’s output variables and show the effects of rate changes at granular and summary levels, including the overall impact on the book of business.</td>
<td>3</td>
<td>See Appendix D for an example of an exposure distribution.</td>
</tr>
<tr>
<td>C.7.f</td>
<td>Identify policy characteristics, used as input to a model or sub-model, that remain “static” over a policy’s lifetime versus those that will be updated periodically. Obtain a narrative on how the company handles policy characteristics that are listed as “static,” yet change over time.</td>
<td>3</td>
<td>Some examples of “static” policy characteristics are prior carrier tenure, prior carrier type, prior liability limits, claim history over past X years, or lapse of coverage. These are specific policy characteristics usually set at the time new business is written, used to create an insurance score or to place the business in a rating/underwriting tier, and often fixed for the life of the policy. The reviewer should be aware, and possibly concerned, how the company treats an insured over time when the insured’s risk profile based on “static” variables changes over time but the rate charged, based on a new business insurance score or tier assignment, no longer reflect the insured’s true and current risk profile. A few examples of “non-static” policy characteristics are age of driver, driving record, and credit information (FCRA-related). These are updated automatically by the company on a periodic basis, usually at renewal, with or without the policyholder explicitly informing the company.</td>
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<tbody>
<tr>
<td>C.7.g</td>
<td>Obtain a means to calculate the rate charged a consumer.</td>
<td>3</td>
<td>The filed rating plan should contain enough information for a regulator to be able to validate policy premium. However, for a complex model or rating plan, a score or premium calculator via Excel or similar means would be ideal, but this could be elicited on a case-by-case basis. The ability to calculate the rate charged could allow the regulator to perform sensitivity testing when there are small changes to a risk characteristic/variable. <strong>Note:</strong> This information may be proprietary. For the rating plan, the rate order of calculation rule may be sufficient. However, it may not be feasible for a regulator to get all the input data necessary to reproduce a model’s output. Credit and telematics models are examples of model types where model output would be readily available, but the input data would not be readily available to the regulator.</td>
</tr>
<tr>
<td>C.7.h</td>
<td>In the filed rating plan, be aware of any non-insurance data used as input to the model (customer-provided or other). In order to respond to consumer inquiries, it may be necessary to inquire as to how consumers can verify their data and correct errors.</td>
<td>1</td>
<td>If the data is from a third-party source, the company should provide information on the source. Depending on the nature of the data, it may need to be documented with an overview of who owns it. The topic of consumer verification may also need to be addressed, including how consumers can verify their data and correct errors.</td>
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### 8. Accurate Translation of Model into a Rating Plan

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<tbody>
<tr>
<td>C.8.a</td>
<td>Obtain sufficient information to understand how the model outputs are used within the rating system and to verify that the rating plan’s manual, in fact, reflects the model output and any adjustments made to the model output.</td>
<td>1</td>
<td>The regulator can review the rating plan’s manual to see that modeled output is properly reflected in the manual’s rules, rates, factors, etc.</td>
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<td>Comments</td>
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</tr>
<tr>
<td>C.9.a</td>
<td>Establish procedures to efficiently review rate filings and models contained therein.</td>
<td>1</td>
<td>“Speed to market” is an important competitive concept for insurers. Although the regulator needs to understand the rate filing before accepting the rate filing, the regulator should not request information that does not increase his/her understanding of the rate filing. The regulator should review the state’s rate filing review process and procedures to ensure that they are fair and efficient.</td>
</tr>
<tr>
<td>C.9.b</td>
<td>Be knowledgeable of state laws and regulations in order to determine if the proposed rating plan (and models) are compliant with state laws and/or regulations.</td>
<td>1</td>
<td>This is a primary duty of state insurance regulators. The regulator should be knowledgeable of state laws and regulations and apply them to a rate filing fairly and efficiently. The regulator should pay special attention to prohibitions of unfair discrimination.</td>
</tr>
<tr>
<td>C.9.c</td>
<td>Be knowledgeable of state laws and regulations in order to determine if any information contained in the rate filing (and models) should be treated as confidential.</td>
<td>1</td>
<td>The regulator should be knowledgeable of state laws and regulations regarding confidentiality of rate filing information and apply them to a rate filing fairly and efficiently. Confidentiality of proprietary information is key to innovation and competitive markets.</td>
</tr>
</tbody>
</table>
Mapping Best Practices to Information Elements and Information Elements to Best Practices

Table 1 maps the best practices to each GLM information element. Table 2 maps the GLM information elements to each best practice. With this mapping, a state insurance regulator interested in how to meet the objective of a best practice can consider the information elements associated with the best practice in the table.

<table>
<thead>
<tr>
<th>Information Element</th>
<th>Selected Best Practices Mapped to Information Element</th>
</tr>
</thead>
<tbody>
<tr>
<td>A. Selecting Model Input</td>
<td></td>
</tr>
<tr>
<td>A.1. Available Data Sources</td>
<td></td>
</tr>
<tr>
<td>A.1.a</td>
<td>1.b, 1.d, 2.a, 2.b, 3.a</td>
</tr>
<tr>
<td>A.1.b</td>
<td>2.b, 2.c</td>
</tr>
<tr>
<td>A.1.c</td>
<td>1.b</td>
</tr>
<tr>
<td>A.2. Sub-Models</td>
<td></td>
</tr>
<tr>
<td>A.2.a</td>
<td>1.b, 1.d, 3.a, 3.c</td>
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<td>A.2.b</td>
<td>4.c</td>
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<td>A.2.c</td>
<td>2.a, 2.d, 3.a, 4.c</td>
</tr>
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<td>A.2.d</td>
<td>2.a, 2.d, 3.a, 4.c</td>
</tr>
<tr>
<td>A.2.e</td>
<td>2.c, 1.d, 2.a, 3.a</td>
</tr>
<tr>
<td>A.2.f</td>
<td>1.b, 1.d, 2.a, 3.a</td>
</tr>
<tr>
<td>A.3. Adjustments to Data</td>
<td></td>
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<tr>
<td>A.3.a</td>
<td>1.b, 2.a, 2.b, 2.c</td>
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<tr>
<td>A.3.b</td>
<td>2.a, 2.b, 2.c</td>
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<tr>
<td>A.3.c</td>
<td>2.b, 2.c</td>
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<td>A.3.d</td>
<td>2.b, 2.c</td>
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<td>A.3.e</td>
<td>2.b, 2.c</td>
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<td>A.3.f</td>
<td>2.b, 2.c</td>
</tr>
<tr>
<td>A.4. Data Organization</td>
<td></td>
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<tr>
<td>A.4.a</td>
<td>2.a, 2.b, 2.c, 3.a</td>
</tr>
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<td>A.4.b</td>
<td>1.b, 1.d, 2.b, 2.c</td>
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<td>A.4.c</td>
<td>1.d, 2.a, 2.b, 2.c</td>
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<tr>
<td>B. Building the Model</td>
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<tr>
<td>B.1. High-Level Narrative for Building the Model</td>
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<tr>
<td>B.1.a</td>
<td>2.a</td>
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<tr>
<td>B.1.b</td>
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<td>B.1.c</td>
<td>2.a</td>
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<tr>
<td>Information Element</td>
<td>Selected Best Practices Mapped to Information Element</td>
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<td>---------------------</td>
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<tr>
<td>B.1.d</td>
<td>2.a, 3.b</td>
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<td>B.1.e</td>
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<tr>
<td>B.1.f</td>
<td>1.b, 2.a</td>
</tr>
<tr>
<td>B.1.g</td>
<td>1.b, 1.d, 2.a, 3.a</td>
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<tr>
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<td>2.a, 2.b</td>
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<tr>
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<td>1.b, 2.a</td>
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<td>B.1.j</td>
<td>2.a, 2.c</td>
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</tbody>
</table>

**B.2. Medium-Level Narrative for Building the Model**

<table>
<thead>
<tr>
<th>Information Element</th>
<th>Selected Best Practices Mapped to Information Element</th>
</tr>
</thead>
<tbody>
<tr>
<td>B.2.a</td>
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<tr>
<td>B.2.b</td>
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<tr>
<td>B.2.c</td>
<td>2.a, 3.b</td>
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<td>B.2.d</td>
<td>2.a</td>
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<tr>
<td>B.2.e</td>
<td>2.a, 3.a, 3.b</td>
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<tr>
<td>B.2.f</td>
<td>2.a, 2.c</td>
</tr>
</tbody>
</table>

**B.3. Predictor Variables**

<table>
<thead>
<tr>
<th>Information Element</th>
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</tr>
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<tbody>
<tr>
<td>B.3.a</td>
<td>1.b, 1.d, 2.a, 3.a</td>
</tr>
<tr>
<td>B.3.b</td>
<td>2.a</td>
</tr>
<tr>
<td>B.3.c</td>
<td>1.d, 2.a, 3.a</td>
</tr>
<tr>
<td>B.3.d</td>
<td>1.b, 1.d, 3.a</td>
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<tr>
<td>B.3.e</td>
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**B.4. Adjusting Data, Model Validation, and Goodness-of-Fit Measures**

<table>
<thead>
<tr>
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<tr>
<td>B.4.a</td>
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<td>B.4.b</td>
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<tr>
<td>B.4.c</td>
<td>1.b, 2.a</td>
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<tr>
<td>B.4.d</td>
<td>1.b, 2.a, 2.b, 3.b</td>
</tr>
<tr>
<td>B.4.e</td>
<td>1.b, 2.a</td>
</tr>
<tr>
<td>B.4.f</td>
<td>1.b, 2.a, 3.b</td>
</tr>
<tr>
<td>B.4.g</td>
<td>2.a, 2.d, 3.b</td>
</tr>
<tr>
<td>B.4.h</td>
<td>2.a</td>
</tr>
<tr>
<td>B.4.i</td>
<td>1.b, 2.a</td>
</tr>
<tr>
<td>B.4.j</td>
<td>1.d, 2.a, 3.c</td>
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### Appendix B: Table 1
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<table>
<thead>
<tr>
<th>Information Element</th>
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<tbody>
<tr>
<td><strong>B.5. “Old Model” Versus “New Model”</strong></td>
<td></td>
</tr>
<tr>
<td>B.5.a</td>
<td>3.b</td>
</tr>
<tr>
<td>B.5.b</td>
<td>2.a, 3.b</td>
</tr>
<tr>
<td>B.5.c</td>
<td>2.a, 3.b</td>
</tr>
<tr>
<td>B.5.d</td>
<td>2.d, 3.a, 3.b</td>
</tr>
<tr>
<td><strong>B.6. Modeler Software</strong></td>
<td></td>
</tr>
<tr>
<td>B.6.a</td>
<td>2.a</td>
</tr>
<tr>
<td><strong>C. The Filed Rating Plan</strong></td>
<td></td>
</tr>
<tr>
<td><strong>C.1. General Impact of Model on Rating Algorithm</strong></td>
<td></td>
</tr>
<tr>
<td>C.1.a</td>
<td>2.a, 3.b</td>
</tr>
<tr>
<td>C.1.b</td>
<td>3.b, 3.c</td>
</tr>
<tr>
<td>C.1.c</td>
<td>1.b, 1.d, 3.a, 3.c</td>
</tr>
<tr>
<td><strong>C.2. Relevance of Variables and Relationship to Risk of Loss</strong></td>
<td></td>
</tr>
<tr>
<td>C.2.a</td>
<td>1.b, 1.d, 3.a</td>
</tr>
<tr>
<td><strong>C.3. Comparison of Model Outputs to Current and Selected Rating Factors</strong></td>
<td></td>
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<tr>
<td>C.3.a</td>
<td>1.a, 1.c, 3.b</td>
</tr>
<tr>
<td>C.3.b</td>
<td>1.a, 1.c, 3.b</td>
</tr>
<tr>
<td>C.3.c</td>
<td>3.a, 3.b, 3.c</td>
</tr>
<tr>
<td><strong>C.4. Responses to Data, Credibility, and Granularity Issues</strong></td>
<td></td>
</tr>
<tr>
<td>C.4.a</td>
<td>3.b</td>
</tr>
<tr>
<td>C.4.b</td>
<td>3.b</td>
</tr>
<tr>
<td>C.4.c</td>
<td>3.b</td>
</tr>
<tr>
<td><strong>C.5. Definitions of Rating Variables</strong></td>
<td></td>
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<tr>
<td>C.5.a</td>
<td>2.a, 2.c, 3.b, 3.c</td>
</tr>
<tr>
<td><strong>C.6. Supporting Data</strong></td>
<td></td>
</tr>
<tr>
<td>C.6.a</td>
<td>2.b, 2.c</td>
</tr>
<tr>
<td>C.6.b</td>
<td>1.b, 3.b</td>
</tr>
<tr>
<td><strong>C.7. Consumer Impacts</strong></td>
<td></td>
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<tr>
<td>C.7.a</td>
<td>1.a, 1.c</td>
</tr>
<tr>
<td>C.7.b</td>
<td>1.a, 1.c</td>
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<thead>
<tr>
<th>Information Element</th>
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</thead>
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<tr>
<td>C.7.c</td>
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<tr>
<td>C.7.d</td>
<td>1.a, 1.c</td>
</tr>
<tr>
<td>C.7.e</td>
<td>1.a, 1.c</td>
</tr>
<tr>
<td>C.7.f</td>
<td>2.d</td>
</tr>
<tr>
<td>C.7.g</td>
<td>1.c, 3.b</td>
</tr>
<tr>
<td>C.7.h</td>
<td>1.d, 2.b, 2.d, 3.b</td>
</tr>
</tbody>
</table>

**C.8. Accurate Translation of Model into a Rating Plan**

| C.8.a               | 3.b, 3.c                                             |

**C.9. Efficient and Effective Review of a Rate Filing**

| C.9.a               | 4.a, 4.b, 4.c                                       |
| C.9.b               | 4.a, 4.b, 4.c                                       |
| C.9.c               | 4.a, 4.b, 4.c                                       |
### Appendix B: Table 2
Information Element Mapped to Best Practices

<table>
<thead>
<tr>
<th>Best Practice</th>
<th>Best Practice Code</th>
<th>Information Element (for GLMs)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Ensure that the factors developed based on the model produce rates that are not excessive, inadequate, or unfairly discriminatory.</td>
<td></td>
<td>C.3.a, C.3.b, C.7.a, C.7.b, C.7.c, C.7.d, C.7.e, C.7.d</td>
</tr>
<tr>
<td>a. Review the overall rate level impact of the proposed revisions to rate level indications provided by the filer.</td>
<td>1.a</td>
<td></td>
</tr>
<tr>
<td>b. Determine whether individual input characteristics to a predictive model and their resulting rating factors are related to the expected loss or expense differences in risk.</td>
<td>1.b</td>
<td>A.1.a, A.1.c, A.2.a, A.2.f, A.3.a, A.4.b, B.1.f, B.1.g, B.1.i, B.3.a, B.3.d, B.4.c, B.4.d, B.4.e, B.4.f, B.4.i, C.1.c, C.2.a, C.6.b</td>
</tr>
<tr>
<td>c. Review the premium disruption for individual policyholders and how the disruptions can be explained to individual consumers.</td>
<td>1.c</td>
<td>C.3.a, C.3.b, C.7.a, C.7.b, C.7.c, C.7.d, C.7.e, C.7.g</td>
</tr>
<tr>
<td>d. Review the individual input characteristics to and output factors from the predictive model (and its sub-models), as well as associated selected relativities, to ensure they are compatible with practices allowed in the state and do not reflect prohibited characteristics.</td>
<td>1.d</td>
<td>A.1.a, A.2.a, A.2.e, A.2.f, A.4.b, A.4.c, B.1.g, B.3.a, B.3.c, B.3.d, B.4.j, C.1.c, C.2.a, C.7.h</td>
</tr>
<tr>
<td>2. Obtain a clear understanding of the data used to build and validate the model and thoroughly review all aspects of the model, including assumptions, adjustments, variables, sub-models used as input, and resulting output.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>a. Obtain a clear understanding of how the selected predictive model was built.</td>
<td>2.a</td>
<td>A.1.a, A.2.e, A.2.d, A.2.e, A.2.f, A.3.a, A.3.b, A.4.a, A.4.c, B.1.a, B.1.b, B.1.c, B.1.d, B.1.e, B.1.f, B.1.g, B.1.h, B.1.i, B.1.j, B.2.a, B.2.b, B.2.c, B.2.d, B.2.e, B.2.f, B.3.a, B.3.b, B.3.c, B.3.e, B.4.a, B.4.b, B.4.c, B.4.d, B.4.e, B.4.f, B.4.g, B.4.h, B.4.i, B.4.j, B.5.b, B.5.c, B.6.a, C.1.a, C.4.b, C.4.c, C.5.a</td>
</tr>
<tr>
<td>b. Determine whether the data used as input to the predictive model is accurate, including a clear understanding how missing values, erroneous values, and outliers are handled.</td>
<td>2.b</td>
<td>A.1.a, A.1.b, A.3.a, A.3.b, A.3.c, A.3.d, A.3.e, A.3.f, A.4.a, A.4.b, A.4.c, B.1.h, B.4.d, C.6.a, C.7.h</td>
</tr>
<tr>
<td>c. Determine whether any adjustments to the raw data are handled appropriately, including, but not limited to, trending, development, capping, and removal of catastrophes.</td>
<td>2.c</td>
<td>A.1.b, A.2.e, A.3.a, A.3.b, A.3.c, A.3.d, A.3.e, A.3.f, A.4.a, A.4.b, A.4.c, B.1.j, B.2.b, B.2.f, C.5.a, C.6.a</td>
</tr>
</tbody>
</table>
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<table>
<thead>
<tr>
<th>Best Practice</th>
<th>Best Practice Code</th>
<th>Information Element (for GLMs)</th>
</tr>
</thead>
<tbody>
<tr>
<td>d. Obtain a clear understanding of how often each risk characteristic used as input to the model is updated and whether the model is periodically refreshed, so model output reflects changes to non-static risk characteristics.</td>
<td>2.d</td>
<td>A.2.c, A.2.d, B.4.g, B.5.d, C.7.f, C.7.h</td>
</tr>
<tr>
<td>3. Evaluate how the model interacts with and improves the rating plan.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>a. Obtain a clear understanding of the characteristics that are input to a predictive model (and its sub-models).</td>
<td>3.a</td>
<td>A.1.a, A.2.a, A.2.c, A.2.d, A.2.e, A.2.f, A.4.a, B.1.g, B.2.e, B.3.a, B.3.c, B.3.d, B.3.e, B.5.d, C.1.c, C.2.a, C.3.c, C.7.h</td>
</tr>
<tr>
<td>b. Obtain a clear understanding of how the insurer integrates the model into the rating plan and how it improves the rating plan.</td>
<td>3.b</td>
<td>B.1.d, B.2.c, B.2.e, B.4.a, B.4.b, B.4.d, B.4.f, B.4.g, B.5.a, B.5.b, B.5.c, B.5.d, C.1.a, C.1.b, C.3.a, C.3.b, C.3.c, C.4.a, C.4.b, C.4.c, C.5.a, C.6.b, C.7.c, C.7.g, C.7.h, C.8.a</td>
</tr>
<tr>
<td>c. Obtain a clear understanding of how the model output interacts with non-modeled characteristics/variables used to calculate a risk’s premium.</td>
<td>3.c</td>
<td>A.2.a, B.4.j, C.1.b, C.1.c, C.3.c, C.5.a, C.8.a</td>
</tr>
<tr>
<td>4. Enable competition and innovation to promote the growth, financial stability, and efficiency of the insurance marketplace.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>a. Enable innovation in the pricing of insurance through acceptance of predictive models, provided they are in compliance with state laws and/or regulations, particularly prohibitions on unfair discrimination.</td>
<td>4.a</td>
<td>C.9.a, C.9.b, C.9.c</td>
</tr>
<tr>
<td>b. Protect the confidentiality of filed predictive models and supporting information in accordance with state laws and/or regulations.</td>
<td>4.b</td>
<td>C.9.a, C.9.b, C.9.c</td>
</tr>
<tr>
<td>c. Review predictive models in a timely manner to enable reasonable speed to market.</td>
<td>4.c</td>
<td>A.2.b, A.2.c, A.2.d, C.9.a, C.9.b, C.9.c</td>
</tr>
</tbody>
</table>
APPENDIX C – GLOSSARY OF TERMS

Adjusting Data – Adjusting data refers to any changes made when the modeler makes any to the raw data. For example, capping losses, on-leveling, binning, transformation of the data, etc. This includes scrubbing of the data.

Aggregated Data – Data summarized or compiled in a manner that is meaningful to the intended user of the data. Aggregation involves segmenting and combining individual data entries into categories based on common features within the data. For example, aggregated raw data requested for a predictive model would be categorized in the same manner as the categories of variables which receive specific treatments within the model outputs.

Big Data – “Big data” refers to extremely large datasets analyzed computationally to infer laws (regressions, nonlinear relationships, and causal effects) to reveal relationships and dependencies or to perform predictions of outcomes and behaviors.

Composite Characteristic – A composite characteristic is the combination of two or more individual risk characteristics. Composite characteristics are used to create composite variables.

Composite Score – A composite score is a number derived by combining multiple variables by means of a sequence of mathematical steps; e.g., a credit-based insurance scoring model.

Composite Variable – A composite variable is a variable created by incorporating two or more individual risk characteristics of the insured into a single variable.

Continuous Variable – A continuous variable is a numeric variable that represents a measurement on a continuous scale. Examples include age, amount of insurance (in dollars), and population density.  

Control Variable – Control variables are variables whose relativities are not used in the final rating algorithm but are included when building the model. They are included in the model so that other correlated variables do not pick up their signal. For example, state and year are frequently included in countrywide models as control variables so that the different experiences and distributions between the states and across time do not influence the rating factors used in the final rating algorithm.

Correlation Matrix – A correlation matrix is a table showing correlation coefficients between sets of variables. Each random variable (Xi) in the table is correlated with each of the other variables in the table (Xj). Using the correlation matrix, one can determine which pairs of variables have the highest correlation. Below is a sample correlation matrix showing correlation coefficients for combinations of five variables (B1:B5). The table shows that variables B2 and B4 have the highest correlation coefficient (0.96) in this example. The diagonal of the table is always set to one, because the correlation coefficient between a variable and itself is always 1. The upper-right triangle would be a mirror image of the lower-left triangle (because correlation between B1 and B2 is the same as between B2 and B1). In other words, a correlation matrix is also a symmetric matrix.

Data Dredging – Data dredging is also referred to as data fishing, data snooping, data butchery, and p-hacking. It is the misuse of data analysis to find patterns in data that can be presented as statistically significant when, in fact, there is no real underlying effect. Data dredging is done by performing many statistical tests on the data and focusing only on those that produce significant results. Data dredging is in conflict with hypothesis testing, which entails performing at most a handful of tests to determine the validity of the hypothesis about an underlying effect.

Data Mining – Data mining is a process used to extract usable data from a larger set of any raw data. It implies analyzing data patterns in large batches of data using one or more software programs. As an application of data mining, businesses can learn more about their customers and develop strategies related to various business functions. One application of data mining for insurance companies is analyzing large datasets to charge different groups of insureds different amounts of premium corresponding to their level of risk. Data mining involves substantial data collection and warehousing, as well as computer processing. For segmenting the data and evaluating the probability of future events, data mining uses sophisticated mathematical algorithms.25

Data Source – A data source is the original repository of the information used to build the model. For example, information from internal insurance data, an application, a vendor, credit bureaus, government websites, a sub-model, verbal information provided to agents, external sources, consumer information databases, etc.

Discrete Variable – A discrete variable is a variable that can only take on a countable number of values/categories. Examples include number of claims, marital status, and gender.

Discrete Variable Level – Discrete variables are generally referred to as “factors” (not to be confused with rating factors), with values that each factor can take being referred to as “levels.”26 For example, “one driver” and “more than one driver” may be levels within a “number of drivers” rating variable.

Double-Lift Chart – Double-lift charts are similar to simple quantile plots, but rather than sorting based on the predicted loss cost of each model, the double-lift chart sorts based on the ratio of the two models’ predicted loss costs. Double-lift charts directly compare the results of two models.27

Exponential Family – The exponential family is a class of distributions that share the same general density form and have certain properties that are used in fitting GLMs. It includes many well-known distributions, such as the Normal, Poisson, Gamma, Tweedie, and Binomial, to name a few.28

Fair Credit Reporting Act – The federal Fair Credit Reporting Act (FCRA), 15 U.S.C. § 1681 (FCRA) is U.S. federal government legislation enacted to promote the accuracy, fairness, and privacy of consumer information contained in the files of consumer reporting agencies. It was intended to protect consumers from the willful and/or negligent inclusion of inaccurate information in consumers’ credit reports. To that end, the FCRA regulates the collection, dissemination, and use of consumer information, including consumer credit information. Together with the federal Fair Debt Collection Practices Act (FDCPA), the FCRA forms the foundation of consumer rights law in the U.S. Originally enacted in 1970, the FCRA is enforced by the Federal Trade Commission, the Consumer Financial Protection Bureau, and private litigants.29

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Generalized Linear Model – Generalized linear models (GLMs) are a means of modeling the relationship between a variable whose outcome we wish to predict and one or more explanatory variables. The predicted variable is called the target variable and is denoted y. In property/casualty insurance ratemaking applications, the target variable is typically one of the following:

- Claim count (or claims per exposure).
- Claim severity (i.e., dollars of loss per claim or occurrence).
- Pure premium (i.e., dollars of loss per exposure).
- Loss ratio (i.e., dollars of loss per dollar of premium).

For quantitative target variables such as those above, the GLM will produce an estimate of the expected value of the outcome. For other applications, the target variable may be the occurrence or non-occurrence of a certain event. Examples include:

- Whether a policyholder will renew his/her policy.
- Whether a submitted claim contains fraud.

For such variables, a GLM can be applied to estimate the probability that the event will occur.

The explanatory variables, or predictors, are denoted x_1 \ldots x_p, where p is the number of predictors in the model. Potential predictors are typically any policy term or policyholder characteristic that an insurer may wish to include in a rating plan. Some examples are:

- Type of vehicle, age, or marital status for personal auto insurance.
- Construction type, building age, or amount of insurance (AOI) for home insurance. 30

Geodemographic – Geodemographics is the study of the population and its characteristics, divided according to regions on a geographical basis. This involves application of clustering techniques to group statistically similar neighborhoods and areas with the assumption that the differences within any group should be less than the difference between groups. While the main source of data for a geodemographic study is U.S. Census Bureau data, the use of other sources of relevant data is also prevalent. Geodemographic segmentation is based on two principles:

1. People who live in the same neighborhood are more likely to have similar characteristics than are two people chosen at random.
2. Neighborhoods can be categorized in terms of the characteristics of the population that they contain. Any two neighborhoods can be placed in the same category; i.e., they contain similar types of people, even though they are widely separated.

Granularity of Data – Granularity of data is the level of segmentation at which the data is grouped or summarized. It reflects the level of detail used to slice and dice the data. 31

For example, a postal address can be recorded, with coarse granularity, as:

- Country

Or, with finer granularity, as multiple fields:

- Country
- State

Or, with much finer granularity, as multiple fields:

- Country
- State
- County
- ZIP code
- Property geo code

Home Insurance – Home insurance may cover, depending on the specific product, damage to the property, contents, and outstanding structures of a residential dwelling, as well as loss of use, liability, and medical coverage. The perils covered, the amount of insurance provided, and other policy characteristics are detailed in the policy contract. Common examples of home insurance policy forms are homeowners insurance (HO3 or HO5), renter’s insurance (HO4), and condominium insurance (HO6).

Insurance Data – Data collected by the insurance company directly from the consumer or through direct interactions with the consumer (e.g., claims). This is often referred to as “internal data.” For example, data obtained from the consumer through communications with an agent or on an insurance application would be “insurance data.” However, data obtained from a credit bureau or census would not be considered “insurance data” but would be considered “non-insurance data” instead.

Interaction Term – Two predictor variables are said to interact if the effect of one of the predictors on the target variable depends on the level of the other. Suppose that predictor variables X1 and X2 interact. A GLM modeler could account for this interaction by including an interaction term of the form X1X2 in the formula for the linear predictor. For instance, rather than defining the linear predictor as η = β0 + β1X1 + β2X2, they could set η = β0 + β1X1 + β2X2 + β3X1X2. The following two plots of modeled personal auto bodily injury pure premium by age and gender illustrate this effect. The plots are based on two otherwise identical log-link GLMs, built using the same fictional dataset, with the only difference between the two being that the second model includes the age-gender interaction term, while the first does not. Notice that the male curve in the first plot is a constant multiple of the female curve, while in the second plot the ratios of the male to female values differ from age to age.

Lift Chart – See definition of “quantile plot.”

Linear Predictor – A linear predictor is the linear combination of explanatory variables (X1, X2, ... Xk) in the model; e.g., β0 + β1X1 + β2X2.

Link Function – The link function, η or g(μ), specifies how the expected value of the response relates to the linear predictor of explanatory variables; e.g., η = g(E(Yi)) = E(Yi) for linear regression, or η = logit(π) for logistic regression.

Missing data – Missing data occurs when some records contain blanks or “Not Available” or “Null” where variable values would normally be available.

Non-Insurance Data – Non-insurance data is any data not defined as “insurance data.” Non-insurance data includes data provided by another party other than the insurance company and is often referred to as “external data.” For example, data obtained from a credit bureau or census would be considered “non-insurance data.” However, data obtained from the consumer through communications with an agent or on an insurance application would not be considered “non-insurance data” but would be “insurance data” instead.

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33 To see that this second definition accounts for the interaction, note that it is equivalent to η = β0 + β1X1 + β2X2 and to η = β0 + β1X1 + β2X2, with β1 = β1 + β3X2 and β2 = β2 + β3X1. Since β1 is a function of X2 and β2 is a function of X1, these two equivalences say that the effect of X1 depends on the level of X2 and vice versa.
35 https://online.stat.psu.edu/stat504/node/216.
**Offset Variable** – Offset variables (or factors) are model variables with a known or pre-specified coefficient. Their relativities are included in the model and the final rating algorithm, but they are generated from other studies outside the multivariate analysis and are fixed (not allowed to change) in the model when it is run. The model does not estimate any coefficients for the offset variables, and they are included in the model, so that the estimated coefficients for other variables in the model would be optimal in their presence. Examples of offset variables include limit and deductible relativities that are more appropriately derived via loss elimination analysis. The resulting relativities are then included in the multivariate model as offsets. Another example is using an offset factor to account for the exposure in the records; this does not get included in the final rating algorithm.36

**Overfitting** – Overfitting is the production of an analysis that corresponds too closely or exactly to a particular set of data and may, therefore, fail to fit additional data or predict future observations reliably.37

**PCA Approach (Principal Component Analysis)** – The PCA method creates multiple new variables from correlated groups of predictors. Those new variables exhibit little or no correlation between them, thereby making them potentially more useful in a GLM. A PCA in a filing can be described as “a GLM within a GLM.” One of the more common applications of PCA is geodemographic analysis, where many attributes are used to modify territorial differentials on, for example, a census block level.

**Personal Automobile Insurance** – Personal automobile insurance is insurance for privately owned motor vehicles and trailers for use on public roads not owned or used for commercial purposes. This includes personal auto combinations of private passenger auto, motorcycle, financial responsibility bonds, recreational vehicles and/or other personal auto. Policies include any combination of coverage such as the following: auto liability; personal injury protection (PIP); medical payments (MP); uninsured/underinsured motorist (UM/UIM); specified causes of loss; comprehensive; and collision.38

**Post-Model Adjustment** – Post-model adjustment is any adjustment made to the output of the model, including, but not limited to, adjusting rating factors or removal of variables.

**Probability Distribution** – A probability distribution is a statistical function that describes all the possible values and likelihoods that a random variable can take within a given range. The chosen probability distribution is supposed to best represent the likely outcomes.

**Proxy Variable** – A proxy variable is any variable that indirectly captures the characteristics of another variable, regardless of whether that other variable is used in the insurer’s rating plan.

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38 https://content.naic.org/cipr_topics/topic_auto_insurance.htm.
Quantile Plot – A quantile plot is a visual representation of a model’s ability to accurately differentiate between the best and the worst risks. Data is sorted by predicted value from smallest to largest, and the data is then bucketed into quantiles with the same volume of exposures. Within each bucket, the average predicted value and the average actual value are calculated; and, for each quantile, the actual and predicted values are plotted. The first quantile contains the risks that the model predicts have the best experience and the last quantile contains the risks predicted to have the worst experience. The plot shows two things: 1) how well the model predicts actual values by quantile; and 2) the lift of the model (i.e., the difference between the first and last quantile), which is a reflection of the model’s ability to distinguish between the best and worst risks. By definition, the average predicted values would be monotonically increasing, but the average actual values may show reversals.39 An example follows:

Rating Algorithm – A rating algorithm is the mathematical or computational component of the rating plan used to calculate an insured’s premium.

Rating Category – A rating category is the same as a rating characteristic and can be quantitative or qualitative.

Rating Characteristic – A rating characteristic is a specific risk criterion of the insured used to define the level of the rating variable that applies to the insured; e.g., rating variable = driver age; rating characteristic = age 42.

Rating Factor – A rating factor is the numerical component included in the rate pages of the rating plan’s manual. Rating factors are used together with the rating algorithm to calculate the insured’s premium.

Rating Plan – The rating plan describes in detail how to combine the various components in the rules and rate pages to calculate the overall premium charged for any risk. The rating plan is specific and includes explicit instructions, such as:

- The order in which rating variables should be considered.
- How the effect of rating variables is applied in the calculation of premium (e.g., multiplicative, additive, or some unique mathematical expression).
- The existence of maximum and minimum premiums (or, in some cases, the maximum discount or surcharge that can be applied).
- Specifics associated with any rounding that takes place.

If the insurance product contains multiple coverages, then separate rating plans by coverage may apply.40

Rating System – The rating system is the insurance company’s information technology (IT) infrastructure that produces the rates derived from the rating algorithm.

Rating Tier – A rating tier is rating based on a combination of rating characteristics rather than a single rating characteristic, resulting in a separation of groups of insureds into different rate levels within the same or separate companies. Often, rating tiers are used to differentiate quality of risk; e.g., substandard, standard, or preferred.

Rating Treatment – Rating treatment is the manner in which an aspect of the rating affects an insured’s premium.

Rating Variable – A rating variable is a risk criterion of the insured used to modify the base rate in a rating algorithm.41

Rational Explanation – A “rational explanation” refers to a plausible narrative connecting the variable and/or treatment in question with real-world circumstances or behaviors that contribute to the risk of insurance loss in a manner that is readily understandable to a consumer or other educated layperson. A “rational explanation” does not require strict proof of causality but should establish a sufficient degree of confidence that the variable and/or treatment selected are not obscure, irrelevant, or arbitrary.

A “rational explanation” can assist the regulator in explaining an approved rating treatment if challenged by a consumer, legislator, or the media. Furthermore, a “rational explanation” can increase the regulator’s confidence that a statistical correlation identified by the insurer is not spurious, temporary, or limited to the specific datasets analyzed by the insurer.

Raw Data – Data originating straight from the insurer’s data banks without modification (e.g., not scrubbed or transformed). Raw data may occur with or without aggregation. Aggregated raw datasets are those summarized or compiled prior to data selection and model building.

Sample Record – A sample record is one line of data from a data source including all variables. For example:

<table>
<thead>
<tr>
<th>Record</th>
<th>Zip</th>
<th>Garage Type</th>
<th>LotSize</th>
<th>Roof</th>
<th>Square Foot</th>
<th>Replacement Cost</th>
<th>Heating</th>
<th>Living Costs</th>
<th>Num Stories</th>
<th>Style</th>
<th>Num Bedrooms</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>04234</td>
<td>garage, basement</td>
<td>25700</td>
<td>asphalt shingle</td>
<td>1680</td>
<td>213000</td>
<td>FORCED HOT WATER</td>
<td>1680</td>
<td>1</td>
<td>Ranch</td>
<td>3</td>
</tr>
</tbody>
</table>

Scrubbed Data – Scrubbed data is data reviewed for errors, where “N/A” has been replaced with a value, and where most transformations have been performed. Data that has been “scrubbed” is now in a useable format to begin building the model.

Scrubbing Data – Scrubbing is the process of editing, amending, or removing data in a dataset that is incorrect, incomplete, improperly formatted, or duplicated.

SME – Subject-matter expert.

Sub-Model – A sub-model is any model that provides input into another model.

Variable Transformation – A variable transformation is a change to a variable by taking a function of that variable, for example, when age’s value is replaced by the value (age)^2. The result is called a transformation variable.

Voluntarily Reported Data – Voluntarily reported data is data directly obtained by a company from a consumer. Examples would be data taken directly from an application for insurance or obtained verbally by a company representative.

Univariate Model – A univariate model is a model that only has one independent variable.

41 Ibid.
### APPENDIX D – SAMPLE RATE-DISRUPTION TEMPLATE

<table>
<thead>
<tr>
<th>State Division of Insurance - EXAMPLE for Rate Disruption</th>
<th>Template Updated October 2018</th>
</tr>
</thead>
<tbody>
<tr>
<td>● First, fill in the boxes for minimum and maximum individual impacts, shaded in light blue. Default values in the cells are examples only.</td>
<td></td>
</tr>
<tr>
<td>● The appropriate percent-change ranges will then be generated based on the maximum/minimum changes.</td>
<td></td>
</tr>
<tr>
<td>● For every box shaded in light green, replace “ENTER VALUE” with the number of affected insureds within the corresponding change range.</td>
<td></td>
</tr>
<tr>
<td>● Once all values are filled in, use the “Charts” feature in Excel to generate a histogram to visually display the spread of impacts.</td>
<td></td>
</tr>
<tr>
<td>NOTE: Values of Minimum % Change, Maximum % Change, and Total Number of Insureds must reconcile to the Rate/Rule Schedule in SRFF.</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Minimum % Change</th>
<th>Uncapped</th>
<th>Minimum % Change</th>
<th>Capped (If Applicable)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>-30.000%</td>
<td></td>
<td>-15.000%</td>
</tr>
<tr>
<td>Maximum % Change</td>
<td>30.000%</td>
<td>Maximum % Change</td>
<td>15.000%</td>
</tr>
<tr>
<td>Total Number of Insureds (Auto-Calculated)</td>
<td>1994</td>
<td>Total Number of Insureds (Auto-Calculated)</td>
<td>1994</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Percent-Change Range</th>
<th>Number of Insureds in Range</th>
<th>Uncapped Rate Disruption</th>
<th>Percent-Change Range</th>
<th>Number of Insureds in Range</th>
<th>Capped Rate Disruption (If Applicable)</th>
</tr>
</thead>
<tbody>
<tr>
<td>-30% to &lt; -25%</td>
<td>2</td>
<td></td>
<td>-15% to &lt; -10%</td>
<td>452</td>
<td></td>
</tr>
<tr>
<td>-25% to &lt; -20%</td>
<td>90</td>
<td></td>
<td>-10% to &lt; -5%</td>
<td>340</td>
<td></td>
</tr>
<tr>
<td>-20% to &lt; -15%</td>
<td>130</td>
<td></td>
<td>-5% to &lt; 0%</td>
<td>245</td>
<td></td>
</tr>
<tr>
<td>-15% to &lt; -10%</td>
<td>230</td>
<td></td>
<td>Exactly 0%</td>
<td>12</td>
<td></td>
</tr>
<tr>
<td>-10% to &lt; -5%</td>
<td>340</td>
<td></td>
<td>&gt;0% to &lt; 5%</td>
<td>150</td>
<td></td>
</tr>
<tr>
<td>-5% to &lt; 0%</td>
<td>245</td>
<td></td>
<td>5% to &lt; 10%</td>
<td>160</td>
<td></td>
</tr>
<tr>
<td>Exactly 0%</td>
<td>12</td>
<td></td>
<td>10% to &lt; 15%</td>
<td>401</td>
<td></td>
</tr>
<tr>
<td>&gt;0% to &lt; 5%</td>
<td>150</td>
<td></td>
<td>15% to &lt; 20%</td>
<td>234</td>
<td></td>
</tr>
<tr>
<td>5% to &lt; 10%</td>
<td>160</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>10% to &lt; 15%</td>
<td>401</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>15% to &lt; 20%</td>
<td>201</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>20% to &lt; 25%</td>
<td>19</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>25% to &lt; 30%</td>
<td>12</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>30% to &lt; 35%</td>
<td>2</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**EXAMPLE Uncapped Rate Disruption**

[Graph showing the distribution of insureds across different percent-change ranges]

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### EXAMPLE Capped Rate Disruption

- **Uncapped Change**: 30.00%
- **Uncapped Dollar Change**: $165.00
- **Capped Change (If Applicable)**: 15.00%
- **Capped $ Change (If Applicable)**: $82.50
- **Current Premium**: $550.00
- **Proposed Premium**: $632.50

#### Characteristics of Policy (Fill in Below)

- **For Auto Insurance**: At minimum, identify the age and gender of each named insured, limits by coverage, territory, make / model of vehicle(s), prior accident / violation history, and any other key attributes whose treatments are affected by this filing.
- **For Home Insurance**: At minimum, identify age and gender of each named insured, amount of insurance, territory, construction type, protection class, any prior loss history, and any other key attributes whose treatments are affected by this filing.

#### Automobile policy: Three insureds - Male (Age 54), Female (Age 49), and Male (Age 25). Territory: Las Vegas, ZIP Code 89105.

<table>
<thead>
<tr>
<th>Vehicle</th>
<th>BI Limits:</th>
<th>PD Limits:</th>
<th>UM/UIM Limits:</th>
<th>MED Limits:</th>
<th>COMP Deductible:</th>
<th>COLL Deductible:</th>
</tr>
</thead>
<tbody>
<tr>
<td>2009 Ford Focus</td>
<td>$50,000 / $100,000</td>
<td>$25,000</td>
<td>$50,000 / $100,000</td>
<td>$5,000</td>
<td>$500</td>
<td>$1,000</td>
</tr>
<tr>
<td>2003 Honda Accord</td>
<td>$25,000 / $50,000</td>
<td>$10,000</td>
<td>$25,000 / $50,000</td>
<td>$1,000</td>
<td>$500</td>
<td>$1,000</td>
</tr>
</tbody>
</table>

No prior accidents, 1 prior speeding conviction for 25-year-old male. Policy receives EFT discount and loyalty discount.

Primary impacts are the increases to the relativities for the age of insured, ZIP Code 89105, COLL Deductible of $1,000, and symbol for 2003 Honda Accord.

#### Most Significant Impacts to This Policy (Identify attributes - e.g., base-rate change or changes to individual rating variables)

<table>
<thead>
<tr>
<th>Attribute</th>
<th>% Impact (Uncapped)</th>
<th>Dollar Impact (Uncapped)</th>
<th>What lengths of policy terms does the insurer offer in this book of business?</th>
</tr>
</thead>
<tbody>
<tr>
<td>Insured Age (M/25)</td>
<td>12.00%</td>
<td>$66.00</td>
<td>Check all options that apply below.</td>
</tr>
<tr>
<td>COLL Deductible ($1,000)</td>
<td>10.00%</td>
<td>$61.60</td>
<td></td>
</tr>
<tr>
<td>Territory (89105)</td>
<td>4.00%</td>
<td>$27.10</td>
<td></td>
</tr>
<tr>
<td>Vehicle Symbol (2003 Honda Accord)</td>
<td>1.46%</td>
<td>$10.29</td>
<td></td>
</tr>
<tr>
<td>Effect of Capping</td>
<td>-11.54%</td>
<td>-$82.50</td>
<td></td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td><strong>15.00%</strong></td>
<td><strong>$82.50</strong></td>
<td></td>
</tr>
</tbody>
</table>

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State Division of Insurance - EXAMPLE for Largest Dollar Increase

<table>
<thead>
<tr>
<th>Largest Dollar Increase</th>
<th>Corresponding Percentage Increase (for Insured Receiving Largest Dollar Increase)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Uncapped Change</td>
<td>Current Premium</td>
</tr>
<tr>
<td>$306.60</td>
<td>$2,555.00</td>
</tr>
<tr>
<td>Capped Change (If Applicable)</td>
<td>Proposed Premium</td>
</tr>
<tr>
<td>$306.60</td>
<td>$2,861.60</td>
</tr>
</tbody>
</table>

Capped % Change (If Applicable) 12.00%

Characteristics of Policy (Fill in Below)

- **For Auto Insurance**: At minimum, identify the age and gender of each named insured, limits by coverage, territory, make/model of vehicle(s), prior accident/violation history, and any other key attributes whose treatments are affected by this filing.
- **For Home Insurance**: At minimum, identify age and gender of each named insured, amount of insurance, territory, construction type, protection class, any prior loss history, and any other key attributes whose treatments are affected by this filing.

Automobile policy: Two insureds - Male (Age 33), Female (Age 32). Territory: Reno, ZIP Code 89504.

<table>
<thead>
<tr>
<th>Vehicle:</th>
<th>BI Limits:</th>
<th>PD Limits:</th>
<th>UM/UIM Limits:</th>
<th>MED Limits:</th>
<th>COMP Deductible:</th>
<th>COLL Deductible:</th>
</tr>
</thead>
<tbody>
<tr>
<td>2016 Tesla Model S</td>
<td>$200,000 / $600,000</td>
<td>$50,000</td>
<td>$200,000 / $600,000</td>
<td>$10,000</td>
<td>$2,500</td>
<td>$2,500</td>
</tr>
<tr>
<td>2015 Mercedes-Benz C-Class (W205)</td>
<td>$200,000 / $600,000</td>
<td>$50,000</td>
<td>$200,000 / $600,000</td>
<td>$10,000</td>
<td>$2,500</td>
<td>$2,500</td>
</tr>
</tbody>
</table>

1 prior at-fault accident for 32-year-old female. Policy receives EFT discount and loyalty discount.

Most Significant Impacts to This Policy (Identify attributes - e.g., base-rate change or changes to individual rating variables)

NOTE: If capping is proposed to apply for this policy, include the impact of capping at the end, after displaying uncapped impacts by attribute. Add rows as needed. Total percent and dollar impacts should reconcile to the values presented above in this exhibit.

<table>
<thead>
<tr>
<th>Attribute</th>
<th>% Impact (Uncapped)</th>
<th>Dollar Impact (Uncapped)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Insured Age (M/33)</td>
<td>3.15%</td>
<td>$80.48</td>
</tr>
<tr>
<td>Insured Age (F/32)</td>
<td>3.23%</td>
<td>$85.13</td>
</tr>
<tr>
<td>Vehicle Symbol (2015 Mercedes-Benz C-Class)</td>
<td>2.45%</td>
<td>$66.65</td>
</tr>
<tr>
<td>Increased-Limit Factor for PD</td>
<td>1.55%</td>
<td>$43.20</td>
</tr>
<tr>
<td>Increased-Limit Factor for MED</td>
<td>1.10%</td>
<td>$31.14</td>
</tr>
<tr>
<td>TOTAL</td>
<td>12.00%</td>
<td>$306.60</td>
</tr>
</tbody>
</table>
Ongoing Support of NAIC Programs, Products or Services

1. The Property and Casualty Insurance (C) Committee will:
   A. Discuss issues arising and make recommendations with respect to advisory organization and insurer filings for personal and commercial lines, as needed. Report yearly.
   B. Monitor the activities of the Casualty Actuarial and Statistical (C) Task Force.
   C. Monitor the activities of the Surplus Lines (C) Task Force.
   D. Monitor the activities of the Title Insurance (C) Task Force.
   E. Monitor the activities of the Workers’ Compensation (C) Task Force.
   F. Provide an impartial forum for considering appeals of adverse decisions involving alien insurers delisted or rejected for listing to the Quarterly Listing of Alien Insurers. Appeal procedures are described in the International Insurers Department (IID) Plan of Operation.
   G. Monitor and review developments in case law and rehabilitation proceedings related to risk-retention groups (RRGs). If warranted, make appropriate changes to the Risk Retention and Purchasing Group Handbook.
   H. Monitor the activities of the Federal Crop Insurance Corporation (FCIC) that affect state insurance regulators:
      1. Serve as a forum for discussing issues related to the interaction of federal crop insurance programs with state insurance regulation.
      3. Monitor the regulatory information exchanges between the FCIC and state insurance regulators, as well as the FCIC and the NAIC, and make recommendations for improvement or revisions, as needed.
   I. Report on the private flood insurance market using data obtained from the state insurance regulator private flood insurance data call.
   I. Monitor regulatory issues that arise with the development of autonomous vehicles. Study and, if necessary, develop recommendations for changes needed to the state-based insurance regulatory framework.

2. The Cannabis Insurance (C) Working Group will:
   A. Assess and periodically report on the status of federal legislation that would protect financial institutions from liability associated with providing services to cannabis businesses operating legally under state law.
   B. Encourage admitted insurers to ensure coverage adequacy in states where cannabis, including hemp, is legal.
   C. Provide insurance resources to stakeholders and keep up with new products and innovative ideas that may shape insurance in this space.
   D. Collect aggregated cannabis insurance availability and coverage gap information, as well as other cannabis and hemp insurance-related data, to then publicly share in a publicly released report by the end of 2021.

3. The Catastrophe Insurance (C) Working Group will:
   A. Monitor and recommend measures to improve the availability and affordability of insurance and reinsurance related to catastrophe perils for personal and commercial lines.
   B. Evaluate potential state, regional and national programs to increase capacity for insurance and reinsurance related to catastrophe perils.
C. Monitor and assess proposals that address disaster insurance issues at the federal and state levels. Assess concentration-of-risk issues and whether a regulatory solution is needed.

D. Provide a forum for discussing issues and recommending solutions related to insuring for catastrophe risk, including terrorism, war and natural disasters.

E. Provide a forum for discussing various issues related to catastrophe modeling, and monitor issues that will result in changes to the Catastrophe Computer Modeling Handbook.

F. Investigate and recommend ways the NAIC can assist states in responding to disasters, while building a central repository of timely resources for state insurance regulators to better prepare for disasters and discuss issues surrounding loss mitigation. Update the State Disaster Response Plan, as needed, so that it provides a blueprint for action by the states to respond to catastrophic events.

G. Continue to monitor the growth of the private flood insurance market and assess the actions taken by individual states to facilitate growth. Update the Considerations for Private Flood Insurance appendix to include new ways states are growing the private flood insurance market, examining ways to help state insurance regulators facilitate the private flood insurance market.

H. Study, in coordination with other NAIC task forces and working groups, earthquake matters of concern to state insurance regulators. Consider various innovative earthquake insurance coverage options aimed at improving take-up rates.

4. The Climate Risk and Resilience (C) Working Group will:
   A. Engage with industry and stakeholders in the U.S. and abroad on climate related risk and resiliency issues.
   B. Investigate and recommend measures to reduce risks of climate change related to catastrophic events.
   C. Identify insurance and other financial mechanisms to protect infrastructure and reduce exposure to the public.
   D. Identify sustainability, resilience and mitigation issues and solutions related to the insurance industry.
   E. Evaluate private-public partnerships to improve insurance market capacity related to catastrophe peril.
   F. Investigate and receive information regarding the use of modeling by carriers and their catastrophe concerning climate risk.
   G. Review the impact of climate change on insurers through presentations by interested parties.
   H. Review innovative insurer solutions to climate risk, including new insurance products through presentations by interested parties.

5. The Lender-Placed Insurance Model Act (C) Working Group will:
   A. Complete the drafting and adoption of a new model law concerning lender-placed insurance as it relates to mortgages.

6.4. The Pet Insurance (C) Working Group will:
   A. Complete the development of a model law or guideline to establish appropriate regulatory standards for the pet insurance industry.

6.5. The Terrorism Insurance Implementation (C) Working Group will:
   A. Coordinate the NAIC’s efforts to address insurance coverage for acts of terrorism. Work with the U.S. Department of the Treasury's Terrorism Risk Insurance Program (TRIP) Office on matters of mutual concern. Discuss long-term solutions to address the risk of loss from acts of terrorism.
   B. Review and report on data collection related to insurance coverage for acts of terrorism.

6.6. The Transparency and Readability of Consumer Information (C) Working Group will:
   A. Study and evaluate actions that will improve the capacity of consumers to comparison shop on the basis of differences in coverage provided by different insurance carriers offering personal lines products.
   B. Systematize and improve presale disclosures of coverage.
   C. Facilitate consumers’ capacity to understand the content of insurance policies and assess differences in insurers’ policy forms.
   D. Study. Consider drafting regulatory best practices that serve to inform and discuss whether there is a need for consumers to consider the possibility of disclosures or consumer education information regarding the fact that homeowners policies do not cover losses from flood, earthquake or other specified disasters.
2021 Proposed Charges

CASUALTY ACTUARIAL AND STATISTICAL (C) TASK FORCE

The mission of the Casualty Actuarial and Statistical (C) Task Force is to identify, investigate, and develop solutions to actuarial problems and statistical issues in the property/casualty (P/C) insurance industry. The Task Force’s goals are to assist state insurance regulators with maintaining the financial health of P/C insurers; ensuring that P/C insurance rates are not excessive, inadequate or unfairly discriminatory; and ensuring that appropriate data regarding P/C insurance markets are available.

Ongoing Support of NAIC Programs, Products, or Services

1. The Casualty Actuarial and Statistical (C) Task Force will:
   A. Provide reserving, pricing, ratemaking, statistical, and other actuarial support to NAIC committees, task forces and/or working groups. Propose changes to the appropriate work products (with the most common work products noted below) and present comments on proposals submitted by others relating to casualty actuarial and statistical matters.
   1. Property and Casualty Insurance (C) Committee – ratemaking, reserving or data issues.
   2. Blanks (E) Working Group – P/C annual financial statement, including Schedule P; P/C quarterly financial statement; P/C quarterly and annual financial statement instructions, including Statement of Actuarial Opinion (SAO) and Actuarial Opinion Summary Supplement.
   B. Monitor national casualty actuarial developments and consider regulatory implications.
      1. Casualty Actuarial Society (CAS) – Statements of Principles and Syllabus of Basic Education.
      3. Society of Actuaries (SOA) – general insurance track’s basic education.
   C. Facilitate discussion among state insurance regulators regarding rate filing issues of common interest across the states through the scheduling of regulator-only conference calls.
   D. Work with the CAS and SOA to identify: 1) what types of learning P/C Appointed Actuaries are using to meet CE requirements for “Specific Qualification Standards” today and 2) whether more specificity should be added to the P/C Appointed Actuaries’ CE requirements to ensure that CE is aligned with the educational needs for a P/C Appointed Actuary.
   E. Facilitate training and the sharing of expertise through predictive analytics webinars (Book Club).

2. The Actuarial Opinion (C) Working Group will:
   A. Propose revisions to the following, as needed, especially to improve actuarial opinions, actuarial opinion summaries, and actuarial reports, as well as the regulatory analysis of these actuarial documents and loss and premium reserves:
      3. Annual Statement Instructions—Property/Casualty.
      4. Regulatory guidance to appointed actuaries and companies.
      5. Other financial blanks and instructions, as needed.
3. The Statistical Data (C) Working Group will:
   A. Consider updates and changes to the Statistical Handbook of Data Available to Insurance Regulators.
   B. Consider updates and developments, provide technical assistance, and oversee the production of the following reports and databases. Periodically evaluate the demand and utility versus the costs of production of each product:
      1. Dwelling Fire, Homeowners Owner-Occupied, and Homeowners Tenant and Condominium/Cooperative Unit Owner’s Insurance.
      2. Auto Insurance Database.

NAIC Support Staff: Kris DeFrain/Jennifer Gardner/Libby Crews
**2021 Proposed Charges**

**SURPLUS LINES (C) TASK FORCE**

The mission of the Surplus Lines (C) Task Force is to monitor the surplus lines market and regulation, including the activity and financial condition of U.S. and alien surplus lines insurers by providing a forum for discussion of issues and to develop or amend relevant NAIC model laws, regulations and/or guidelines.

**Ongoing Support of NAIC Programs, Products or Services**

1. **The Surplus Lines (C) Task Force** will:
   A. Provide a forum for discussion of current and emerging surplus lines-related issues and topics of public policy and determine appropriate regulatory response and action.
   B. Review and analyze quantitative and qualitative data on U.S., domestic and alien surplus lines industry results and trends.
   C. Monitor federal legislation related to the surplus lines market and ensure all interested parties remain apprised.
   D. Develop or amend relevant NAIC model laws, regulations and/or guidelines.
   E. Oversee the activities of the Surplus Lines (C) Working Group.

2. **The Surplus Lines (C) Working Group** will:
   A. Operate in regulator-to-regulator session pursuant to paragraph 3 (specific companies, entities or individuals) of the NAIC Policy Statement on Open Meetings and operate in open session when discussing surplus lines topics and policy issues, such as amendments to the International Insurers Department (IID) Plan of Operation.
   B. Maintain and draft new guidance within the IID Plan of Operation regarding standards for admittance and continued inclusion on the NAIC Quarterly Listing of Alien Insurers.
   C. Review and consider appropriate decisions regarding applications for admittance to the NAIC Quarterly Listing of Alien Insurers.
   D. Analyze renewal applications of alien surplus lines insurers on the NAIC Quarterly Listing of Alien Insurers and ensure solvency and compliance per the IID Plan of Operation guidelines for continued listing.
   E. Provide a forum for surplus lines-related discussion among jurisdictions.

NAIC Support Staff: Andy Daleo/Robert Schump
2021 Proposed Charges

TITLE INSURANCE (C) TASK FORCE

The mission of the Title Insurance (C) Task Force is to study issues related to title insurers and title insurance producers.

Ongoing Support of NAIC Programs, Products or Services

1. The Title Insurance (C) Task Force will:
   A. Monitor issues and developments occurring in the title insurance industry, and provide support and expertise to other NAIC committees, task forces and/or working groups, or outside entities, as appropriate.
   B. Review and assist various regulatory bodies in combating fraudulent and/or unfair real estate settlement activities. Such efforts could include working with the Antifraud (D) Task Force and other NAIC committees, task forces and/or working groups to combat mortgage fraud and mitigating title agent defalcations through the promotion of closing protection letters (CPLs) and other remedies. Report results at each national meeting.
   C. Consult with the Consumer Financial Protection Bureau (CFPB) and other agencies responsible for information, education, and disclosure for mortgage lending, closing and settlement services about the role of title insurance in the real estate transaction process.
   D. Consider the effectiveness of changes in financial reporting by title insurance companies, and identify further improvements and clarifications to blanks, instructions, Statement of Statutory Accounting Principles (SSAPs), solvency tools, and other matters, as necessary. Coordinate efforts with the Statutory Accounting Principles (E) Working Group.
   E. Revise the Title Insurance Consumer Shopping Tool Template to include questions and answers about title insurance-related fraud topics, including but not limited to, CPLs and wire fraud.
   F. Evaluate the effectiveness of CPLs, including but not limited to, intent, state regulation and requirements, consumer protections offered and excluded, and potential alternatives for coverage.
   G. Explore short-term and long-term issues and solutions from the pandemic.

NAIC Support Staff: Anne Obersteadt
WORKERS’ COMPENSATION (C) TASK FORCE

2021 Proposed Charges

The mission of the Workers’ Compensation (C) Task Force is to study the nature and effectiveness of state approaches to workers’ compensation and related issues, including, but not limited to: assigned risk plans; safety in the workplace; treatment of investment income in rating; occupational disease; cost containment; and the relevance of adopted NAIC model laws, regulations and/or guidelines pertaining to workers’ compensation.

Ongoing Support of NAIC Programs, Products or Services

1. The Workers’ Compensation (C) Task Force will:
   A. Oversee the activities of the NAIC/International Association of Industrial Accident Boards and Commissions (IAIABC) Joint (C) Working Group.
   B. Discuss issues with respect to advisory organizations, rating organizations, statistical agents and insurance companies in the workers’ compensation arena.
   C. Monitor the movement of business from the standard markets to the assigned risk pools. Alert state insurance department representatives if the growth of assigned risk pools changes dramatically.
   D. Follow workers’ compensation issues regarding cannabis in coordination with the Cannabis Insurance (C) Working Group.
   E. Discuss workers’ compensation issues related to COVID-19.

2. The NAIC/IAIABC Joint (C) Working Group will:
   A. Study issues of mutual concern to state insurance regulators and the IAIABC. Review relevant IAIABC model laws and white papers and consider possible charges in light of the Working Group’s recommendations.

NAIC Support Staff: Sara Robben/Aaron Brandenburg

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REQUEST FOR NAIC MODEL LAW DEVELOPMENT

This form is intended to gather information to support the development of a new model law or amendment to an existing model law. Prior to development of a new or amended model law, approval of the respective Parent Committee and the NAIC’s Executive Committee is required. The NAIC’s Executive Committee will consider whether the request fits the criteria for model law development. Please complete all questions and provide as much detail as necessary to help in this determination.

Please check whether this is: ☐ New Model Law or ☒ Amendment to Existing Model

1. Name of group to be responsible for drafting the model:
   Surplus Lines (C) Task Force

2. NAIC staff support contact information:
   Andy Daleo, Senior Financial Analysis Manager (adaleo@naic.org)
   Dan Schelp, Chief Counsel, Regulatory Affairs (dschelp@naic.org)

3. Please provide a brief description of the proposed new model or the amendment(s) to the existing model. If you are proposing a new model, please also provide a proposed title. If an existing model law, please provide the title, attach a current version to this form and reference the section(s) proposed to be amended.

   Nonadmitted Insurance Model Act (#870) – See Attached

   On August 5, 2020, the Surplus Lines (C) Task Force discussed revisions to Model #870, and directed NAIC staff to form an informal Drafting Group composed of regulators from Louisiana, Oklahoma and Washington to produce a summary document that outlines the significant updates to modernize Model #870 and present a recommendation to the Task Force at a future national meeting. The attached Model #870 contains the Drafting Group’s recommendations with respect to modification of Model #870 to both bring it into compliance with the Nonadmitted and Reinsurance Reform Act (NRRA) as well as other amendments to modernize the model.

4. Does the model law meet the Model Law Criteria? ☒ Yes or ☐ No (Check one)

   (If answering no to any of these questions, please reevaluate charge and proceed accordingly to address issues).

   a. Does the subject of the model law necessitate a national standard and require uniformity amongst all states? ☒ Yes or ☐ No (Check one)

      If yes, please explain why

      The Nonadmitted Insurance Model Act (#870) has been adopted in 31 states, with other states adopting older versions of the NAIC model, statutes or regulations addressing the same subject matter, or other administrative guidance such as bulletins and notices. Every state, the District of Columbia, Puerto Rico, and the U.S. Virgin Islands have surplus lines guidance in place.

      The NRRA was adopted July 21, 2011, and is contained within the Dodd-Frank Wall Street Reform and Consumer Protection Act (Act). The NRRA requirements and the mandate of the federal Act create uniformity for the collection of surplus lines tax payments through the implementation of the “Home State” requirement. All states comply with the NRRA’s home state tax approach.
Model 870 was not modified because of the implementation of the NRRA. However, on October 11, 2011, a Nonadmitted Insurance Reform Sample Bulletin (copy attached) was adopted by Executive/Plenary and subsequently distributed to the state insurance departments. It is important to provide guidance for uniformity among the states in order to ensure compliance with the NRRA.

b. Does Committee believe NAIC members should devote significant regulator and Association resources to educate, communicate and support this model law?

☐ Yes  or  ☐ No  (Check one)

5. What is the likelihood that your Committee will be able to draft and adopt the model law within one year from the date of Executive Committee approval?

☐ 1  ☐ 2  ☐ 3  ☐ 4  ☐ 5  (Check one)

High Likelihood  Low Likelihood

Explanation, if necessary: Due to the previous adoption of the Nonadmitted Insurance Reform Sample Bulletin by the NAIC, there is already uniformity of intent with respect to key areas addressed by the NRRA. The Surplus Lines (C) Task Force should be able to leverage that agreement to quickly and efficiently finish revisions to Model #870.

6. What is the likelihood that a minimum two-thirds majority of NAIC members would ultimately vote to adopt the proposed model law?

☐ 1  ☐ 2  ☐ 3  ☐ 4  ☐ 5  (Check one)

High Likelihood  Low Likelihood

Explanation, if necessary: Surplus Lines is an important industry in every state and U.S. Territory, and it is important to provide uniform guidance to the NAIC members to ensure compliance with the federal NRRA.

7. What is the likelihood that state legislatures will adopt the model law in a uniform manner within three years of adoption by the NAIC?

☐ 1  ☐ 2  ☐ 3  ☐ 4  ☐ 5  (Check one)

High Likelihood  Low Likelihood

Explanation, if necessary: Model #870 is not an accreditation requirement, but as previously stated it is important to provide uniform guidance to the states to ensure compliance with the NRRA.

8. Is this model law referenced in the NAIC Accreditation Standards? If so, does the standard require the model law to be adopted in a substantially similar manner?

No

9. Is this model law in response to or impacted by federal laws or regulations? If yes, please explain.

Yes, the proposed revisions to Model #870 are in direct response to the federal NRRA, which would preempt inconsistent state law.
Private Flood Insurance Data Call

PROPERTY AND CASUALTY INSURANCE (C) COMMITTEE

DECEMBER 8, 2020
Background on Private Flood Data

- Annual Statement State Page
  - Line 2.5
  - 2016-2019
  - Commercial and Residential Data Combined

- State Regulator Data Call
  - 2018 and 2019 Data
  - Commercial and Residential Broken out as well as Standalone, First Dollar, Excess, Endorsement
  - New Data Elements including Number of Policies, Number of Claims Opened, Number of Claims Closed with Payment
  - Data collection will continue as part of the Annual Statement
Comparison of Datasets

- Annual Statement – 140 insurers reported data in 2019; 120 in 2018
- Data Call – 165 insurers reported data in 2019; 158 in 2018
- Annual Statement - $523 million direct written premium in 2019; $420 million in 2018
- Data Call - $1.2 billion direct written premium in 2019 ($992 million commercial); $437 million in 2018.
Private Flood Data Call Results

- [https://content.naic.org/industry_private_flood_data_call.htm](https://content.naic.org/industry_private_flood_data_call.htm)
# Residential Private Flood

<table>
<thead>
<tr>
<th>Category</th>
<th>2018</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of Companies</td>
<td>55 in 2018</td>
<td>58 in 2019</td>
</tr>
<tr>
<td>Direct Written Premium</td>
<td>$183M in 2018</td>
<td>$201M in 2019</td>
</tr>
<tr>
<td></td>
<td>80% Standalone vs. Endorsement</td>
<td></td>
</tr>
<tr>
<td>Direct Losses Incurred</td>
<td>$38M in 2018</td>
<td>$28M in 2019</td>
</tr>
<tr>
<td>Claims Closed w/Payment</td>
<td>1,078 in 2018</td>
<td>753 in 2019</td>
</tr>
<tr>
<td>Policies in Force</td>
<td>294K in 2018</td>
<td>486K in 2019</td>
</tr>
<tr>
<td></td>
<td>79% Endorsements vs Standalone</td>
<td></td>
</tr>
<tr>
<td>Average Premium</td>
<td>$1,516 Standalone; $164 endorsement in 2018</td>
<td>$1,568 Standalone; $103 endorsement in 2019</td>
</tr>
<tr>
<td>Direct Losses Incurred</td>
<td>$38M in 2018</td>
<td>$28M in 2019</td>
</tr>
</tbody>
</table>
State Comparisons

- States with most premium written (2019): FL, CA, NY, TX, NJ, SC
- Highest Losses (2019): TX, CA, NY, FL, LA
- Highest Loss Ratios (2019): See map
- 15 insurer groups wrote over $1M in residential premium in 2019
  - Largest writers wrote $71M and $42M
Questions?