MULTISTATE TARGETED MARKET CONDUCT EXAMINATION

Of

Insurance Services Office, Inc.

PARTICIPATING REGULATOR ADOPTION

On behalf of the Alaska Division of Insurance, I, Bret S. Kolb, hereby adopt, agree, and approve the Insurance Services Office, Inc. multistate market conduct examination report covering the period January 1, 2007 through December 31, 2011.

Dated: December 10, 2013
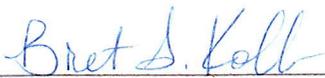
Bret S. Kolb

Bret S. Kolb
Director
Division of Insurance
Department of Commerce, Community &
Economic Development
State of Alaska

**Insurance Services Office, Inc.
And ISO Data, Inc.**
**545 Washington Boulevard
Jersey City, NJ 07310-1686**

**Report of Examination
As of December 31, 2011**

**Examination Report Prepared by Independent
Contractors of Risk and Regulatory Consulting, LLC
With Regard to the Multi-State
Market Conduct Examination of ISO**

Table of Contents

May 28, 2013

Kenneth Kobylowski
Commissioner
NJ Department of Banking and Insurance
20 West State Street
PO Box 325
Trenton, New Jersey 08625

Eric A. Cioppa
Superintendent
Maine Bureau of Insurance
76 Northern Avenue
Gardiner, Maine 04345

Benjamin Lawsky
Superintendent
NY Department of Financial Service
One State Street
New York, New York 10004

Dear Commissioners:

Pursuant to your instructions, an examination has been conducted of the

<div align="center">

INSURANCE SERVICES OFFICE DATA, INC. (ISO)
545 Washington Boulevard
Jersey City, NJ 07310-1607

</div>

hereinafter referred to as "ISO" or "Company." The following report of the findings of this examination is herewith respectfully submitted.

Purpose and Scope of Examination

The Advisory Organization Examination Oversight (C) Working Group ("the Working Group") of the National Association of Insurance Commissioners ("NAIC") initiated a multi-state examination ("the Examination") of Insurance Services Offices, Inc. and ISO Data Inc. (collectively, "ISO" and the "Organization") to validate that the advisory organization is performing its permitted regulated functions in a manner consistent with state laws and regulations. The scope of the Examination (the "Scope") included a review of the Organization's processes and procedures in place during the period of the Examination, including but not limited to, the preparation of loss cost filings; rules, forms; operations/management; statistical plans; regulatory licenses or other authorization; data receipt and controls; processing, editing and compilation procedures; error handling and related correspondence with reporting insurers; report submissions to regulators, as well as compliance with Chapter 25 and its Appendix F and selected sections of Chapter 16 of the 2011 NAIC Market Regulation Handbook ("the Handbook").

The Examination was conducted at the direction and overall management and control of New Jersey, Maine and New York Insurance Departments (the "Lead States"). Representatives from the firm of Risk & Regulatory Consulting, LLC ("RRC" or "the Examiners") were engaged to complete certain examination procedures.

RRC personnel participated in this Examination in their capacity as Examiners. The Examination Team included Actuarial and Information Technology ("IT") Specialists as well as Market Conduct Examiners. RRC provides no representations regarding questions of legal interpretation or opinion. Determination of Findings, if any, constituting potential violations is the sole responsibility of the Lead States. The Examination Report (the "Report") notes that the review of practices, procedures and files was not exhaustive or all-inclusive; thus the failure to identify unacceptable or non-complying practices does not constitute acceptance of these practices.

Company Profile

Insurance Services Office, Inc., and ISO Data, Inc. are subsidiaries of Verisk Analytics, ("Verisk"). ISO Data, Inc. provides statistical agent services to the property/casualty insurance industry and makes statistical submissions to regulators in accordance with the NAIC Handbook of Information Available to Regulators. Insurance Services Office, Inc. prepares and files advisory prospective loss costs, forms and manuals of

rating rules for many lines of property & casualty insurance. The property and casualty lines of business ("LOB") administered by ISO include but are not limited to: personal and commercial automobile; homeowners; dwelling fire and allied lines; inland marine; commercial fire and allied lines; commercial multiple line; boiler and machinery; general liability; crime; glass; farm and farm owners and professional liability.

The Insurance Services Office was formed on April 1, 1971 as a national voluntary, non-profit unincorporated association of insurers through the consolidation of various state, regional and national rating bureaus for various lines of property/casualty insurance. Over the decades that followed its formation, ISO made a series of changes in its operations and structure. Effective January 1, 1983, Insurance Services Office changed its legal form from that of a non-profit association to that of a non-profit corporation. Its name changed from Insurance Services Office to Insurance Services Office, Inc. (ISO). By 1989, ISO started making advisory loss costs instead of advisory rates and transferred complete decision making authority on all rate related matters, including actuarial methodology, to ISO staff from insurer committees.   By 1994, insurers relinquished control of ISO to a member board that included seven non-insurer directors. In 1997, ISO became an independent for-profit corporation. Insurers may only own stock in ISO that have very restricted voting rights, primarily limited to the election of a minority of the board of directors and matters involving a substantial change to the structure or business purposes of the corporation. In 2008, Verisk Analytics was established, which serves as the parent holding company of ISO. In 2009, Verisk completed its Initial Public Offering and became a publicly-traded company.

ISO Data, Inc. a subsidiary of ISO, applied to the states for designation as a statistical agent on July 6, 2001.

ISO's functions include developing programs to help insurers define and manage insurance products and provide information to help insurers determine their own independent premium rates. Insurers use ISO offerings primarily in their product development, underwriting and rating functions.

ISO serves insurers, reinsurers, insurance producers, insurance regulators, risk managers and other participants in the property/casualty insurance marketplace. The following is a list of the advisory organization products and services ISO offers:

- Data to help insurers make independent decisions about their pricing
- Statistical and actuarial services
- Insurance policy language
- Rules needed to write and rate insurance policies

- Tools for predictive modeling and scoring of risk
- Information about specific properties and communities

Executive Summary

The objective of the Examination focused on evaluating ISO's regulated operations, including the processes and procedures utilized in collecting and disseminating statistical data, and to determine compliance with applicable regulatory requirements and the Handbook. The Examiners collaborated closely with the Lead States throughout the course of the Examination. The Lead States included the following:

Lead States:

- New Jersey (Managing Lead State)
- Maine
- New York

Additionally, the NAIC solicited states and territories to serve as Participating jurisdictions for the Examination. Participating jurisdictions include all 50 states, the District of Columbia, and the territories of Puerto Rico, Virgin Islands and Guam.

This Examination encompassed the period from January 1, 2007 through December 31, 2011 ("the Period"). An introductory meeting was held at ISO's offices in Jersey City, New Jersey, on December 15, 2011. Field work began on January 19, 2012, and was completed on October 5, 2012.

The Examiners workplan was prepared using the relevant guidance and standards of the Handbook confirming that the Organization utilizes consistent procedures and processes for each jurisdiction in which ISO operates. ISO modifies its procedures and processes to comply with specific state statutes and regulations as appropriate. The Examiner's workplan, consistent with the applicable Handbook Chapters 16, 25 and Appendix F of Chapter 25 included consideration of the following Scope areas:

- Operations/Management/Governance
- Statistical Plans
- Data Collection and Handling
- Correspondence with Insurers and State Regulators

- Report Systems and Data Requests

- Ratemaking

- Form Development

- Rule Development

- Other Procedures

The overall results of the examination indicate that ISO's processes and procedures related to its regulated operations adequately meet the standards reviewed.

Examiners Methodology

The Examination Team included Actuarial and Information Technology ("IT") Specialists as well as Market Conduct Examiners (collectively, the Examiners). The Examiners primarily relied on the review of documentation and testing of records and information maintained by the Organization concerning certain of their operations included within the Scope of the Examination and the above noted subject areas. Also, the Examiners participated in presentations prepared and offered by ISO, which provided detailed information regarding the Organization's operations, which were the subject of the Examination. With regards to the IT scope of the Examination, the Examiners adapted a high-level risk focused approach to review and evaluate ISO's IT relevant infrastructure and controls, consistent with Chapter 25 and Appendix F of Chapter 25.

The Report is segregated by the Scope areas of the Examination, consistent with the Handbook Standards for Chapters 16, Chapter 25 and its Appendix F. To be as efficient as possible during the Examination process and with the concurrence of the Lead States, the Examiners reviewed and tested areas which would be applicable to more than one Scope area of the Examination. As such, in some instances, reference is made to a prior section of the Report for information regarding the Examiners review, evaluation and testing.

Additionally, interviews and process walkthroughs with representatives of the Organization were also conducted. Targeted testing was performed consistent with examination processes and sampling methodologies in concert with the Handbook guidance. Where appropriate, the Examiners tendered inquiries and follow-up inquiries to ISO for response.

The Examiners developed a sampling methodology, relying on Audit Command Language (ACL), which was used to select samples for review and testing. Samples were selected for the following Scope areas including:

Loss Cost Filings

- A judgmental sample of ten (10) loss cost filings was selected, which was representative of the relevant LOB and included filings from a representative number of states. The sample included one (1) filing from each of the top (most number of filings) five (5) LOBs and five (5) filings from the remaining LOBs.

Rule Filings

- A judgmental sample of ten (10) rule filings, was selected, representative of the relevant LOBs and included rules from a representative number of states.

- Two (2) judgmentally selected rule filings from each of the top (most number of filings) five (5) LOBs were selected for review. The sample of two (2) rules for each of the top (most number of filings) five (5) LOBs included one (1) judgmentally selected rule filing that has a rate impact, and one rule filing that does not have a rate impact.

Form Filings

- A judgmental sample of 20 form filings was selected for testing, which was representative of the LOBs and included laws from a representative number of states.

- Two (2) judgmentally selected form filings from each of the top (most number of filings) ten (10) LOBs were selected for review.

Statistical Plans

- The Examiners confirmed that ISO had not revised or subsequently filed any statistical plans during the Period and the Organization confirmed that the statistical plans, which were filed prior to the Period, were done so in accordance with the Handbook and individual state requirements. No sampling was necessary. The Examiners further confirmed that ISO's personal lines statistical plan (called the Personal Lines Statistical Manual) was filed with each jurisdiction in 2002 and the statistical plan for commercial lines (called the Commercial Lines Statistical Manual) were filed with each jurisdiction in 2006. No sampling was necessary.

- At the request of the Texas Department of Insurance, the examiners reviewed the Texas Commercial Lines Statistical Plan to ensure that Texas specific requirements were met.

Correspondence with Insurers and State Regulators

- The Examiners reviewed ISO information, which included the weekly Delinquency Report and the Submission Analysis Report ("SAR").

- A judgmental sample of 15 statistical reporting insurer reports that had data errors and 15 statistical reporting insurer reports that were delinquent in reporting during the Period was selected, which resulted in a sample of 30 items.

Results Of The Examination

A.   REVIEW OF EXAMINATION STANDARDS

This aspect of the Examination was related to the review and testing, where applicable, of the Standards for each of the identified areas included within the scope of the Examination. These Standards are identified in Chapter 25 of the Handbook and certain additional areas of review as requested by the Working Group and certain Participating States. Additionally, sections of Chapter 16 and Appendix F of the Chapter 25 of the Handbook were also referenced during the Examination.

The overall results of the Examination did not identify any significant matters with regards to ISO's operations.

I.   Operations/Management/Governance

> **Standard 1: *The advisory organization has implemented written policies and procedures to prevent anti-competitive practices in the insurance marketplace, as related to the advisory organization's services and communications to insurers.***

Results: The evaluation of this Standard included reviewing documentation provided by ISO, which explained their process. The Examiners note that the Organization appears to satisfy the requirements of Standard 1.

Observation: A procedural review was performed to address this Standard. The Examiners noted that ISO has written policies and procedures, which document its efforts to prohibit anti-

competitive practices. As an advisory organization, ISO receives proprietary data from its statistical reporting insurers for the express purpose of complying with state statistical reporting requirement and using the aggregated data to produce the various products and services. As such, it is essential that ISO continue to maintain effective controls in place to prohibit anticompetitive practices that might limit or prevent competition.

The Examiners confirmed the Organization has the following controls in place to address the requirements of Standard 1 as follows:

- ISO's Antitrust Compliance Policy Statement provides guidelines with regards to how employees avoid potential antitrust situations;
- ISO has a designated Antitrust Compliance Officer;
- ISO's Antitrust Compliance Policy Statement Appendix provides a notice that must be read at sponsored meetings where two (2) or more insurers are present;
- Insurer Panel communications are reviewed by ISO's legal resources to ensure the absence of antitrust violations; and
- All ISO newly hired employees are trained on the Organization's Antitrust Policy. Additionally, senior management employees receive training on an annual basis.

Standard 2: *The advisory organization uses sound actuarial principles for the development of prospective loss costs.*

*Results***:** Based on the documentation and process review and testing, the Examiners concluded that ISO has implemented policies and procedures that ensure the development of prospective loss costs in accordance with applicable Actuarial Standards of Practice ("ASOP") and the Organization appears to satisfy the requirements of Standard 2.

Observation: A procedural review and testing was performed by the Examiners to address this Standard, which included a review of a sample of loss cost filings. Each sample was tested against certain actuarial guidelines set forth in the ASOP's, and as identified below.

- ASOP #12: Risk Classifications

- ASOP #13: Trending Procedures in Property/Casualty Insurance

- ASOP #23: Data Quality

- ASOP #25: Credibility Procedures Applicable to Accident and Health, Group Term Life and Property/Casualty

- ASOP #29: Expense Provisions in Property/Casualty Insurance Ratemaking (for loss based expenses only)

- ASOP #38: Using Models Outside the Actuary's Area of Expertise (Property and Casualty)

- ASOP #39: Treatment of Catastrophe Losses in Property/Casualty Ratemaking, and

- ASOP #41: Actuarial Communications

Additionally, testing included a sample of calculations performed by the Organization, which were used to support the derivation of certain loss costs including:

- Loss Development Factors

- Trends Factors

- Procedure for Wind and Water losses (where applicable)

- Procedure for Hurricane losses (where applicable)

- Extension of Exposures or On-level factors

- Credibility Procedures

- Increased Limits Factors

- Loss Adjustment Expenses

- Classification Relativity Analysis

- Use of Models

The Examiners' sampling methodology was discussed earlier in the Report. The Examiners also noted that ISO performs specific reasonability checks for ratemaking compilations that include the following:

- Missing data and data anomalies at the insurer group level - losses, claim counts, decrease in premiums indicating a reporting insurer delinquency in reporting; premium/loss mismatch; shifting of data between categories; unusual loss severity, frequency, pure premium, loss ratio; and unusually high or low average premium.

- Comparison of the statistical data stored on the mainframe to downloaded Excel files.

- ISO scans for the similar types of anomalies, which it completes at the Company level, such as changes in the current year's data, unusual or unexpected loss development, and shifts in territory and/or policy form. If necessary, additional exclusions are made, and the compilation is reproduced.

Following the reasonability checks, ISO prepares aggregate statistical compilations and then a call-to-call check with the prior year's compilation is performed. Any significant changes in overlapping years, or unexpected differences in latest (new) year compared to earlier years, are investigated and explained before the compilation is released. Finally, loss cost filing samples from 10 jurisdictions were reviewed (see Appendix A).

Standard 3: *The advisory organization prepares, submits filings as necessary, adheres to applicable state filing and/or approval requirements and written procedures prior to distribution of prospective loss costs, rates, policy forms, endorsements, factors, classifications or rating rule manuals.*

Results: The Examiners reviewed documentation provided by the Organization, performed a process review, and as a result, determined that ISO appears to satisfy the requirements of Standard 3.

Observations: A procedural review and testing were performed to address Standard 3. The Examiners reviewed ISO's process for preparing and submitting filings, and note the following:

The policies and procedures reviewed by the Examiners included the following:

- Filings are made on the System for Electronic Rate and Form Filing (SERFF) or other state-approved filing systems. ISO has implemented use of SERFF in most jurisdictions over the exam period. SERFF is now used in the majority of jurisdictions except Florida where an alternative electronic filing system, I-File is used,

- ISO's Regulatory Correspondence Tracking System (RCTS) which is used to record and monitor the status of all inquiries that are made by a Department of Insurance ("DOI") analyst that is reviewing the filing and,

- ISO's Publication Support Division (PSD) workflow process that focuses on the accuracy of the publication of the policy forms and manuals included in filings, including introduction of new or revised policy forms or manual pages in compliance with the filed material that was approved by the DOI.

ISO explained that an effective date of a filing may be based on statutory requirements, regulatory request/input, potential impact to the industry, and/or time required for implementation.

The Examiners used ACL to select a sample of 20 form filings (See Appendix B). The samples were representative of the lines of business serviced by ISO and included forms from a representative number of states. This sample included two (2) judgmentally selected form filings from each of the top ten (10) lines of business.

Additionally, using ACL, the Examiners selected a sample of ten (10) loss cost filings (Appendix A). The samples were representative of the lines of business and included a representative number of states. Finally, the Examiners used ACL to select a sample of ten (10) rules filings (See Appendix C).

The Examiners reviewed the selected samples and tested certain attributes to determine ISO's compliance with regard to Standard 3. The attributes tested included the following:

- ISO makes filings with regulators through SERFF, Florida's iFile system or via paper. Over the period of examination, ISO has moved almost entirely to electronic filing submissions.

- ISO follows its established lead-time guidelines to publish approved material.

- ISO is responsive to state filing analyst questions regarding filings.

- The materials distributed by ISO are the same as those filed with applicable state insurance departments.

- ISO provides accurate information to its participating insurers related to the status of the states' approval of the filings and approved usage date of prospective loss costs, policy forms, and rules.

- Instructions are included in the Organization's manuals for all prospective loss costs, policy forms, and rules.

- Negative actions on the part of State Regulators are reviewed by ISO to confirm that safeguards are in place to prevent recurrence of the underlying problem(s).

- There are no unexplained concentrations of negative actions with respect to filings in a particular state or states. ISO represented to the Examiners that the Organization has received no warnings, fines or other negative actions from state regulators for any reason. The Examiners did not identify any information that was contradictory with ISO's representations.

Standard 8: *The organization conducts ongoing research and review of state insurance laws and insurance-related case law in order to be responsive to necessary changes in prospective loss costs, policy forms, endorsements, factors, classifications or manuals, as applicable.*

Results: The Examiners reviewed the Organization's documentation, performed a process review and testing, and as a result, determined that ISO appears to satisfy the requirements of Standard 8.

Observations: The Examiners confirmed through their review that the Organization has procedures and protocols in place to monitor the regulatory environment that may require changes to prospective loss costs, policy forms, and rules, as applicable, and to evaluate the impact of such developments on the Organization's products and services. The Examiners conclusions are based on reviewing and confirming that ISO has in place, the following protocols and procedures that address Standard 8 as follows:

- ISO receives from its vendor, Statenet, proposed and amended laws by jurisdiction on a daily basis,

- Each item in the Statenet daily report is assigned to an ISO state analyst responsible for determining potential impact, which ISO would need to address with its participating insurers. The state analyst is responsible for communicating this information to the impacted ISO Line of Business Unit,

- Each Line of Business Unit is responsible for addressing/updating the new law requirements for its workflows and for communicating the changes to participating insurers,

- ISO communicates changes to participating insurers through circular memos (Circulars) throughout the review and implementation process,

- ISO modifies forms through a defined process that includes employee and manager sign off, quality assurance, and legal review. Once a form is deemed as final, all prior versions if applicable, are removed from production.

To test ISO's procedures regarding the above, the Examiners selected a sample of 20 states and then reviewed department of insurance websites, and legislative websites, and performed general insurance searches to identify new laws enacted during 2009 - 2011. (See Appendix D)

The sample of new laws and regulations was then matched to the listings of new laws and regulations provided by ISO to its participating insurers.

Standard 12: *The advisory organization has an up-to-date, valid internal or external audit program.*

Results: The Examiners reviewed documentation and related information as provided by ISO and conducted a process review and testing, noting that ISO appears to satisfy the requirements of Standard 12.

Observations: A procedural review including a process walkthrough with ISO key employees was conducted, and certain testing was performed by the Examiners related to the Organization's audit programs. The Examiners also reviewed IT-related information identified from ISO internal audits performed between 2009 and 2011, which included the review of the following matters:

- Remote and Mobile Computing

- Enterprise Business Continuity Planning

- ISO Innovative Analytics

Based on the review of various reports and related documentation from the Period, the Examiners were able to confirm that ISO's Internal Audit Department participates in the Software Development Life Cycle (SDLC) process related to selected projects and enhancements. Additionally, the Examiners noted that Sarbanes - Oxley (SOX) testing is performed annually by ISO's external auditor, Deloitte LLP. Finally, the Examiners reviewed summary reports for 2009, 2010 and 2011 which indicated adequate controls were in place for the relevant Organization's systems under review.

Standard 13: *The advisory organization has appropriate controls, safeguards and procedures for protecting the integrity of computer information.*

Results: The Examiners reviewed documentation provided by ISO and conducted a process review and testing and, as a result, noted that ISO appears to satisfy the requirements of Standard 13.

Observations: A procedural review, which included a process walkthrough with ISO key employees, as well as detailed testing, was performed to identify the controls the Organization has in place specific to Standard 13. Further, testing was also performed to evaluate the safeguards and procedures for protecting the integrity of computer information.

The Examiners performed a walkthrough of the computer facility at ISO and confirmed that appropriate physical security safeguards are in place. Also, the Examiners performed certain testing related to logical security, specific to user access within certain of the Organization's critical IT applications. Logical security testing was performed for the following system levels:

- Active Directory ("AD") level,

- Remote Access Control Facility ("RACF") and;

- Universal Receipt and Acceptance ("UNIRA")

The Examiners also reviewed ISO's "change management" protocols related to the IT controls and safeguard to address protecting computer related information. In doing so, the Examiners confirmed that ISO's change management process is centralized and managed by the Organization's Software Configuration Management ("SCM") team, which coordinates changes through ISO's System Development Life Cycle ("SDLC"). The Examiners reviewed a sample of changes performed during the Period, for compliance with ISO's written protocols and procedures.

The Examiners review also confirmed that ISO utilizes a vendor- provided tool and IBM's Internet Security Systems for intrusion detection. Further, it was noted that any potential security exceptions are logged for review by ISO's Security staff. A second vendor provided tool named WebSense is also used to scan for application security vulnerabilities and all incoming email is scanned using McAfee Email Gateway software.

With the increasing growth of wireless access in today's business environment, the Examiners investigated ISO's safeguards and controls regarding wireless application and found that wireless access is limited to select employees and is encrypted using WPA2 security. Also, ISO's protocols include annual scans for rogue wireless access points. The Examiners secured supporting evidence of wireless access reviews performed by ISO.

Computer viruses represent risk to any organization but even more so for businesses such as ISO; an entity that manages significant volumes of data, as evidenced by the scope of Standard 13. As such, the Examiners investigated and reviewed ISO's protocols and procedures in this regard, and found that the Organization's potential detection and prevention is enabled at the server and workstation level using the Symantec anti-virus program.

ISO has an established Virus Prevention Team, which works with the Organization's Operations and Security areas to evaluate risk and identify the appropriate actions to be taken. The Examiners obtained evidence that the virus definitions were up-to-date at the server and workstation levels.

During the review of Standard 13, the Examiners also reviewed and confirmed the following IT aspects, including:

- In accordance with Verisk's Enterprise Information Security Policy, sensitive data may not be transmitted outside of the ISO network unless encrypted.

- All Verisk laptops are encrypted for all customer financial information, property and casualty insurance data, personally identifiable information ("PII"), and protected health information ("PHI"). ISO's advisory organization and statistical agent functions do not handle PII or PHI.

- The Organization's network is protected by firewalls, and any changes to the firewalls must be processed through the formal change management process.

- Remote access to the ISO network is possible through a secure Virtual Private Network ("VPN'). Remote users utilize Secure ID hardware tokens for two factor authentication. (Hardware tokens are physical devices that display a PIN that must be entered in addition to the user's ID and password to access the ISO environment.)

Finally, the Examiners confirmed that ISO has in place a formal Information Security Incident Management Policy, which covers ISO's initial response protocols and the notification and reporting of incidents.

Standard 14: *The advisory organization has a valid disaster recovery plan.*

Results: The Examiners reviewed documentation provided by ISO and performed a process review and note that ISO appears to satisfy the requirements of Standard 14.

Observations: A procedural review was performed to address Standard 14, which included a review of ISO's Disaster Recovery ("DRP") and Business Continuity ("BCP") plans.

The Examiner's review of ISO's DRP determined the following:

- ISO's data recovery procedures are current and comprehensive with testing that occurs at regular intervals throughout the year.

- ISO has an inventory of critical business applications, databases and files, which is current and the inventory is defined and prioritized for a recovery process.

- Critical business areas have developed manual recovery testing (off-site retrieval through restoration of a fully operational computing environment) on a regular basis.

- ISO's DRP includes down time standards for customer service "transactions."

Further, the Examiners confirmed that during 2010, ISO's Internal Audit Department performed an assessment of the Organization's BCP, and no concerns were noted. It is noted that during the course of the Examination, the northeast section of the United States was significantly impacted by Superstorm Sandy. ISO's Jersey City, New Jersey, headquarters and operations were impacted by the storm. The Examiners confirmed with the Organization, that as a result of its disaster recovery planning, no services to its participating insurers were significantly disrupted nor was there any loss of data or information. The Examiners believe that ISO's management of the results of Hurricane Sandy further demonstrates the overall effectiveness of its DRP and business continuity plan.

Standard 15: *The advisory organization is adequately monitoring the activities of any entity that contractually assumes a business function or is acting on behalf of the advisory organization.*

Results: The Examiners reviewed documentation and related information provided by ISO and performed a process review. The Examiners also took into consideration during their review the limited activities performed by the Organization in regards to this Standard. Based on the Examiner's work, it is noted that ISO appears to satisfy the requirements of Standard 15.

Observations: A procedural review was performed, including a process walkthrough with key employees, to address Standard 15. The Examiners identified that ISO utilizes two vendors for IT Support, both of which have had longstanding relationships with ISO that span more than 5 years. The vendors provide IT support functions only. Two (2) operators from one of the vendors work on site in Jersey City and another two (2) operators work in India and perform monitoring during off peak hours. Further, the Examiners confirmed that the Organization has six (6) resources who work off shore providing operational support. Resources from one of ISO's vendor's are also based in India, and are utilized to perform routine, cyclical program changes to ISO applications.

The Examiners confirmed that ISO has appropriate protocols in place to onboard vendor resources, which includes the following:

- Offshore resources are trained on site for four (4) weeks to become acclimated to the ISO environment.
- ISO's Internal Audit Department performs a vendor review upon the initial contract that includes IT security controls.

- ISO's offshore resources access the Organization via VPN using their own computers and hardware tokens provided by ISO.

Finally, the Examiners confirmed that offshore resources are dedicated by product line, and controls exist such that data cannot be copied from the vendor workstation. As an added control, ISO's production data is not accessible to vendors, and security logs are enabled providing an audit trail showing activities performed by vendors.

Standard 16: *Records are adequate, accessible, consistent and orderly and comply with state record retention requirements.*

Results: The Examiners reviewed documentation and related information provided by ISO and also performed a process review. The Examiners note that ISO appears to satisfy the requirements of Standard 16.

Observations: A procedural review was performed to address this Standard whereby, the Examiners confirmed that ISO does have established Record Retention Procedures which contain state specific retention requirements. Additionally, the Examiners confirmed that the Organization maintains department of insurance filings, including loss costs, forms, and rules on an indefinite basis.

The Examiners note that throughout the course of the Examination, ISO provided all requested documentation and related information without exception, and the documentation was orderly managed and legible, and the structure of the files and data was organized. As such, the Examiners offer that the Organization's ability to provide the requested documentation suggests in part that ISO's record retention policies are operating effectively.

Standard 17: *The advisory organization is appropriately licensed.*

Results: The Examiners reviewed documentation and related information provided by ISO and performed testing. The Examiners note that ISO appears to satisfy the requirements of Standard 17.

Observations: The Examiners requested the Organization's licenses and/or registrations for each jurisdiction where the Organization operates, noting that each jurisdiction establishes the requirements that determine if a license or registration is granted.

ISO was responsive in providing the licenses and/or registrations for each jurisdiction, which the Examiners then reviewed to confirm the requirements of Standard 17.

The Examiners review confirmed the following:

- A separate license and/or registration, whichever applies to a particular jurisdiction, is maintained for each ISO entity: Insurance Services Office, Inc. and ISO Data, Inc.

- The ISO Data Inc. licenses and/or registrations pertain to the Organization's functions regarding the statistical plan and the required statistical data reported by its statistical reporting insurers.

- The Insurance Services Office, Inc. licenses and/or registrations pertain to the functions performed by ISO such as the design of advisory policy forms, loss costs, and rules.

- The Examiners confirmed that ISO is licensed and/or registered in all 50 states, District of Columbia, Puerto Rico, Guam and the Virgin Islands as Insurance Services Office, Inc.

- ISO Data Inc. is licensed or registered in all 50 states, the District of Columbia and Puerto Rico.

The Examiners confirmed that a copy of the current license and/or registration for Insurance Services Office, Inc. for each state or territory was provided, and a copy of the current license and/or registration for ISO Data, Inc. was also provided.

> **Standard 18:** *The advisory organization cooperates on a timely basis with examiners performing the examination.*

Results: During the course of the Examination, the Examiners requested certain data, documentation and related materials as well as requesting meetings and interviews with ISO resources. Based on the Organization's responses to the Examiners, it is noted that ISO appears to satisfy the requirements of Standard 18.

Observations: To assist in evaluating ISO's cooperation throughout the Examination, a request log was maintained that documented the date each request was tendered to the Organization, the date a response was due and the date on which the response was ultimately received. Additionally, regularly scheduled status calls and/or meetings were held, providing a means to discuss outstanding requests, examination progress and immediate needs of the Examination, including the timeliness in responding to the Examiner's requests.

In some instances, ISO requested additional time from the Examiner in Charge (EIC) to provide the information/documentation based upon the assessment of the time needed to complete the request and all requests for extensions were considered reasonable. The EIC reviewed the requests and in some instances collaborated with the Lead States regarding the basis for the requested extension. With respect to the Examination in its entirety, ISO's responses to requests were generally provided in a timely manner and the Organization's cooperation during testing, including that of system databases contributed to an efficient examination process.

Standard 19: *The advisory organization has developed and implemented written policies, standards and procedures for the management of insurance information.*

Results: The Examiners reviewed documentation and related information and performed a process review. The Examiners note that ISO appears to satisfy the requirements of Standard 19.

Observations: Upon reviewing Standard 19 with the Organization, ISO suggested that the Standard does not apply since the Organization does not fall under the purview of the Health Insurance Portability and Accountability Act of 1996 ("HIPAA"). ISO further noted however that its parent Company, Verisk, does have a privacy policy, which ISO's employees are required to acknowledge in writing.

The Examiners also met with ISO's Assistant Vice President, Technology Operations, and ISO's Assistant Vice President, Development, to gain an understanding of IT Outsourcing and Offshoring at ISO, including the scope of Standard 19 regarding established written policies, standards and procedures for the management of insurance information, which would include ISO's vendors. As noted earlier in the Report, the Examiners confirmed ISO utilizes two vendors for IT Support. Both vendors have had longstanding relationships with ISO and the vendor contracts did include a security based review by Internal Audit, however, evidence of the review was not maintained.

> **Illinois Request:** *A review of ISO Data Inc.'s and Insurance Services Office, Inc.'s constitution, bylaws, etc.*

Results: The Illinois Department of Insurance, a participating State made a request of the Working Group to include a review of certain documentation related to ISO Data, Inc. and Insurance Services Office, Inc. The Examiners note that ISO Data, Inc. and Insurance Services Office, Inc. appear to satisfy the requirements of Illinois Insurance Code Section 123A-7.

Observations: A procedural review was performed by the Examiners to address the request.

Consistent with the request of the Illinois Department of Insurance, the Examiners reviewed and Insurance Services Office, Inc. and ISO Data, Inc.'s:

(a) constitution, its articles of incorporation, agreement or association, and its by-laws, rules and regulations governing its activities, all duly certified by the custodian of the originals thereof; and

(b) a list of its members and subscribers.

Insurance Services Office, Inc. and ISO Data, Inc.'s information was reviewed to ensure these rules provide that the advisory organization will:

(a) permit any admitted Company to become a member of or a subscriber to such organization at a reasonable cost and without discrimination, or to withdraw therefrom;

(b) refrain from adopting any policy, the effect of which would be to require any member or subscriber as a condition to being a participating insurer or subscriber, to adhere to its advisory loss costs, insurance policy forms, or underwriting rules;

(c) neither practice nor sanction any plan or act of boycott or intimidation tending to result in the unreasonable restraint of or monopoly in the business of insurance; and

(d) allow admitted companies who are not participating insurers or subscribers to the organization to purchase the same services of such organization as are made available to participating insurers and subscribers without discrimination as respects costs to participating insurers and subscribers. (Illinois Insurance Code Section 123A-7)

II.   Management and Organizational Controls

As previously noted, the scope of the Examination included a review by the Examiners of certain aspects of Appendix F to Chapter 25 and certain additional areas of review as requested by the Working Group.   Although Appendix F does not include specific Standards, the Appendix does identify areas to be included in an examination of an Advisory Organization.

The Examiners conducted a procedural review, including a process walkthrough with ISO key employees, as well as performing testing to address the areas of Appendix F as follows:

A.   Change Management

The Examiners confirmed that ISO has a Software Configuration Management (SCM) group for deployment of changes to acceptance and production.   SCM is an independent group that works with the line of business units and developers to deploy changes.   Further, the Examiners confirmed that ISO uses Computer Associates Service Desk Manager for tracking changes to all applications.   The developer builds the change request for which ISO will assign resources.   The Quality Assurance area reviews the change information to ensure all required items are included.

Sample changes were reviewed and tested by the Examiners to ensure the changes followed the documented Software Development Life Cycle (SDLC) that guidelines established as part of the Organization's change management process.

B.   Risk Assessment

The Examiners confirmed that ISO's Internal Audit Department participates in the SDLC process by performing periodic "consulting engagements" related to selected projects and enhancements. The Examiners obtained and reviewed various reports issued by Internal Audit during the exam period.

Additionally, the Examiners confirmed that on an annual basis, Sarbanes Oxley testing is performed by ISO's external auditor Deloitte, LLP. The Examiners obtained summary reports for 2009, 2010 and 2011 which appear to indicate there are adequate controls over the Organization's systems.

C.   Physical Security

The purpose of this aspect of the Examination is for the Examiners to review the Organization's physical security systems.

> ***The organization has processes and systems in place for ensuring and maintaining physical security.***

And

> ***The organization has emergency response procedures to follow if a computer security incident occurs.***

Results: The Examiners reviewed documentation and related information and conducted a process review and performed testing. The Examiners note that ISO appears to satisfy the requirements of these requests.

Observations: A procedural review, including a process walkthrough with ISO key employees, as well as detailed testing were performed to address these requests.   The Examiners performed a walkthrough of ISO's computer facility and noted the Organization appears to have in place established physical security safeguards.   The Examiners confirmed that physical security requirements regarding ISO's Data Center are formally documented in the Organization's Physical Security Policy and Procedures (Security Policy).

The Security Policy outlines ISO's user access procedures and confirms that all user access requests must be formally approved by management. The Examiners also reviewed user access to the Data Center for appropriateness.

The Examiners   confirmed through their review and related work that ISO has established formal incident and problem management procedures, which include roles and responsibilities, severity levels, entry and exit criteria, and status reporting. The Examiner's testing included obtaining and reviewing information related to ISO's documented procedures.

D.   Logical Security

Additionally, the Examiners performed certain testing related to logical security, specific to user access within certain of the Organization's critical IT applications. These applications included:

- Active Directory (AD) level,

- Remote Access Control Facility (RACF) and;

- Universal Receipt and Acceptance (UNIRA)

E. Passwords

The Examiners confirmed and reviewed ISO's password configuration procedures, which are documented within the Enterprise Information Security policy. The Examiners review confirmed that ISO's passwords are (1) required to expire after 60 days, (2) be a minimum of 8 characters in length and (3) include a combination of alpha, numeric and special characters. The Examiners also reviewed screenshots from ISO's systems identifying password configurations documented within the policy and ensured that these configurations are set within the system consistent with the policy.

Finally, the Examiners verified in real-time that passwords are masked upon user login by reviewing screen shots and accessing ISO systems with the Organization's IT resources onsite at ISO's office in Jersey City.

F. User Access – System Software

The Examiners reviewed and investigated ISO's user access procedures and protocols and noted this area is administered by the Organization's security group. The Examiners confirmed through their review that new users are granted access to systems based on individual roles established by ISO's business units. Additionally, the Examiners confirmed the following:

- User access requests are communicated by ISO's Human Resource (HR) area and must be approved and documented.

- ISO's contractors' user access is configured to automatically expire after 90 days.

- Each new user is assigned with a RACF account whether they utilize RACF resources or not in the event a user makes a request by phone for a password change. The user is

assigned a four (4) digit PIN in their mainframe profile. The Security group obtains the PIN from the user and ensures it matches prior to making any changes.

The Examiners reviewed a sample of new user ID's to confirm access was approved and restricted to the minimum levels necessary. Additionally, the Examiners noted that user access re-certifications were also tested internally by Internal Audit, through obtaining and examining ISO's Internal Audit's testing in this area.

The Examiners also reviewed ISO's procedures for handling employee terminations specific to user access. The Examiners confirmed that ISO's HR area generates a daily report listing accounts to be disabled. ISO prepares an automated application that runs every thirty days to remove "revoked" accounts. The Examiners examined ISO screenshots from systems confirming that the automated application exists and runs as scheduled looking to identify "revoked" ID's. Additionally, the Examiners reviewed a sample of terminated users to ensure timely removal from ISO systems.

G.   User Access - Applications

The Examiners conducted a detailed review of this area and confirmed the following:

- ISO uses a consistent database flat file across all business unit applications.

- The files are stored in the ISO mainframe and are protected by RACF security.

- The level of user access is determined based on the profile they are assigned as established by the individual ISO business unit.

- User access to the mainframe is administered by the Security group.

- At the ISO application level, access is defined in the Organization's Application Subsystem (APSY). Each authorized user of the application must be defined within the APSY.

- Access to ISO's ratemaking applications is controlled through a common intranet URL which presents a customizable web based user interface.

H. Privileged User Access

The Examiners reviewed ISO's protocols and procedures related to privileged user access and confirmed that there are approximately 30 user ID's in the administrator level category. Further, ISO prepares a daily report to track administrator level system activity, which logs the tasks performed and is reviewed regularly by the Organization's Security group.

Additionally, the Examiners confirmed that ISO's Information Security management reviews administrator level access at the operating system level twice per year to ensure it remains appropriate.

I. Security Monitoring and Management

The Examiners noted that ISO prepares a variety of security reports, which are generated and periodically reviewed by management and/or the Security team. The Examiners obtained and reviewed log reports for the application, network and database areas.

J. Application Management

The Examiners confirmed through process walkthrough with ISO key employees that application changes flow through a documented SDLC process. ISO's software is the workflow tool that tracks the various steps within the process. ISO utilizes a Software Configuration Management (SCM) group for deployment of changes to acceptance and production. SCM is an independent group that works with the business area and developers to deploy changes.

ISO's procedures specify that any application change request begins with an email or conversation between the ISO business unit and the responsible developer. Application changes are tested using either "mock data" or in some cases production data that is copied to the test environment. The Quality Assurance team reviews the information related to the change to ensure all required information is included.

Finally, as previously noted in the report, the Examiners confirmed that ISO's Change Management process is tested by the Organization's Internal Audit Department. The

Examiners obtained and examined ISO Internal Audit's testing and workpapers specific to change management to confirm this process is in place.

K. Disaster Recovery/Contingency Planning

The Examiners discussed previously in the Report that a review of ISO Disaster Recovery (DRP) and Business Continuity (BCP) Plans was performed. The Examiners confirmed that in 2010, ISO's Internal Audit performed an assessment of ISO's BCP, and no exceptions were identified. The Examiners reviewed the Organization's Internal Audit report for this area.

L. Operations and Processing Controls

During the review of this area, the Examiners learned that ISO's Operations team meets weekly to discuss new and ongoing issues and problems that occurred during the prior week. Further, formal incident and problem management procedures are in place, which include roles and responsibilities, severity levels, entry and exit criteria, and status reporting. The Examiners obtained and reviewed the documented procedures. Also, the Examiners performed testing to validate job processing controls are in place and operating effectively.

Based on the review of documentation and the results of processes reviews and testing where conducted, the Examiners note that ISO appears to be addressing the aforementioned areas of Appendix F to Chapter 25.

The Examiners conducted a procedural review, including a process walkthrough with ISO key employees, as well as performing testing to address the areas as requested by the working group as follows:

M. Efficiency

The Examiners reviewed documentation and related information in order to address this area. A procedural review was performed to address this request through which the Examiners reviewed the Board of Directors ("Board") Meeting Minutes for the Period and confirmed that ISO's Board of Directors exercises, conducts and administers the Organization's corporate powers, business and property of ISO through established committees. ISO's Committees ("Committees") address the Organization's operational and financial matters.

Each Committee has a written charter that defines its purposes, composition and responsibilities.

The Board reviews the Organization's budget annually, reviews variances in the budget quarterly, and evaluates staffing additions as the need arises. The following are the Committees established by ISO's Board:

- **Audit Committee** — The Audit Committee oversees the Internal Audit function including the approval of the audit plan and the annual evaluation of the internal audit performance. Although the Internal Audit function does not report directly to the Audit Committee, the oversight function as performed by the Audit Committee may be deemed as meeting this requirement. The Examiners reviewed the Audit Committee Meeting Minutes for the Period.

- **Finance Committee** — the Finance Committee is responsible for recommending financial policies, goals, and budgets. The Finance Committee also reviews the Organization's financial performance against its goals.

- **Compensation Committee** — the Compensation Committee's responsibilities include reviewing the Organization's compensation and benefits both for executives as well as employees of ISO. The Compensation Committee also reviews staffing needs, compensation, and benefits.

- **Nominating and Corporate Governance Committee** – The Nominating and Corporate Governance Committee is responsible for evaluating the size, composition, functions and duties of the Board. The Nominating and Corporate Governance Committee also recommends the criteria for the selection of candidates for the Board and identifies qualified candidates for the Board.

- **Executive Committee** – The Executive Committee is responsible for exercising all of the power and authority of the Board between regularly scheduled Board meetings. The Executive Committee also considers and makes recommendations to the Board regarding Corporate Governance matters.

The Examiners note that while reviewing the Board and various Board Committee documents it was discovered that the Board and Committees do not have any attendance requirements for members; however based upon the review of the Board and Audit Committee minutes, the majority of Board Members appear to have attended all meetings during the Period.

The Examiners further note that travel and entertainment budgets and expenditures are not reviewed by the Board or applicable Committee for appropriateness and necessity. ISO indicated that these budgets are part of the overall budget review process as performed by the Board.

Finally, the Examiner's review identified that during the Period, the Organization's Internal Audit function has not performed any operational audits to assess whether the Organization is operating efficiently, effectively and meeting its performance goals and objectives.

III.   Review Of Statistical Plans

The Examiners' review of the Statistical Plans scope of the Examination focused on reviewing ISO's process, protocols and procedures regarding the services the Organization provides related to statistical plans.

Standard 1: *The statistical agent has filed its statistical plans in accordance with applicable statutes, rules and regulations.*

Results: ISO appears to satisfy the requirements.

Observations: The Examiners conducted interviews at ISO to discuss statistical plans ("Plans") during which the Organization informed the Examiners, that ISO Data, Inc. files two (2) statistical plans (called Statistical Manuals) in accordance with the applicable statutes, rules and regulations, most notably the NAIC Handbook of Statistical Data Available to Regulators. The filed statistical plans that were in place during the Period include the Personal Lines Statistical Manual which was filed in each state in 2002; and the Commercial Lines Statistical Manual which was filed in 2006. The Examiners confirmed that ISO Data Inc. did not revise or file any new or revisions to the filed statistical Plans during the Period.

ISO advised the examiners that it collects additional information from reporting insurers that is used primarily for ISO's ratemaking and research functions. This information is not required to be filed per the NAIC Statistical Handbook. ISO maintains three such plans: the Commercial Statistical Plan; the Personal Automobile Statistical Plan and the Personal Lines (Other Than Automobile) Statistical Plan. Data required to comply with the filed Statistical Manuals is extracted from date collected for these three plans.

ISO has documented procedures regarding reviewing of and making changes to Plans, including communicating the changes to statistical reporting insurers. ISO's Statistical Data Collection ("SDC") unit is responsible for implementing changes to the Plan(s) that are made as a result of a new law or regulation or an ISO insurance program enhancement.

Statistical plan filings are made through ISO's State Relations Division. If a DOI analyst has a question regarding a filing, the Organization's State Relations Unit is notified by the DOI, and will then obtain responses from the SDC unit. Once approved, the DOI will again notify State Relations who in turns advises the SDC unit. The SDC unit will communicate the approved plan information to participating insurers via Circulars.

The Examiners reviewed and tested ISO's information and processes related to DOI filing procedures and participating insurer communications under Form Development, Section VII of the Report.

Standard 2: *The statistical plans are reviewed and updated in accordance with applicable statutes, rules and regulations.*

Results: ISO advised the Examiners that for the period under review, there were no changes to statutes, rules or regulations that required revisions to the Statistical Manuals.

Standard 3: The statistical agent verifies that companies submit data in accordance with the appropriate statistical plans.

Results: The Examiners reviewed documentation and related information, met with ISO resources and performed process reviews. The Examiners note that ISO appears to satisfy the requirements of Standard 3.

Observations: The Examiners confirmed that ISO's statistical reporting insurers receive specific directions regarding proper data reporting requirements on an annual basis from the Organization through Annual Calls for experience reporting.   ISO's procedures in this regard include the following:

- Insurer data received is processed through ISO's Universal Receipt and Acceptance System (UNIRA). UNIRA tracks all required submissions and required corrections and automatically applies the transaction-level edits to the data as it arrives at ISO and generates a report that is returned to the reporting insurer within 3 days of receipt of the data at ISO.

- Incomplete, inaccurate, or missing data is identified in a weekly production report.

- ISO prepares the weekly production report each Monday and sends follow up emails to applicable statistical reporting insurers.

- Follow up emails are sent to statistical reporting insurers until the matter is resolved.

For reference please note that details regarding the Examiner's testing, of the above procedures which was conducted under the Correspondence with Insurers, Standards 1 through 3 are discussed later in the report.

IV.   DATA COLLECTION AND HANDLING

The data collection and handling aspect of the Examination focused on the Examiners confirming whether ISO adequately tests reported data for validity, completeness and reasonableness. The areas to be considered in this type of review include data quality, data checking procedures and edit programs.

Standard 1: *The statistical agent's series of edits are sufficient to catch material errors in data submitted by a Company/entity.*

Results: The Examiners reviewed documentation and related information and conducted a process review and performed testing. The Examiners note that ISO appears to satisfy the requirements of Standard 1.

Observations: The Examiners performed a procedural review, including a process walkthrough with ISO key employees, to address Standard 1. The Examiners determined that UNIRA edits are specific to LOB and are described in the Actuarial Edit Definitions. There are three major types of edits: field, relationship and reasonability; and are general and module-specific edits. The edits are created to confirm compliance with established requirements.

- **Field Edits** - Performed on a record basis and on each and every field the edits are performed to determine validity of each field.

- **Relationship Edits** - Multiple fields on an individual record are compared for validity. . Edits are performed on a transaction basis**.**

- **Reasonability Edits** - More subjective in nature and also performed on a transaction basis. The edits test for reasonableness of reported amount fields vs. rating variables, using formulas.

For example, reviewing premium to exposure relationship or the loss to exposure relationship and validating the rating variables may identify outliers that would indicate there may be an error in effective or expiration date, error in reported premium or loss or error in rating variables.

The Examiners also noted that ISO performs specific reasonability checks for statistical compilations that include the following:

- Missing data and data anomalies at the insurer group level - losses, claim counts, decrease in premiums indicating a reporting insurer delinquency in reporting; premium/loss mismatch; shifting of data between categories; unusual loss severity, frequency, pure premium, loss ratio; and unusually high or low average premium.

- Comparison of the statistical data stored on the mainframe to downloaded Excel files.

- ISO reviews scans for the similar types of anomalies, which it completes at the Company level, such as changes in the current year's data, unusual or unexpected loss development, and

shifts in territory and/or policy form. If necessary, additional exclusions are made, and the compilation is reproduced.

Following the reasonability checks, ISO prepares aggregate statistical compilations and then a call-to-call check with the prior year's compilation is performed. Any significant changes in overlapping years, or unexpected differences in latest (new) year compared to earlier years, are investigated and explained before the compilation is released.

Finally, the Examiners note that ISO Data Quality Reviews include distributional analyses, call-to-call checks and reasonability tests.

- Distributional analysis is used to discover if a disproportional amount of data is reported under a single data code. This may occur, for example if a reporting insurer's system triggers an inconsistency. In this event the reporting insurer's data is extracted and brought into pivot tables for additional review, which includes comparing that insurer's information to the industry.

- Call-to-Call comparisons involve ISO's actuaries' review of data in overlapping years between current and previous reports. The reviews include the most recent year's experience given historical patterns and also include a review for data consistency.

- Reasonability tests identify a relationship of experience over time and a relationship between various statistics such as premium to exposure, loss to premium, loss to claim count and claim count to exposure.

If an anomaly is identified, it may affect one or all companies in a group. A reporting insurer may be comprised of more than one Company and as such is considered to be a group of companies. ISO will notify other ISO LOB units. Claim count reporting is a common anomaly identified for many LOBs, while exposure reporting is one of the most common for commercial property.

ISO maintains logs to document findings and to assist with follow up. Quarterly memos are also sent to disclose anomalies identified. If a Company cannot correct the anomaly on a retrospective basis, the Company will correct it on a prospective basis.

The UNIRA application has numerous Field, Relationship and Reasonability Edits for each of the LOB including the following:

Lines of Business	Number of Edits
All	2600
Commercial Fire and Allied lines	136
General Liability	157
Commercial Auto	204
Business Owners	142
Homeowners	77
Personal Auto	308

The Examiners also performed a walkthrough with ISO's IT resources to review sample edits within the applications. Additionally, the Examiners reviewed Internal Audit testing performed related to data edits within the UNIRA application.

Standard 2: *All data that is collected pursuant to the statistical plan is run through the editing process.*

Standard 3*: Determine that all databases are updated as needed with all accepted Company data.*

Results: Based on the documentation reviewed and the results of the process review and testing, the Examiners note that ISO appears to satisfy the requirements of Standard 2 and Standard 3.

Observations: The Examiners performed a procedural review, including a process walkthrough with ISO key employees, as well as testing to address the scope of Standard 2 and Standard 3. The Examiners reviewed several of the Organization's data quality control processes to ensure the completeness and accuracy of data.

The Examiners note that UNIRA's Submission History File (SHF) is an automated control tool that documents the status of each submission through the entire process, including its first run through the UNIRA edits, any necessary corrections, the status of correction submissions, through to its inclusion into the databases. Valid and invalid files are accumulated as the result of UNIRA Receipt and Acceptance edit processing. These files are processed through the Report System Interface

(RSI) program for the existing report systems and sorted to consolidate the data prior to data base update.

ISO uses a closeout process to determine when new records received during the quarter can be incorporated into the various statistical databases. Each quarter a closeout schedule is followed that provides target due dates for various closeout related functions. There are three separate schedules as follows: personal auto, personal lines other than auto and commercial lines. Staff from the Data Management and Ratemaking disciplines (i.e., the users of the data) review information from the UNIRA Submission History File to determine whether sufficient data has been reported for the quarter and databases can be updated. The actual update of the databases is managed by way of control reports. Input totals (written premiums and exposures, paid and outstanding losses, and record counts from the updated quarter and the Historical Data Base) are balanced to the output control totals of the updated database.

Standard 4: *Determine that statistical data is reconciled to the State Page Exhibit of Premium and Losses, Statutory Page 14, of the NAIC Annual Statement on an annual basis.*

Results: The Examiners performed a procedural review, including a process walkthrough with ISO key employees. The Examiners confirmed that ISO appropriately deploys the control totals of each individual data submission to assure that each submission balances with respect to applicable record counts, written premiums, paid and unpaid losses. The Examiners confirmed that any submission that does not reconcile in any applicable key items is returned for correction to the reporting insurer.

The walkthrough also included an illustrative example regarding ISO's Annual Statement reconciliation process in which ISO requires that insurers reconcile or reasonably explain differences between reported statistical data and Annual Statement State Page amounts.

Based on this information documented by the Examiners, no additional work was deemed necessary regarding this Standard.

Standard 5: *Determine that all calculations associated with the database have been accurately applied.*

Results: The Examiners reviewed documentation and related information and conducted a process review and performed testing. The Examiners note ISO appears to satisfy the requirements of Standard 5.

Observations: A procedural review, including a process walkthrough with ISO key employees, was performed to address this standard. The Examiners obtained and reviewed the Statistical Plans and Statistical Compilation processes and procedures and noted that after the Organization has processed submitted data through the editing systems, other calculations are performed to decide whether further corrective action may be necessary.

The Examiners note that ISO performs specific database calculations based upon the reported data as follows:

- *Aggregation* - Several databases have some level of aggregation. For some databases, the level of aggregation is limited to summarization over all non-amount fields to reduce the size of the database. For other databases, the aggregation process summarizes the data to a report year level (e.g., consolidates loss records related to a single occurrence).

- Calculated amounts - For example, some databases (e.g., commercial auto and liability other than auto) have quarterly earned amounts and others (e.g., personal auto, homeowners, and business owners) have the calculated fields needed to earn data when a report is generated (e.g., earned year and quarter (month), number of quarters (months) earned). Other calculated fields may include risk counts, exposure adjusted for policy term, and car-months (exposure) for personal auto.

- Mappings - Class grouping, rating territory, and other indicators are assigned from tables onto the database.

The database systems were developed in a strict environment that requires testing by both the development area and the business area. The various database calculations were tested (using specially-designed test data) and verified when originally implemented. Then, whenever a change is made to a calculation that change is tested using specially-designed test data and verified. For all changes, including those made to other parts of the database process, the calculations are tested and verified via regression testing; that is, tested to ensure that the part of the system not affected by the system change produces the same results before and after the change is implemented. The database load programs are run and the control reports are checked by staff to ensure that data is passed through the system correctly. In addition, business analysts prepare and review control reports for consistency across quarters.

A more detailed review of database calculations occurs when business analysts prepare reports from the databases. These are reviewed for reasonableness and completeness. If an anomaly is identified, the analyst traces the anomaly through the report system to the database and back to the data reported by companies, which ensures that the anomaly is data driven and not due to a flaw in the calculation process. The investigation deconstructs the calculations and is a backward check at a very detailed level of the calculations.

> ***Standard 6: Where applicable, the statistical agent employs use of data completeness tests as outlined in the NAIC Statistical Handbook of Data Available to Insurance Regulators.***

Results: Based on the documentation reviewed and the results of the process review and testing, the Examiners note that ISO appears to satisfy the requirements of Standard 6.

Observations: The Examiners performed a procedural review, including a process walkthrough with ISO key employees, as well as testing to address the scope of Standard 6. The Examiners reviewed several of the Organization's data quality control processes to ensure the completeness and accuracy of data.

Following the reasonability checks, ISO prepares aggregate statistical compilations and then a call-to-call check with the prior year's compilation is performed. Any significant changes in overlapping years, or unexpected differences in latest (new) year compared to earlier years, are investigated and explained before the compilation is released. Finally, the referenced calculations are segregated into two (2) categories; 1 - Balancing and 2 - Error Tolerance. Calculations are performed separately on each module. The Examiners note for reference that ISO defines a module as one of the major subdivisions of insurance or lines of business. If a module fails either the balancing or error tolerance test, it is rejected and receives the status "Resubmission Required".

ISO's system compares the dollar amount and the number of detail records reported for a particular module with the dollar amount and record count reported on the Submission Control Record for the module. The Examiners confirmed with ISO that if either the dollar amounts or record counts are out of balance by 1% or more, the system rejects the module. ISO's systems assign each detail record to a module and calculate the percentage of the total dollar amount and record count containing errors. Each Plan and level of reporting has a maximum acceptable error percentage (such as the 1% error rate noted above), which if reached or exceeded will result in the system rejecting the module.

The Examiners performed walkthroughs of each of the above processes, which included the review of sample calculations, for each of the LOB in scope for the exam.

V. CORRESPONDENCE WITH INSURERS AND STATE REGULATORS

The purpose of this section of the Examination is for the Examiners to review and confirm whether ISO promptly notifies the statistical reporting insurers (and regulators, as requested or required) when a problem with or question about the data is found, and then follows up with the statistical reporting insurer whose data is problematic, if the statistical reporting insurer does not respond within the appropriate time frame.

> **Standard 1**: *The statistical agent keeps track of companies that fail to meet deadlines.*

And

> **Standard 2**: *The statistical agent has established procedures for notifying companies (and regulators, as requested or required) of material errors and for correcting those errors.*

And

> **Standard 3**: *The statistical agent maintains a follow-up procedure with companies that have reporting errors or questions.*

Results: The Examiners reviewed documentation and related information and conducted a process review and performed testing. The Examiners note that ISO appears to satisfy the requirements for Standard 1, Standard 2 and Standard 3.

Observations: A procedural review and detailed testing was performed to address the above referenced Standards. The Examiners reviewed ISO's procedures regarding the tracking and reporting of data submissions for those statistical reporting insurers that fail to meet deadlines. Also, a review of the annual statistical reporting procedural manual ("manual") that is sent to statistical reporting insurers was performed.

The manual includes information with regards to how statistical reporting insurers are to report data and correct reporting errors. Additionally, the manual explains how statistical reporting insurers are to resubmit data, and provides information regarding penalties for reporting with errors and/ or untimely submissions. In this regard, the Examiners confirmed that ISO prepares weekly reports that identify any statistical reporting insurers that are delinquent in reporting and/or have reporting errors. ISO tracks and follows up with these statistical reporting insurers for 18 quarters.

Based on the Examiner's review of these procedures, it was noted that the Organization has controls and procedures for determining its statistical reporting insurers reporting status. In addition, ISO has processes and procedures established to communicate with delinquent statistical reporting insurers.

In addition to the above review, the Examiners used ACL to select and test a sample of 15 statistical reporting insurer delinquencies with at least one partial submission not reported, and 15 from other

types of data errors from the combined lines of business for the statistical reporting insurer. (See Appendix E)

Correspondence for each sample was tested with regards to certain attributes including the following:

- The initial due date of the request

- The dates of first follow up with Company

- The timeliness of original notification

- Additional follow-up notifications

- Monitoring of the issue(s) through completion (Company corrected errors or submitted past due reports).

- Any required notifications to State Insurance Departments

- Assessments of charges in compliance with the ISO Incentive Assessment Program

---

Standard 4: *Review any additional data quality programs maintained by the statistical agent pertaining to data collected pursuant to the statistical plan.*

Results: The Examiners reviewed documentation and related information and conducted a process review and performed testing. The Examiners note that ISO appears to satisfy the requirements of Standard 4.

Observations: The Examiners performed a procedural review, including a process walkthrough with ISO key employees, as well as testing to address the scope of Standard 4. The Examiners reviewed several of the Organization's data quality control processes to ensure the completeness and accuracy of data. These processes included the following:

Submission Analysis Report ("SAR") – The SAR is returned to each statistical reporting insurer and includes a cover letter, submission summary, module summary and state summary reports, and also includes error listings. The report displays the accuracy and validity of their data. The Examiners reviewed a sample of SARs during the review.

Submission Summary Report ("SSR") – The SSR is organized by LOB. It displays a pending error record residing in file from UNIRA. The SSR includes details regarding the status of data edits, which must be addressed by the reporting insurer prior to resubmitting the data if applicable.

In addition ISO has the following initiatives in place to ensure on-going data quality:

- *ISO's Incentive Assessment Program (IAP) encourages timely, accurate and complete statistical reporting through the use of acceptability and compliance charges, resource allocation charges and special submission processing fees for data submissions.*

- *ISO has a Performance Evaluation Report (commonly called the Report Card Program), which evaluates the timeliness and quality of submissions each year, that is sent to each Insurer's Data Quality Officer.*

- *ISO conducts Statistical Reporting Training Seminars on an annual basis for insurers. Seminar attendees are given detailed supporting material.*

- *Custom training is also available on an individual insurer basis. One-on-one support for individual insurer inquiries is provided on an ongoing basis in support of the entire statistical reporting process.*

> **Standard 5: With each standard premium and loss report to the states, the advisory organization provides a listing of companies whose data is included in the compilations and a historical report listing insurers whose data for the state was excluded, as set forth in Section 2.4 of the NAIC Statistical Handbook of Data Available to Insurance Regulators.**

Results: The Examiner reviewed documentation and related information and performed a process review. The Examiners note that ISO appears to satisfy the requirements of this request.

Observations: The Examiners incorporated the review and testing for this standard concurrent with the review of the (10) loss cost filings conducted under the Operations and Management section, Standard 2, which was done with the Lead State's approval of the Examiners workplans and to assist with the overall efficiency of the Examination.

In so doing the Examiners confirmed that the annual statistical submissions to the states included a listing of statistical reporting insurers whose data is included in the compilations and a historical report listing of insurers whose data for the state was excluded, as set forth in Section 2.4 of the NAIC Statistical Handbook of Data Available.

VI. REPORTS, REPORT SYSTEMS AND OTHER DATA REQUESTS

The Reports, Report Systems and Other Data Requests aspect of the Examination focused on the Examiners review of ISO's reports and other statistical compilations prepared for state regulators,

as well as confirming the Organization's internal procedures for preparing reports and responding to data requests, including the timeliness and quality of the response.

Standard 1: *All calculations used to develop the database have been performed accurately.*

Results: The Examiners reviewed documentation and related information and conducted a process review and performed testing. The Examiners note that ISO appears to satisfy the requirements of Standard 1.

Observations: The Examiners performed a procedural review, including a process walkthrough with ISO key employees, to address Standard 1, which included obtaining and reviewing ISO's Statistical Plans and Statistical Compilation processes and procedures. Through this review, the Examiners confirmed that the Organization processes submitted data through their editing systems and other calculations are performed to decide whether further corrective action is necessary.

Standard 2: *The statistical agent has accurately extracted the appropriate information from the statistical database.*

Results: The Examiners reviewed documentation and related information and conducted a process review and performed testing. The Examiners note that ISO appears to satisfy the requirements of Standard 2.

Observations: The Examiners performed a procedural review, including a process walkthrough with ISO key employees, as well as testing to address the scope of Standard 2. The Examiners reviewed several of the Organization's data quality control processes to ensure the completeness and accuracy of data.

The review and testing performed by the Examiners under the Review of Statistical Plans Section, Additional Area of Review 1 also pertains to this Standard. Please refer to the information starting on page 12; see this section for testing results.

The Examiners also noted that ISO performs specific reasonability checks for statistical compilations that include the following:

- Missing data and data anomalies at the insurer group level - losses, claim counts, decrease in premiums indicating a reporting insurer delinquency in reporting; premium/loss mismatch; shifting of data between categories; unusual loss severity, frequency, pure premium, loss ratio; and unusually high or low average premium.

- Comparison of the statistical data stored on the mainframe to downloaded Excel files.

- ISO reviews scans for the similar types of anomalies, which it completes at the Company level, such as changes in the current year's data, unusual or unexpected loss development, and shifts in territory and/or policy form. If necessary, additional exclusions are made, and the compilation is reproduced.

Following the reasonability checks, ISO prepares aggregate statistical compilations and then a call-to-call check with the prior year's compilation is performed. Any significant changes in overlapping years, or unexpected differences in latest (new) year compared to earlier years, are investigated and explained before the compilation is released.

To confirm the Examiner understands the above process and procedures, walkthroughs were performed, which included the review of sample reports, for each of the LOBs included in the scope of the Examination.

Standard 3: *Any data extracted from the statistical database has been accurately reviewed with any additional data obtained directly from a Company in preparing a response to a data request.*

Standard 4: *Data collected, in addition to the data collected under the statistical plan, was adequately reviewed for quality and compiled according to applicable statutes, rules and regulations.*

Results: Standards Not Applicable.

Observations: The two Standards were discussed with ISO personnel and the Examiners confirmed that there have been no inquiries made during the Period. The Organization responded as follows:

"Unlike other statistical agents, ISO has very detailed statistical plans and thus we rarely need to issue special calls to our reporting insurers in order to respond to regulatory data requests. We have

checked our records and confirmed that there were no such requests requiring special calls during the exam period, so there is nothing to discuss or demonstrate with respect to your first question."

Based on this information documented by the Examiners, no additional work was deemed necessary regarding Standards 3 and 4.

VII.   RATEMAKING FUNCTIONS

The purpose of this aspect of the Examination was to review ISO's loss cost reports and reporting systems, if any, as well as its internal procedures for preparing related reports and responding to data requests, including the timeliness and quality of the response.

> **Standard 1:** *The advisory organization submits filings and/or submissions to the state within the established time frame.*

Results: The Examiners reviewed documentation and related information and conducted a process review and performed testing. The Examiners note that ISO appears to satisfy the requirements of Standard 1.

Observations: The Examiners note that ISO does not make rates; rather, the Organization prepares advisory prospective loss costs. The Examiners reviewed the Organization's written policies and procedures for the preparation and submission of policy forms and filings and written procedures to effect compliance with applicable state filing and/or approval prior to distribution. The policies and procedures reviewed by the Examiners included the following:

- Filings are made on SERFF or other state-approved filing systems,

- ISO's RCTS is used to record and monitor the status of all inquiries that are made by a DOI analyst that is reviewing the filing and;

- ISO's PSD workflow process focuses on the accuracy of the publication of the policy forms and manuals included in filings, including introduction of new or revised policy forms or manual pages in compliance with the filed material that was approved by the DOI.

The review and testing performed by the Examiners under Operations and Management Standard 3, of the report also pertains to this Standard. Please reference this section starting on page 10 of the Report.

VIII. FORM DEVELOPMENT REVIEW

The purpose of this aspect of the Examination was for the Examiners to review ISO's processes for development, maintenance and filing of forms for insurance programs.

> **Standard 1: *The advisory organization has processes in place to identify and provide subscribers with necessary changes (by virtue of changes in state laws or case law) to advisory forms, rules or loss costs***

Results: The Examiners reviewed documentation and related information and performed testing. The Examiners note that ISO appears to satisfy the requirements of Standard 1.

Observations: Please note for reference that this Standard was reviewed under Section I, Operations and Management Standard 8*; please reference this section starting on page 12 of the Report.*

> **Standard 2: *The advisory organization has quality assurance processes in place to review submissions of forms, rates, loss costs or other submissions prior to filing or submitting to the applicable state.***

Results: The Examiners reviewed documentation and related information and performed testing. The Examiners note that ISO appears to satisfy the requirements of Standard 2.

Observations: *Please note for reference that this Standard was reviewed under Section I, Operations and Management Standard 3; please reference this section starting on page 10 of the Report.*

Appendix A - Loss Cost Filing Samples

Sample	LOB	ST	Description	Filing Designation
LC Filing 01	BP	AK	Business owners	BP-09-RLC09
LC Filing 02	CA	MD	Commercial Auto	CA-09-BRLA1
LC Filing 03	CF	ME	Commercial Property	CF-09-RLA1
LC Filing 04	GL	TN	General Liability	GL-08-IALL1
LC Filing 05	HO	WV	Homeowners	HO-11-RLA1
LC Filing 06	PP	AZ	Personal Auto	PP-09-IRLA1
LC Filing 07	FI	TX	Financial Institutions	FI-09-RLC09
LC Filing 08	FR	OK	Commercial Farm	FR-10-RLA0
LC Filing 09	DP	FL	Dwelling Property	DP-11-RLA1
LC Filing 10	WT	ID	Watercraft	WT-09-RWTLC

Appendix B - Form Filings Samples

Sample	LOB	ST	Description	Filing Designation
Forms 01	CL	MT	Commercial Property	CL-09-OAI1
Forms 02	CL	NH	Commercial Property	CL-10-OCUL1
Forms 03	PP	PA	Personal Auto	PP-09-OUM4
Forms 04	PP	SD	Personal Auto	PP-10-OLSVF
Forms 05	FR	NY	Commercial Farm	FR-07-OTFL1
Forms 06	FR	WI	Commercial Farm	FR-08-OTOAL
Forms 07	MS	UT	Market Segments	MS-07-OSF07
Forms 08	MS	GA	Market Segments	MS-09-OHCFR
Forms 09	BP	VA	Business owners	BP-08-OWEFO
Forms 10	BP	IL	Business owners	BP-09-OFR09
Forms 11	CU	CO	Commercial Umbrella	CU-08-ORU08
Forms 12	CU	IA	Commercial Umbrella	CU-08-OTRCX
Forms 13	CR	ND	Crime	CR-08-OTOAP
Forms 14	CR	VI	Crime	CR-10-OACFO
Forms 15	OP	AR	Capital Assets – Output Policy	OP-07-OEBFO
Forms 16	OP	NJ	Capital Assets – Output Policy	OP-07-OEBFO
Forms 17	HO	KY	Homeowners	HO-10-OFR10
Forms 18	HO	RI	Homeowners	HO-10-OFR10
Forms 19	BM	MO	Boiler and machinery	BM-08-OEBWE
Forms 20	BM	VT	Boiler and machinery	BM-09-OEBFO

Appendix C - Rule Filings Samples

Sample	LOB	ST	Description	Filing Designation
Rules 01	PP	LA	Personal Auto	PP-10-RLSVR
Rules 02	PP	SC	Personal Auto	PP-11-ORU1
Rules 03	CM	MS	Commercial Inland Marine	CM-10-IMHB1
Rules 04	BP	KS	Business owners	BP-11-RWTRU
Rules 05	BP	CA	Business owners	BP-09-OAIE2
Rules 06	RP	OH	Revisions to Financial Experience	RP-10-RLW10
Rules 07	HO	MI	Homeowners	HO-10-RRU10
Rules 08	HO	MN	Homeowners	HO-09-OAP09
Rules 09	MS	CT	Market Segments	MS-10-OASRU
Rules 10	CA	DC	Commercial Auto	CA-11-RCP1

Appendix D - New Laws and Regulations Sample

Sample #	State	Identifier	Date
1	AL	2009-7	09/18/2009
2	DE	HB 7	06/19/2009
3	FL	SB 1196	06/01/2010
4	GA	11-EX-2	01/10/2011
5	HI	Memorandum 2011-1R	06/08/2011
6	IN	HB 1024	05/09/2011
7	MA	Bulletin 2011-014	07/20/2011
8	ME	BULLETIN NO. 371	02/11/2010
9	NC	SB 660	08/07/2009
10	NE	LB 289	05/24/2011
11	NJ	NJDOBI EXHIBIT 6	06/01/2011
12	NM	Bulletin 2011-001	01/14/2011
13	NV	Bulletin 11-014	10/11/2011
14	NY	LB 289	05/24/2011
15	OR	HB 2326	04/09/2009
16	PR	RULING LETTER 2011-133-AP	11/28/2011
17	US - ALL STATES AND TERRITORIES	US DEPT. OF HEALTH & HUMAN SERVICES CENTER FOR MEDICARE & MEDICAID	09/25/2009
18	UT	SB 167	03/24/2009
19	WA	WSR 10-10-058	04/29/2010
20	WY	HB 110	03/02/2011

Appendix E - Insurer Correspondence

SAMPLE	STAT PLAN	MODULE	ACCOUNT DATE	STAT TYPE
DR 01	41	00	12/01/2008	20
DR 02	41	00	12/01/2007	20
DR 03	41	00	09/01/2007	123
DR 04	41	00	09/01/2008	23
DR 05	41	00	06/01/2009	20
DR 06	11	00	09/01/2011	120
DR 07	11	00	12/01/2011	23
DR 08	11	00	09/01/2007	123
DR 09	11	00	03/01/2008	123
DR 10	11	00	09/01/2009	23
DR 11	11	00	03/01/2010	100
DR 12	1	00	12/01/2009	100
DR 13	1	00	09/01/2009	100
DR 14	1	00	12/01/2011	23
DR 15	2	00	03/01/2009	100
DR 16	11	01	12/01/2010	123
DR 17	1	01	06/01/2009	123
DR 18	2	01	09/01/2009	123
DR 19	41	03	09/01/2010	123
DR 20	1	03	09/01/2008	3
DR 21	2	04	03/01/2009	23
DR 22	2	04	09/01/2011	23
DR 23	1	05	12/01/2011	123

SAMPLE	STAT PLAN	MODULE	ACCOUNT DATE	STAT TYPE
DR 24	2	05	12/01/2008	123
DR 25	1	06	12/01/2008	100
DR 26	1	07	03/01/2011	3
DR 27	2	07	12/01/2011	123
DR 28	2	07	09/01/2008	123
DR 29	2	08	09/01/2008	23
DR 30	1	14	09/01/2009	3

Examination Report Submission

The courtesy and cooperation of the officers and employees of the Organization during the examination are acknowledged.

In addition to the undersigned, the following individuals participated in the examination. All phases of the examination were conducted by Risk & Regulatory Consulting, LLC.

Joseph Clark	Quality Control
LeeAnne Creevy	IT Quality Control
Debbie Rosenberg	Actuary
Michael Dubin	Actuary
Jared Rubenstein	Actuary
Stephan Donk	Actuarial Staff
Alan Gutierrez Arana	Information Technology Specialist
Scott Bryson	Information Technology Specialist
Andrew Arnott	Examiner
Sam Binnun	Market Conduct
Judi Miller	Market Conduct Examiner
Marc Springer	Market Conduct Examiner

Respectfully submitted,

Barry L. Wells, CCLA, MCM
Risk and Regulatory Consulting, LLC
Managing Examiner