Abstract

What can Property & Casualty (P&C) carriers do to improve underwriting and optimize their ROI on IT spends? Improving their risk assumption and pricing processes, and leveraging data and analytics for writing Personal Lines insurance can be one way to go. However, a wider prevalence of legacy systems that are slow to deliver accurate and up-to-date information about applicants’ risk profiles, hampers conversions into business. Lack of real-time risk information also results in skewed pricing, affecting overall profitability. Third-party data aggregators, who assimilate risk information from reliable sources, offer a cost-effective, real-time, and business critical solution that can transform the way you write insurance.
Bridging the Gap: IT Must Deliver Growth for P&C

An uncertain economic climate continues to put pressure on IT budgets, especially for P&C carriers. Today, IT is seen as strategic to delivering profitable growth, and getting a higher Return on Investment (ROI) from their current IT spends is a business imperative for P&C carriers.

While IT spends vary, at a more macro level, the outlay is divided between “keep-it-running” expenditure—dedicated towards support and maintenance of existing systems—and “improve-the-business” investments. The latter can yield rich business benefits for carriers if conceptualized and executed correctly.

For example, Personal Lines carriers have made significant investments in making quote and bind functionality available to applicants and agents. Yet, to profitably sell online or through intermediaries, a carrier should be able to pick and choose the risks within its underwriting guidelines without being too restrictive or highly priced. A key component of this ability is access to comprehensive risk information—a major hurdle for most P&C carriers. Insurers, forced to price risks based on inadequate data about their customers, open themselves to greater chances of failure. The emergence of new and reliable sources of information such as data aggregators shows the way for better and more profitable writing.

One of the critical pieces that helps solve the “profitable selling” jigsaw puzzle is real-time integration of the insurer’s Core Policy Administration system with that of the data aggregator’s. Real time integration of the underwriting system and rating engine with that of the third-party data aggregator results in a number of business benefits such as improved risk assumption, accurate pricing, expansion of data for future analytics, and improved conversion of business while selling online. All these lead to a higher ROI on IT spend.

This white paper explores underwriting challenges, benefits of using data aggregator services, opportunities for improving submissions, and the need for Policy Administration System (PAS) integration.

Data Aggregators: Instant Information, Distributed Costs

One of the distinguishing characteristics of the P&C industry is the limited amount of risk information available for insurance products at the time of sale. Measuring and minimizing this uncertainty underlines the need for the industry’s sharp focus on data and analytics.
The data for underwriting requirements in the P&C industry can come from a number of sources, including, but not limited to, insurance companies' transactions, Federal and State courts, Federal and State agencies, primary data collected by surveyors and, in many cases, individual customers. However, one of the most accessible and increasingly reliable sources of data is third-party data aggregators who collect and store information from all the available sources and provide it to carriers at a fraction of the original cost—they do this by distributing costs amongst numerous carriers who subscribe to their data services.

A data aggregator is usually a vendor or a third-party service that assimilates risk-related information. Examples of such data aggregators include Choice Point, Explore Information Services etc. Data aggregators use sophisticated data collection and aggregation techniques enabling them to own credible and homogenous data.

The data is made available to carriers primarily through databases, separate standalone applications and through Web services. This allows insurers to open their policy administration and/or rating systems to directly receive underwriting and risk data in real time and use it for decision-making and accurate risk-pricing.

**Golden Opportunity: Integrate Rating Systems with Data Services**

The cornerstones of real-time quoting and policy issuance capability are a strong set of well-defined business rules, configurable rating capability and real-time availability of external data related to risk(s). Many P&C insurers continue to run their businesses without entirely exploring the potential of risk-related data available with various data aggregators.
For example, a large number of P&C insurers while quoting a homeowner’s risk, use geographical location, credit score, and applicant’s loss history, over and above the personal information provided by the applicant. However, a small number of smart insurers are able to determine and use the actual distance from the coast, the property’s distance from the nearest fire station, proximity of a fire hydrant to the property, and estimated replacement cost for the property before providing a quote to the applicant.

Given the above, P&C insurers should aspire to integrate their rating systems (whether standalone or part of the core policy administration capability) with data services that help their underwriters accurately assess and price the risks undertaken.

**Real-Time Data Services: Trends and Challenges**

As insurers looking to fast-track the policy issuance process and right-price risks explore the possibilities of accessing real-time risk information, roadblocks in data integration challenge them—specifically, integrating their Core Policy Administration system with that of the data aggregator’s. However, the quest is worthwhile because this approach, efficiently leveraged, can lead to smarter insurance processing, save time and resources, and accelerate growth.

Here is an overview of the elements, range of services, and challenges of the integration approach.

**Need for an Agile Services-based Framework:** A real-time integration approach can be challenging to implement because of the need to define a services-based framework. Understanding how modern P&C systems operate can show the way.

These systems support “loosely coupled,” service-oriented architecture that integrates seamlessly with the third-party systems using XML Web services, allowing the underwriting system to access them in real time. Data from these common services is obtained through a service call to the third party service during the underwriting process. These service calls essentially involve an XML request to the service and an XML response from the service.

This approach enables an underwriting system to avoid “tightly coupled,” point-to-point integration of risk data service, which makes it difficult for systems to adapt to changing business rules and requirements. Each modification to the third-party service may require code changes in the underwriting system and vice-versa. Owing to the business imperative of rating/underwriting a policy in real time, these Web services require a high level of availability with little or no downtime, as the risk data provided by the service may be immediately required to complete policy issuance.
Need for an Enterprise Service Bus (ESB): To quickly and seamlessly integrate multiple third-party services with the underwriting and policy issuance systems, the carrier’s Enterprise Architecture framework should create an Enterprise Service Bus (ESB) that moves common third-party services to the ESB. These common services can then be used by multiple underwriting/policy issuance systems supporting different lines of business to obtain risk data through a services-based middleware.

To enable reuse of risk data and optimize underwriting expenses, a logging database must be created to store all date and time stamped service requests and responses with a unique identifier. This logging database provides the ability to reuse previously stored risk data for an existing risk in the underwriting system, subject to a time window.

A 360-degree View of Applicants: Gaining deep visibility into an applicant’s background and life-events with such data integration rationalizes the entire policy issuance process from quote to bind. An assessment for underwriting a Personal Auto insurance thus takes into account the insured’s credit history, vehicle usage, driving records and vehicle characteristics. Similarly, a homeowner’s insurance risk assesses the property’s loss history and location-based fire and hurricane peril scores. Given the availability of good quality underwriting data, carriers can now focus on how to integrate real-time data with multiple underwriting and policy issuance systems to enhance the way these systems issue policies.
What Data Aggregators Can Do

There are a large number of data vendors in the market today that not only provide up-to-date risk data, but also integration options. Consider the range of services, for example, in the selection of data sources for Personal and Commercial Lines carriers below.

**Line of Business: Auto**

<table>
<thead>
<tr>
<th>Service Name</th>
<th>Purpose</th>
<th>Vendor</th>
</tr>
</thead>
<tbody>
<tr>
<td>C.L.U.E.® Auto</td>
<td>Vehicle loss and driver loss history</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>Claims Discovery™</td>
<td>Claimant’s prior auto or property claim history</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>Driver Discovery</td>
<td>Helps identify undisclosed additional drivers in your household</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>Motor Vehicle Records</td>
<td>Provides driver histories in all 50 states</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>Current Carrier</td>
<td>Informs about current coverage and coverage lapses</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>Risk Alert</td>
<td>Early notification of youthful operators</td>
<td>Explore</td>
</tr>
<tr>
<td>E.A.R.S.</td>
<td>Continuous monitoring of auto insured(s) for moving violation activity</td>
<td>Explore</td>
</tr>
</tbody>
</table>

**Line of Business: Home**

<table>
<thead>
<tr>
<th>Service Name</th>
<th>Purpose</th>
<th>Vendor</th>
</tr>
</thead>
<tbody>
<tr>
<td>C.L.U.E.® Property</td>
<td>Provides property loss history</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>APLUS</td>
<td>Provides property loss history</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>Current Carrier</td>
<td>Informs about current coverage and coverage lapses</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>FireSafe® – Fire Protection Information</td>
<td>Fire peril rating scores</td>
<td>Explore</td>
</tr>
<tr>
<td>Property Point– Property Risk Mitigation Tool</td>
<td>Identifies high risk properties</td>
<td>Explore</td>
</tr>
<tr>
<td>Property Point Hail – Hail Risk Information</td>
<td>Provides a property hail risk profile</td>
<td>Explore</td>
</tr>
<tr>
<td>Property Location Insight™ (PLI)</td>
<td>Predictive modeling based scores reflect probability of loss attributable to fire, theft, liability, weather, water and other non-cat events</td>
<td>Explore</td>
</tr>
</tbody>
</table>
ability to price risk even with limited inputs from the applicant. This gives them a competitive edge against other carriers who rely on time-consuming Web forms or third-party sites to obtain vital underwriting information. In the battle to convert a quote into a policy, carriers with a deeper quote process will survive owing to their instant response and result (in the form of final premium to be paid) capability vis-à-vis other carriers who lack depth in the quote process and often request the applicant to revisit their quote at a later point in time to know the underwriting decision or final premium.

Compelling Value Proposition: Every time a conversion fails, the related costs are unrecoverable for an insurance producer. Many a times, the quote does not convert into policy because the carrier could not respond in time. Thus, timely response is of the essence for producers. A carrier promising timely and accurate response definitely offers a high value proposition for the producer.

Data Accessibility for Analytics, Reporting and Compliance: Beyond immediate results for customers, real time data can help carriers develop long term growth strategies and ensure regulatory compliance to accurately and systematically track information—a must for regulatory reporting. Carriers can also look at historical data and catch trends early to guide future decisions.

Cost-Efficiency: An automated underwriting system with automatic responses eliminates the need for manual intervention and lowers operational cost. Moreover, the subscription services of third-party data aggregators are spread across multiple carriers benefiting all.

### Upping Your Insurance Game

At the heart of the insurance business is the customer whether it is an individual or an organization. On one hand, rising economic uncertainties are multiplying risks at all levels, and on the other, opening up new risk markets. In an increasingly volatile and customer-centric age, smart P&C carriers will do well to invest in SOA that enables real-time data integration. This will help minimize risk, drive agility, faster time-to-market, and deliver higher ROI and customer satisfaction. Data aggregators can offer multiple benefits for P&C carriers:

**Wider Scope of the Quote Process:** Real-time underwriting data capability arms carriers with the

### Commercial Lines

<table>
<thead>
<tr>
<th>Service Name</th>
<th>Purpose</th>
<th>Vendor</th>
</tr>
</thead>
<tbody>
<tr>
<td>C.L.U.E.® Commercial</td>
<td>Provides claim information for all major commercial lines</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>Motor Vehicle Records</td>
<td>Provides driver history consistently in all 50 states</td>
<td>LexisNexis</td>
</tr>
<tr>
<td>National Credit File</td>
<td>Provides tri-bureau reports through a common inquiry</td>
<td>LexisNexis</td>
</tr>
</tbody>
</table>
The NIIT Technologies Thought Board:
Flipping the Pricing and Underwriting Odds in Your Favor

What Challenges do P&C Carriers Face in a Changing Industry Landscape?

- Poor ROI on IT spends
- Legacy systems with slow turnaround time for the quote and bind process
- Limited sources of external data related to risks and lack of real-time information
- Inaccurate risk pricing

What are the Sources of Deriving Risk Information for Insurers?

- Insurance companies’ transactions
- Federal and State courts
- Federal and State agencies
- Primary data collected by surveyors
- Individual customers

What are Data Aggregators and How Do They Function?

- A vendor or a third-party data service that assimilates risk-related information
- Data aggregators collect and store information from all available sources
- They provide data to carriers in real time, at affordable prices by distributing costs amongst various carriers who subscribe to their data services

What should P&C Carriers do to Avail Data Aggregators for Underwriting?

- Integrate their core policy administration system with that of the data aggregator’s
- Implement a “loosely coupled” Service-oriented Architecture that integrates seamlessly with third-party systems using XML Web services
- Create an Enterprise Service Bus (ESB) so common services can be used by multiple underwriting/policy issuance systems of different LOBs

Why is Real-Time Data Integration a Business Imperative for P & C Carriers?

- Widens the scope of the quote process allowing underwriters to price risk even with limited inputs
- Helps carriers provide instant and accurate quotes to customers
- Minimizes risk exposure
- Saves time, resources, and accelerates growth with faster business conversions
- Makes the insurer more customer-centric and competitive with faster policy processing
- Lowers operational cost
- Helps develop long-term growth strategies and ensure regulatory compliance
Toward New-Gen Insurance

In spite of technological advancements, Personal Lines carriers even in commoditized lines of business (Personal Auto and Homeowners) get limited amount of information about the risks at the time of insurance policy sale. They face the challenge of running legacy policy administration systems to meet increasing customer demand for making the quote and binding process available online. They can overcome this challenge by investing in integration of their underwriting and rating systems with those of a data aggregator.

To conclude, underwriting risk data aggregators fit well within a customer-centric model, allowing applicants or producers to obtain real time Personal Lines quotes, compare them with different carriers/brokers and coverage options, and finally, select the right insurance policy. In addition, apart from offering technical frameworks that can integrate seamlessly with diverse policy administration systems, the quality and quantity of sources giving vital underwriting information about a prospective insured and their risk has gone up. The recommended path for carriers is to select one underwriting data aggregation service at a time and partner with an experienced IT vendor to evaluate and implement the benefits of such integration.

About the Author

Rajiv Gehani has deep experience in transformation initiatives aimed at improving customer experience, business agility and operational efficiency. With expertise in the area of Personal Lines rating algorithms, complex price match programs for rollover, integration of PAS with North American industry service databases (MVR/CLUE, Equifax, E.A.R.S and ISO: A-PLUS, PPC), he has led numerous end-to-end implementation(s) of functional modules in business systems in Business-IT liaison roles in the US, Europe and Asia Pacific. He has also been conferred with CPCU designation by AICPCU. His latest muse is next generation applications relevant to niche areas of P&C Insurance.
NIIT Technologies is a leading global IT solutions organization, differentiated on the strength of domain expertise; it services clients in travel and transportation, banking and financial services, insurance, manufacturing, and media verticals. Leading with its service vision “New Ideas, More Value,” NIIT Technologies is committed to delivering new ideas combined with operational excellence to provide exceptional value to its clients. The Company is focused on helping businesses design sustainable, optimizable and winning digital operating models, enabling them to become agile, scalable, and flexible.

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