



Case Study

On

Detecting and Reducing Cost of Fraud Rings through the use of Insurance Analytics



Abstract

The American Insurance Industry estimates that 15 to 20 cents of every dollar paid in premiums goes towards paying fraudulent claims, totaling for more than \$1.3 billion each year. In fact, nearly \$80 billion in fraudulent claims are made annually only in

the United States. Within the insurance industry and across business lines, fraud can span from devious individual claims to organized multi-million dollar rings that involve staged auto accidents and participating medical equipment providers and clinics.

Challenges Faced by small to medium auto insurance companies



- A Medium scale Insurance organization for the past two years has been experiencing revenue loss due to Fraudsters filing dubious claims.
- The insurer contacted Inniti Alliance with the problem to reduce its multi-million dollar expenditures on auto insurance claims, which is its largest annual expense.

- Presently, the company avoids paying out only about 0.33% of the predicted 10% of fraudulent claims.
- The insurer asked us to find a more effective way to prioritize questionable claims (i.e. the individual claims with the most financial exposure) and understand the associations across all entities within claims to detect fraud rings.

Solutions Provided by Inniti Alliance



Claims Data Ingested by Inniti Alliance in 3 months

Inniti Alliance worked with the insurer for 12 weeks to find hidden associations and detect fraud rings. Our Insurance Analytics Platform ingested data from three states within the last two years, including auto injury claims (structured data) and MSR notes (unstructured data). Composite data decks were created for

each claim and Predictive Analysis was used to provide the insurer insight into data they had not previously seen. Inniti's analytics platform 'learns' from legacy claims and new claims, which allowed our team to see patterns and similarities of providers across all claims and easily identify fraud rings.

Results of Inniti's Analytical Solutions



Over a 12-week period, Inniti through the use of Insurance Analytics examined 50,000 claims (structured data) from one year in one state, and found three potential fraud rings, deserving further investigation, in less than a month. Under further analysis, Inniti detected that

these three rings were part of one larger ring that included 35 claims and 40 participants from various provider entities. From these 35 claims, the insurer paid out approximately \$400k to questionable providers of the \$700k that was billed.

How did Inniti Latch the Fraudsters?



Inniti's Analytical solution which comprises of Predictive, Prescriptive and Descriptive Analytics enabled the insurer to have an 'all-source intelligence' view across claims and all providers that are involved in one questionable claim. We worked collaboratively with the insurer's to reveal the questionable providers in that claim, what they billed, what the insurer paid out on the claim, and the necessary supporting evidence to further investigate such questionable claims, bringing about positive results for the company.

The numbers game



Findings from Inniti Alliance Fraud loss & Detection incurred by Insurance companies (overall)

- Nearly 12% of all auto claims filed are fraudulent.
- Questionable Auto claims in the United States have risen from 27% in 2015 to 30% in 2016-17.
- The average American Household paid \$200-\$300 additional insurance premiums for the past 2 years to cover the fraud loss.
- Of the \$80 billion appropriated by Government in all insurance sectors, \$6 billion is estimation accounted for Insurance fraud across all lines.

Total Savings :

- As the trend of Insurance Analytics grasped the industry, saving ratio of many companies did produce some positive numbers:
- Using Analytics (Predictive, Prescriptive and Descriptive) the aggregate saving of all insurers as of 2016-17 stands at \$6-\$10 million.
- A single implementation of Predictive Analytics for Fraud Detection improved overall savings up to 10% to 17 %.

About Inniti Alliance



Inniti Alliance combines the power of computing with Business Intelligence to make meaningful use of data and help anticipate future trends, events and outcomes. Our insurance processing platform adapts in real time, ingesting data from disparate sources and automatically finding new patterns, similarities, anomalies or sequences, revealing previously undetected knowledge.

Inniti's Analytical services enhance the speed and volumes at which data can be processed but also critically improve the accuracy of results. Businesses using our business solutions can anticipate market trends, optimize processes, mitigate risk, personalize customer experiences and find new revenue streams. For more information, please visit www.innitialliance.com.