



ADVANCED ANALYTICS

CASE STUDY  
R SYSTEMS ANALYTICS

A Leading Internet Service Provider  
Improved FCR Rate by Up to 5% with  
R Systems Analytics

[www.rsystems.com](http://www.rsystems.com)

# Client Overview

The client is one of the largest UK-based Internet Service Providers (ISPs). Observing frequent erratic spikes in the call volume and after having conducted several unsuccessful quality initiatives, the client wanted to diagnose the root causes of this repeat calls. The quality initiatives helped the client to evaluate the effectiveness of FCR improvement campaign but still could not reveal the key drivers of repeat calls by customers. To improve the overall FCR performance the client was seeking some deeper and actionable insights.

## Problem Statement

FCR is directly connected with customer satisfaction and loyalty. Its poor performance can lead to a significant rise in customer dissatisfaction and churn rate. Customers always want their issue to be resolved the first time they connect. When customers' issues are not resolved on the first contact, it leads to repeat contacts and thus high call volume and cost per call in a contact center.

- Difficulty in measuring FCR accurately due to the inability to collect data from all relevant data sources and correlate diverse sets of data
- The client was experiencing a higher customer churn rate due to increase in dissatisfied customers

## Primary Client Objective

- The client wanted to have a methodology that could diagnose the root causes of repeat calls and help monitor the FCR performance
- The client wanted a solution that could predict potential repeat calls along with its underlying issues much in advance so that proactive measures can be taken to control the erratic spikes in the call volume

## Our Solution: Analytics GYM®

### ► Data Science

Our Analytics Consulting Engagement

### The STEPS:

- a. Business Understanding/ Use
- b. Data Understanding/ Use
- c. Analytics and Assessment
- d. Implementation

# Analytics GYM®

## The Approach

R Systems deployed its integrated interaction analytics platform along with a team of data scientists and domain experts to help the client detect the root causes of poor FCR performance and to reduce the repeat call volume.

Using the platform, our data scientists analyzed diverse sets of data from various sources like customer interactions, CDR, CRM and IVR to detect the key reasons of repeat contacts. The key objective of our analytical study was to identify call types and processes that were driving high repeat call volume.

Our solution broadly comprised the following stages:

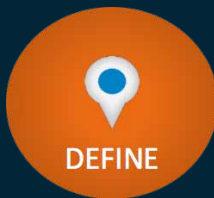
- A call driver analysis was performed to categorize call types that were leading to repeat calls and erratic spikes in the call volume
- Further analysis was carried out to spot frequently used words and phrases in customer conversations and the reasons of repeat calls by customers, including process issues
- Combining speech data with other data elements like agent/ customer demography, CRM and IVR, our team was able to accurately measure FCR and predict potential repeat calls
- The repeat contact details were further correlated with agents' efforts to outline FCR challenges at all levels and discover ways to address them



Leveraging predictive modelling techniques, the team precisely predicted the repeat calls near real-time and prescribed effective remedies. With our failure mode effect analysis reports and recommendations related to processes and technological changes, as well as targeted training for agents, we enabled this ISP, significantly drop down the overall repeat call volume.

## Methodology Adopted

Our methodology involved a five-step DMAIC process that was performed using our analytics platform. Figure 2 below shows and discusses these five steps.



- Project Charter & Plan
- Project CTQs:
  - 2 & 4 repeat contacts within 24 hours
  - 3, 5 & 7 repeat contacts within 7 days
  - Resolution Effectiveness
  - Identify the success criteria for good FCR



- Listening and data collection
- Identifying and building sub-queries and use them as measuring stick for FCR
- Using FCR reports to derive RCA trends



- Root Cause Analysis
- Resolution Effectiveness
- Reasons for Repeat Contacts
  - Same Issue
  - Different Issue
  - Primary reason
  - Secondary reason
- Percentage of deflectable Call volume



- Recommend specific reports for measurement and continual improvement

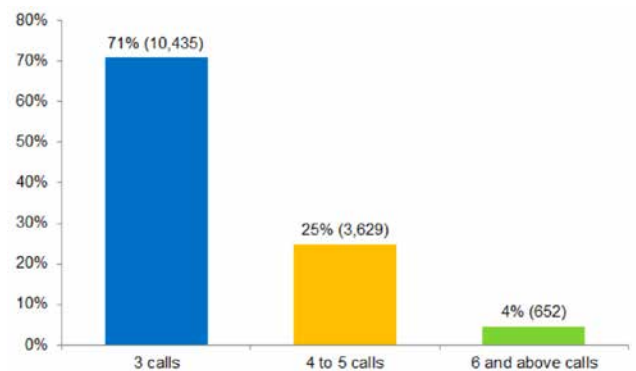
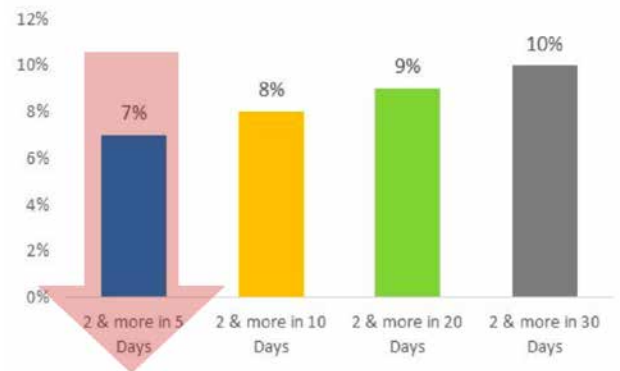


- Utilize reports to measure improvement
- Re-analyze data for additional improvements

## Key Observations

Using the speech analytics capabilities we were able to generate a report which depicted the number of repeat calls made by customer in 5, 10, 20 and 30 days period.

- Total 321,104 customers called between the 1st and 31st of May
- 15,477 customers made 2 or more calls in 5 days
- Majority of the customers (71%) made 3 calls in 5 days. therefore, a deep dive analysis was conducted on customers who made 3 calls in 5 days
- There was a statistically significant correlation between the call categories and calls made by customers (3 calls in 5 days)



## Recommendations

Some of the key recommendations given by our analytics team includes:

- Inform customers through text messages once the order is complete
- Route customers to order management department with open orders directly through the IVR
- Educate customers on IVR about the turnaround time of order completion to minimize repeat calls
- By implementing the changes recommended by our analytics team, the client realized up to a 5% improvement in their FCR rate

## Business Outcomes

- After implementing the changes recommended by R Systems' analytics team, the client realized up to a 5% improvement in the FCR rate and overall cost savings of \$4.9M
- Besides interpreting the observations and findings, an end-to-end action plan was shared with the client that outlined the potential ROI and benefits of implementing the recommended changes