Jasper Reporting API

This can be integrated with any Java application

Client need

Client wanted to build a Jasper reporting API which could be integrated with any Java application. Client wanted the Jasper report section to consist of 10 sub reports and each sub reports to be designed in such a way that they act both as individual reports as well as can be integrated with any Jasper main report.

Our Solution

We got the API designed and delivered to client as per the requirement. The way we went about it is explained below:

This API generates report as per the provided Jasper report template which includes Multi-axis Time-Series Chart, Multi-axis Bar Chart and Detail Reports etc.

All the charts are customized with **JFreeChart** supported Java classes in order to achieve pixel perfect design. All the styles including font, color, size etc are 100 % dynamic. This API comes with two already defined stylesheets but infinite number of stylesheets can be added and used to generate report.

The API is completely **multilingual** and can generate report in lots of languages. The API was tested with **English, French, German, Spanish and Japanese languages**. Internationalization is done using **Resourse Bundle**. Locale for a particular report is passed as report configuration settings along with ReportOutputFormat (ie PDF / HTML) and ReportOutputPath .

This API uses **JRDatasourse** as the data source for generating reports dynamically. **JRDatasorces** are coded to fetch data from CSV files and CSV file paths are passed as report configuration settings.

In the Jasper Report section all the Chart labels, Column Headers, Header Logo, and Footer Logo etc are dynamic and passed as report configuration settings.

In the Java side of the API all the required configuration settings are validated on runtime to check whether the values passed by the user are proper to generate report or not. In case the validation fails, it logs a proper message with the cause.

About our Client

Client Global Online Advertising Farm**|** **Location** Israel | **Industry** Online Advertising
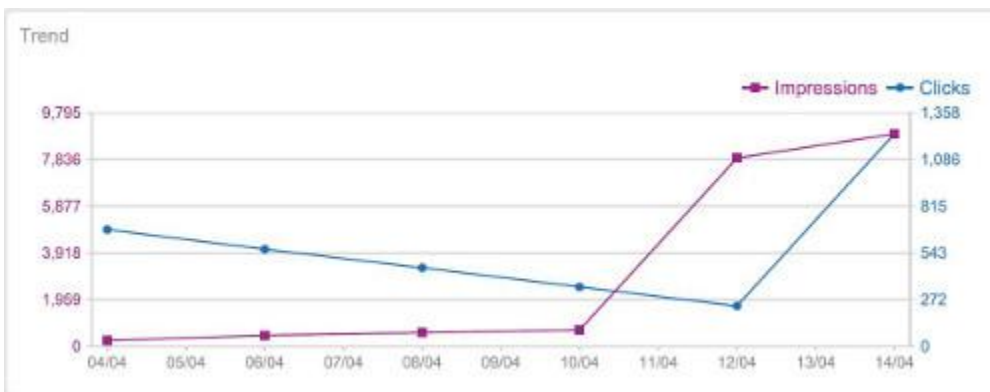
Technologies

Java, Jasper Report 4.5.0, IReport 4.5.0

Report screen shots

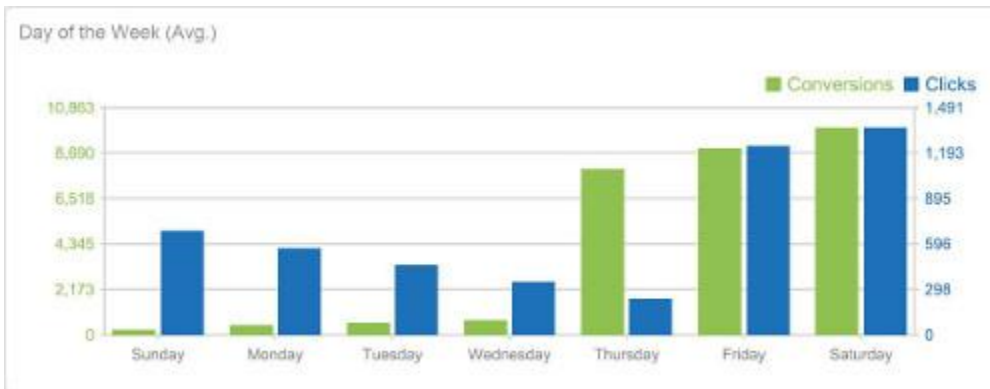Some of the report pages are as shown below:

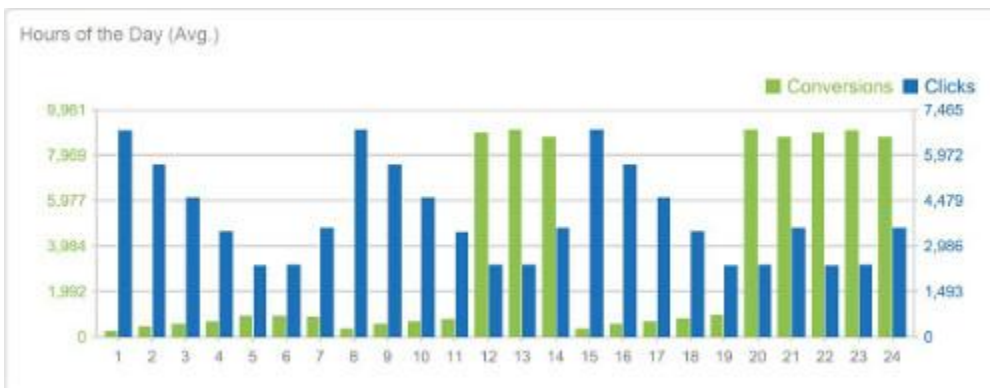Campaign Metrics report

Trend Analysis Report

mindfiresolutions
BURN IGNORANCE

Usage Metrics Report

Usage Metrics					
	CTR	Avg. Position	Time on Site (Min)	Page Views	Avg. P/V
Totals	0.43%	3.61	0.23%	25,678%	4.31%
Previous Period	-0.67% 0.87%	0.23% 3.62	15.1% 0.12%	5.02% 21,291%	25.9% 2.87%

Daily conversion statistics

Hourly conversion statistics

Future relationship

The client was pleased with Mindfire's effort and reckoned that they were happy to have discovered a professional offshore IT unit. We shall continue to be the service provider for the next versions of the client's product. They have not only allocated the support and maintenance work of the current system to Mindfire but have also chosen us for future customization work.