Chapter 7

Data Reviewing and Sharing

Utilizing Your Data to the Fullest

Abstract

Google Analytics does an excellent job in collecting and reporting data, but how can libraries get the necessary data out of the tool and into the hands of the people that need it? Chapter 7 of Library Technology Reports *(vol. 49, no. 4) "Maximizing Google Analytics: Six High-Impact Practices" explores Google Analytics data exporting options and provides reasons why libraries should be interested in regularly exporting/sharing their data.*

Implementing and configuring Google Analytics on a website is the easiest part of the web analytics process—most of your time will be spent analyzing the data it collects. However, many libraries suffer from the set-it-and-forget-it mentality, where they implement Google Analytics and then seldom act on the data it provides. This is such a waste since Google Analytics provides several options for libraries to easily review and share essential data. This chapter focuses on the Google Analytics features designed to help you manage your data and shares some best practices of the data-reviewing and -sharing process.

Reviewing Your Google Analytics Reports

A commonly asked question: How often should I review my data reports? Our answer: Depends on what you are looking at and why you need it. Do not look at data for the sake of reviewing data. Google Analytics provides so much data, and not all of it is going to be useful every time. Libraries need to focus on the data that has the most impact for their website. Typically, we recommend focusing on the data prioritized in the library's web analytics strategy that outlines the library's website goals and connects those goals to website use data to measure them. However, there are a few additional reports that are also useful to monitor regularly. Using Google Analytics's Scheduled Email and Custom Alerts features will help you efficiently integrate data reviewing into your already busy schedule.

Creating a Scheduled Email

A majority of Google Analytics reports include an option to e-mail that report. If you have not used this feature, it is located next to Advanced Segments and Export options at the top of the report. The Scheduled Email option creates a scheduled e-mail that will automatically send out an e-mail of the specific report on a daily, weekly, monthly, or quarterly schedule, which is a nice reminder that it is time to review that report. The Scheduled Email feature can be set to automatically send the report for up to a year, and the data is sent as a PDF, CSV, TSV, or a Google Spreadsheet. Note that the e-mail will include only data that you directly see in the report that you e-mailed. For example, the Landing Pages report defaults to showing only the top ten landing pages. If you want to set up a Scheduled Email that contains the top twenty landing pages, you must change the report to show those twenty landing pages and then set up the Scheduled Email feature. You can view all the Scheduled Emails in the Admin section for that profile. Both profile administrators and users can extend or delete any of the Scheduled Emails as desired.

Creating a Custom Alert

Custom Alerts are extremely useful because they instantly notify you if your data meets the selected

criteria. For libraries that do not have time to check their Google Analytics every day, this feature will alert you when you need to look at the data. The Custom Alert feature is under the profile's Admin settings, and both profile administrators and users can create their own Custom Alerts. Simply create a new alert, name that alert, set the period of time for which that alert should analyze the data, and then set conditions that will trigger the alert. Alerts can be sent via SMS to a mobile device or e-mail. You should be comfortable in selecting the exact metrics to trigger the alert so that the alert is accurate and merits your attention. Below, we provide Custom Alert examples for some of the reports that we suggest should be regularly monitored.

Reports to Regularly Monitor

Useful Data for Usability

Using Google Analytics's Custom Alerts, you can easily monitor potential errors on a website. Great indicators that there could be something wrong with your website are a sudden drop in visits or page views. A large spike in bounces and views to your 404 Error web page should also be causes for concern. Naturally, you would want to be alerted quickly to these issues, so configure the Custom Alert to notify you daily rather than waiting a week or month to act on the issue.

To set up a Custom Alert, you need to decide which metric you will monitor and set a benchmark number that will generate the alert. Interested in monitoring an increase in a bounce rate? Create a new alert, set the period to Day, and then select how you want to be notified. Under the alert conditions, you have the option to look at all traffic (which would be for usage of the entire website) or a specific section of the website or type of visitor. Next, select the bounce rate metric for the alert and then % increases by more than for the condition because this allows you to compare the day's bounce rate to the bounce rate the site received for that day one week or a year ago (instant perfect benchmark!). Enter the value that will be the percentage: for a bounce rate, a 10 percent increase can be alarming, but feel free to enter whatever value is reasonable for your library.

Interested in monitoring a sudden increase or decrease in page views of a certain web page? Figure 7.1 displays the configurations for tracking a sudden increase to a 404 Error web page, which can create poor user experiences for your website visitors. While the alert can notify you of a problem, you will have to dig deeper to understand what is triggering the problem. For this example, you can see how visitors are finding the 404 Error page using Google Analytics Traffic Sources data or Navigation Summary report. It could simply be a dead link that needs to be fixed.

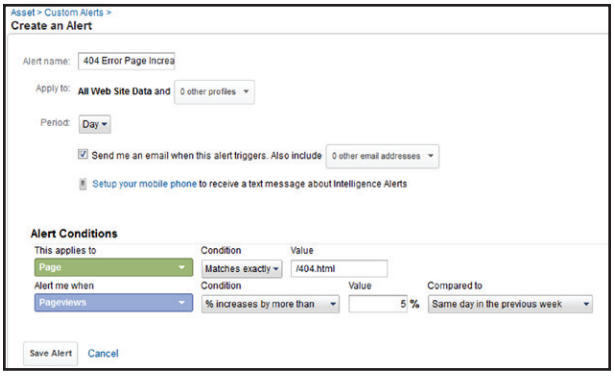

Figure 7.1
Custom alert, Google Analytics, University of Colorado Colorado Springs

Goal Reports

If your library is using Google Analytics's Goal reports, you should regularly monitor them because they directly show how your library is performing against its set goals. We suggest using a Scheduled Email to export the Goal Overview report for each configured goal on a monthly or quarterly schedule. This is ideal for sending updates to your library administrators who need to be kept informed of the website's progress.

We also recommend creating a Custom Alert for each goal's completion rate or conversion rate to monitor for any major decreases. This will notify you if the website is not performing up to your expected standards in goal completion. Set your alert to Weekly (or Monthly at the longest) so there is enough data to indicate a real problem and not just a temporary fluke on the website.

Custom Reports

Did your library set up some custom reports? If so, they were probably created for a reason and should also be monitored on a regular schedule. It is difficult to advise how often to monitor these reports because their contents are so diverse—custom reports are whatever data you want to analyze. However, if the custom report is related to testing and enhancing a site's performance, then definitely check those reports weekly using a Scheduled Email, or consider setting up a Custom Alert. Custom reports that are designed to collect basic use data can be monitored less frequently.

Sharing Data and Reports

Regardless of whether you are the lone person or part of a team of people that has access to the Google Analytics profile, there are likely many others in your library who could benefit from reviewing website use data but who have no idea this information even exists. The book

Web Analytics Strategies for Information Professionals: A LITA Guide identifies four groups that could potentially benefit from having some web analytics data:

- web services teams and managers
- content contributors
- anyone involved in the decision-making process for a website
- library administrators[1]

Essentially, you need to identify who in your library could use the data from Google Analytics, determine the data and reports to provide them, and share the data with them. Once you know who needs data and what data they need, Google Analytics provides several options for data sharing. This chapter has already covered the Scheduled Email and Custom Alert options, but the other options include manually exporting the data, using the Dashboard feature, or utilizing the Google Analytics APIs.

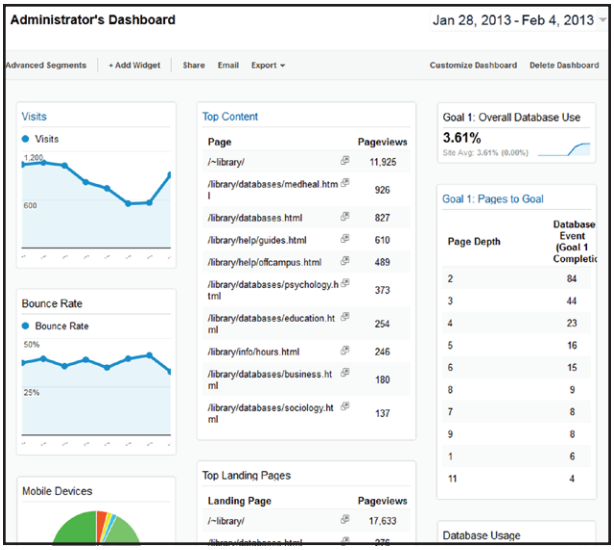

Figure 7.2
Custom dashboard, Google Analytics, University of Colorado Colorado Springs

Exporting Reports

Most of the Google Analytics reports are easy to export—simply click on the Export option for the report you need. You can export the reports as CSV or TSV files, Excel spreadsheets, Google spreadsheets, or PDF files. The PDF option is most user-friendly for a person who has limited web analytics knowledge or who does not want to read spreadsheets of data. Yet the spreadsheet option allows you to export the data in a format that is easy for you to customize into more presentable reports and charts.

Similar to the Scheduled Email option, the Export option will export only the data you see in the current report, so make sure you have the report set to display exactly as you want to export it. Once the report is exported, you can share it with whomever needs it.

Dashboard Feature

The dashboard is a tool available within your Google Analytics profile that lets you "pin" up to twelve reports in one location. Dashboards not only locate all the necessary data in one place, but they serve as bookmarks to directly link a person back into the full report. To add reports to a dashboard, you can go to the desired report and click the Add to Dashboard option. Additionally, you can click on the Add Widget option within the dashboard screen and create your own custom report widgets.

Each profile can contain up to twenty separate dashboards, so you could create a unique dashboard and share that dashboard with whomever needs it. You can share the dashboard by using a Scheduled Email or by exporting the report (currently both will display the data only in a PDF). Naturally, you could also create a user account for the person to log into the Google Analytics profile and access the dashboards. Figure 7.2 shows a custom dashboard designed for a library administrator interested in understanding the basic use trends and goal performance for a library's website.

Google Analytics APIs

The Google Analytics APIs option is the best export option if you want to have complete control over your data's presentation, but it requires the most time. Google Analytics has three APIs, but this section focuses on the two core APIs: Management API and Core Reporting API. The Management API contains profile and custom settings data, while the Core Reporting API is used for automatically exporting report data. Together, they allow you to export whatever data you want from your profile and create custom applications to display that data. You can create your own dynamic dashboards embedded neatly in your intranet or wherever you desire. There is extensive documentation available for those interested in the Google Analytics APIs, but most of it will require programming knowledge.[2] If you choose this option, make sure to read up on the best practices for data visualization so you can display the data in the manner most accessible to your users.[3]

Potential Uses of the Google Analytics APIs

Need some inspiration on how to implement the Google Analytics APIs? Here are some creative ideas:

- Create custom dashboards with Google Analytics APIs using the Google Apps script (http://analytics.blogspot.com/2012/08/automate-google-analytics-reporting.html): Requires minimal scripting, but still provides you with fully customizable dashboards.
- Visualize Google Analytics data with Google Charts tools (https://developers.google.com/analytics/solutions/articles/gdataAnalyticsCharts): While this example uses an older version of the Google Analytics API (version 2.4), it is still updated and contains a great example of how to effectively visualize your data outside of Google Analytics.

Next Steps

Reviewing and sharing your data on a regular basis will help keep you in touch with your site's usage and guide the actions to be made to improve site performance. While Google Analytics is an extremely powerful web analytics tool, it is merely a tool. It is more important to have a person comfortable with sifting through the data focus on finding the essential information to report and share. Convert that data into actions to improve the site and then use your website use data to determine if those revisions help increase the overall traffic or goal completions on your site.

Notes

1. Tabatha Farney and Nina McHale, *Web Analytics Strategies for Information Professionals: A LITA Guide* (Chicago: ALA TechSource, 2013).
2. See "Developer Guides & Reference," Google Developers website, last modified October 29, 2012, https://developers.google.com/analytics/devguides.
3. See Stephen Few, *Information Dashboard Design: The Effective Visual Communication of Data* (Cambridge, MA: O'Reilly and Tufte, 2006) and Edward R. Tufte, *The Visual Display of Quantitative Information*, 2nd ed. (Cheshire, CT: Graphics Press, 2001).