Use audience analytics to predict and identify patterns in audience behavior

**The Issue**
Growing numbers of people consume content on multiple platforms. Viewership data is often generated and collected from these new screens differently than with linear broadcasting. Content providers struggle to consolidate all this mobile and digital data, and many also have to battle internal data silos. So it’s no easy task to track how and why viewers move from one platform to another.

Content distributors use authentication and can track content consumption from device to device. But there are still enormous volumes of known and unknown viewers. Unknown viewers come from anonymous media consumption on a website, whereas known viewers come from content subscription models where the audience member becomes a direct customer with a company like Netflix.

The media industry’s shift from broad audiences to individual content consumers is causing content creators and distributors to rethink their strategies and business models. With various audience segments consuming content so differently—like millennials versus Gen X and baby boomers—having complete, accurate audience behavior information is critical to expanding viewership and advertising revenue. Data management tools and big data analytics can piece this all together and directly influence marketing, programming, operations and advertising decisions.

**Our Approach**
SAS provides an integrated audience analytics framework that relies on actual viewership data and includes data management, predictive analytics and big data visualization. We provide software and services to help you:

- **Predict audience behavior using all available data.** Automate and simplify the data management process. Develop meaningful audience segments, and quickly find content correlations to get a pulse on viewing preferences so you can score content suitability.
- **Perform fine-tuned forecasting ratings** to precisely predict and model audience engagement. Use historical audience measurement data and perform look-alike modeling on new content to predict future audience engagement and content performance.
- **Get deeper insights about campaign performance.** Target relevant offers and content to the right audiences while optimizing your interactions based on constraints, budget and capacity.

SAS delivers insights using advanced analytics like data mining and forecasting to reliably predict future audience behavior and content performance.

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**Solution Brief**

Use audience analytics to predict and identify patterns in audience behavior

**Business Impact**

“SAS helps Viacom perform segmentation based on TV viewing behavior along with audience demographics, psychographics, social media chatter and purchasing propensity.”

Fabio Luzzi
Vice President, Advanced Analytics & Data Science, Viacom

**Challenges**

- **Getting a true audience picture.** It’s hard to dynamically combine audience behavior data into a single view, and sampled data is not a real reflection of the population.
- **Finding audience behavior patterns and meaningful segments.** Juggling a diversity of structured and unstructured data makes audience analytics problematic and sometimes incomplete.
- **Complex audience forecasting.** Audience data is bigger and richer with TV being anytime, anywhere—so only sophisticated analytic tools can reveal why audience segments tune in and out.

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The SAS® Difference:
Faster insights from all of your audience data

Using a big data analytics environment, SAS provides full access to all of your valuable audience data regardless of platform or location. With SAS, you can:

- Automate the cumbersome data management process. Data management tools unite and provide governance for all structured and unstructured audience data. That includes digital, set top box, ratings, spreadsheets and content metadata and data, whether stored in Hadoop or elsewhere.

- Analyze audience data of all types, sizes and complexity, quickly and easily. By using in-memory analytics, less data movement is needed – and audience data is analyzed on the fly. Plus, you can analyze all of your data instead of just samples. So you can act on audience insights fast.

- Perform large-scale, automatic forecasts. Data mining, text mining and forecasting capabilities help you model virtually any type of audience behavior, incorporating past and future events. Use historical measurements data like clickstream, ad server, ratings, etc., and perform look-alike modeling on new content to predict future audience engagement and content performance. Choose your level of automation – from simple forecasting to advanced econometric models and hierarchical forecasts.

From dynamic visualization to predictive modeling, model deployment and process optimization, SAS reveals patterns, anomalies, key variables and relationships, leading to new insights and better answers, faster.

Case Study:
Viacom Media Networks

Situation
For data-driven analytics, TV research has traditionally used a set of one-dimensional techniques not linked together. For example, TV research might indicate what a male 18 to 39 years of age would overindex in TV viewing during a specific part of the day. Viacom wanted to improve its analytical capabilities by using machine learning and data mining techniques to process multidimensional data points in parallel. To accomplish this, it needed to group TV viewers into segments based on consumption of hundreds of shows, different types of profiles and purchasing behavior.

Solution
Viacom began using SAS to build audience segmentation models based on viewing data, demographic and psychographic profiles, purchasing behavior data and more. Now Viacom can mine Nielsen’s all-minute respondents to identify audience segments, then design and implement strategies to target them.

Results
With SAS, Viacom has developed better plans for how to advertise shows. It also supports optimized promo placements across all of its brands on a regular basis, for new or existing content. Using SAS also helps Viacom track the effectiveness of its marketing plans, ensuring that it delivers maximum conversion and rating lift.

What if you could …
Expand viewership and boost audience loyalty
What if you could easily determine why certain content performs better with certain audience segments?

Improve advertising effectiveness
What if you could improve advertising performance and optimize ad sales?

Create more meaningful consumer relationships
What if you could personalize content and programming based on advanced analytic insight?

Negotiate more effectively
What if you could improve your position for programming negotiations using all your audience data?

You can. SAS gives you THE POWER TO KNOW®.

SAS Facts
- SAS helps customers at more than 75,000 sites improve performance and deliver value by making better decisions faster.
- SAS customers or their affiliates represent 93 of the top 100 companies on the 2014 Fortune Global 500® list.
- SAS combines big data analytics with industry-specific solutions to give pay TV providers a road map for how to uncover audience insights.

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