SOLUTION BRIEF Intel® Audience Impression Metrics Suite Retail Banking Digital Signage



Increase Bank Sales with Targeted Digital Signage

With targeted messaging retail banks can deliver marketing messages, based on demographic information such as age or gender, to specific viewers.



Adding Intel® Audience Impression

Metrics Suite to digital signage can
help bank marketers implement
business intelligence solutions while
delivering viewer-specific messages.

Introducing Targeted Marketing

With today's revolution in digital marketing, banks have a unique opportunity to increase sales and capture new customers with targeted marketing content using digital signage. By combining digital signage with the Intel® Audience Impression Metrics Suite (Intel® AIM Suite), marketers can deliver viewerspecific messaging while implementing valuable business intelligence solutions that can help gauge the effectiveness of their marketing campaigns.

Targeted messaging offers the ability to deliver marketing messages to specific viewers, based on demographic information such as age or gender. For example, promotions can focus on new checking accounts and student loans to college-age customers or offer financial planning advice to older customers who may be thinking about retirement.

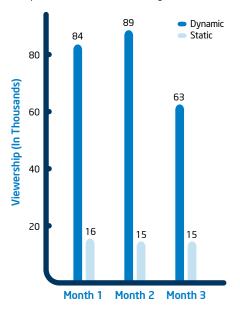
Targeted Digital Marketing in the Modern Bank Branch

The bank branch remains a crucial point of contact with existing and potential customers. Face-to-face interaction at the bank is an important factor in how customers make personal financial decisions.

According to a 2010 CEB Financial Services Customer Experience Survey, an average of nearly 70 percent of customers prefer to open accounts at the branch rather than on the Internet or through other channels, and over 40 percent of customers prefer to address issues in-person with bank staff or a manager.¹ With most customers entering the bank branch to conduct business, banks have a singular opportunity to not only convey specific messages but also gain a better understanding of the people entering a particular branch.

By using digital signage, retail banks can take advantage of the opportunities the rapidly evolving word of digital marketing offers. According to TowerGroup, the number of bank branches deploying digital signage in the United States is projected to increase from 26,000 in 2011 to 56,000 in 2015.² With digital signage, banks can create digital touch points with customers inside the branch, transforming brick-and-mortar outlets into service-oriented destinations. Digital signs positioned near windows can also be seen by passersby, expanding the scope of marketing opportunities.

Figure 1. A 2010 Intel study included measuring the number of views of dynamic digital signage compared to views of a static sign.



Intel conducted a three-month study in 2010 to measure various aspects of digital signage technology, including a look at its effectiveness, based on number of views, compared to a static sign. As shown in Figure 1, this study revealed that the digital signage captured an average of more than 400 percent more views than a static sign.³

Intel® Audience Impression Metrics Suite: Helping Enable Smarter Bank Marketing

Combining digital signage solutions with Intel AIM Suite can help marketers in retail banks deliver key marketing messages while collecting information about viewer demographics and behavior.

Intel AIM Suite's integrated package of three anonymous viewer analytics (AVA) software components utilizes the powerful performance of Intel® processors. Providing an easy way to add data collection and audience measurement tools to a bank's digital signage network, Intel AIM Suite provides the opportunity to target the messaging based on the viewer. The system also collects

a wealth of quantifiable information about viewer behavior and characteristics while safequarding privacy (see sidebar).

Viewer-based information:

- Gender and age range
- Number of viewers per message, time of day, or demographics
- Distance from and attentiveness toward the display

Bank marketers can use this information to help shape their marketing programs, ensuring they are promoting the right products and services at each branch. For example, the Intel AIM Suite may reveal that certain branch locations draw more customers from a college-age demographic, whereas other branches serve older customers. The Intel AIM Suite and the bank's digital signage solution creates the opportunity to deliver targeted messages to those audiences in the appropriate branches. In addition, by better understanding who is visiting each bank branch, branch managers can fine-tune their other in-branch products and services or external marketing campaigns to appeal to the identified audiences.

PRIVACY DESIGNED IN

Safeguarding privacy is important to both consumers and manufacturers, retailers, and others throughout the digital marketing industry.

Information about viewer demographics and behavior provides banks with valuable insights into their customers. In additional to enabling real-time targeted marketing through digital signage, this information gives bank marketing staff and managers what they need to better plan and fine-tune branch product offerings and marketing campaigns.

Intel designed the Intel® Audience Impression Metrics Suite (Intel® AIM Suite) with privacy in mind, adopting guidelines such as those devised by Privacy by Design under the Information and Privacy Commissioner of Ontario, Canada. Intel AIM Suite collects no personally identifiable information about viewers, completely safeguarding their anonymity and privacy.

The system analyzes captured video using sophisticated face pattern detection algorithms—not facial-recognition—to identify the age range, gender, attentiveness, and distance from the display. The data is aggregated, and then the video image is immediately destroyed. At no time does the system attempt to recognize individual faces or match individuals to any personal identification or transaction.

Read the Privacy by Design white paper "Anonymous Video Analytics (AVA) technology and privacy," at www.ipc.on.ca/images/Resources/AVAwhite6.pdf.

Intel® Audience Impression Metrics Suite Software Components

Intel AIM Suite brings together three innovative software components—Intel® AIM View, Intel® AIM Analytics, and Intel® AIM Manage—to place powerful tools in the hands of bank marketers.

Intel® AIM View

Intel AIM View is an audience-detection module that utilizes AVA to detect the presence of customers who are viewing the digital signage display, whether they are inside the branch or looking at the display through a window. As shown in Figure 2, this component collects information on the number of viewers present, their distance from and attentiveness toward the display, their gender and age range, what content was viewed, and how much time was spent viewing content. This data is then used in real time to determine the content to display on the screen.

AVA is audience detection technology, not facial recognition technology. It measures key

features on viewers' faces to determine gender and age range without recording any images or collecting personal information. Viewers' personal privacy is always maintained.

Intel® AIM Analytics

The data visualization and reporting system of Intel AIM Analytics features a wide range of powerful report formats. Using its user-friendly interface, marketers can analyze the effectiveness of their marketing campaign and make informed decisions about products and services to offer in their branches.

As shown in Figure 3, the demographic and behavior data associated with viewers are presented in easy-to-understand reports, graphics, and charts using pre-defined templates. These files can be exported in CSV format or through Intel AIM Suite's web API for use with other data systems. Users can drill down to obtain details to help them understand how certain demographic groups respond to specific marketing campaigns.

Figure 2. Intel® AIM View detects nearby viewers of the display and uses anonymous viewer analytics to determine aspects of their demographics and behavior.

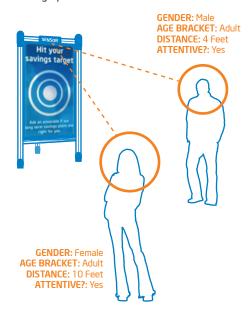
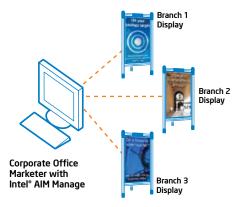


Figure 3. Intel® AIM Analytics gives the user access to data, charts, and reports associated with the viewers of the digital signage.



Figure 4. Intel® AIM Manage enables a bank marketer in a central location to manage all the viewer analytics across the entire network, either within a single branch or across multiple branches.



Intel® AIM Manage

Intel AIM Manage is a cloud-based license and sensor management system that remotely manages all instances of Intel AIM Suite, provides a scalable and transparent method of analyzing multiple branch marketing efforts, and identifies regional trends.

With Intel AIM Manage, marketing professionals who manage the system in a branch or across multiple branches or regions can collect and act on information in each of the individual branch locations, all from one PC (see Figure 4). Marketing campaigns can be adapted and executed in shorter periods of time, offering bank marketers flexibility and agility in rolling out new marketing messages while still allowing for individuality between branches.

A Solid Platform on Which to **Unlock Bank Marketing Potential**

Intel AIM Suite helps bank marketers take advantage of the power of targeted marketing by quickly analyzing video input, assessing information about the audience viewing the display, and then through integration with Content Management Software ensuring the

right content is displayed on the screen. This type of real-time video and analytic work is compute-intensive and requires a platform that is fast and reliable.

Intel provides this platform with powerful 2nd generation Intel® Core™ i5 and Core™ i7 processors, which can run the advanced AVA application while simultaneously playing high-definition video content. With the speed and power of these platforms, systems can run the Intel AIM suite as well as run other enterprise applications, helping to lower infrastructure costs.

As more and more banks begin to take advantage of the digital signage opportunities, combining intelligence with digital signage technology is becoming increasingly important. Intel AIM Suite offers bank marketers a nextgeneration set of tools for maximizing the ROI on digital marketing campaigns through valuable customer intelligence and messaging adaptation, and customers benefit from learning about products and services appropriate to their unique needs.

For more information on the use of Intel® technology in retail and retail banking, visit: www.intel.com/retail

For more information on Intel® Audience Impression Metrics Suite. visit: http://intel.cognovision.com/intel-aim-suite

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Internal TowerGroup presentation, 2011.

² Internal calculations by TowerGroup, December 2011.

^{3 &}quot;A Report on a Field Trial of Anonymous Video Analytics (AVA) in Digital Signage," http://download.intel.com/embedded/applications/digitalsignage/325223.pdf (PDF).

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