

M2M magazine

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A SUPPLEMENT TO M2M MAGAZINE



M2M + (INSERT VERTICAL HERE) = SMART MOVE

VERTICAL MARKETS ARE CHANGING THE WAY THEY DO BUSINESS AS M2M TECHNOLOGY GAINS MOMENTUM.

M2M (machine-to-machine) technology is not a new concept in the B2B (business-to-business) realm. What is new, however, are the types of industries adopting M2M to transform their businesses. Beyond such often-mentioned markets as healthcare and home security, fringe markets are also making strides thanks to pioneering

companies that understand the potential of machine-to-machine. In markets such as vending and tracking, M2M is allowing companies to see inside their assets to manage and monitor them in ways that were previously impossible. No matter which vertical market we are considering, strong

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partnerships are key to getting the solutions up and running, as the companies offering these various solutions are well aware.

Two such companies are Cantaloupe Systems, www.cantaloupesys.com, San Francisco, Calif., and XACT Tracking Solutions, www.xacttrax.com, New York, N.Y. Together, and through the lenses of their respective vertical markets, they provide a glimpse into M2M's impact in the current market and its expanding role in the future world of ubiquitous connections.

VENDING GETS SMART

Mandeep Arora, CEO and co-founder, Cantaloupe Systems, is on a mission to turn the 6 million U.S. vending machines into smart devices. Cantaloupe's Seed product is his weapon of choice.

Once installed, Seed uses cellular to connect the vending machine to the Seed Network and begin "talking." This line of communication allows companies to gather, store, and analyze the machine's data online.

In a vertical traditionally plagued by guesswork and inefficiency, M2M technology offers an almost immediate ROI (return on investment) and radically improved daily operations. Smart vending machines can call for help when they are broken and keep track of inventory and sales, allowing for a host of new operational efficiencies.

"Our slogan is 'Where to Go, When to Go, and What to Take,' and that's what (Seed) does for our customers," says Arora. "It tells vending machine owners how best to manage their resources; primarily drivers and technicians. Seed tells them where they need to be everyday and what they need to have with them to address what's happening out there in the field. It takes the guesswork out of how much product should be on those trucks so they come back empty. This way you've got less fuel usage and better utilization of time.

"Our customers are seeing that one driver is now able to service up to two times as many machines as before. Suddenly they're no longer going to machines that don't need them to be there, and they're no longer ignoring machines that are out of product. M2M technology is allowing vending companies to use fewer resources, while providing a higher level of customer service."

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—Mandeep Arora, Cantaloupe Systems

One of M2M's greatest benefits in vending, according to Arora, is the opportunity to conduct business in a realtime manner. "M2M technology presents vending companies the opportunity to function in realtime," says Arora. "It's changing the way they do business; our customers are now running their trucks, their warehouse, their purchasing, and their technician departments differently."

Arora is confident M2M is the trend to watch in the vending space. "Going forward, M2M is going to be a critical part of vending," he says. "There are so many more things we can do; the question is what will the consumer—our customer's customer—respond to?"

For instance, he says there is talk about being able to press a button on the machine and be connected live with a customer service agent, or remotely adjusting prices based on demand or special programs.

Currently in development at Cantaloupe is a new product that will allow cashless vending. Though not the first company to manufacture such a solution, Arora sees the technology as a great addition to the benefits already offered by Seed.

"Once we've equipped these machines with M2M technology and plugged them into the wireless network, we can then add accessories and peripherals as they are developed," Arora says. "So we've already sold the product based on adding efficiencies. Now we can look into other applications that will tap into that network availability as well."

TRACKING GAINS

With a 30-year history in consumer electronics, XACT Technology, www.xacttrax.com, New York, N.Y., upped the ante in January 2009 with XACT Trax, a portable tracking device and adaptable tracking platform that can keep tabs on anything from children, seniors, and pets, to equipment, assets, and cargo.

The device, which uses GSM (global system for mobile communications) and GPS (global positioning system) signals, can be clipped onto a child's backpack or dropped into a cargo crate. After setting up geographical boundaries or "geofences," the tracker can be sent automatic alerts from the device as it enters or exits an area. Through XACT's online portal and backoffice infrastructure, businesses and consumers in the tracking industry now have a user-friendly entrée into telematics.

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"When (XACT) decided to enter the M2M space, we applied our keen understanding of value proposition," says Bill Acevedo, vice president of business development, XACT. "The real focus was to develop a platform that was flexible and scalable, that met the quality standards we're used to in the consumer space, had the product reliability that we know has been an obstacle in the M2M deployments in the past, and offer performance that simply was the best the technology could offer."

In developing the platform, the company decided to allow customers to run their own source code on the product. "The open-source platform is an extremely flexible offer with a lot of M2M capabilities," Acevedo says. "The same platform that can be a portable device can also be used as an embedded solution for asset tracking or something of that nature, or can be used for in-vehicle communication. We believe if we have 90% of what everyone wants, and have designed a product that's open to allow that last 10% to come to fruition, we have done a good job."

XACT believes consumer awareness will play a big role in increasing the demand for connected devices. The company predicts significant growth in the personal tracking space, including portable solutions such as child tracking and automotive applications.

"I also think we'll see a large surge in the aftermarket side of in-vehicle telematics," Acevedo says. "It could be in various fleet applications, aftermarket OEM (original-equipment manufacturer), or even general consumer for teen-driver safety or pay-as-you-drive."

VALUE CHAIN PARTNERS

Acevedo and Arora agree most customers have no desire to understand the technology behind their devices, let alone the value-chain partnerships that enable the technology. But both stress the importance of working with a wireless carrier willing to tailor service to their specific needs.

XACT sees its ability to offer a friendly pricing structure as one of its best market advantages. To do so, the company requires a reliable wireless carrier that allows

flexibility; it found that partner in T-Mobile USA, www.t-mobile.com, Bellevue, Wash.

"T-Mobile has really grasped how varied the channels and markets are and come forward with unique business models to facilitate the M2M deployment," says Acevedo. "Obviously the network is a critical piece of the puzzle, and without question T-Mobile has been the most valuable partner in that space."

The carrier's certification process also offers a time-to-market advantage, according to Acevedo, because there is no cumbersome private certification process in addition to going through PTCRB (PCS Type Certification Review Board) certification.

As with XACT and its tracking solution, a solid mobile partnership

is also crucial to Cantaloupe's success. Arora says, "Working with T-Mobile has given us access to greater diversity in terms of network footprint. We've found their team to be extremely supportive, and very in touch with us. They understand what our business is, they pay attention to it, and they find ways to help us help our industry adopt machine-to-machine technology." —*Bethanie Hestermann*

Keeping Track of It All

Frost & Sullivan, www.frost.com, Mountain View, Calif., defines mobile FAM (field asset-management) as using wireless and GPS technologies to track fleets and cargo.

- \$661 million: FAM application software revenues in 2009
- \$2 billion: Forecast revenues in 2015

A Frost survey identified three major ROI impacts of FAM solutions.

- Improved field service response times
- Faster trouble ticket resolution
- Significant decrease in worker overtime hours

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Source: Frost & Sullivan, Mountain View, Calif.

So far the approach has worked. "We're seeing an incredible amount of interest in a wide variety of channels," says Acevedo. "Now we are seeing a pull in the market for this technology instead of a push." He also says M2M technology is the company's central focus. He explains, "The ability to communicate remotely, request assistance, and get information to or from a product is always going to have value."