

**Ft. Lauderdale, Tampa Airports Enhance Rental-Car Operations
With Installation of OPW iSite™ Automatic Tank-Gauging System**
Fuel tracking and leak detection optimized through use of innovative wireless solution

By Gene Pope, OPW- FMS Sales Representative



Fuel Facility Management (FFM) of Lake Worth, FL, oversees the fueling operations of the Ft. Lauderdale-Hollywood International Airport and Tampa International Airport.

In 2010, Ft. Lauderdale-Hollywood International Airport, located just north of Miami, and Tampa International Airport on Florida's Gulf Coast offered a combined total of 500 daily flights that served more than 38 million flyers throughout the year. A great number of those travelers either arrived at or departed from those airports in vehicle procured from the rental-car companies—12 at Ft. Lauderdale and eight at Tampa, each with fleets numbering in the hundreds of vehicles—that are located in the airports' terminals.

That is a lot of rental cars, and to keep the rental agencies' fleets ready to roll, both the Tampa and Ft. Lauderdale airports feature consolidated rental-car facilities. It is in these facilities that the cars are not only serviced, but fueled, with dedicated fueling islands for use by each of the rental-car agencies. In fact, the facility at Ft. Lauderdale is the largest indoor rental-car fueling operation of its kind in the United States, covering 4.3 million square feet, or the equivalent of 76 football fields. Combined, the airport's 12 rental agencies can pump as much as 20,000 gallons of fuel per day with upwards of 1,000 fueling transactions completed in a 24-hour period.

To keep up with this demand, the Ft. Lauderdale facility is outfitted with six 25,000-gallon underground storage tanks, for a total storage capacity of 150,000 gallons, while the rental-car facility at the Tampa airport features six 20,000-gallon USTs and a storage capacity of 120,000 gallons. With that much fuel on hand at any one time, compounded by the number of transactions that are taking place on a daily basis, inventory monitoring and control, as well as leak detection, are a major concern for the company that oversees the operation of the respective facilities—Fuel Facility Management (FFM) of Lake Worth, FL.

(more)

(continued)

“We started in 2004 when we managed the Ft. Lauderdale airport, which was one of the first of its type with a consolidated rental-car facility,” explained John Jeremiah, Vice President of FFM. “We manage the rental-car operations from a fueling standpoint, including maintaining the dispensers and other equipment, and reporting fuel usage to the rental agencies and fuel suppliers on a weekly basis. Anything that requires upgrading or enhancement of the fuel system we handle, and we’re always striving to make it a better system.”

Addressing A Concern

Because of the complexity of the Ft. Lauderdale fueling operation, the leak-detection system required that sensors needed to be put in all 105 of the dispenser pans and sumps that were on-site. While meeting all applicable codes and regulations for operation, FFM wasn’t satisfied with this type of leak-detection setup because it would be nearly impossible for a person working alone on the graveyard shift to effectively monitor all of the system’s 105 potential alarm points.

In the search for a more comprehensive, reliable and user-friendly solution, FFM turned to Gene Pope of Pope & Associates, Inc., a fueling-system manufacturers’ representative based in Tampa, FL. After reviewing the parameters of the Ft. Lauderdale operation, Pope’s suggested solution was the SiteSentinel® iSite Automatic Tank-Gauging System from OPW Fuel Management Systems; Pope & Associates has acted as a district manager for OPW’s fuel-control products in Florida since 1982.



FFM began looking for a better fuel management system for improved monitoring and leak detection capabilities.

“We’re blessed to be able to rep OPW as an independent agent for almost 30 years,” said Pope. “It’s very rare to have an association that has lasted that long.”

The SiteSentinel was the perfect solution for the Ft. Lauderdale facility’s fuel-monitoring needs because it is a multi-function inventory and leak-detection management system that can monitor product levels, delivery amounts, leak statuses and environmental-compliance information for up to 16 USTs at one time. Working with Pope & Associates, FFM installed the SiteSentinel system at the Ft. Lauderdale rental-car facility in 2004.

“What the OPW iSite did was allow us to use addressable sensors that report back to the system,” said Jeremiah. “There’s a lot less wiring and the sensors let you know immediately which dispenser is experiencing an alarm. I was also able to pull all of the wiring back to one end of the building rather than have so much wiring that it needed to be split on two sides of the building. This made it a much simpler setup, as well as much easier to monitor.”



SiteSentinel® iSite Automatic Tank-Gauging System from OPW Fuel Management Systems

(more)

(continued)



The SiteSentinel® iSite™ provides FFM the perfect system to take its operation to the next level.

The Next Level

While the SiteSentinel effectively met the needs of the Ft. Lauderdale facility, OPW was hard at work on the development of the next generation in remote, automated tank-gauging and monitoring: the SiteSentinel® iSite™. The iSite provides complete tank-monitoring, inventory-management and environmental-compliance information through the incorporation of Windows®-based technology that allows the user to view all data either remotely from anywhere in the world or via an LCD touch-screen display that is located at the fueling site. The iSite also enables all of the system's probes, sensors and leak-detection devices to be connected wirelessly or through a single-wire interface via its VSmart Module. All devices are automatically configured through the push of a button, making it the easiest and most cost-effective automatic tank-gauging system in the world to install, configure and use.

“John was looking for even better communications capability to interface with the Ft. Lauderdale facility's fueling center,” said Pope, who oversaw the installation of the iSite system at Ft. Lauderdale in November of 2009. “We were able to remove the SiteSentinel console that had been installed and directly replace it with the iSite without needing to change any of the inventory probes or sensors. The iSite gave John the advanced communications capability that he was looking for.”

“The iSite offers a lot of system enhancements, which is what we were shooting for,” confirmed Jeremiah. “I was never really comfortable with an alarm being the only warning we were getting; we also wanted a positive shutdown. We got approval from the county to tie the iSite into an I/O relay box and in the electric breakers at the site. Now, when we have an alarm on any sensor, the system sends out not only the telemetry of the alarm, but it also sends out alerts via text and e-mail, and kills power to the system.”

(more)



(continued)

The speed and efficiency with which the iSite system sends out the alarms is such that the exception events are often identified, rectified and facility operations put back in service before the Broward County Aviation Department, which is the agency that oversees the operation of the airport, is even aware that an alarm condition had even occurred.

“If I have an alarm go off, I know in seconds, which allows for quicker response time,” said Jeremiah. “in fact, a lot of times I’ll get an alarm text before the agency even realizes that something’s going on. We’ll respond to the alarm and they’ll be back up and running before the agency even realizes that the system was down.”

Onward And Upward

With the iSite system in place and meeting all expectations at the Ft. Lauderdale facility, Pope and Jeremiah knew that it would have to be a part of the operation of the expanded consolidated rental-car facility that FFM was chosen by the Hillsborough County Aviation Authority to help create at Tampa International Airport in 2010.

“In the design process, the county reached out to FFM because they had experience in running these types of operations based on the work they had done at Ft. Lauderdale,” said Pope. “When it came time for them to set up the specs for the facility they relied on John’s input regarding which equipment to use and he was very adamant that they use the iSite.”

The Tampa facility features 112 leak sensors and six inventory probes. VSmart Modules are located at various points in the fuel-supply system and are all remotely tied back to the main iSite Console, where all of the information can be viewed via an IP address on a Web browser.

“I was on the design team for the Tampa site and made sure that we included the iSite in the design because of all of the benefits the system offers,” said Jeremiah. “It really allows us to keep a close track on the fuel volume and will alert us to any low-volume settings, which are also programmable so that different alerts can be set for different levels. Because these facilities go through so much fuel in a day, being able to monitor volume levels like that is critical to us and their operations.”

Conclusion

The implementation and operation of the iSite at the consolidated rental-car facilities at the Ft. Lauderdale and Tampa international airports has been such a success that FFM now considers the system standard equipment. In fact, the company is currently involved in the bidding process for two more airport rental-car facilities and is specifying the use of the iSite in its plans.

“It’s been wonderful,” said Jeremiah. “The iSite is a great system and we’d use it on anything going forward.”

For more information on the SiteSentinel® iSite™ Automatic Tank-Gauging System, contact OPW Fuel Management Systems at (708) 485-4200 or go to www.OPWglobal.com.

About OPW Fuel Management Systems

OPW Fuel Management Systems specializes in the design and manufacture of tank gauges and automated fuel control systems. OPW Fuel Management Systems is a business unit of OPW Fueling Components, the leader in commercial and retail fueling solutions worldwide.