CASE STUDY





MALL OF AMERICA.

DALCO AND ORBIO TECHNOLOGIES HELP MALL OF AMERICA® SHINE USING SUSTAINABLE CLEANING TECHNOLOGY

As the nation's largest retail and entertainment complex, Mall of America hosts more than 400 events annually and welcomes 42 million annual visitors. Mall of America is home to 520 world-class shops, 50 restaurants, the nation's largest indoor family amusement park, a 1.2 million gallon walk-through aquarium, and a 14-screen movie theatre. One of the top tourist destinations in the country, the 4.2 million square foot complex in Bloomington, Minn., has a long record of sustainability, including recycling 32,000 tons of trash each year (more than 60 percent of its waste), recycling 2,400 tons of food waste to a local hog farm, and collecting fat from restaurant fryers to be turned into biodiesel. Keeping Mall of America clean is one of the keys to its great success. And Dalco, a long-time Tennant partner and distributor was eager to bring the new Orbio[®] Split Stream technology to the mall management for evaluation. Available only in the Orbio 5000-Sc, the technology generates cleaning solution on-site that replaces many daily-use conventional cleaning chemicals.

The Orbio 5000-Sc uses tap water, a small amount of salt and electricity to create an effective multi-purpose cleaning solution on-site. This solution can be used in floor scrubbing machines, spray-and-wipe cleaning, touchless cleaners, automated carpet cleaning equipment and more.

BECOMING MORE SUSTAINABLE

"Previously we used walk-behind and rider floor scrubbers with conventional packaged cleaning chemicals," said Daminga Lash, Housekeeping Manager, Mall of America. "But since we began using the Orbio 5000-Sc solution in our floor scrubbers, we've eliminated the need to buy a concentrated 55-gallon drum of neutral floor cleaner every month. And now we know exactly what dilution we're using in our machines." Tennant and Dalco have had a close relationship for more than 25 years, and as a result, Dalco has played a key role in evaluating several of Tennant's new technologies.



"We first tried using Orbio[®] 5000-Sc solution in the food court – it was a real test with food and grease. Cleaning grease off the floors, it definitely worked as well as or better than the degreaser we had been using."

- Daminga Lash, Housekeeping Manager, Mall of America

"Orbio 5000-Sc solution has helped Mall of America become more sustainable," said Jim Buis, Director of Business Development for Dalco. "Packaging waste from conventional floor cleaning chemicals has been virtually eliminated, and disruptions from ordering, receiving and storing conventional chemicals have been significantly reduced."

IMPRESSIVE RESULTS

Lash's 36-member cleaning crew cleans three shifts, seven days a week. They use Orbio 5000-Sc solution on the floors, stainless steel, glass and some furniture. In the food court, the primary soils are food and grease, but dirt and dust are predominant in other areas.

A 20-year industry veteran, Lash and her crew members were initially surprised by how well Orbio Split Stream Technology. They had previously used a variety of conventional cleaning chemicals, including neutral cleaners and degreasers.

"In the past, we used a stainless steel polish with oil in it that sometimes left a film which caused rapid resoiling," said Lash. "The Orbio solution cleans stainless and removes fingerprints as well as or better than what we previously used, without the film."

The floors within the mall consist of marble, vinyl composite tile, quarry tile and carpet. Cleaning crews use a fleet of 18 Tennant floor scrubbers to keep the floors clean. They simply fill the scrubbers with Orbio 5000-Sc solution and go.

LESS RESIDUE, MORE CLEAN

"We scrub every floor and each of the mall's 20 restrooms every night," said Lash. "We still use disinfectant in the restroom and on the food court tables, but we've significantly reduced conventional cleaning chemicals used for floors. And it works well on carpets."

According to Lash, the floors still look great since they stopped using conventional cleaning chemicals, and there is noticeably less chemical residue. The Orbio 5000-Sc is high-traction certified by NFSI, a notfor-profit group that focuses on reducing slip-and-fall accidents.

"I'd recommend Orbio Split Stream Technology to others because it works. Try it and see the results for yourself," said Lash. "It's safe and easy. Just fill up the floor scrubber, mop bucket or spray bottle and go."

Mall of America cleaning crews keep the facility looking its best to enhance visitors' experience. They pride themselves on keeping a safe, clean environment and mall management receives many compliments on how good the 20 year-old building looks.



ORBIO® SPLIT STREAM TECHNOLOGY



Through the process of electrolysis, the Orbio 5000-Sc creates a multi-purpose cleaning solution on site using tap water, salt and electricity. The 5000-Sc solution effectively replaces many conventional daily-use cleaning chemicals.

To learn more about the Orbio[®] 5000-Sc and other innovations in cleaning, contact Orbio today.

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