

SQUEEZING time

Coating Welch's
tank rooms
required precise
timing, expertise

for Welch's



For a couple of months each summer, tank rooms at the Westfield, N.Y. production facility for Welch's grape juice are available for planned cyclical maintenance. As part of Welch's ongoing painting maintenance program, the company uses that window of opportunity to complete coating of the interior of a selected tank room, including ceilings and support superstructures as well as the exteriors of the tanks within.

For the rest of the year, the temperature in the tank rooms is maintained at a steady 28 degrees F, providing the optimal storage environment for the Welch's Concord grape juice inside of the six 147,000-gallon steel storage tanks within each room.

If you think you recognize the Welch's brand name, you should. Founded in 1869, Welch's is known throughout the world for its Concord and Niagara grape juices and juice-related products. Westfield is in the heart of the New York State Concord grape-producing country and is the headquarters of the National Grape Cooperative, which owns Welch's. The company has operated production facilities in the area since 1906.

Some 60 miles away, in Saegertown, Pa., Salt Painting geared up to do the prep and coating work on one of the Welch's tank rooms during that time window last year.

GROWING COMPANY

Dick Eglinton founded Salt Painting about 25 years ago after getting his first experience as a "college kid" painting houses during the summer.

"Salt Painting reflects my philosophy of fair and honest work embodied in Christian values," Eglinton says about the company's name. "It refers to our goal of being considered 'salt of the earth' in our business dealings."

The firm's crew usually numbers between 28 and 35 painters and field people, with seasonal adjustments. It grew from its humble beginnings to expand its expertise into a wide variety

of commercial and industrial coatings work — new construction, waste treatment plants, paper mills, ceilings, repaints — as well as developing a niche in the very exacting work of painting churches. Located in rural Pennsylvania, the contractor usually works on projects within a two-hour radius of its headquarters. That radius extends roughly to include Pittsburgh, Cleveland and Buffalo, although Eglinton concentrates on work close to the firm's headquarters as often as possible.

Salt Painting, which has a track record over several years with the Welch's cooperative in Westfield and at several of its other facilities, earned the right to the tank room job finished last summer through competitive bidding. A year earlier, the contractor also earned the Welch's maintenance coatings business on a larger tank room, and worked out a couple of refinements that made the work on its next project go essentially flawlessly.

CAREFUL PLANNING

Salt Painting's coating work was part of the larger tank room maintenance and renovation program that required coordination with other contractors working in the same space doing piping upgrades. As a result, the project required tight controls and careful planning.

"Any coating work we accomplish in the tank rooms has to take into account the chemistry of

Sherwin-Williams Industrial and Marine representative Jim Adcock measures film thickness at Welch's Tank Room 5.

At a Glance

PROJECT

Tank Storage Room at Welch's, Westfield, N.Y.

COATING SYSTEM

Primer: Sherwin-Williams Macropoxy 646, 3.0-5.0 mils dft
Intermediate: Macropoxy 646, 4.0-6.0 mils dft
Topcoat: Armor-Tile High Solids, 2.5-4.0 mils dft

CONTRACTOR

Salt Painting, Saegertown, Pa.

A three-coat Sherwin-Williams system was applied to the tanks and other steel in Welch's Tank Room 5.



the coating product, the impact of wet and chemical cleaning processes on the tank exteriors that are a necessary part of our production, and the temperature swings that are integral to operation of the tank rooms,” explains Ken Salman, Welch’s team leader for facilities in Westfield.

“Therefore, we worked closely with Salt Painting and Sherwin-Williams as we initially set up our coatings maintenance program. They were very helpful, first in assessing what had to be done, then suggesting steps to develop a long range plan, and finally giving me alternative prep procedures and coatings systems to consider.”

ABRASIVE BLASTING PREP

The dimensions of the latest project — a room known as Tank Room 5 that is similar in size to the other tank rooms at the facility — are 75 feet wide by 105 feet long, with a 31-foot ceiling. The roof is cast concrete. Each of the six tanks within the room is 25 feet high and has a circumference of about 32 feet. To begin the process, the outer doors were opened and the entire room and its equipment were allowed to warm to the outside ambient air temperature. Then began surface preparation.

“After initially using a water blast prep when we did the earlier job, we settled on abrasive blasting the Tank Room 5 tank exteriors to SSPC-SP6,” Eglinton notes. “We also collectively decided that we would use a three-coat system for the tank exteriors and the other related steel in the room.”

Once the blasting was finished, the site clean up completed and the room thoroughly aired, the three-coat system was applied to the tanks and other steel. The primer coat was Sherwin-Williams Macropoxy 646 at 3.0 to 5.0 mils dft. An intermediate coat of Macropoxy 646 was applied, between 24 and 72 hours later, at 4.0 to 6.0 mils dft. And some 72 to 96 hours later, the finish coat of Sherwin-Williams Armor-Tile High Solids Epoxy was applied at 2.5 to 4.0 mils dft. All coats were applied using airless spray technology and equipment, with some brush-and-roll touchup. Paint crews also hand cleaned and caulked spot welds on the beams that formed a superstructure above the tanks themselves.

Then the freshly coated room was once again closed up, ready to resume its role in the cooling, storage and, ultimately, delivery of its 700,000-plus gallon payload of grape juice to Welch’s customers throughout the world. 