For release 2/1/2018 Local Contractor Wins National Award For Project At Midtown Tunnel

For those in the polyurethane foam industry, the annual SPFA convention is the go-to event of the year to learn about changes and advancements in the industry, network with other industry professionals, and recognize exemplary spray foam projects that had been completed that year. This January the whos-who of contractors, manufacturers, and scientists made their way to Mobile, Alabama to see what big announcements would be made and which contractors would be taking home the coveted SPFA Awards.

Having won two previous National Industry Excellence Awards in the Specialty Applications category previously (in 2015 and 2016), JACKCRETE was hopeful that they were going to place among the top this year. JACKCRETE, a Hampton Roads based polyurethane foam contractor, was entering the competition with an impressive project at The Midtown Tunnel on interstate 264 connecting the cities of Portsmouth and Norfolk in Hampton Roads, Virginia. The tunnel system was showing signs of water infiltration along the eastbound approach where the bridge structure began the descent into the underwater tunnel. Seawater would leak through this massive concrete infrastructure resulting in saltwater gathering in the roadway as motorist approached the tunnel opening, causing commuters to splash the cars behind them with water. While not a hazard during the summertime, the risk present in winter was very apparent- stagnant water on the approach could freeze, leaving motorists at risk.

Fearing that extensive repairs may be necessary to eliminate the dangers posed and seal all of the leaking joints to prevent future problems, Elizabeth River Crossings reached out to JACKCRETE to solve the issue cost-effectively and with minimum intrusion. With around 44,000 motorists relying on the midtown tunnel everyday, it was imperative that JACKCRETE come prepared. An action plan was drafted that maximized production and a core drilling firm was subcontracted to assist in drilling through the 6-foot-thick concrete structure. Over the course of the four-day project each of the voids present behind the approach retaining wall slabs were determined and eliminated. Drain holes had to be drilled at the base of each vertical joint to allow seawater to escape as the foam was injected. As the foam expanded within the waterlogged voids, the water was forced out followed by the excess expanding polyurethane foam. This process ensured that water was fully eradicated from each void, and that each void was filled to mitigate future infrastructure damage. Once the voids were filled, the SPF material filled cracks and leaks in the 6-foot-thick concrete itself.

JACKCRETE's work resulted in a major construction cost savings to the client, Elizabeth River Crossings, when compared to the expenses of traditional waterproofing applications which would have required extensive periods of excavation and then cofferdams and seawater pumps installed before work could even begin. In addition to the reduced construction costs and work time frame, JACKCRETE also helped VDOT keep the interstate open. With tolls ranging from \$1.65 - \$5.25 for the 44,000 cars and trucks that use this toll road daily, any closure of the road has real revenue implications. The environmental impact was significant as well; through

- (1) <u>"AVERAGE DAILY TRAFFIC VOLUMES with VEHICLE CLASSIFICATION DATA on INTERSTATE, ARTERIAL and PRIMARY ROUTES"</u> (PDF). Virginia Department of Transportation. *Retrieved 7 November* 2017.
- (2) Sightline Institute http://www.sightline.org/2008/02/08/planes-trains-and-automobiles/

decreased commute times for the 44,000 daily travelers that would have experienced a detour, 330 tons of CO2 pollution were avoided per day of avoided additional closure. (1) (2)

Though competition was stronger than ever, JACKCRETE was able to take home the first place prize in the Specialty Applications category of the National Industry Excellence Awards once again. As mentioned previously, JACKCRETE is no newcomer to the awards show; in 2015 they won first place for their work at the Newport News YMCA and in 2016 they won for a stabilization project at the Hampton RuhRPumpen facility. The parent company of JACKCRETE, RPC Industries, is also a well known contractor at the event, having won awards in 2006, 2015, and 2016.