BUSRide
THE GO-TO RESOURCE FOR THE TRANSIT BUS AND MOTORCOACH INDUSTRY

OFFICIAL
BUSRide Field Test:
ARBOC
Specialty Vehicles solidifies DART partnership p10

Transit data collection and analysis p14
“Lightweighting” bus suspensions p17
Motorcoach customer care p25

Maintenance inside
Seven years ago, Dallas Area Rapid Transit (DART), Dallas, TX, moved on two major initiatives to expand its fleet, transition to compressed natural gas (CNG) and introduce more convenient, passenger-friendly services to smaller outlying neighborhoods. A unique working relationship was forged when DART turned to ARBOC Specialty Vehicles, Middlebury, IN, to fill its promise of consistent level boarding at every stop, which at that time was to include its new Flex routes and On-Call service.

Five years ago, the original contract called for 123 buses, for which DART issued a formal Request for Interest (RFI) and received three respondents. The RFI required the vehicles be low floor.

The small low-floor bus would provide all passengers faster, safer easy-on, easy-off access and would be more compatible with DART’s larger 40-foot NABI low-floor transit fleet and Kinkisharyo light rail vehicles.

DART needed a bus better suited for the smaller neighborhoods in the vast Dallas Metroplex, so the procurement called for vehicles no longer than 26 feet – narrow enough to safely negotiate intimate, cul-de-sac-laced streets.

One bid best fit the agency needs – logistically and financially – and DART awarded the contract to ARBOC. National Bus Sales & Leasing of Marietta, GA, facilitated the purchase.
“National Bus Sales is a long-time partner of DART,” says Blake Beach, president at National Bus Sales & Leasing. “We regard DART as a first-class operation and we appreciate having the opportunity to support them.”

“From the beginning, everyone at DART liked the idea of our easy on, easy off low-floor products,” says ARBOC President and CEO Don Roberts. “All passengers can board, ride and depart without any sort of limitation. They like the fact that ambulatory passengers and those using wheelchairs, scooters can now load faster than the wait for a standard lifts. More importantly, they no longer have nearly as many slips and falls.”

“This smaller-sized fleet provides us the capability to reach customers closer to their points of origin,” says DART’s Mike Hubbell, vice president, maintenance. “People in these communities no longer have to walk away from their homes to get into our transit network.”

Hubbell says the ARBOC buses additionally satisfy the agency’s transition from diesel fuel and liquefied natural gas (LNG) to compressed natural gas (CNG).

As DART sees it, the fleet of smaller ARBOC low-floor buses complements its level-customer boarding initiative found throughout both the DART light-rail and fixed route bus network.

“Our smaller, sleeker CNG equipped low-floor buses are less offensive than standard transit buses lumbering down neighborhood streets and provide a much higher level of service,” says Bill Fay, vice president of sales and marketing at ARBOC. “DART is using our buses to further expand its footprint allow passengers make their intermodal connections with the DART bus, light rail and express train systems.”

THE WORK BEGINS

ARBOC was introducing a new concept for small and midsize buses at the time it began work with DART, a situation Roberts found both unique and noteworthy.

“This was a totally new product that the people at DART put enough faith in to buy and begin using in service,” he says. “However, at this point, we not yet fully field tested this model — and certainly never in a large fleet.”

THAT DIDN’T STOP DART.

“DART employs a highly competent engineering staff,” Hubbell says. “This team is capable of drilling down deep into the root causes and knowing the corrective actions to remedy problems that arise or make improvements they see for the product.”

As the ARBOC buses began operating, Roberts says the DART engineers offered immediate feedback.

“We took all their suggestions under advisement,” Roberts says. “If they were reasonable, we would make immediate changes once we were satisfied with our own due diligence.”

At the time, DART was implementing a new transit service with new and unfamiliar vehicles with October 1, 2012 the “cast-in-stone” hard-stop date for the first order.

“We had new CNG stations coming on line, a new service to deploy and we had to have these buses built and delivered by this date,” Hubbell says. “Three years in the making, it all happened — on time and under budget. I can say this could never have happened without the collaboration and cooperation from ARBOC.”

STANDING THE TEST OF TIME

Now that the original buses are running beyond their 200,000-mile life cycle, DART repeated the procurement process in February 2015; issuing its RFI, conducting due diligence to fairly analyze and compare OEM candidates. The agency ultimately chose to continue its partnership with ARBOC Specialty Vehicles.

“Surprisingly, the results this time around were no different than our original RFI from five years ago,” Hubbell says. “Again, of the three responses, ARBOC was the only one to meet all of our salient requirements.”

That said, rather than continue with the standard solicitation, DART simply engaged ARBOC in a sole-source negotiation and in February awarded the contract for 123 buses, with the option for 123 additional units. ARBOC Specialty Vehicles says it will begin delivering buses 3Q 2016 and continue over a 5-year period, with the majority being delivered in 2016 and 2017.

“As before, our specific requirements for these buses are strictly operational, determined by our multi-modal model for transit delivery,” Hubbell says. “It was not as though we had settled on the ARBOC vehicles. We issued our requirements to learn what was out in the market that might fit.”

LESSONS LEARNED

Since the first contract, ARBOC and DART collaborated on the optimum seating configuration for the two required wheelchair positions with tie-downs that would allow either passenger to maneuver on the flat floor independently of the other.

Other changes have included a higher-density steel frame structure, as well as enhanced ergonomics for the driver. DART initially suggested that the majority of the HVAC systems on ARBOC buses be roof mounted.

THE NEW ORDER

DART says this new order for ARBOC buses share the same amenities, electronic equipment and components as the standard transit fleet. Such robust options nearly transform the vehicles in to full info-transit buses with the ITS suite, complete with electronic fare boxes, passenger counters, Wi-Fi and GPS.

ARBOC is working closely with DART to equip the new units with the necessary pre-wiring for the new components.
“This is all about extending the same passenger experience from one service to the next regardless of the vehicle,” Gary Thomas, DART CEO says. “We don’t want our riders to feel in any way that our Flex routes and On-Call service are substandard to regular transit. Absolutely, we could do this less expensively, but doing so would send the wrong message to our valued DART passengers. Moreover, we believe in an equal passenger experience for everyone.”

**A COLLABORATIVE EVOLUTION**

Both organizations agree that their partnership is one of mutual admiration. DART sees ARBOC Specialty Vehicles as a company that actively engages with the customer and stands behind its products. In turn, ARBOC says DART has helped it build a better bus through the agency’s willingness to test, evaluate and provide feedback. This has led to improvements in product engineering and design.

“This give-and-take exchange has helped us recognize we don’t always don’t know everything about our buses before we deliver them to the customer,” says Roberts. “Working with DART, we have a better understanding of how our buses are being used and how they preform in actual service.”

“Our customers are commenting on the convenience and comfort, and the fact that the neighborhood-friendly ARBOC buses fit better in their travel environment,” Hubbell says. “That’s what we set out to accomplish. And working with dependable partners, that’s what we’ve been able to do.”

ARBOC and DART collaborated on the optimum seating configuration for the new buses.

DART customers are commenting on the vehicles’ convenience and comfort, and the fact that the neighborhood-friendly ARBOC buses fit better in their travel environment.

ARBOC is working closely with DART to optimize the location of all key electrical components for both the operator and passengers.