



Bulldog[®]

Connected truck drives uptime

Mack Trucks accelerates
toward total connectivity

Mack Anthem[®] rolls out

Moving from launch to market

Mack's clear advantage for glass hauler

Moore Freight converts to all-Mack fleet

Building the Mack Anthem[®] brick by brick

Meet the new Lego Technic Mack Anthem & LR

Vol. 1 2018



MACK



We are Mack. This is our Anthem.

Introducing Anthem, the next-generation highway truck from Mack. Born of the American spirit, Anthem comes standard with a bold design that delivers serious aerodynamics, and a new interior that keeps drivers comfortable and productive.

See how Anthem is built to move your business forward.
MackTrucks.com/NewAnthem

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Building the Mack Anthem® brick by brick

HEADLIGHTS



Mack Trucks donates Mack Anthem[®] model to Share the Road Highway safety program

Mack Trucks donated a 2018 Mack Anthem[®] 70-inch Stand Up Sleeper model to the American Trucking Associations' Share the Road highway safety program. Mack made the announcement during a key handover ceremony at ATA's Management Conference & Exhibition in Orlando, Florida.

"Safety is a key focus for Mack, something we've demonstrated through the design of our new Anthem model and the many safety-focused features it includes," says Jonathan Randall, senior vice president of sales for Mack Trucks North America. "Mack's commitment to safety goes beyond our trucks to those who share our nation's roads. We're proud to support the Share the Road drivers and their work to reach millions of people across the country with crucial messages about highway safety."

The Share the Road program engages truck drivers to conduct live safety exhibitions for students, members of the media and policy

makers. They demonstrate how to drive safely alongside semi-trucks. Each Share the Road driver has an outstanding driving record, including many with one million or more accident-free miles.

The drivers will travel the country in their new 2018 Mack Anthem 70-inch Stand Up Sleeper model to teach the driving public about truck stopping distances, demonstrate potential truck blind spots and share other safety considerations that can help ensure safe travel for everyone on the road.

"Mack Trucks has a long legacy of promoting highway safety, so we are very fortunate that ATA and Mack Trucks continue to partner together to advance highway safety through ATA's Share the Road program," ATA President and CEO Chris Spear says. "When teaching the motoring public about highway safety, our best tool is the Share the Road Mack Anthem because it gives people an opportunity to see what professional truck drivers can see during their day-to-day work."

Oakland Raiders score with Mack Anthem[®]

Mack Trucks hosted six Share the Road program drivers and displayed a Mack Anthem[®] model at an Oakland Raiders game in Oakland, California. Mack is the primary sponsor of Share the Road, an American Trucking Associations highway safety program that educates all drivers about sharing the roads safely with large trucks.

Following the pre-game festivities in Raiderville, where the Mack Anthem was prominently featured, the drivers had an opportunity to watch Raiders defensive end Khalil Mack help lead his team to victory Dec. 3 against the New York Giants. Mack Trucks reached a sponsorship agreement with Mack to support the launch of the Mack Anthem model earlier this year.



From left, Road Team drivers Russ Simpson, Holland; Wayne Crowder, FedEx Freight; Steve Smalley, ABF Freight; Eric Flick, FedEx Freight; Steve Fields, YRC Freight; and Dion Saiz, FedEx Freight.

Mack Trucks named the official transportation sponsor for Petty's Garage



Mack Trucks and Petty's Garage, the high-performance speed shop founded in 2008 by NASCAR legend Richard Petty, recently entered into a partnership agreement naming Mack the official transportation sponsor for the garage.

Petty's Garage is located at the historic facility in Level Cross, North Carolina, where winning stock cars were developed for more than 60 years. When the race team moved to Mooresville, North Carolina, Petty began Petty's Garage to deliver the ultimate driving experience to performance enthusiasts.

"Mack is pleased to partner with Petty's

Garage and to be named its official transportation sponsor," says John Walsh, Mack vice president of marketing. "Richard Petty is a NASCAR legend, so it is fitting that Mack, a legendary truck brand, would partner with the garage. Both are committed to delivering superior performance to customers along with unmatched customer service, so we are enthusiastic about this new partnership."

Mack Trucks already is the Official Hauler of NASCAR. As part of that agreement, Mack provided a fleet of custom-designed Mack® Pinnacle™ sleeper models spec'd to answer the challenges of the grueling

Mack Trucks and Petty's Garage recently inked a partnership agreement deeming Mack the official transportation sponsor for the garage. Petty's Garage will use a 2018 Mack Pinnacle Axle Back model to transport vintage cars to public events through its Performance Tour across the U.S.

NASCAR schedule. Now, Petty's Garage will also receive a custom-spec'd truck to transport cars to public events through its Performance Tour. The 2018 Mack Pinnacle Axle Back model equipped with an MP8-445C engine will bring Petty's Garage to fans and auto enthusiasts at select events across the U.S.

Mack prototype achieves zero emissions in eHighway demo

A Mack truck prototype equipped with a fully integrated plug-in hybrid electric driveline recently participated in a zero-emission eHighway demonstration in Carson, California.

Siemens also participated in the project and installed the eHighway infrastructure, which covers select lanes of a highway with a catenary system similar to those used to power trolleys or streetcars.

The Mack prototype used in the demonstrations is a Mack® Pinnacle™ Day Cab model equipped with a proprietary plug-in hybrid electric driveline, which saves fuel and reduces emissions when running in hybrid or in electric mode. The Mack truck can connect to the overhead contact lines and transfer energy to the truck's electric driveline thanks to a current collector supplied by Siemens, allowing it to operate with zero tailpipe emissions on the eHighway corridor.

The demo, which was sponsored by the South Coast Air Quality Management District, was conducted near the ports of Los Angeles and Long Beach. The goal of the project is to reduce air pollution at freight-intensive locations, such as the ports of Los Angeles and Long Beach, the two largest ports in the U.S.

"Mack was pleased to participate in the catenary demo," says Jonathan Randall, Mack senior vice president of North American sales. "Mack continuously investigates alternative solutions to diesel, and the catenary system is just one of a number of projects in which we are currently involved."



A prototype Mack® Pinnacle™ axle back model equipped with a proprietary plug-in hybrid electric driveline recently participated in a zero-emission eHighway demonstration in Carson, California. The demo was conducted as part of a project with Siemens and sponsored by the South Coast Air Quality Management District.

Mack has investigated several other solutions for reducing greenhouse gas emissions and pollution, including a plug-in hybrid electric powertrain and the use of alternative fuels such as dimethyl ether.

HEADLIGHTS

Mack evaluates video system for refuse trucks



Mack Trucks is evaluating incorporating Lytx systems into two of its refuse truck models. Lytx is a leading provider of video services that help enhance the safety, efficiency, productivity and profitability of fleets.

While full details regarding the agreement between Mack and Lytx have not been established, Mack says it is considering Lytx

DriveCam and Lytx Video Services Technology for its Mack® LR and TerraPro® refuse models. Lytx DriveCam is an in-cab camera system that records internal and external events when an abrupt lane change or hard braking occurs, while Lytx Video Services Technology continuously records external events regardless of a trigger situation.

“We are pleased to announce an agreement

with Lytx,” says David Pardue, vice president of connected vehicles and uptime services for Mack Trucks. “Lytx DriveCam technology can help improve the safety of those on the roadway, as well as inform fleets of drivers who may need some coaching. Lytx Video Services Technology also can help with theft prevention, job site monitoring and driver safety.”

Mack partners with Sears Seating to bring improved seat to LR model

Beginning in early 2018, Mack Trucks will offer a new multi-position seat for the Mack® LR model, boosting comfort and ergonomics for operators in the right-hand stand-up/sit-down drive configuration.

Developed with Sears Seating, the new seat was designed and engineered specifically for the Mack LR model. The enhanced multiple-position seat for right-hand operation LR cab configurations offers both seated and standing positions along with improved adjustability. Because both the seat back and seat base can be adjusted, drivers of varying statures can operate the truck and joystick controls more easily and comfortably.

“Working with Sears Seating to offer a Mack LR model-specific seat will improve the driving experience for the LR model,” says Curtis Dorwart, Mack refuse product manager. “The new seat is more ergonomic, more comfortable and can help improve driver productivity.”

The Mack LR model is built specifically to meet the challenges of refuse customers who require additional visibility and maneuverability in order to increase productivity. With both 6x4 and 4x2 configurations available, the Mack LR model is designed to work well in both tight urban and open suburban environments. Several control options are also available, including left-hand drive,

right-hand drive, dual-drive and left-hand drive with right-hand stand-up/sit down drive.

Mack’s 11-liter MP®7 diesel engine is standard in the LR model, delivering up to 355 horsepower and 1,260 lb.-ft. of torque. The LR model is equipped with an Allison RDS five-speed or six-speed automatic transmission.



Tradeshows and Events Schedule

Follow Mack Trucks at trade shows and events throughout North America!

Dates	Show Name	Location
January 23 – 26	World of Concrete	Las Vegas, NV
March 5 – 7	Technology & Maintenance Council	Atlanta, GA
March 7 – 9	Work Truck Show	Indianapolis, IN
March 22 – 24	Mid-America Trucking Show	Louisville, KY
March 22 – 24	American Truck Dealers	Las Vegas, NV
April 15 – 17	NTTC (Fairmont Royal York hotel)	Toronto, ON
April 19 – 21	Truck World	Toronto, ON
April 24 – 26	Waste Expo	Las Vegas, NV
April 29 – May 1	NPTC	Cincinnati, OH
October 27 – 30	American Trucking Associations	Austin, TX
October 24 – 25	Canadian Waste & Recycling	Toronto, ON
November 5 – 7	Tank Truck Week	Nashville, TN

TRENDS A roundup of the numbers that drive your business.

INFRASTRUCTURE



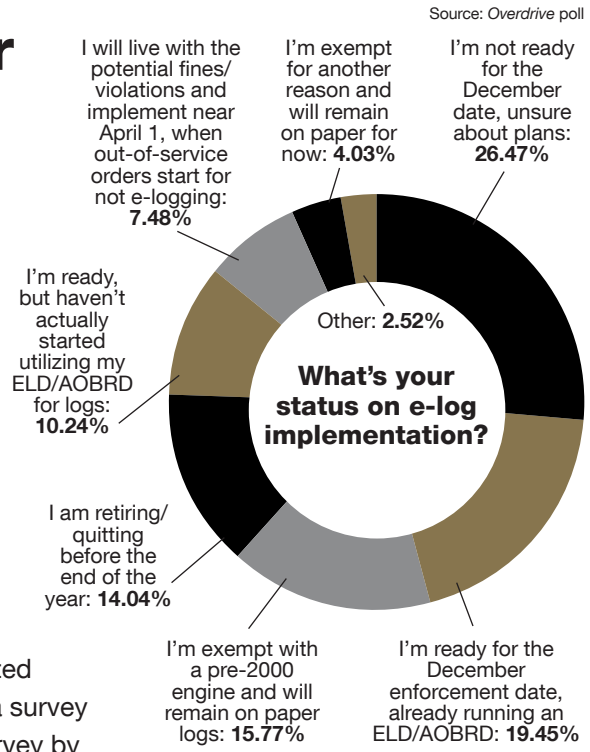
71%

THAT'S THE PERCENTAGE of U.S. residents who would support a 10-cent increase in the 18.4 cents-per-gallon gas tax that is used to pay for federal transportation projects, per a poll by Mineta Transportation Institute. Published reports indicate the Trump administration might be willing to advocate a fuel-tax hike to help pay for \$1 trillion in promised infrastructure investments.

TECHNOLOGY

Ready or NOT...

IT'S OFFICIAL. You have to operate with an ELD. While most owner-operators were ready, many had to scramble at the last minute. In fact, six weeks before the deadline, 60 percent of fleets with 100 or fewer trucks had not adopted ELDs, according to a survey by CarrierLists. A survey by Transplace conducted in mid-2016 found 81 percent of large fleets (those with more than 250 trucks) had implemented ELDs.



DRIVERS

Men and women quit for different reasons ...

Here are the top five, by gender.



Turnover predictors for female drivers:

1. Dissatisfaction with tractor
2. Dissatisfaction with compensation for deadhead miles
3. Dissatisfaction with hours worked
4. Inadequate preparation during orientation for driving at this carrier
5. Lack of respect at carrier's facilities

Turnover predictors for male drivers:

1. Dissatisfaction with home time
2. Lack of desire for career at this carrier
3. Dissatisfaction with deadhead miles
4. Dissatisfaction with frequency of maintenance done on equipment
5. Desire to switch dispatcher



Source: Stay Metrics

CONNECTED TRUCKS

40%: The proportion of fleet managers who say connected trucks are a "must-have" item.

35 million: The number of trucks worldwide predicted to be connected vehicles by 2020



Source: Start-ups Disrupting Global Connected Truck Market 2016-2017 by Frost & Sullivan

FREIGHT

A trillion-dollar industry

REVENUE ASSOCIATED with truck transport is projected to top \$1 trillion by 2024. Industry revenue is expected to grow annually by 5.4 percent between 2018 and 2023. Growth is then projected to slow to 4.7 percent through 2028.

For-hire carrier revenue <i>(in billions)</i>	2016- \$368
	2023- \$538
	2028- \$679
Truckload carrier revenue <i>(in billions)</i>	2023- \$454
	2028- \$568
Truck tonnage <i>(in billions)</i>	2016- 10.419
	2013- 12.579
	2028- 13.916

Source: American Trucking Associations' 2016-2028 Freight Transportation Forecast

COVER STORY

Connected truck drives uptime



Mack Trucks accelerates
toward total connectivity

By Denise Rondini



One of the most radical changes in **transportation** is the emergence of the completely connected, highly efficient truck. Driving the gains in efficiency is a network of innovation beyond maintenance and hardware. Mack Trucks has been at the forefront of not only connecting engines to other components and services but also in collaborating with a variety of telematics partners to offer the next level of predictive technology.

David Pardue, Mack's vice president of connected vehicle and contract services, says Mack takes the approach that advances in hardware drive opportunities to partner with a variety of cutting edge technology companies, gives customers more choices and places Mack ahead of the curve in the drive for total connectivity.

The conversation around connectivity has shifted from communication between a truck and its powertrain to sharing information between trucks, drivers and the

entire trucking infrastructure. While the future will include fully autonomous trucks, many of the enabling features are already in place with technology that is truly groundbreaking.

“Connectivity is really about how we turn technology into the availability of that vehicle to perform its operations every day”

**David Pardue,
Mack's vice president of
connected vehicle and
contract services**

Hardware and telematics

Sandeep Karr, chief strategy officer at Fleet Complete, breaks down the two kinds of connectivity.

“The first is systems of the vehicle talking to each other. For example, an engine talking to a transmission, a transmission talking to an axle, an axle talking to an engine and an engine talking to a brake,” he says. “What you realize once you start seeing the systems more connected — once the transmission learns about engine performance and the brakes learn about the transmission's operating parameter — suddenly you can start optimizing the performance of each of the systems within the vehicle with the overall aim of optimizing the performance of the vehicle itself.” Mack already achieves this efficiency with MP® engines and *mDRIVE*™.

The second wave of connectivity involves telematics and focusing on mobile resource management, Karr says. “Both your truck and driver are considered a mobile resource. This means whatever is happening with either equipment or employee, you receive pertinent information about the situation. This type of connectivity is capable of prognostics, which means the vehicle can predict an impending failure.”

One current benefit of connectivity is significantly improved uptime, and Mack is using connectivity to enhance and improve the vehicle repair process at its dealerships. “Connectivity is really about how we turn technology into the availability of that vehicle to perform its operations every day,” Pardue says.

COVER STORY



With connected trucks, Mack proactively takes the data off the truck in real time. “We engineer it, we analyze it, we diagnose it, we determine patterns and then we turn that into the approach we have developed for our Certified Uptime Centers,” he says.

When the vehicle arrives at a dealership it gets checked in, and the customer is informed about the length of time the repair will take.

“Mack takes technology and turns it into a decision and workflow experience to get the vehicle in and out of the dealership quicker,” Pardue explains. “We are using technology to enhance the customer experience rather than just provide information.”

With traditional truck repair, a vehicle drives into a dealership and the technician plugs in a diagnostic tool. “Basically the technician is starting from scratch to try to figure out what the problem is and where to troubleshoot,”

Pardue says. Sometime that process can be hit or miss and the vehicle can be at the dealership for days before the cause of the problem is determined. The result is the repair itself could end up taking several days or just a few hours.

Mack recognizes how frustrating this can be for vehicle owners who lost four days of vehicle productivity for a repair that took only two hours to complete. “What Certified Uptime Centers do is use all the data we are collecting in real time from telematics and from all the other vehicles we monitor and then diagnose the problem before the truck even gets to the dealership,” Pardue says.

Proactive to predictive

Smart systems are already in place and increasing safety and productivity as they evolve.

Paul Menig, who is CEO of Tech-I-M, a strategic management and business consulting firm, explains that today there are anywhere from a dozen to 75 computers on trucks that are doing some level of communication among themselves. “And you have vehicles with

seven to 20 sets of wires just for communications.”

Mack has more than 65,000 connected vehicles today that are operating in a variety of environments. Mack’s engineers are looking at data, finding patterns and making

determinations as to the most likely cause of the problem. Mack’s approach to connectivity is to pre-diagnose, pre-arrange and create all the decision points ahead of time by capitalizing on its fully integrated powertrain tied into GuardDog Connect.

Mack’s vision is to continue to take advantage of connectivity and move from proactive to predictive and eventually to prognostics. “We are looking at how connectivity can help us predict more about failures before they occur,” Pardue says.

But Mack is already moving beyond using connectivity to enhance the repair process with its launch of Over the Air, which updates vehicle software remotely.

Software for Mack’s powertrain components can be updated through Mack’s Over the Air service. Mack OTA integrates with Mack GuardDog Connect telematics hardware to deliver the software updates directly to the customer’s vehicle with minimal interruption to their operations.

Pardue explains how an over the air update or repair occurs. “When a code is identified that can be updated remotely, an Uptime Center agent alerts the customer and schedule for the update to be performed. At that point the driver receives instructions on steps to secure the vehicle and the update occurs. The driver can go to lunch or take care of paperwork while the repair takes place. The customer doesn’t even have to take the truck off the job site, thereby reaping productivity additional gains.”

He says that for customers, transit time is downtime. “If we can minimize the impact of

“We are using technology to enhance the customer experience rather than just provide information.”

David Pardue, Mack’s vice president of connected vehicle and contract services

transit time through connectivity services, that means the customer has more productive time during the work day.”

The benefits of connectivity have not yet been fully explored and leveraged, but Karr says the industry has already seen some development in the areas of vehicle to infrastructure, vehicle to driver and driver to infrastructure connectivity. “These things are happening today, but the question is when will they be adopted on a mass market scale?”

Connection and collaboration

With improved connectivity, will come more collaboration between various industry participants, and OEMs will partner with innovative companies to co-create new business models and deliver innovative solutions.

Mack is already doing this through its recent announcement of relationships with Lytx and GeoTab. Pardue says Mack has integrated GeoTab into the Certified Uptime Centers operations. Mack can now manage a legacy vehicle throughout a service event and even a non-Mack truck using the same

process it uses for its newer vehicles.

“Our approach is every truck, every time,” he says, emphasizing that the approach used with the Certified Uptime Centers is a “process, not a program.”

“We have reinforced that you have to do the process every time regardless of the make of truck.” The integration with GeoTab allows that to happen.

Future prognostics and autonomous trucks

Karr thinks autonomous driving will soon be here in the form of platooning and says that real transformation, when the fringe becomes the center of gravity, will come in the next four or five years. Beyond that he is looking at trucks becoming part of an overall freight ecosystem where everything is automated.

What about regulations?

Sandeep Karr, chief strategy officer at Fleet Complete, thinks regulation may be necessary for this new connected environment. “We have not seen regulations around autonomous trucking yet nor around cyber security and protecting trucks, yet. But those kinds of regulations are necessary, and I think the regulations will follow the technology.”

When Stu Russoli, highway product manager for Mack Trucks, is asked about autonomous trucks, he says he’s not sure when they will be on the roads but points out the “enabling” technology is rapidly falling into place. Some of what he describes as enablers include collision avoidance with active cruise control

gap and braking, lane departure warning, telematics for trucks to communicate and platoon and over the air software updates. “These enablers are a form of driver assistance designed to keep the driver and the traffic environment safe,” Russoli says.

Mack is pushing connectivity in the market because it sees ways connectivity can help customers optimize their operations. Savvy fleets are seeing how connectivity can solve their problems, enhance productivity and safety, and are embracing it. ■

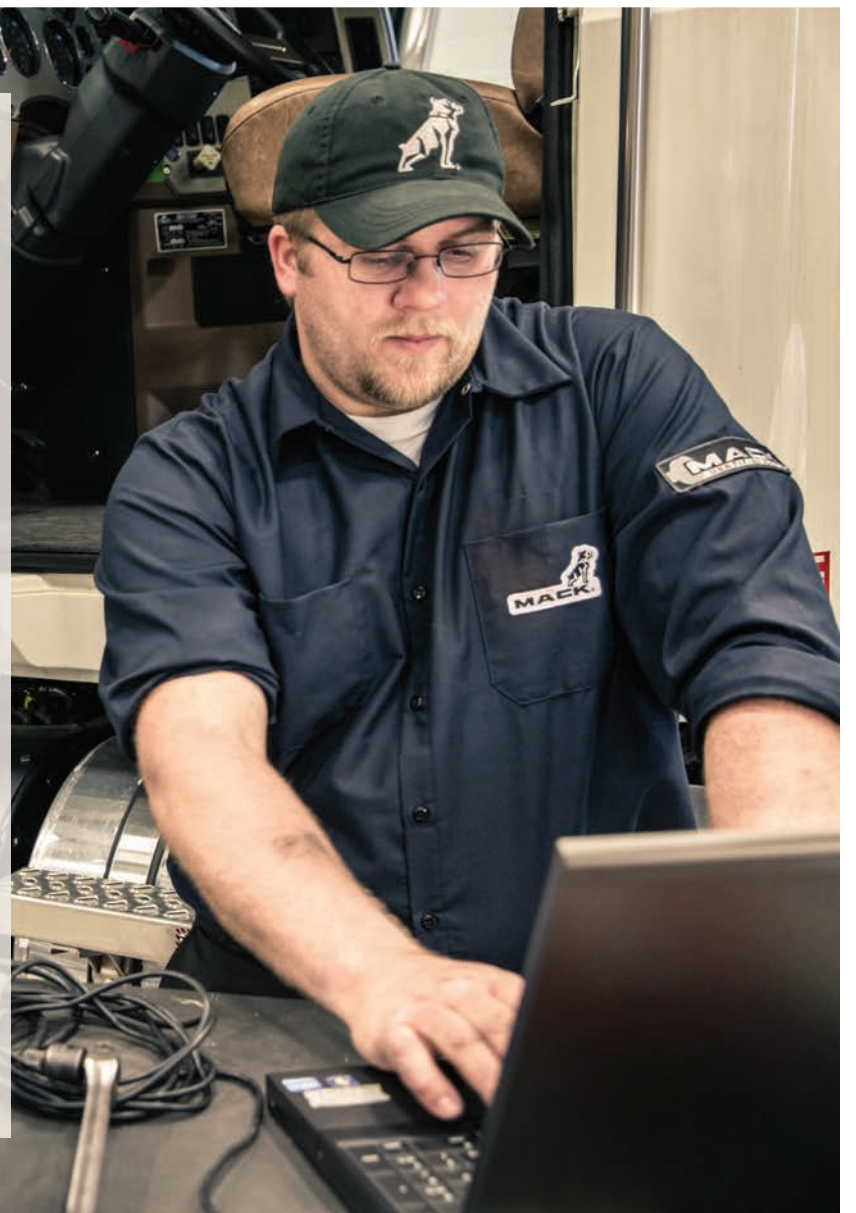
What it takes to be a Certified Uptime Center

Mack dealerships that want to become Certified Uptime Centers are evaluated on 28 standards in four key areas: cleanliness and organization; check-in assessment; communication; and work flow, says David Pardue, Mack’s vice president of connected vehicle and contract services.

A Mack Dealer Uptime Development Manager performs a gap assessment of a dealer’s operations, and provides an action plan detailing areas to improve deficiencies. Once they have made improvements, they go through an audit and are graded against the Certified Uptime Center standards.

Here are some specifics about the program.

- **Check-in:** A prompt assessment of vehicle status. The service adviser performs a walk-around assessment. Check-in and initial diagnosis should be completed in less than two hours.
- **Uptime bay:** Expedited service for short repairs. If the assessment indicates quick diagnosis and repair, the truck goes directly to an uptime bay.
- **Advanced bay:** Dedicated to longer repairs. Trucks needing more advanced diagnosis and repairs are routed to an advanced bay.
- **ASIST messaging:** Ongoing, up-to-the minute updates. Service advisers keep customers informed, and status alerts are sent throughout the service.



INSIDE MACK





(Above) Jonathan Randall, Mack senior VP of sales for North America, speaks to journalists at a press conference introducing the Mack Anthem® in September. (Right) Randall speaks with a trucker at a truckstop during Mack's two-day, 10-truck trade press convoy from Allentown, Pennsylvania, to Atlanta, Georgia.

Roaring into the market

Jonathan Randall on the Mack Anthem® launch and post-launch experiences

By Carolyn Mason

When the curtain rose on Sept. 13 and the Mack Anthem® was first revealed to the Mack dealer network and the general public, there was an intense feeling of exhilaration among those who saw it, but especially among the team that had spent the past few years bringing the project to this point.

The months leading up to the launch were jam-packed with an enormous effort to make all the moving parts — design, engineering, sales, marketing, aftermarket support and more — come together. And the time between the launch and the delivery of the first production trucks to customers was also intense and eventful.

The unveiling

The Mack Anthem was officially unveiled at Mack's Global Dealer Summit in Allentown, Pennsylvania, and in a Facebook Live video event following months of social media and advertising teases.

The planning was well underway when Jonathan Randall was named senior vice

president of sales for North America in spring 2016.

With more than a year to go before the Anthem's launch, he immediately focused on the go-to-market strategy and how to position Mack as a significant player in the long-haul segment of the market.

His first look behind the curtain at the Mack Anthem confirmed that this was one "badass" truck.

"Just 'wow.' You immediately recognize that this is a Mack® truck. The Mack lineage, the Mack heritage is in that design, but it's still extremely functional, extremely slippery from an aerodynamics standpoint, but it stands out and that's what Mack does," Randall says.

Randall says the launch did more than he had hoped for, not only generating excitement about the product but also powering the momentum of the brand. With the continued repositioning of the brand, the line of demarcation was really evident. It was truly the notification to the market that Mack is serious about on-highway segment. "We introduced a new Mack without discarding

INSIDE MACK

the brand's heritage." He thinks the introduction of the Mack Anthem sends a very strong message that Mack never went away and is not here to just participate, but here to win.

"It was really after the launch and after showing the truck that I experienced the sense of shared euphoria. It's like after you see something amazing in a sporting event you don't want to leave. It hit home that all the hard work the team put into the project was paying off."

Randall felt certain the Mack Anthem hit all the right notes and the dealers confirmed it.

Dealers were brought in for early looks and he says their response were like everybody else's. "You get the initial comment, 'Wow, that's a cool truck.' Then it's followed up by 'and it truly is a Mack.' That's when we segue into the features, the benefits, the options that we're able to provide and their response is, 'This is something I can sell.'"

Since the launch, their enthusiasm has continued to grow as they experience the excitement of selling the Mack Anthem and say order intake is strong.

Randall says there's a high level of interest at the customer level, especially in the long haul sleeper market. "This has been a challenging segment for us and since the launch, it's expanded exponentially. Doors that we would knock on without response are now being opened and calls are returned enthusiastically. In fact, we have customers calling our dealers, looking at the truck, asking for quotes," he says.

It's a convoy

While it's been a wild ride, Randall says that for him, the best part of the launch was when after all the presentations he made use of his CDL and drove in a convoy of eight Anthems, one Pinnacle™ and one



Granite® traveling 850 miles from Allentown to Atlanta.

They started at the newly renovated Mack Customer Center on Sept. 15, with a police escort. The plan was to give truckers and the public a first look at Mack's new highway hero, with visits to truck stops along the way so drivers could check out the trucks up close and personal.

"As we drove by, you could see car and truck drivers leaning out their window, doing double-takes. Many took photos and videos of the Mack Anthem, rolling down the highway. Truckers used their CB radios to express their awe and amazement at the design of the new truck."

"Listening to the CB chatter along the way about how awesome, fantastic and 'badass' the trucks looked on the highway, as well as watching others take photos from cars and trucks, was a great indicator of the extremely positive response we've received from dealers, customers and the public to these new vehicles," Randall says.

The inclusion of trucker input clearly made a difference in design and

TEST DRIVE Mack Anthem®

By Jason Cannon

As seen at CCJDigital.com

After more than a decade on the highway, Mack's® Pinnacle™ tractor will yield its position as the company's flagship long-haul truck next model year.

Anthem – a tractor that made its debut in September and will replace the Pinnacle axle back models that have helped Mack carve out about a 2 percent share of the long-haul segment – is the company's next-generation on-highway truck, offering a unique mix of legacy styling and modern engineering.

Mack-like look with aero performance

The exterior of the Anthem bears little resemblance to the model it will supplant, but it does manage several nods to Macks of years past. Anthem's large, structural and beefy grille is reminiscent of a SuperLiner, and the truck's flat, chiseled fenders are a throwback



to the RD Model.

"The whole goal was to design something that looks like a Mack," says Stu Russoli, Mack's highway marketing manager.

"We wanted a dramatic, new, efficient design that screams strong and hardworking and Mack," adds Mack Trucks Vice President of Global Marketing John Walsh.

Mission accomplished on all fronts

There's a lot of tradition in this new design – the name Anthem itself is a reflection of the company's commitment to American manufacturing – but it offers plenty of modern benefit. Mack designers and engineers used

advanced computer modeling and coast-down testing at Kennedy Space Center to put together body lines that reduce aerodynamic drag by 6 percent and help improve fuel efficiency by up to 3 percent versus a similarly equipped Pinnacle.

Those flat fenders help throw air down the side of the trailer, decreasing aerodynamic drag.

The slanted hood slopes upward as it approaches the windshield to toss air over the truck, and the deep slope of the hood also improves visibility.

The sun visor is designed to cut through the air without creating turbulence, and from there, air passes over a one-piece composite roof that smoothly moves air over and around both the



The convoy featured eight Mack Anthem® models, including:

- A blacked out, custom Mack Anthem 70-inch Stand Up sleeper and dry van trailer;
- Mack Anthem 70-inch Stand Up sleeper featuring the Mack MP®8-TC with turbo compounding and dry van trailer;
- Mack Anthem 70-inch Stand Up sleeper and dry van trailer;
- Mack Anthem 70-inch Stand Up sleeper and pneumatic tanker;
- Mack Anthem 70-inch Stand Up sleeper and dump trailer;
- Mack Anthem 48-inch Flat Top sleeper and flatbed trailer;
- Mack Anthem Day Cab outfitted with Mack's 6x2 with liftable pusher axle hauling a tanker;
- Mack Anthem Day Cab and dry van trailer.
- And a Mack Granite® dump truck and Mack® Pinnacle™ 70-inch Stand Up sleeper hauling a dry van trailer rounded out the convoy.

engineering of the Mack Anthem, and the hard work was not lost on truckers. Randall appreciated how their positive feedback revolved around the design and how the aerodynamics still looked like a Mack and not a jelly bean. The interior got rave reviews for the roominess and how intuitive the human machine interaction is. "The emotional response was about the bold design and the overall look," he says.

Fleet peeks

In the next few months, the Mack Anthem was displayed at several fleet-oriented shows where the new truck continued to generate a lot of interest. "We didn't have the largest booth but it was one of the busiest. There was great interest in the Mack Anthem, especially from fleets that had never considered Mack for their over-the-road market," Randall says.

For the first quarter of this year, there is a full slate of opportunities to show off the Mack Anthem, including a cross country road show, and via continued sponsorship of American Trucking Associations' Share the Road highway safety program. Share the Road now has a brand-new Mack Anthem Stand Up Sleeper model to use to deliver highway safety messages to audiences around the country. The months ahead will also be full of customer test drives and visits to the Mack Customer Center.

There is great opportunity to launch into new markets and continue the relaunching of the brand. Randall says he's excited about the new products and enthusiasm from the market so far.

"You don't often in your professional career get to change the course of a company's future. I believe that this launch presents Mack with the opportunity to change Mack's trajectory." ■



sleeper and trailer. A roof fairing with an adjustable tab helps improve airflow from the cab to the trailer on the 70-inch stand-up sleeper.

Hood-mounted mirrors sit up high, decreasing wind resistance by pushing air around the door mirrors. The hood mirrors offer a wide panoramic view on either side of the truck, practically eliminating blind spots and picking up passing vehicles before they ever reach the trailer.

The hood mirrors are large, and you can spec them off the truck, but I found them a handy complement to the door mirrors. Under most circumstances, vibration was minimal and noticeably less than more traditional tripod fender-mounted mirrors. They also feature a breakaway design, allowing them to fold in upon impact and lessen the likelihood of damage.

Anthem's hood and bumper not only improve aerodynamics, they also help cut service time. Both feature a three-piece

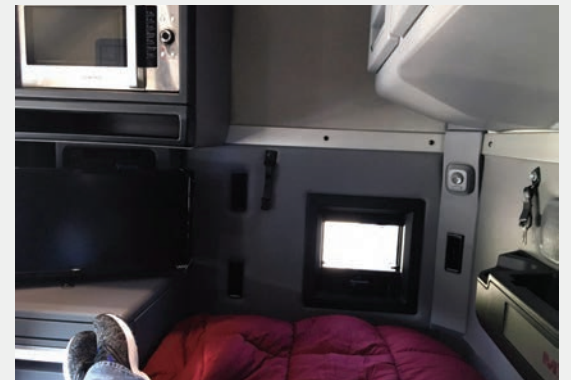


construction. A new central hood-latch release below the grille eliminates the need for drivers to walk from side to side to tilt the hood forward; the hood now requires 50 percent less effort to raise.

A close-out flange prevents airflow between the hood and bumper and helps move air around the cab. Covered tow hooks cut wind resistance, and the bumper and bumper air dam help reduce air drag underneath the truck.

Keeping air attached to the truck also makes the interior quieter, which made my two-day 850-mile drive from Allentown, Pennsylvania, to Atlanta feel less mentally taxing. You could talk in a normal volume and hear CB chatter and the radio clearly without amping up the volume to obnoxious levels.

Anthem gets an LED makeover inside and out. New LED headlamps are 66 percent brighter, almost doubling low-beam lumens while providing a wider, whiter light with lower electrical draw and longer service life.



Designed for drivers, by drivers

Mack's newest on-highway tractor may have debuted only a few days ago, but it's been part of the company's long-term product strategy for the past several years. The truck's design process started about five years ago with driver surveys.

Mack designers and engineers crawled through any truck they could get their hands on at truck stops, asking drivers about the features they liked, the ones they didn't and what things they would like to see added or taken away.

Fleets spend upwards of \$7,000 to recruit, train and onboard a driver, but industry turnover is more than 70 percent. With its fine-tuned interior and driver comforts, Mack hopes the Anthem model will help drive retention rates, drop total cost of ownership

continued on page 14

INSIDE MACK

TEST DRIVE

continued from page 13

and drive the Pennsylvania truck maker's market share along the way.

The Anthem, now available for order with production scheduled for this month, is available in day cab, all-new 48-inch flat-top sleeper and 70-inch stand-up sleeper.

The 70-inch stand-up sleeper – the largest offered on Anthem – is eight inches taller than Mack's previous mid-rise sleeper, and interior roof height at the driver's seat is a foot higher – 6 feet 11 inches at the driver's seat and 7 feet 1 inch at the rear of the bunk. It's this sleeper – thanks to its size and comfort – that Jonathan Randall, Mack's senior vice president of sales, thinks will help the company gain consideration in the long-haul segment.

I could stand comfortably between the passenger and driver seat and only gained more headroom as I worked my way back to the bunk.

The bunk is spacious and nicely appointed. The 70-inch stand-up sleeper has 35 percent more space than previous models and an additional 27 cubic feet of storage, including a three-compartment set of bins suspended under the bunk.

A panel mounted in the sleeper features power outlets, USB ports and controls to the sleeper stereo, interior lighting and high-performance HVAC system.

The bunk features dimmable pipe lighting around the perimeter of the driver environment, bunk task lights and overhead LED lights. The addition of LED lights makes doing paperwork in the dark less of a hassle.

Built-in aircraft-style pulldown shades block 100 percent of the light and are screened with the window tilting out to let air in but keep rain out.

An updated automotive-inspired interior design keeps everything around the driver and has a wraparound cockpit-type feel. The Mack *mDRIVE* automated manual transmission shift pad is pushed higher on the dash and closer to the driver. Laser-etched rocker switches have been repositioned higher on the dash, while some switch functions – like the wipers and engine brake – have been eliminated entirely and moved to stalks behind the flat-bottom steering wheel.

I've never liked having basic driving functions located off the wheel. With its model-year 2019 design, Mack has put them in a much more intuitive place.

The flat-bottom steering wheel – an industry first – gives the driver more space between his or her lap and the bottom of the wheel, making swinging in and out of the truck easier, especially when the seat is fully inflated.

I prefer to drive with the seat close to the wheel and with the wheel dropped low. The flat bottom allowed me to bring the seat further forward and lower the wheel without having to change my natural position in the seat.



This feature should allow larger-stature drivers to find a more comfortable driving position, or at least give them the opportunity to move closer to the wheel than they have previously.

The new steering wheel also contains illuminated controls for cruise control, Bluetooth and the audio system.

Behind the steering wheel rests Mack's updated five-inch full-color Co-Pilot display. Co-Pilot provides drivers with vehicle information monitoring, including engine and oil temperatures, trip odometers, aftertreatment status and tire pressures. A Pre-Trip Assistant helps guide drivers through inspection points and includes an exterior light inspection mode, which will activate the truck's lights for a walk-around inspection.

Climbing in and out of the truck, you first notice the grab handle has been moved lower off the A-pillar, making it easier to maintain three points of contact.

Engineered for Mack power

As Anthem inherits the moniker of Mack's newest "Highway Hero," it also becomes the torchbearer for the company's integrated powertrain.

As with all Mack trucks, the *mDRIVE* automated manual transmission comes standard. In Anthem's case, it's a 12-speed. When fully integrated with an MP engine, the *mDRIVE* uses sensors to detect speed, load and grade to ensure optimal gear and shift points are selected based on conditions.

Mack's reinforced and ruggedized *mDRIVE* HD AMT is available as an option on all Anthem models, including 13- and 14-speed variants that add one or two low-ratio creeper gears.

Creeper gears offer low-speed maneuverability while also allowing for lower rear-axle ratios for better fuel economy at highway speed.

Mack's Predictive Cruise is available on *mDRIVE*-equipped models. Mack Predictive Cruise learns the topography of a given route and stores up to 4,500 hills in its memory. The next time the driver travels the route, Mack Predictive Cruise deploys an optimized shift strategy and chooses the most fuel-efficient gear, helping improve fuel efficiency by up to 1 percent.

The Anthem is available with Mack's MP[®]8 13-liter engine with up to 505 hp and 1,860 lb.-ft. of torque depending on spec. The 11-liter Mack MP[®]7 is available as an option, with up to 425 hp and 1,560 lb.-ft. of torque. Mack's SuperEconodyne downspeeding packages are available with both engines.

Also available as an option is Mack's turbo-compounding MP8, which captures and converts waste energy from the exhaust into mechanical energy that is fed back to the engine.

The turbo-compounding MP8 made its debut this year, but order rates to-date have been low given Mack's low truck order volume from the long-haul segment – the application where this engine setup makes the most sense and strongest business case. The turbo-compounding system puts up to 50 additional "free" horsepower back to the crankshaft. Combined with the Anthem's aerodynamic improvements, the turbo-compounding MP8 engine provides up to an 11.8 percent improvement in fuel efficiency compared with a baseline from previous Mack models equipped with GHG 2014 engines because the turbo compounding setup needs less fuel to make maximum power.

At 445 hp and 1,860 lb.-ft. of torque it's a

solid performer. Fully loaded, I routinely got full torque at less than 1,000 rpm, and the reduction in the number of downshifts at cruising speed was noticeable. It's a smart and intuitive setup that really shines on long stretches at highway speeds.

Added connectivity and safety

Anthem also will ring in the Mack Connect platform, which will serve as the reference for Mack's expanding connectivity and uptime services. Mack Connect will structure current and future services under Connected Support, Connected Business and Connected Driving. Using predictive analytics and connective technologies, Mack Connect uses data produced by the truck, the driver and the service process to form insights and actions.

Under Connected Support, Mack GuardDog® Connect proactively monitors truck performance and automatically notifies Mack's Uptime Center when a potential issue is detected. Under Connected Business, GuardDog Connect can send vehicle data directly to Mack's fleet management partners, allowing customers to choose fleet management software that works for their business without having to rely on third-party hardware installations. Connected Driving covers the truck's information and entertainment options, including Bluetooth connectivity, satellite radio and Apple CarPlay integration.

Bendix's Wingman Fusion camera- and radar-based driver assistance system comes standard on all Anthem models, providing collision mitigation, adaptive cruise control and lane departure warning.

The adaptive cruise control is handy on

long drags of highway. Its ability to maintain a given speed, account for over- and under-speed and maintain a safe following distance helps keep the driver from switching off cruise control with constant braking, which is annoying and not fuel-efficient.

Loaded to about 77,000 pounds gross, I drove for many long stretches with adaptive cruise engaged and was impressed by the system's ability to make adjustments on the fly while safely maintaining my speed preferences. It was just another impressive feature in an overall impressive truck that translates to an impressive driving experience.

What Mack has done with its Anthem is taken one of the best drivelines on the highway, wrapped it in a chiseled and surprisingly aerodynamic package and thrown in added ergonomics and comfort not widely associated with a Mack. ■



Mack Trucks® launched the all-new Mack Anthem® highway model for the Mexican market in November at ExpoTransporte in Guadalajara. Combining power, efficiency and comfort with an unmistakably Mack design, the Mack Anthem gives drivers and businesses the tools they need to command the road. Mack Anthem models feature all-new driving and sleeper environments.

Mack launches Mack Anthem® at ExpoTransporte 2017

In November, Mack Trucks launched the all-new Mack Anthem® highway model for the Mexican market at ExpoTransporte in Guadalajara.

“Built with Mack’s legendary durability and our latest innovations to improve fuel efficiency and productivity, the Mack Anthem is designed to meet the needs of our Mexican customers,” says Dennis Slagle, president, Mack Trucks. “We’re confident that these features, along with the new standard of driver comfort delivered by the Mack Anthem, will help boost Mack’s presence in the important Mexican market.”

Mack launched the Mack Anthem model for the U.S. and Canadian markets in September 2017 to tremendous customer response. With a

bold grille and prominent Mack wordmark, the Mack Anthem’s all-new exterior design optimizes aerodynamics for improved fuel efficiency. The Mack Anthem also includes new driving and sleeping environments designed with an emphasis on increasing driver comfort and productivity. Several configurations are available, including a Day Cab, an all-new 48-inch Flat Top Sleeper, and an all-new 70-inch Stand Up Sleeper.

Multiple interior configurations are available to meet the needs of customers’ varying applications. When outfitted with maximum storage options, the Mack Anthem boasts an industry-leading 27 cubic feet of storage. Mack Anthem’s 70-inch Stand Up Sleeper models

are available in single or double bunk configuration.

All interior lighting is also LED-based, reducing electrical consumption, while providing brighter lighting for tasks.

Mack Anthem models sold in the Mexican market are equipped with Mack’s legendary integrated powertrain featuring Mack MP® engines, the Mack *mDRIVE*™ AMT and Mack axles. Mack Anthem models sold in Mexico come standard with Euro 4-rated Mack MP engines. Where approved, and where ultra-low-sulfur diesel and diesel exhaust fluid are available, customers can choose Mack’s GHG2017 MP8 for improved fuel efficiency and reduced emissions. ■

AT WORK

Optimal uptime



Mack[®]
Pinnacle[™]
adds power
and increased
uptime for
Intermodal
Cartage
Company

Story and photos by Carmen Sisson

Shipping containers fill the yard at Intermodal Cartage Company, with the multicolored steel stacks towering over the heavy-duty Mack[®] Pinnacles[™] waiting to carry them to their destinations.

Memphis-based IMCG, one of eight businesses operating under the IMC Companies umbrella, has become a leader in container drayage, tapping into more than three decades of experience in international supply chain solutions. They also provide customs house brokerage, truck brokerage, freight forwarding, warehousing, chassis provisioning and secured container storage.

Intermodal drayage is a tough application and requires suitably tough trucks. Most loads fall inside the the standard 80,000

pound GCW limit, but some require special permits to carry more.

The Mack Pinnacle models have proven more than capable, says IMCG maintenance director Rick Seawright. Five years ago, the company purchased four model year 2012 Pinnacles for a trial. After years of issues with other manufacturers, the Macks' reliability was a pleasant surprise, says their salesman, Todd Garley of Tri-State Truck Center in Memphis.

As the five-year mark approached, IMCG began pushing the trucks even harder, letting their incoming, less experienced drivers get behind the wheel of the 2012 Pinnacles.

"Even in that situation, they didn't encounter the mechanical failures that had become

habitual," Garley says. "They were used to having downtime with other manufacturers and having to have backup trucks. I think they were waiting for the other shoe to drop. It's amazing what you can become used to when it becomes your norm."

Those four trucks are still running strong today, and in December, IMCG took delivery of 90 additional Pinnacles. Eventually, they expect to replace the majority of their 250-truck fleet with Mack.

"The Macks we've had over the past five years rarely have to go back to the dealer," Seawright says. "The uptime is a big plus. Their systems run. They don't stay in the shop."

Dependability has improved by 15 to 20



Joel Henry, president of Intermodal Cartage Company, talks with maintenance director Rick Seawright. ICMG, which specializes in container drayage, recently purchased 90 2018 Mack® Pinnacle™ trucks.

percent, estimates ICMG president Joel Henry, and he expects the new trucks will yield a 3 to 4 percent cost savings per year.

The latest Pinnacles have 13-liter MP®8 415 hp engines with 1,650 lb.-ft. of torque and are spec'd with *mDRIVE*™ automated manual transmissions — but specs are only part of the picture.

The Macks are heavier duty than other brands, Seawright says, making a 415 hp engine outperform another manufacturer's 430 hp engine.

"Our application of the truck is tough," he says. "We go through lots of unimproved areas and gravel yards. It's tough on suspension. That's why you see so many Macks used as dump trucks — there's a reason for that."

Thanks to the *mDRIVE*, all that power doesn't equal increased fuel consumption. Instead, the 12-speed, two-pedal automated transmission saves money, Seawright says. With no clutch pedal or shift lever, the

mDRIVE shifts the same every time, automatically selecting the best gear for the conditions and bringing their lowest drivers' fuel economy average in line with their best drivers' average.

While some drivers were averaging in the low 5 mpgs, most are now averaging 6.7 mpg.

And the *mDRIVE* saves money in maintenance and repair. With other transmissions, burned-out clutches were a frequent headache, averaging as much as \$2,500 per repair. The upgrade to the *mDRIVE* transmission more than pays for itself, Seawright says. Even the small savings can add up, and that's one thing

companies tend to overlook, Garley says. With their other trucks, they were constantly having to replace interior parts like knobs, dash trim and door handles. That, too, is a thing of the past.

If the trucks do have problems, which are

rare, GuardDog® Connect is on the job, often alerting drivers and calling in a maintenance request before the driver even knows there is an issue.

The new trucks also come with advanced technologies and more safety features. Seawright is particularly impressed with Mack Predictive Cruise, which uses GPS to memorize a route when the cruise control is engaged and stores up to 4,500 hills in its memory. The next time the driver travels that route, the *mDRIVE* will remember the topography and choose the most fuel-efficient gear, hill after hill.

Better forward visibility, low hood profile, forward and inward facing cameras, and hood and side down memory mirrors are additional safety features.

It all adds up to a safer, more fuel-efficient vehicle, but there is another major benefit — drivers are happier, and recruitment and retention is better than ever. Keeping good drivers is an industrywide challenge and ICMG is no exception.

"Driver retention is a big issue," admits Joel Henry. ICMG currently has a significantly better retention rate compared to the overall industry, but he believes his new Macks will make that number even better.

"Mack has a very good reputation for safety and good brand recognition with drivers," he says. "Drivers like the Mack. We have a better product and a safer unit." ■

“The Macks we’ve had over the past five years rarely have to go back to the dealer. The uptime is a big plus. Their systems run. They don’t stay in the shop.

**Rick Seawright,
ICMG maintenance director**

AT WORK

Mack is clear advantage for glass hauler

Moore Freight converts to all-Mack® fleet


Dan Moore is an innovator as well as a businessman, so when his glass transporting fleet — one of only a few such specialized haulers in the U.S. — ran into a problem, he wasted no time figuring out how to solve it. In his case, the answer was crystal clear: Change his mixed fleet to all Mack®. His decision to fill his yard with 140 Mack® Pinnacles™ saved not only money but, possibly, his business.

Moore Freight Service was founded in 2000 in Mascot, Tennessee, near Knoxville, with little more than some cubicles, a fax machine and a solid business plan to serve the glass manufacturing industry. Initially the fleet was only one truck and two owner-operators. Before long, word of his experience in the glass industry spread, and soon he was buying more trucks and hiring more drivers.

Today, Moore Freight has 140 company drivers and 25 owner-operators. They specialize in transporting crated and uncrated flat glass, which ranges from 2.2 millimeters to an inch thick. It is a highly exacting business that suits Moore — and his Pinnacles — well. The biggest challenge is getting the shipments quickly and safely to the vendors, without breakage or workplace injuries.

The challenge

Moore required reliable equipment, a consistent drawback of operating the mixed equipment fleet. Glass is a seasonal business, peaking in spring and summer, when housing is in high demand. Natural disasters also create a spike in glass usage. When business is booming, trucks



“It’s a big change. Our fuel bill was averaging \$20 million per year, and Mack has cut that in half. Our maintenance costs have gone down by two-thirds.”

Dan Moore, Moore Freight Service

Dan Moore, owner and founder of Moore Freight Service, stands beside one of the company’s Mack® Pinnacles™. After having numerous problems with another vendor, Moore switched to an all-Mack fleet, a move which saved money and alleviated his uptime issues.

Story and photos by Carmen Sisson

must be rolling, but with its aging mixed fleet, Moore Freight could barely keep trucks on the road.

“We had a particular brand of truck that kept breaking down, and it was costing us market share,” Moore says. “The president of that truck company sent a letter to our customers saying, ‘It’s not Mr. Moore’s fault. We’re going to put trucks at all his locations so when these trucks break down, they’ll have a loaner.’ That’s pretty bad.”

“That’s not exactly confidence inspiring,” agrees Jim Toussaint, division operations manager of Worldwide Equipment, a Mack dealership and a Certified Uptime Center in Knoxville. In 2010, when he met Moore, he found a frustrated businessman in need of a solution.

“He told me, ‘I don’t care about fuel economy. I don’t care what color they are. I don’t care what they look like. I need something that’s going

to run, because if it doesn’t run, the rest of it doesn’t matter,’” Toussaint recalls.

The solution

Together, Moore and Toussaint created a new, all-Mack fleet, complete with GuardDog® Connect and extended coverage plans, which provide beyond-warranty coverage for the engine, exhaust system and air conditioning components.

“When you run that out over the period that covers, which is 60 months or 650,000 miles, it runs out to about 1.25 cents per mile, which is pretty inexpensive,” Toussaint says. “They’ve elected to trade maintenance dollars for capital dollars, and so far, that’s worked out pretty well for them.”

Moore’s current fleet averages 2.5 years old and consists of Mack Pinnacle 70-inch double bunk sleepers, running 13-liter MP®8 Super Econodyne 445 hp engines, with 1,860-lb.-ft. of torque and a 2.64 rear-end ratio. They are also outfitted with *mDRIVE*™ transmissions and air suspension.

Moore’s previous fleet’s fuel usage averaged 4.5 miles per gallon, but his Macks give more than 8 mpg. Maintenance costs plummeted also, from 30 cents per mile to 11-12 cents per mile.

“It’s a big change,” Moore says. “Our fuel bill was averaging \$20 million per year, and Mack has cut that in half. Our maintenance costs have gone down by two-thirds.”

Improved safety features were another important factor when Moore decided to go with Mack.

“Glass is hazardous,” Moore says. “You’ve got to know what you’re doing.”

Every driver completes a one-week class at a glass plant, where they learn the intricacies of hauling glass, from how to load and offload it to where to stand.

The *mDRIVE* helps with safety, especially in rough terrain; Moore Freight delivers to 48 states as well as Canada, and drivers see a wide range of road conditions.

“The *mDRIVE* takes out all the bad habits drivers have in shifting, when you’ve got downshifting going down a mountain or when you’re in inclement weather,” Moore says. “Mack automatically takes out most of that concern with all the innovations they have made. We’ve had drivers raised on 10-speeds and 13-speeds who said they would never drive an automatic, but they love the *mDRIVE*.”

Another advantage: Moore no longer worries about uptime. With GuardDog Connect, drivers are alerted to potential problems sometimes before they are even aware of them, and they are routed to the nearest dealer for repairs. Moore receives the alerts, too, making him aware of not only the problem, but also an estimate on the repair time.

“I see the notifications, and I know it’s being handled,” Moore says. “I don’t go deep into that. If we have any issue with the truck, they let us know when it gets (to the repair center), what the problem is, and when it’s going to get out so we can notify our customers. If it’s being handled in a timely fashion, I’m OK. With the Uptime program, Mack can get us in the door so we can get the problem fixed. They’re good at what they do.”

“The best downtime is no downtime,” Toussaint says. “The best warranty is no warranty. I think what’s worked best for him is they just run.”

Driver recruitment and retention

The cost savings has enabled Moore to improve his driver recruitment and retention rates by increasing their mileage reimbursement to 65 cents per mile, offering bigger bonuses and spec’ing tractors with premium seats and trim.

The drivers are worth it, Moore says. They average more than 500 miles per day and are the backbone of the company.

“Drivers take pride in their rig,” he says. “They like chrome and the

AT WORK



Jim Toussaint, Division Operations Manager of Worldwide Equipment, listens as Steve Sparks, fabrication manager at Moore Freight Service, explains the company's proprietary rack system, Oct. 31, 2017, in Mascot, Tenn. The new rack enables customers to preload shipments and allows drivers to offload in less than 15 minutes instead of the two to three hours required with the old system.

image of driving a Mack. We believe they deserve the best. Without drivers, you don't have a company. Without a good truck, you don't have a company — or you get close to not having a company, like we did. Customers are also influenced by safe, reliable equipment. It speaks volumes about us that we operate top-of-the-line equipment.”

Moore seeks ways to improve the customer experience, talking with them about their needs and, when necessary, creating custom, patented products like his latest invention — a special system that allows racks to be preloaded with glass, driven into a custom 45-foot trailer and dropped off at a customer's dock for offloading at their convenience.

The new system cuts down on the potential for driver injuries and gets them back on the road quicker. Normally, a driver would have to wait two to three hours for a shipment to be offloaded, and everyone at the plant would have to stop what they were doing to handle the shipment. Now, drivers can be in and out within 15 minutes.

Moore's fabrication shop has built 200 racks and intends to build more as their customers continue to embrace the new concept. Using drive-ins instead of curtain side trailers saves money on the equipment purchase as well as the maintenance.

Revenue growth

Because glass is such an expensive industry, every dollar saved helps. And Moore intends to stay in the business for a long time. Moore Freight has rapidly grown from a \$100,000 annual revenue to more than

\$40 million, and they are regularly listed among *Inc.* Magazine's annual list of the top 5,000 fastest growing private companies in the country.

“You've got to either be in glass or not in glass,” Moore says. “You've got to commit. With our equipment, you're looking at a (tractor-trailer) unit that's somewhere around \$225,000, and not everybody

is going to put that kind of equipment into the glass industry. All we do is glass.”

And all Moore plans to use in the future is Mack. He already has his eyes set on Mack's newest model, the Mack Anthem®.

“I like the way it looks — very classy,” Moore says. “I think Mack has a good-looking product. It doesn't look cheap. It has good eye appeal when it's going down the road. We're not going to buy anything else other than Mack. The ones we've been getting are great, but the Anthem tells me that Mack is looking outside the box to capture drivers' imaginations.”

He also intends to continue his business relationship with Toussaint at Worldwide Equipment.

“Worldwide Equipment was the only company to stay with us and work with us as far as getting new

equipment,” Moore says. “Loyalty speaks volumes. We will always go through Worldwide Equipment.”

He attributes his success to not only his equipment but also his drivers and staff.

“It's a team effort,” Moore says. “We talk to our customers and see what we can do to improve their efficiency. We're a free-thinking company. It takes a lot of individuals and a lot of pieces of the puzzle to make a successful company. My people are the best in the business, and I couldn't be happier or prouder.” ■



“The *mDRIVE* takes out all the bad habits drivers have in shifting, when you've got downshifting going down a mountain or when you're in inclement weather. Mack automatically takes out most of that concern with all the innovations they have made.”

Dan Moore, Moore Freight Service



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Wendy Smith coordinates maintenance operations for Red Classic.

A classic American partnership

Mack Trucks helps Red Classic meet the demands of fast-paced expansion.

By Carmen Sisson

Red Classic — a subsidiary of the largest independent Coca-Cola bottler in the United States — has seen very strong growth across its divisions, and Mack Trucks is helping the company meet the equipment and logistics challenges that come with such rapid expansion.

Prior to 2011, Red Classic was the in-house transportation arm of Charlotte, N.C.-based Coca-Cola Consolidated. When the parent firm spun Red Classic into a separate entity, the door opened for impressive market advancement.

“By spinning off (Red Classic) into a separate company, we were able to gain backhaul opportunities,” says Wendy Smith, region manager, maintenance operations South, for Red Classic. “Before that, we were going out full, coming back empty, and it just didn’t make sense. We had old equipment and not as many drivers.”

Since Red Classic was established, its transportation services have seen very strong growth, and the company launched two new divisions: a brokerage segment that has grown fourfold since it was founded and an outside maintenance segment — derived from its

former, internal-only maintenance operations — with triple-digit growth. The maintenance division services light-duty vehicles to material-handling equipment to class 7 and 8 tractors, and offers tractor and trailer bodywork for “everything from touch-up painting to full accident reconstruction,” Smith says.

To keep an older fleet on the road, Coca-Cola Consolidated had performed its own maintenance and even completely refurbished many of the trucks.

“Once Red Classic got established and started growing, we realized that model just didn’t make sense, because no matter what you do, it’s still a 20-year-old truck by the time you get through refurbishing it,” Smith says. “We decided to really be efficient and operate the way we should, we had to invest in new equipment.”

Red Classic bought its first Mack® truck in 2012 and now buys more than 100 trucks per year, primarily Mack® Pinnacle™ day cabs with tandem axles, MP®7 engines and the *mDRIVE*™ automated manual transmission.

Smith says Red Classic chose Mack over other brands because of fuel economy and driver preference, but aesthetics were at play,

too. “I love the way the Macks look with our decals and pulling our trailers,” she says. “To me, it’s such a striking visual.”

Red Classic buys all its Mack trucks through McMahon Truck Centers, which operates seven locations in five states, including North Carolina. Smith says they rely on McMahon’s strong maintenance department and parts network. David Locke, director of fleet sales for McMahon, says he feels privileged to partner with the Red Classic group and be part of contributing to their continuous growth. “We worked hand-in-hand with Red Classic to make improvements to their specs for fuel economy gains, weight savings and lowered maintenance costs. They enjoy the full spectrum of Mack benefits including retention and recruiting benefits from the *mDRIVE*.”

“I can’t express how much it means to be a business partner with a company with such strong moral character,” Locke says.

Red Classic is expanding out of its Southeast footprint into the Midwest, and has approximately 445 trucks, 87 locations, 613 drivers and 262 technicians.

The company’s fleet, of which 69 percent





Photos by Kirk Zutell

are Mack trucks, typically hauls pallet loads in a mix of city and highway conditions. For its parent company, Coca-Cola Consolidated, it hauls preformed bottles, cans and ingredients to production centers, then carries finished products to distribution and sales points.

Red Classic, like most trucking companies, feels the struggle to recruit and retain drivers but says operating Mack trucks gives them a competitive advantage.

Smith says their drivers love the Mack trucks' ride quality, visibility, Bluetooth technology and the comfortable seats. "We spec the premium seats," she says. "And everything is very accessible from the driver's seat

— there's not a lot of bending and reaching."

At first, there was resistance from some drivers to an automated transmission. "We had guys who loved their trucks," Smith explains. "They'd been in them for 15 years, and they didn't want to drive an automatic. Once you get them into that Mack, if they have to drive one of the older spares, even for a day, they're all upset."

The *mDRIVE* transmission also improves safety and corrects driving mistakes, Smith says. "It allows less experienced drivers to be as efficient as the most experienced drivers and lets all drivers concentrate on driving rather than shifting gears."

"[The *mDRIVE* transmission] allows less experienced drivers to be as efficient as the most experienced drivers and lets all drivers concentrate on driving rather than shifting gears."

Wendy Smith, region manager, maintenance operations South, for Red Classic

The uptime Red Classic achieves comes from using Mack services such as the GuardDog® Connect telematics network, Mack OneCall™ and the ASIST system and is key to the company's success, Smith says.

GuardDog Connect helps the company to anticipate vehicle service needs, which in turn allows drivers to focus on the task at hand, says Eric Turner, external invoice processor/service writer for Red Classic. "Drivers already have a lot of responsibility and this technology helps us monitor vehicle condition without adding to drivers' workload," he says.

Through Mack's Uptime Solutions, trucks are diagnosed and repaired quickly. Red Classic receives updates throughout the process. "We can track everything that's going on from the time the truck hits the door until we get it back," Smith says. "It makes sure our trucks are on the road and running as much as possible. It helps us out a lot that Mack is doing the legwork versus us having to stop what we're doing and call around to dealerships we might not be familiar with. That's support I've not seen from any other OEMs." ■

AT WORK





Powerful mix

Lauren Concrete relies on Mack
for power, increased uptime and
driver comfort

By Carolyn Magner Mason Photos by Kirk Zutell

AT WORK

Ronnie Klatt began **Lauren Concrete** in 1986 with one derelict plant and four beat up trucks. He slept at the job site and fueled 20-hour shifts with one meal per day. His fifth truck was a Mack®, and from there, with hard work and better equipment, the Austin-based businessman grew to dominate the Texas concrete industry.

Today, Klatt owns 20 batch plants, 10 million tons of sand and gravel reserves, and a 215-truck fleet, including 155 Macks. He oversees 400 employees and is involved in some of the biggest projects in Austin, including the U.S. Federal Courthouse, the Waller Creek Tunnel, Dell Medical School and numerous other schools, condominiums, apartments, hotels and office buildings.

He prefers Macks for their reliability, performance and driver comfort.

His mixer trucks are Mack Granites®, equipped with 11-liter MP®7 395 hp engines, with 1,560 lb.-ft. of torque and six-speed Allison transmissions. His tractors are Mack Pinnacles™, with 11-liter MP7 455 hp engines, 1,860 lb.-ft. of torque, and *mDRIVE*™ transmissions.

“Macks are the best trucks out there,” Klatt says. “They’re bulletproof.”

His local dealership, Vanguard Truck Center of Austin, plays a crucial role in both his satisfaction with the Mack brand as well as the continued success of his growing company.

“They treat us like royalty,” he says. “Our salesman, Terry Lancaster, bends over backward to make sure we’re satisfied and have the maximum uptime

on our equipment. We work around the clock in our shop, and when our trucks break down, Vanguard pulls them right in there.”

With GuardDog® Connect, an advanced system detects problems instantly and contacts Mack’s OneCall customer center with the fault code, where experienced technicians identify the issue. The necessary information, including parts needed, service instructions, and diagnostics, is sent to the repair center, where work can begin as soon as the truck arrives.

“Lauren Concrete is probably our biggest overall customer for parts service and truck sales,” Lancaster says. “When they hit the door, we work as a team to get their trucks back on the job. I can’t think of a time either

“The traffic is a killer for us, and that’s another reason we like the automated transmissions. Fuel mileage with the *mDRIVE* is great, especially in the hilly areas of Austin.”

Ronnie Klatt, owner, Lauren Concrete

one of us has let each other down.”

Lancaster has worked closely with Klatt, spec’ing their trucks so efficiently that he often receives calls from Klatt’s competitors, asking for the “Lauren Concrete spec.”

Lancaster is eager to see how Klatt likes his newest acquisition — a Mack Granite Axle Back with standard mixer recently demonstrated at the 2017 CONEXPO-CON/AGG trade show in Las Vegas. The Granite is powered by an 11-liter MP7 425 hp engine, with 1,560 lb.-ft. of torque, and a Mack *mDRIVE* HD 14-speed automated manual transmission. The truck features a Cornerstone chassis, Mack PowerLeash engine brake, and Mack Grade Gripper hill assist, with 23,000-pound front axles and 46,000-pound rear axles.

Though Lauren Concrete is getting good fuel mileage with the Allison transmission, Lancaster thinks the *mDRIVE* HD will offer even better savings, and that will add up, especially given the length of time the trucks remain employed.

“They keep their trucks for quite a while,”

Lancaster says. “Most mixers last about seven years, but Ronnie keeps his because they hold up over time. This guy lives and breathes Mack trucks, and this combination is working very well for him.”

Klatt is cautiously optimistic about using the *mDRIVE* HD for his mixers. He loves it in his Pinnacles, so he’s willing to try it.

“The traffic is a killer for us, and that’s another reason we like the automated transmissions,” Klatt says. “It’s a huge challenge. Fuel mileage with the *mDRIVE* is great, especially in the hilly areas of Austin.”

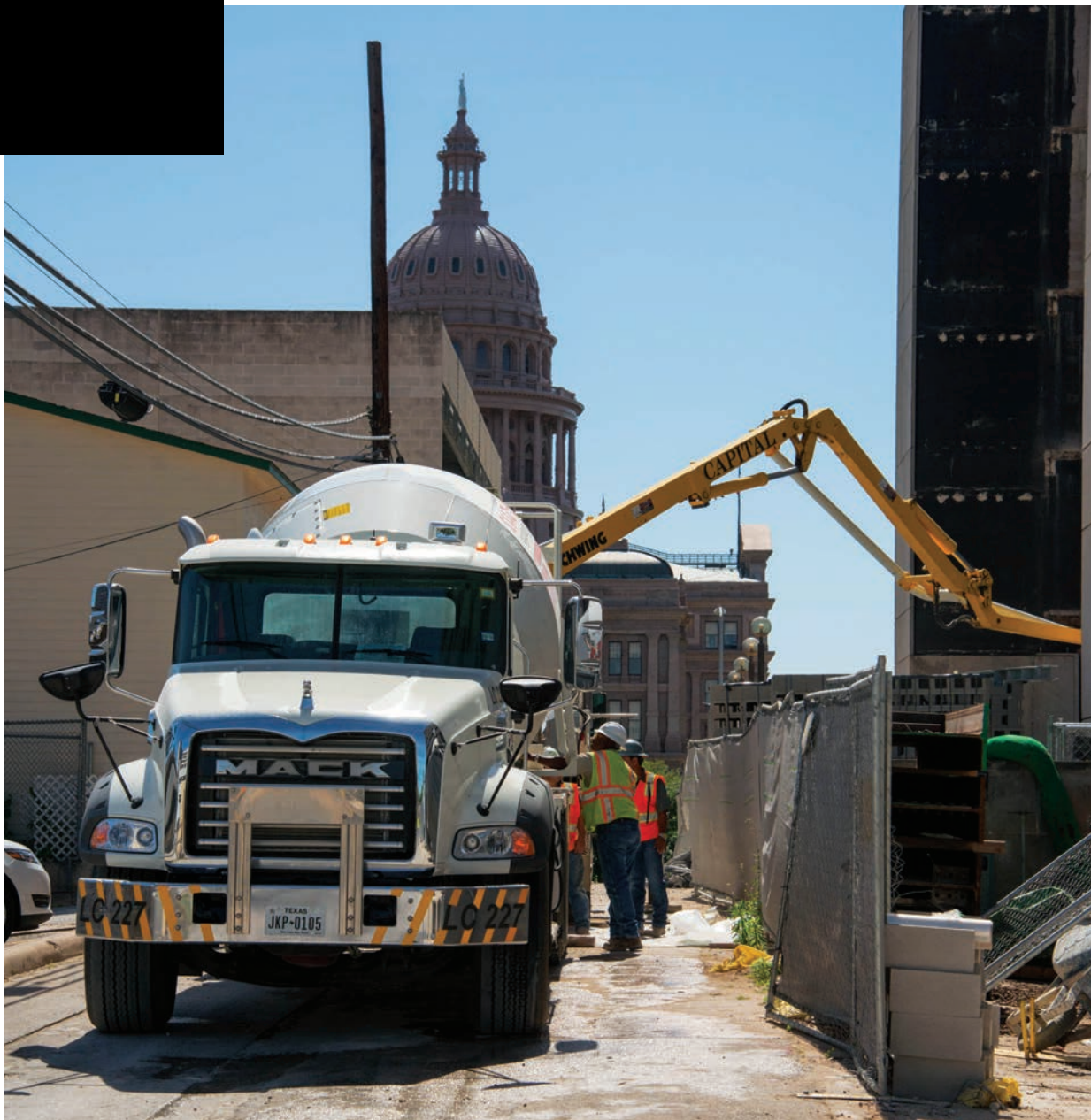
Klatt believes strongly in giving back to the community, and he is heavily involved in the annual Touch-A-Truck event, which gives children of all ages the chance to see and explore everything from concrete mixers to cranes. Proceeds benefit the Austin Children’s Shelter. He has gotten Vanguard Truck Center of Austin involved as well.

He attributes his success to working hard, staying focused, and practicing his faith.

“The Lord has been good to us,” Klatt says. “I am a firm believer that the more you share in life, the more you will get back. We surround ourselves with good people, and God has blessed us.”

He hopes to add another 20-30 batch plants as his business continues to expand, and he says Macks will to play a significant role in the company’s growth.

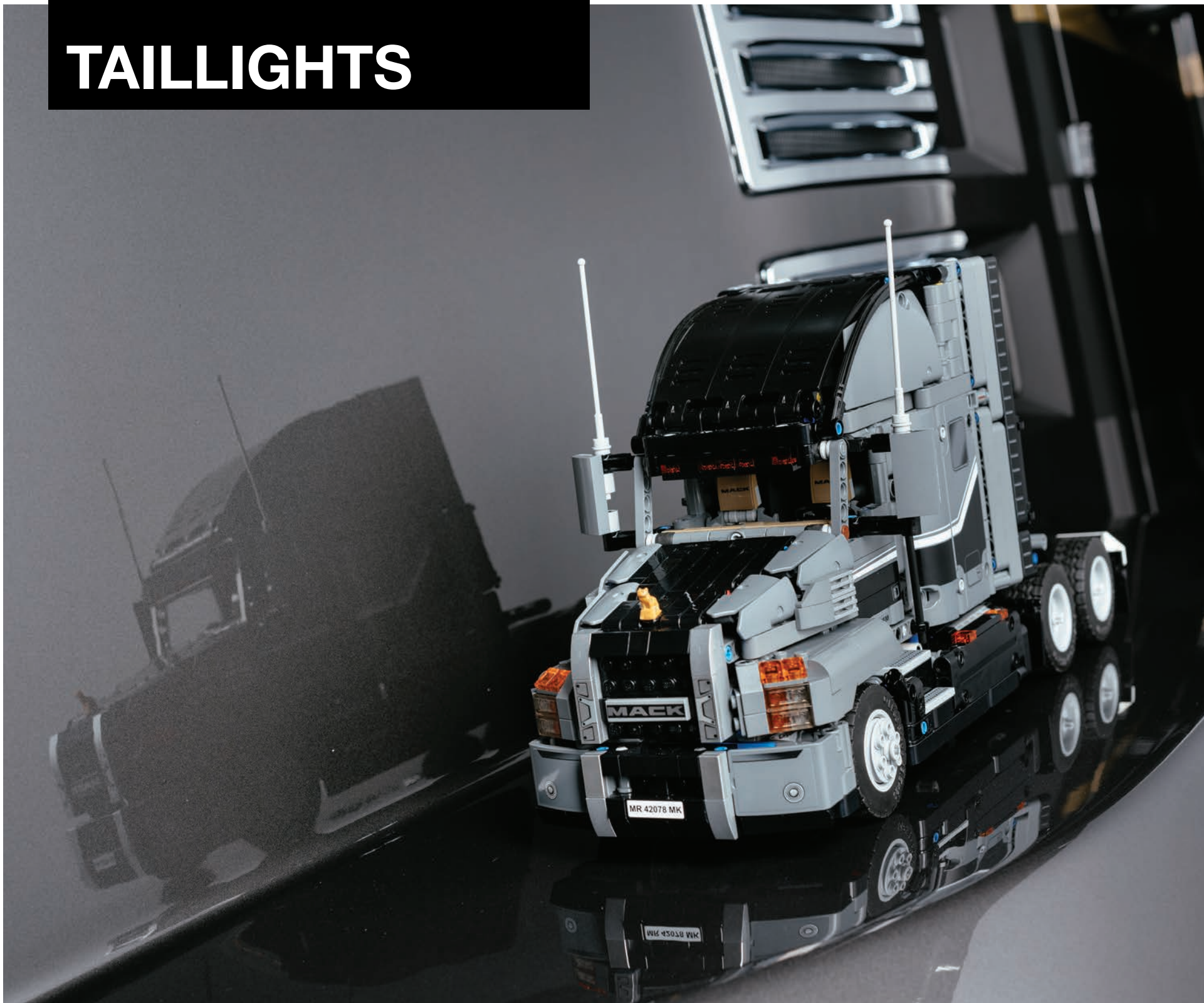
“Mack trucks do a great job for Lauren Concrete,” Klatt says. “They’re the best out there. We have a lot of Mack trucks, and we will always have a lot of Mack trucks.” ■



The wish list starts here:

Building the Mack Anthem[®], brick by brick

TAILLIGHTS



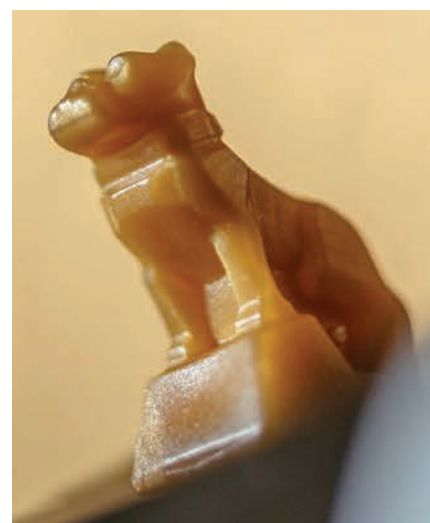
One of the coolest toys ever was unveiled in January. Oddly enough, it looks just like the Mack Anthem® long-haul truck that was unveiled in September. Unless it looks like the Mack® LR refuse truck instead. Which, it turns out, is totally possible.

It's the new Lego Technic Mack Anthem, an incredibly detailed model truck made with Lego's interchangeable parts. The Technics line of Lego models are famous for their level of detail and functionality, and the Technics Anthem is no exception. The front wheels steer, the doors open, the interior is complete with a detailed dashboard and steering wheel, sun visors, adjustable seats and a bunk bed. The hood flips open to reveal an engine with spinning radiator fan and moving pistons (and the pistons even move in the correct firing sequence!). Plus it has a very detailed Bulldog hood ornament, just like all Mack trucks.

And if that's not enough, the entire model — all 2,595 pieces — can be remade into a Mack LR front end loader refuse truck, also with moving parts.

Lego and Mack designers began collaborating on the project in mid-2016 and continued through mid-2017. Through a series of online and in-person meetings, both teams exchanged detailed design information. Lego designers even came to Mack's Greensboro, North Carolina, headquarters to drive each of Mack's models on a test track so they had a clear idea of the trucks' scale and presence.

"It was an interesting challenge to be able to build our LR and Anthem from existing Lego pieces," says Vince Lokers, Mack's chief designer - interiors. "No new tooling was introduced aside from our Bulldog hood ornament.

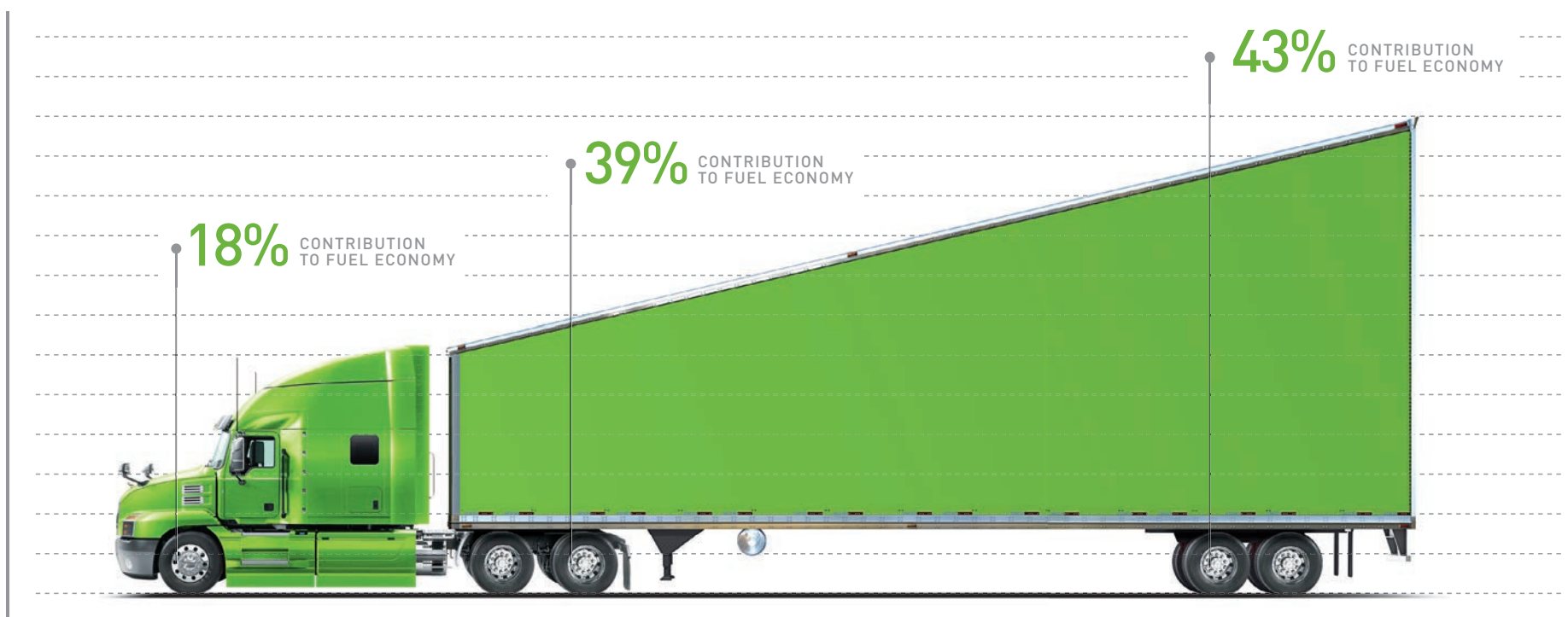


"It's always cool to see your designs come to life on the road, but even more special a second time in the shape of a Lego Technics model."

"Obviously, the Product Design team had fun, however we took this as seriously as we would any other project," said Loker's colleague, Lukas Yates, chief designer - exterior. "This is a relationship that will continue to grow, building a lasting impression of the best name in trucks."

The Lego Technics Mack Anthem model is available through mack-shop.com and shop.lego.com. ■

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