



A Legacy Of Achievement ... A Future With Promise The History Of Bendix Commercial Vehicle Systems LLC

Bendix Commercial Vehicle Systems LLC, a member of the Knorr-Bremse group, develops and supplies leading-edge active safety technologies, air brake charging, and control systems and components under the Bendix® brand name for medium and heavy duty trucks, tractors, trailers, buses, and other commercial vehicles throughout North America. An industry pioneer, employing more than 2,000 people, we are driven to deliver solutions for improved vehicle performance, safety, and overall operating costs. Our two primary market segments are Original Equipment Manufacturing (OEM) and Aftermarket (AM).

Our OEM operation produces original equipment for major worldwide truck and engine manufacturers such as PACCAR, Detroit Diesel, Volvo, Mack, Daimler Trucks North America and Navistar International. The Aftermarket operations remanufacture a wide range of air brake components as well as stocking new replacement parts, both of which are distributed to independent distributors, OEM parts distribution centers and dealers, and government and foreign customers.

In addition to our multi-building operations in Huntington, Indiana, manufacturing and distribution centers are strategically located across North America in Bowling Green, Kentucky; Acuña, Mexico; Sparks, Nevada; Mexico City, Mexico; along with Vancouver and Montreal, Canada.

A Legacy Of Achievement

Today's Bendix® automotive businesses began producing air brakes in a small corner of the Westinghouse Union Switch and Signal Company in Pennsylvania in the early 1920s. By 1930, Bendix Aviation Company and Westinghouse Air Brake joined forces to form Bendix-Westinghouse Automotive Air Brake Company, located in Wilmerding, Pennsylvania to produce air brakes for heavy vehicles.

In 1941, the company and most of its employees moved to Elyria, Ohio, to occupy a newly built, then ultra-modern production facility that today houses our company headquarters. By 1969, Bendix Aviation acquired 100 percent ownership of the company, forming the Air Brake Division of the Bendix Corporation. The name was changed to Bendix Heavy Vehicle Systems Group in 1973.

An Indiana facility opened in February 1980, when the Bendix Heavy Vehicle Systems Group built a new warehouse and distribution center in Huntington. The facility employed approximately 30 employees during its first year of business, servicing customers throughout the Midwest region. By 1983, Bendix Heavy Vehicle Systems Group joined AlliedSignal Inc. (then Allied Corporation) and the division became an operating unit of the company's automotive sector. In October of 1993, our name changed to AlliedSignal Automotive, Truck Brake Systems Company, as a direct result of our joint venture with Munich, Germany-based Knorr-Bremse. In conjunction with this shift, we then became our own business unit within AlliedSignal Inc.; referred to as AlliedSignal Truck Brake Systems Company.

AlliedSignal and Knorr-Bremse operated a complete air brake joint venture. AlliedSignal served as the majority owner and managed the North American operations, including those in Mexico. Knorr-Bremse staked a 35 percent investment and managed the European operations.

In 1999, AlliedSignal Inc. merged with Honeywell International Inc., and the operating unit became known as Bendix Commercial Vehicle Systems, a division of Honeywell. The company expanded its manufacturing operations throughout North America in 2000 by opening two plants in Acuña, Mexico, and a sales and distribution facility in Mexico City. The manufacturing facilities in Acuña focus on heavy vehicle manufacturing for braking systems and include electronics, valves, hose, air dryer and compressor assembly.

A Strong Foundation For Global Growth

On January 24, 2002, Knorr-Bremse moved forward in its long-term strategic global growth plan, acquiring full ownership of Bendix from Honeywell and changing the company name to Bendix Commercial Vehicle Systems LLC (Bendix CVS). Today, the privately owned Knorr-Bremse Group remains a worldwide leader in braking systems for both railways and commercial vehicles. The company employs nearly 15,000 people at more than 60 locations in 25 countries. Bendix CVS is the North American headquarters for the commercial vehicle group.

In 2004, Bendix and Dana Corporation formed a joint venture known as Bendix Spicer Foundation Brake LLC (BSFB). Widely anticipated in the market, the joint venture is a single, complete source for OEM brake system design, manufacturing, hardware, and support for all foundation brake components and actuation systems, as well as all-makes coverage of nearly 50,000 medium- and heavy-duty aftermarket parts. BSFB is headquartered in Elyria, Ohio, with engineering operations in both Elyria and Kalamazoo, Mich., and a state-of-the-art foundation drum and air disc brake manufacturing facility in Bowling Green, Ky. It serves as the global Center of Competence for drum brakes, slack adjusters, and actuators while providing valuable support to Knorr-Bremse's growth in emerging markets such as Russia, India, and China.

Achieving growth through sales and strategic business expansion, in early 2006, BSFB formed a strategic alliance with Gorilla Brake & Components Inc., an Ontario, Canada-based state-of-the-art brake shoe reliner. With a focus on new and remanufactured brake shoes and kits, and a complementary set of capabilities, the alliance serves as a catalyst for significant and sustained business growth for relined shoes for both organizations. Later that year, BSFB again expanded its operations with the purchase of Fresno, California-based Di-Pro, Inc., a privately held manufacturer and distributor of spring brake actuators and brake chambers to the heavy duty trucking industry. At the close of 2010 Bendix transferred actuation production from Fresno to a new Bendix manufacturing facility in Acuña, Mexico. The move is consistent with the company's overall strategic plan to optimize our North American manufacturing locations by leveraging corporate shared services, alongside our goal of maintaining lean and cost-effective manufacturing processes and practices to remain competitive in the markets we serve.

On The Forefront Of Innovation

In 2010 Bendix marked its 80th anniversary of operation. We're proud of our reputation as experts in air brake systems and leading-edge safety technologies in North America. In collaboration with our European affiliates, we take advantage of our combined geographic reach and engineering expertise to offer the most innovative and economical solution no matter how complex the problem. Since becoming a member of the Knorr-Bremse Group, our organization has completed a series of key business moves aimed at expanding and diversifying our operations and technological expertise, while at the same time advancing the strategic alignment of our manufacturing facilities and product business units.

In the closing months of 2008, Bendix further expanded its technology offerings with two key acquisitions. First, in October, Bendix CVS acquired select assets from the Vancouver, Canada-based SmarTire Systems Inc. SmarTire™ by Bendix® offers large fleet, commercial bus, and

recreational vehicles patent-protected, before- and aftermarket wireless technologies and advanced tire monitoring solutions using its proprietary SmartWave platform.

On December 31, 2008, the company acquisition of the VORAD[®] system from Eaton Corporation. The transaction incorporated the assets associated with VORAD operations to become a part of the electronics business unit of Bendix. The VORAD[®] Collision Warning System – used by original equipment manufacturers, major trucking fleets, and specialty vehicle manufacturers – employs warnings that alert the driver to objects up to 500 feet ahead of the vehicle, even around curves, and can track up to 20 vehicles at a time. In addition, radar-based Blindspotter[®] and Backspotter[®] technologies can also help warn the driver of objects to the side and/or rear of the vehicle.

Both the SmarTire[®] and VORAD technologies have been integrated into the electronic business unit of Bendix CVS and complement the other leading safety technologies such as leading safety technologies such as the Bendix[®] ESP[®] Electronic Stability Program and driver assistance technologies such as and Bendix[®] Wingman Adaptive Cruise with Braking (ACB).

An Industry Pioneer, Driven To Deliver

Bendix has long been known as a pioneer in commercial vehicle air treatment. With a focus on research & development, we are using our core air management capabilities and expertise to go beyond the air brake system. At the 2009 MidAmerica Truck Show, Bendix introduced the Bendix[®] Pneumatic Booster System (PBS), the first air management system of its kind to simultaneously improve fuel economy and vehicle acceleration, while reducing engine emissions. In 2010 the company expanded its global business again to include torsional vibration engine dampers produced by Hasse & Wrede, a Chicago area-based business unit that is the North American arm of the long time Knorr-Bremse Group member. Engine dampers are used to reduce torsional vibration on engine crankshafts to prevent shaft failure and reduce noise. Hasse & Wrede produces dampers in Germany, China, Brazil, and the U.S.

Finally – reinforcing its commitment to actively pursue business opportunities and effective technologies that help improve highway safety, enhance vehicle operation, and help fleets manage and maintain operating cost margins – on July 29, 2011 Bendix took yet another step down its firmly established technology development road map when it acquired select assets – including SafetyDirect[®] and the AutoVue[®] Lane Departure Warning System – from Iteris, Inc. The transaction – which complements the Bendix global Driver Assistance Strategy in North America, Europe, and the Asia Pacific region – immediately incorporates the technologies and associated research, development, sales and service operations into the electronics business units at Bendix and Knorr-Bremse.

While the scope and size of our organization may change, one thing remains the same. At Bendix, we are committed to improving the quality of life in the communities in which we operate through programs that nurture and support education, health and human services, the environment, economic development, civic involvement and diversity. We're a team with an overwhelming drive to help our customers succeed.