

CARLISLE

/// Brake & Friction

Experienced,
Global,
Innovative

Mining

Construction

Military

Agricultural

Aerospace

Industrial

Motorsports

Performance Street

Renewable Energy

Commercial Fleet

Recreational

Emergency

Forestry



HAWK
PERFORMANCE

WELLMAN
PRODUCTS GROUP

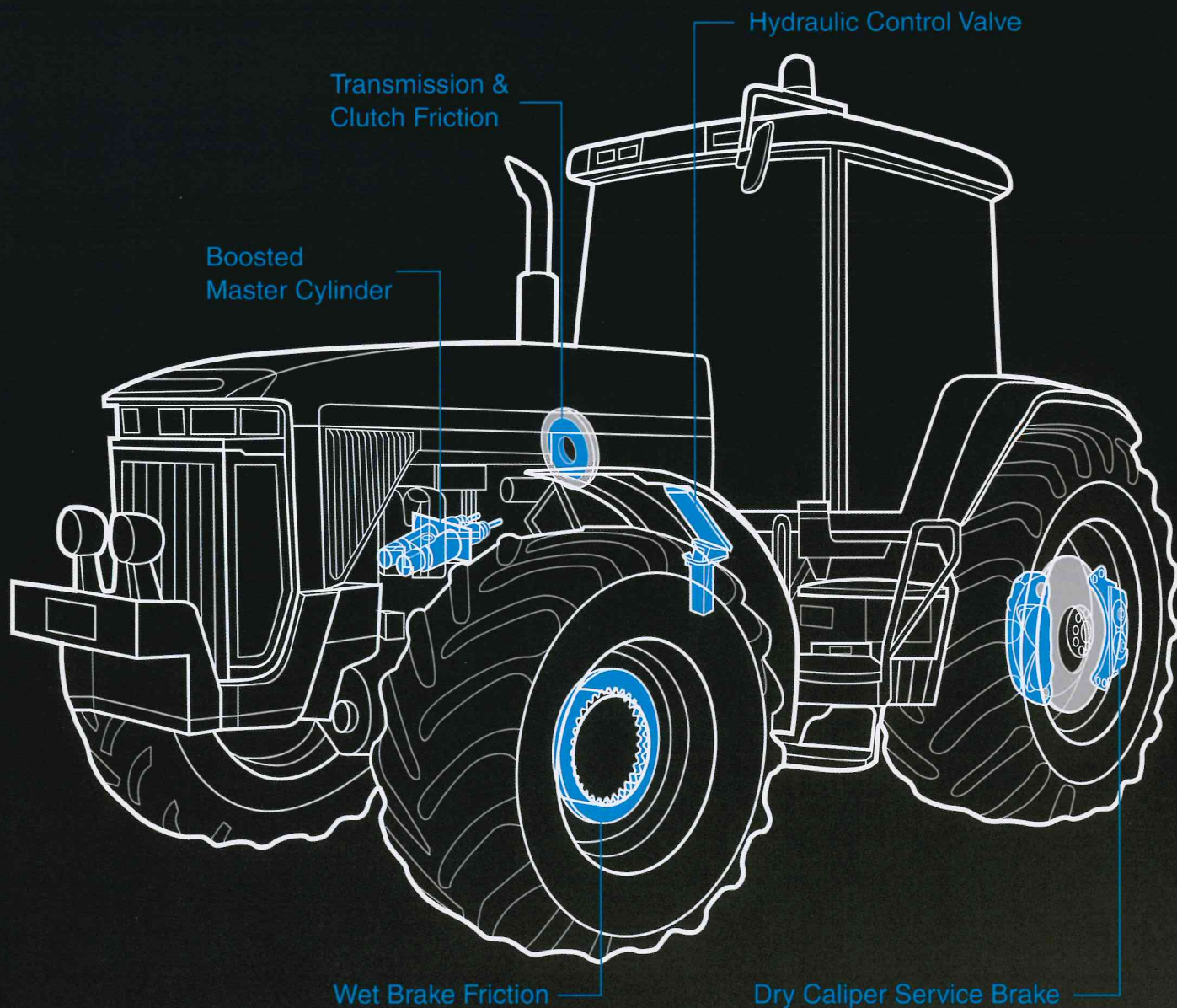
TALON

CARLISLE
Industrial Brake & Friction

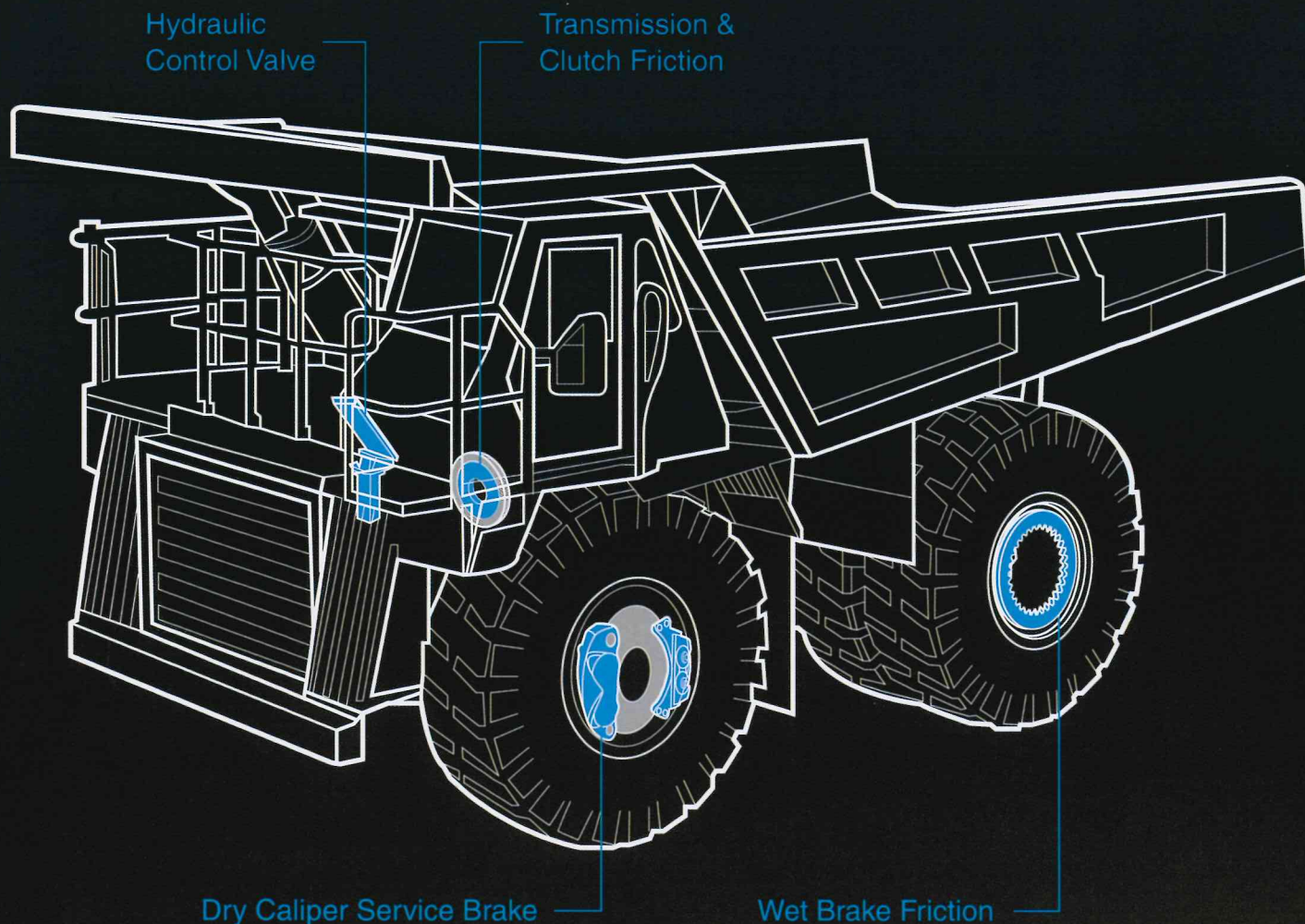
Jpb

FieldPro

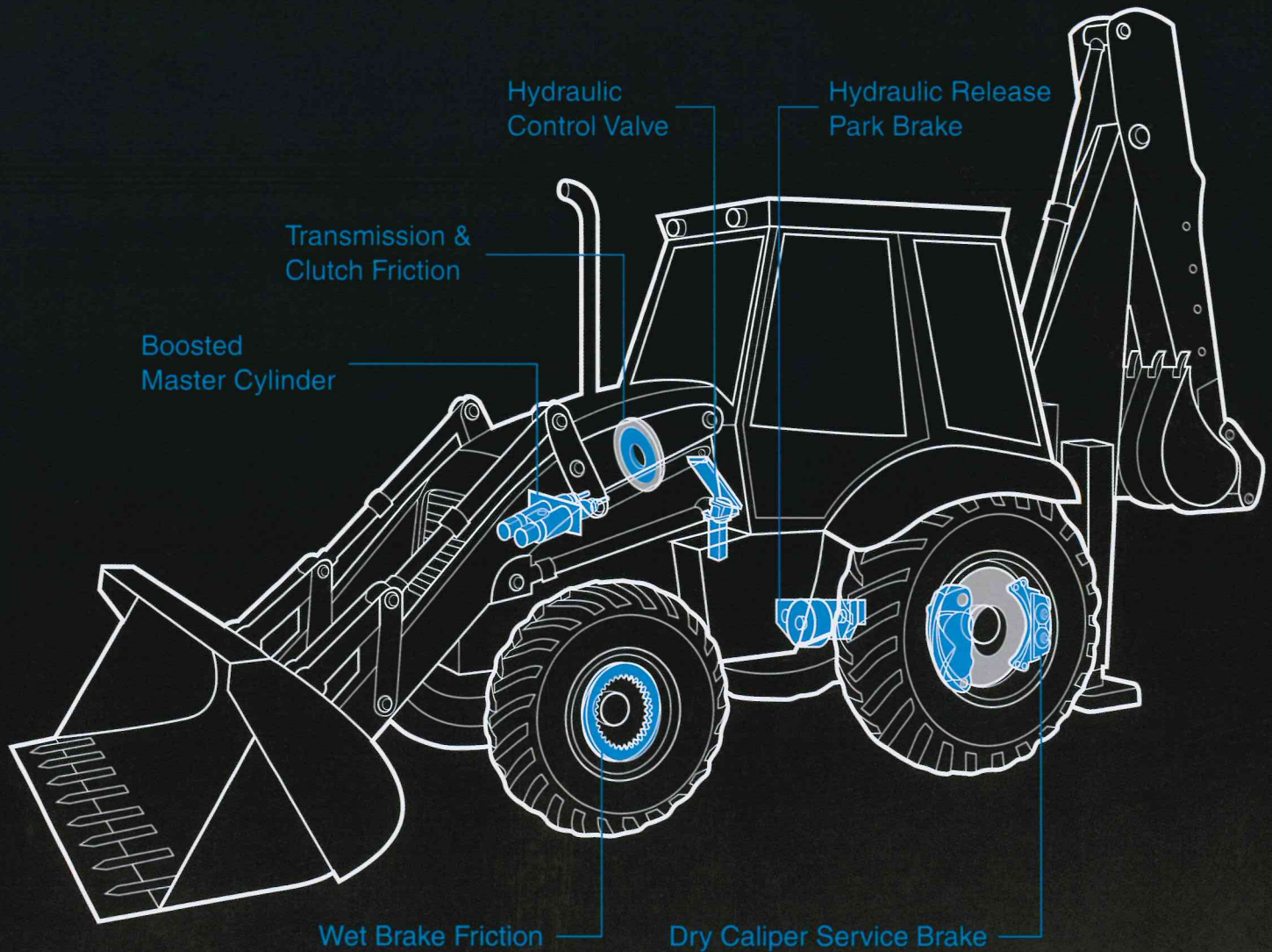
VELVETOUCH



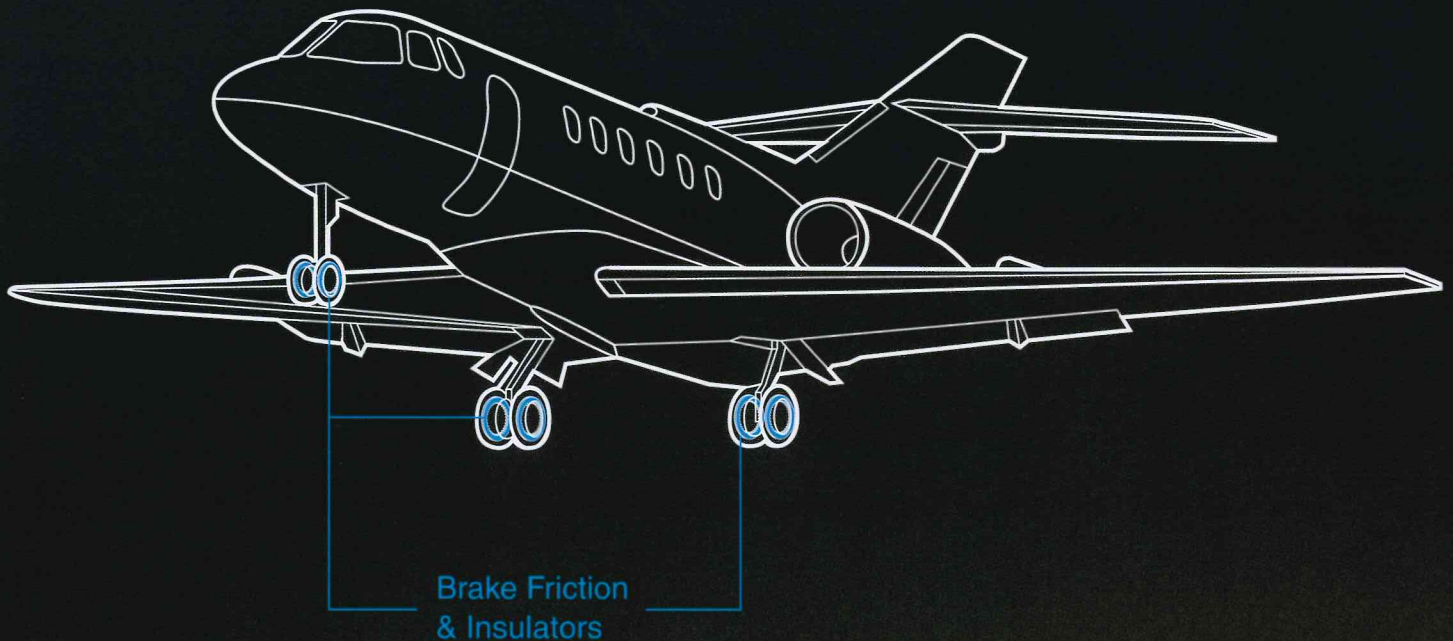
Carlisle Brake & Friction (CBF) has been a significant brake system and friction component supplier to agriculture and forestry industry for over thirty years. Our customer base is an extensive list of industry leaders including John Deere, CNH, Same Deutz-Fahr, Clark Hurth, Claas and Mahindra. Our friction components are utilized in countless clutch, transmission, wet brake and dry brake applications. We also expanded our brake system capabilities with the acquisition of ArvinMeritor's off-highway braking division in 2005 (formerly Lucas Girling). Today, our master cylinders, boosted master cylinders, ball and ramp brakes, and friction components are hard at work in agricultural equipment all over the world.



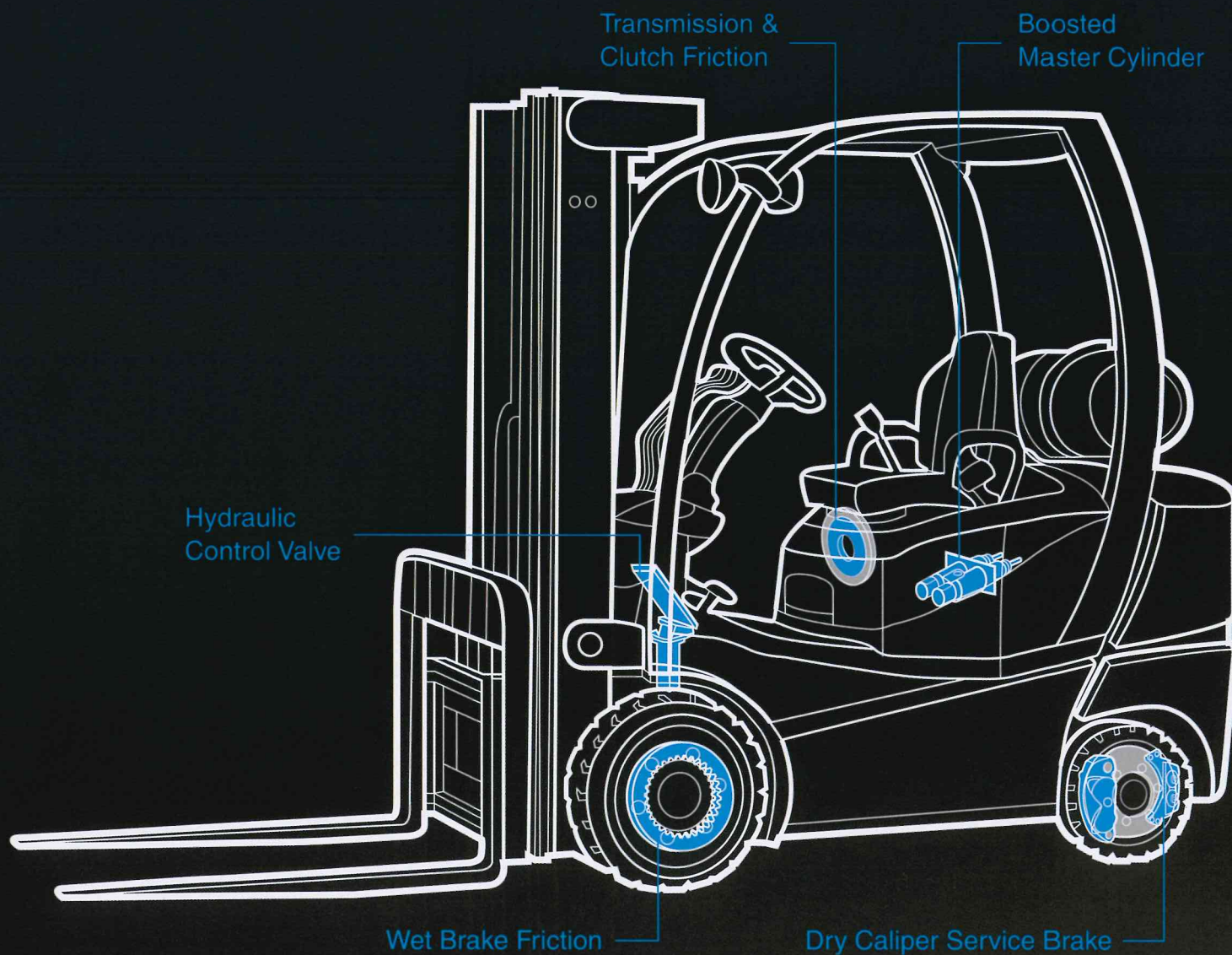
Carlisle Brake & Friction (CBF) has been the brake supplier of choice in the mining industry for decades, counting the world's largest and most respected mining OEMs as customers, including CAT, Komatsu, Liebherr, Hitachi and Sany. CBF first started supplying braking products to the mining industry in the 1930s at the onset of off-highway vehicle manufacturing. Over the past seventy years CBF has established itself as the undisputed industry leader in dry brake system and friction solutions. Recently the evolution of large scale wet braking systems has created a technology shift in the industry. CBF met the challenge and developed high density paper and carbon paper friction discs that provided OEMs unparalleled performance and durability. CBF consistently remains in the braking technology forefront by adapting to the changes in the industry, expanding the technology envelope and ultimately providing superior solutions to world class OEMs around the world.



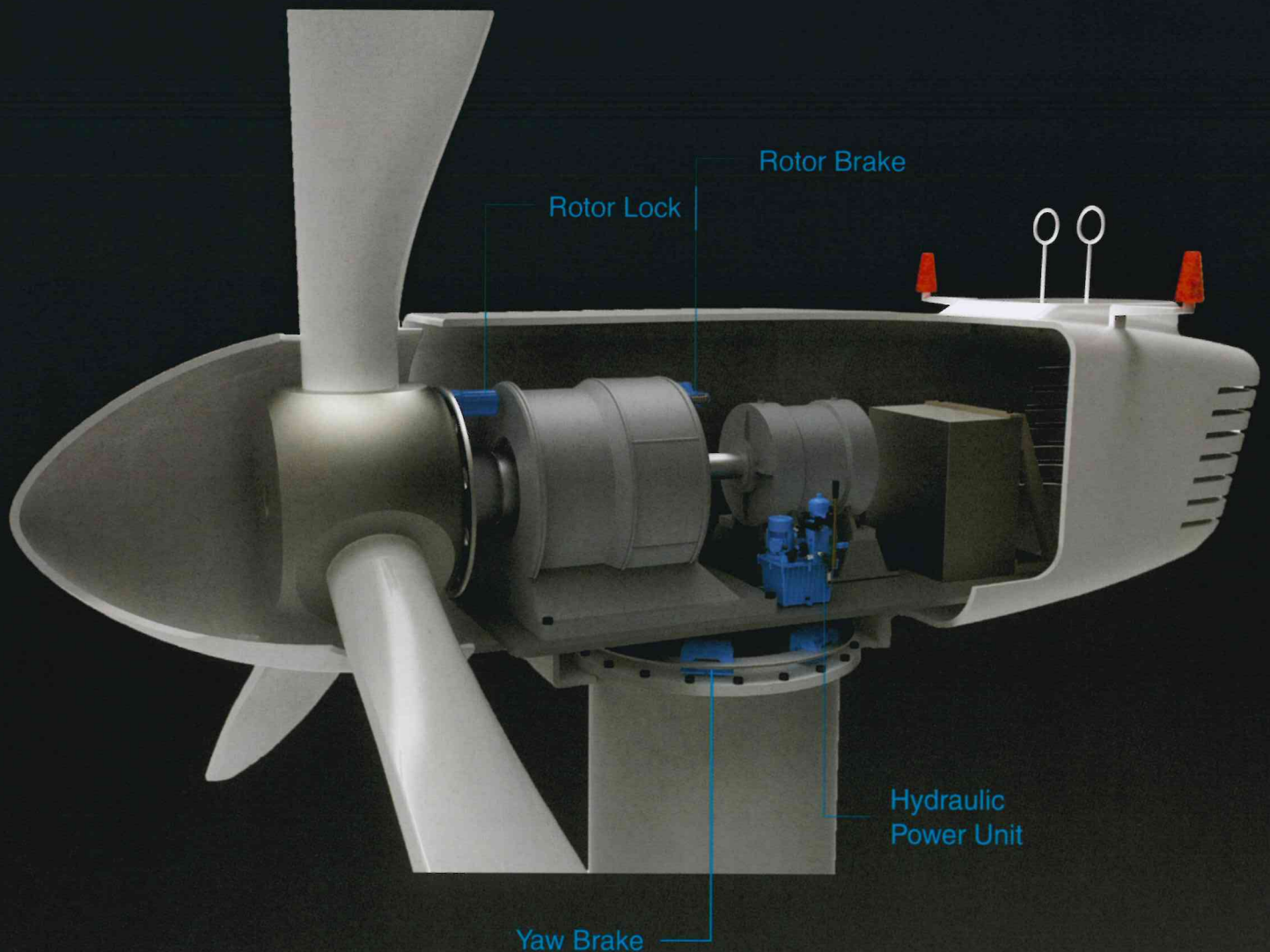
The construction machine market has been a cornerstone of Carlisle Brake & Friction (CBF) for decades. Our products are used by the most recognized construction OEMs in the world in applications around the globe as diverse as articulated dump trucks to backhoe loaders. We designed the first caliper disc brakes for CAT backhoes in the 1950s. In 1975 we introduced high density paper friction discs for the emerging wet brake system technology. Today CBF offers a wide range of motion control solutions including complete hydraulic brake systems and superior frictions material components for wet brake, dry brake, clutch and transmission applications. If you pass a construction site during your day, chances are you've seen a vehicle with a CBF product on it.



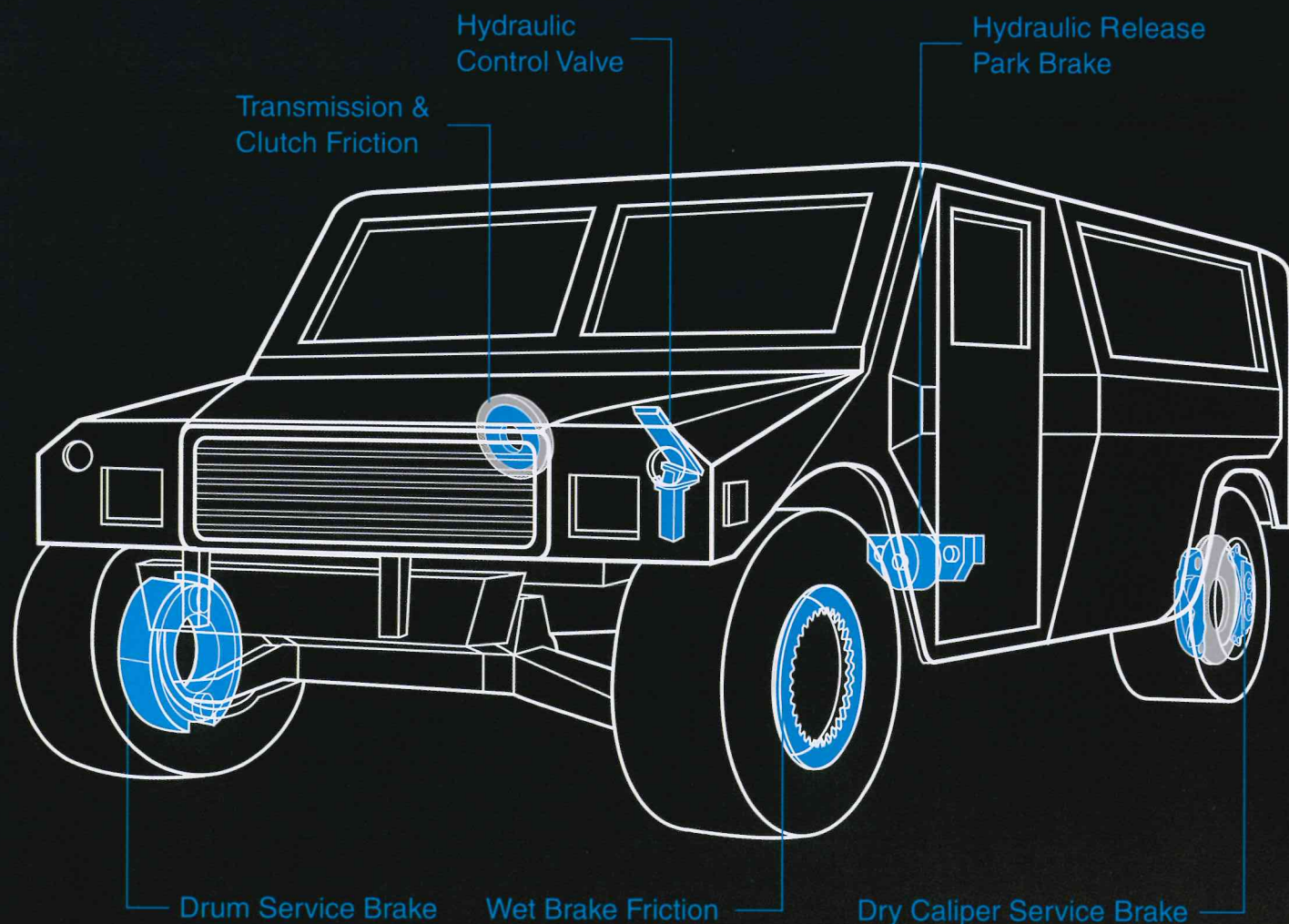
Carlisle Brake & Friction (CBF) is one of the largest steel brake friction suppliers for the global aerospace market. Original equipment manufacturers including Goodrich, ABS and Parker Hannifin, rely on our product quality, heat capacity, consistent performance and exceptional durability to meet the critical demands of today's aircraft. CBF's current product range includes friction discs, friction cups, friction linings, stators, rotors and insulators for commercial jets, general aviation aircraft, military aircraft, helicopters and gliders.



Carlisle Brake & Friction (CBF) has been supplying braking systems and friction components to original equipment manufacturers in a diverse range of industrial markets for over 87 years. Our products can be found on material handling vehicles, oil rigs, telehandlers, transit systems, car and truck commercial fleets, cranes, elevators, amusement park rides, motorcycles, ATVs, snowmobiles, and electromagnetic devices. CBF provides our customers, including Eaton, Wichita Clutch, Twin Disc, DANA, Allison, Disney, Harley Davidson, Brembo, ZF Sachs, SKF, Clark Hurth and many more, with reliable and often revolutionary solutions for dynamic and static motion control applications.



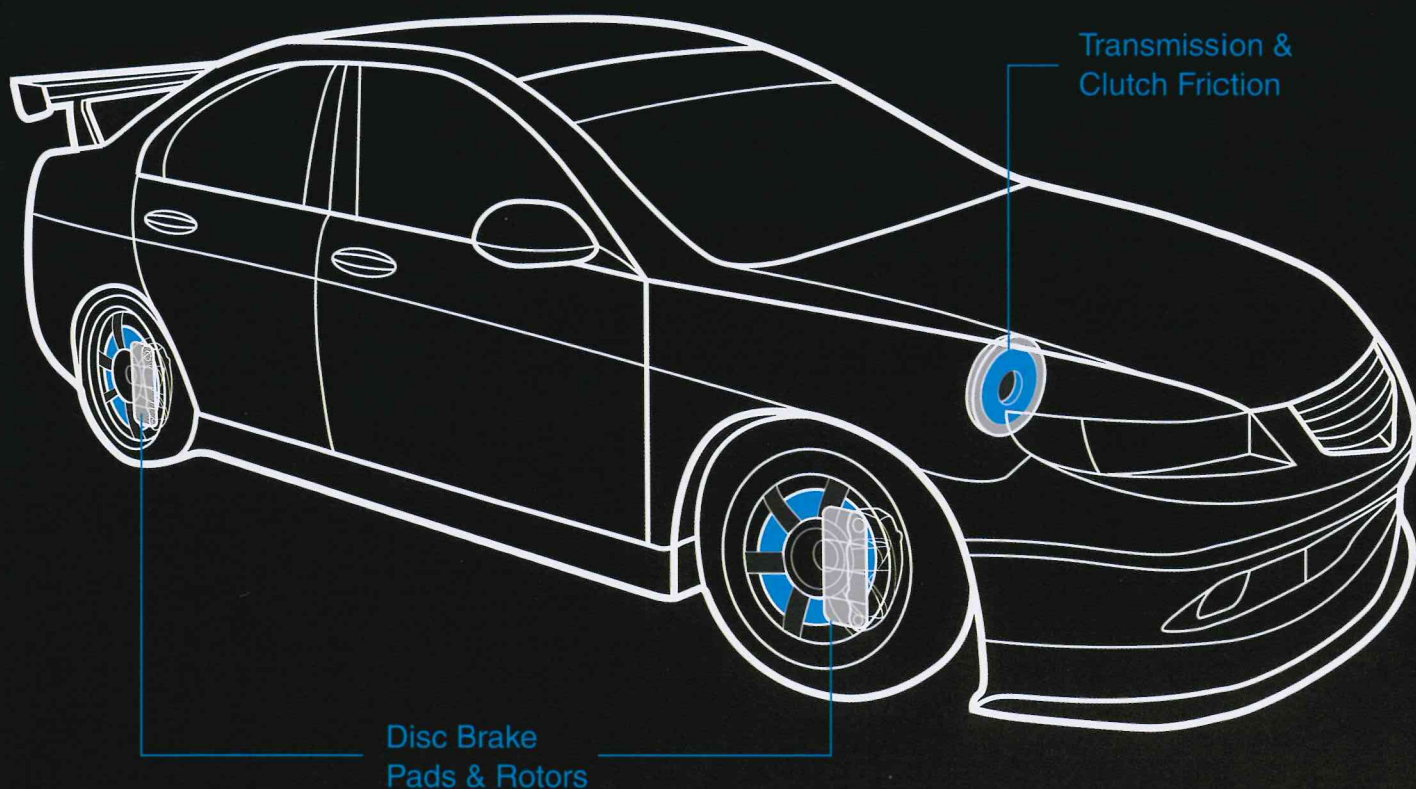
With the phenomenal growth of wind power around the globe in the last few years, Carlisle Brake & Friction (CBF) has turned its attention to meeting the needs of wind's biggest and most innovative wind turbine manufacturers. Today CBF is partnering and supplying braking solutions to leading wind OEMs around the globe. Bringing decades of braking experience, CBF offers innovative and cost-reducing features on next-generation brakes, friction and hydraulic systems, and provides a complete line of brake products specifically designed for both the MegaWatt and KiloWatt class wind market.



For over seventy years Carlisle Brake & Friction (CBF) has been a major supplier to the military market. Our hydraulic brake systems and friction components for transmission, brake and clutch provide superior performance and exceptional durability in the harshest environments around the world. Our products are utilized in virtually every form of military land vehicle including transports, tanks, assault vehicles and construction equipment. CBF is also a primary OEM supplier of brake friction materials for military jets, planes, helicopters and drones.



Performance Street & Motorsports



Carlisle Brake & Friction (CBF) is a leading supplier of severe duty and high performance products for the motorsports and performance automotive markets. CBF produces "Best in Class" disc brake pads, rotors, clutch discs, facings and transmission discs. Over the past decade our friction products have won more motorsports championships than any other friction manufacturer. From NASCAR to the weekend racer, our products provide a true competitive edge. Additionally, our extensive line of performance street products offers spirited drivers the confidence to push the limits of their cars, trucks and SUVs.

