

# **GLOBAL HIGH-CAPABILITY TOOLING SUCCESSES**





Global Assembly Solutions Since 1970



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For more than 50 years, AIMCO has been working with manufacturers around the world. We are the complete global source for all critical fastening and bolting solutions. AIMCO can effectively and swiftly meet your needs whether you're in Tennessee, USA fastening a 3 mm nut at 3 Nm, or in Denmark servicing wind-turbine bolts at 17,000 Nm. AIMCO provides the tools and solutions, on a global scale, that guarantee the success of your project. It is with great pride that AIMCO can say the products that we manufacture are MADE IN THE USA.

# **Our Associations**





Global leader in the design, manufacturing, and distribution of agricultural equipment

Need: Tools for transmission and final assembly lines.

AcraDyne Solution: Tools ranging from 1000 series up to HT DC series to cover complete production line.

#### Changzhou, China: Transmission Line for Massey Ferguson Tractor





Changzhou, China: Axle Line for Massey Ferguson Tractor



St. Petersburg, Russia: 300 Gang Assembly



St. Petersburg, Russia: Two Spindle Chain Assembly





Automobile manufacturing company that produces Hyundai-branded automobiles for the Chinese market

**Need:** Tools for engine assembly line. **AcraDyne Solution:** 1000, 2000, and 5000 series tools.

#### Engine Assembly Line, Beijing





World's leading manufacturer of construction and mining equipment, diesel and natural gas engines, industrial gas turbines, and dieselelectric locomotives

#### Northern Ireland: MH-3000 Series Material Handling Machine





Target Torques: 265 nm, 800 nm





**Swing Motor** Target Torques: 260 nm, 608 nm, 900 nm

System on portable base. Arm absorbs torque reaction.





Wheels to Hub 2 step tightening 12 bolts Torque 1 = 200 nm Torque 2 = 600 nm



Counterweight Target Torque = 2800 nm System on portable base (moved by tug). Reaction arm absorbs torque reaction.







Northern Ireland: MH-3000 Series Material Handling Machine

Slew Ring to Upper Target Torques = 183 nm, 475 nm, 610 nm





Singapore: Excavator Engine Assembly





Global leader in designing, producing, and selling agricultural and construction equipment, trucks, commercial vehicles, buses, and specialty vehicles, as well as powertrain applications

**Need:** Tools for complete control and monitoring of torque on tractor assembly line for consistent quality of final product. CNH previously used pulse tools.

AcraDyne Solution: Various AcraDyne tools, from low to high torque, provide complete control torque control, and integrate with the CNH network to send data.

#### Queretaro, Queretaro, Mexico: Tractor Assembly Line

Power Train: Gear Box Assembly



Exhaust Assembly



Tire Assembly



#### Assembly Feeder







Queretaro, Queretaro, Mexico: Tractor Assembly Line

#### Final Assembly of Rear Wheels



Tightening Car Tandem





Saddle Reaction Arm



Final Assembly Tightening Car Swing Bearing





Designs, manufactures, and distributes engines, filtration, and power generation products

### Engine Rebuild



# DAIMLER

One of the biggest producers of premium cars and the world's biggest manufacturer of commercial vehicles with a global reach

**Need:** Replace set of Atlas Copco tools because of poor customer service and support. **AcraDyne Solution:** AEN35350A with Gen IV controller provides semi-automatic tightening.

Derramadero, Coahuila, Mexico: Truck Assembly

Rear Axle Assembly



Chasis Assembly





Doosan Infracore's Construction Equipment Division is a global construction equipment supplier with a broad lineup ranging from mid–large excavators to refractive dump trucks and small machinery

**Need:** Tools for counterweight balance application. **AcraDyne Solution:** 3000 Nm inline HT DC tools with torque reaction arm.

#### Seosan, Korea: Manufacture of Excavator and Weight Balancer









A global leader in renewable energy production, that develops, builds, and operates clean energy power plants.

**Need:** A high-torque bolting tool for tightening bolts around a pitch bearing in a wind tower. Hydraulic tools were heavy, cumbersome, slow, and had not supplied the needed torque accuracy for the customer.

AcraDyne Solution: a high-torque DC angle tool – AEN4B773000B – with a single-ended offset reaction bar to complete the application at 2,800 Nm. Customer was able to tighten all 200 pitch-bearing bolts in 1-1/4 hours. Previously the application had taken 6 – 7 hours with the hydraulic tool

#### Pitch-Bearing Bolts







Brazilian aerospace conglomerate that produces commercial, military, executive, and agricultural aircraft, and provides aeronautical services

#### KC-390 Military Transport Aircraft





Ramp











Global automotive industry leader that manufactures and distributes automobiles across six continents

**Need:** Tools and controllers for complete line of 6.7 and 4.4 engine assembly. System has to monitor and control torque and angle, communicate with Toolsnet, include IP networking capability, and comply with Ford's budget and timeline. Solution requires full structure to hang tools, and requires that all tool rails be supplied and installed.

AcraDyne Solution: More than 300 tools and controllers supplied to Ford. The system incorporated all requirements. Best bits/sockets for application were supplied, as well covered sockets that protect operators.

Chihuahua, Chihuahua, Mexico: Engine Assembly and Repair (14, J56, 4.4, and 6.7 Diesel

6.7 L Diesel Assembly Line Low-Pressure Fuel Lines, Stud Bolt One Bolt to FIP and two to LH Cover

Assembly Area



4.4L Repair Bay





**Final Assembly** 





Global power and technology services leader

## Assembly Plant





Stator Assembly





Transmission specialist company and Hyundai Motor Group's leading automobile parts firm

**Need:** Tools for transmission assembly line.

**AcraDyne Solution:** 1000 and 2000 series AcraDyne DC tools with Ergo Arms and fixtures.

Rizhao, China: Transmission Assembly







International manufacturer and supplier of commercial trucks, parts, and diesel engines

Argentina: Truck Assembly

#### Axle Assembly









#### CNH Iveco Factory, Bourbon Lancy, France

Application: Engine dressing, sub-assembly mounting Application torque: 1.6 to 4 Nm AcraDyne tool used: AES4A12006BQ Controller: IEC4EV







Multinational manufacturer of equipment for construction, agriculture, waste handling, and demolition

Wheel Installation







Manufactures agricultural, construction, and forestry machinery, diesel engines, drivetrains used in heavy equipment, and lawn care equipment

#### Assembly

Small Loader Wheel Mount



Wheel Assembly



Steer Skidder Plate Mount





Tie Rod Adjustment









Torque Cart for Combine Frame



Multi-Spindle System for Row Planter







Two-Spindle System for Loader Wheels







Sprocket Assembly









Forestry Cab Assembly







One of Europe's leading manufacturers of commercial vehicles, engines, and mechanical engineering equipment

## Marine Engine Assembly





Global provider of automotive systems, modules, and components for light vehicle, commercial truck, trailer, and specialty original equipment manufacturers

Assembly of Bearing Cap to Carrier







South Carolina: Four Spindle Multiples







Global full-line vehicle manufacturer

#### Smyrna, Georgia: Automotive Subframe Install

Car Subframe



TLink



Strut to Knuckle



Center Bearing and Lower Torque Rod



Upper Torque Rod





Major Swedish automotive industry manufacturer of commercial vehicles, specifically heavy trucks and buses

Brazil: Subassembly Truck Plant





Global provider of automation and robotic solutions in industries including meat, food, mining, and general manufacturing

**Need:** Tools for disassembly and reassembly/replacement of earthmover wheels. **AcraDyne Solution:** 2000 Nm inline HT DC tool system with ABB articulated robot.

#### Australia: Mining Truck Wheel Nut Assembly and Disassembly





Manufacturer of wind turbines and provider of onshore and offshore wind services

## Wind Tower Assembly









Tool Lift Assist







Supports construction, commissioning, servicing, and retrofitting of wind turbines

Wind Tower Servicing







Global company focused on providing active and passive safety products and services to the automotive industry

**Need:** Four-bolt and six-bolt applications were having issues on valve cover assembly due to an o-ring that was not seated properly.

**AcraDyne Solution:** AEN35225B and AEP35350APT nutrunners, coupled with the Gen IV controller, allowed operators to create and set parameters to monitor and properly tighten all bolts.

Queretaro, Queretaro, Mexico: Driving Wheel Hydraulics Assembly







Manufacturer, seller, installer, and servicer of wind turbines



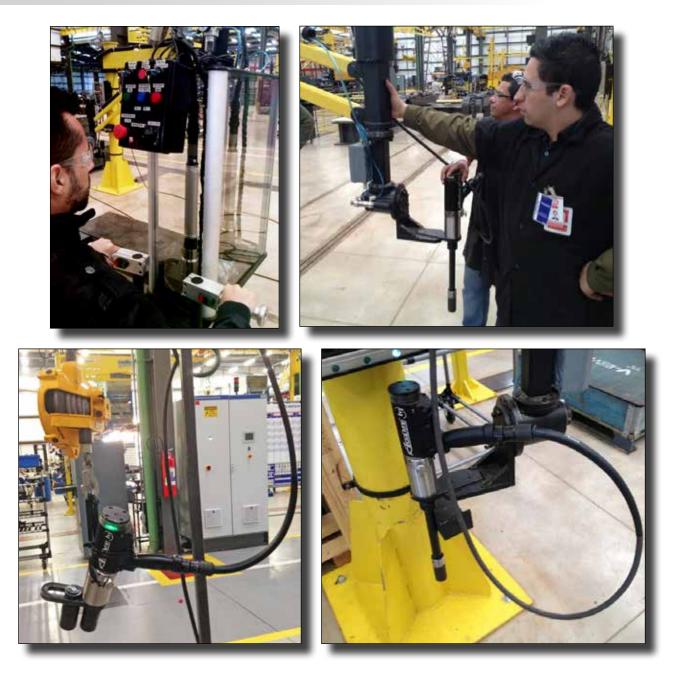






One of the world's leading manufacturers of trucks, buses, construction equipment, and marine and industrial engines

Brazil: Excavator, Backhoe, and Wheel Loader Assembly





Manufactures and services power sources and other equipment in the marine and energy markets

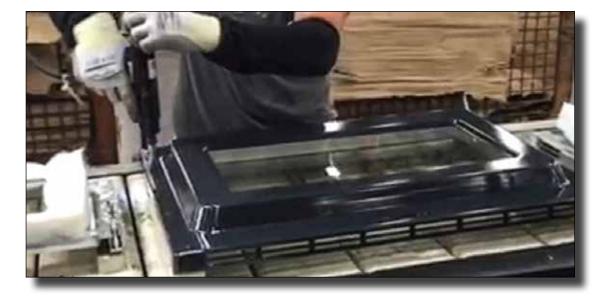
## Sub Assembly for Large Combustion Engines





World's leading global manufacturer of home appliances

Assembly-Line Screwdriving System







# **Controlled Tools**















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