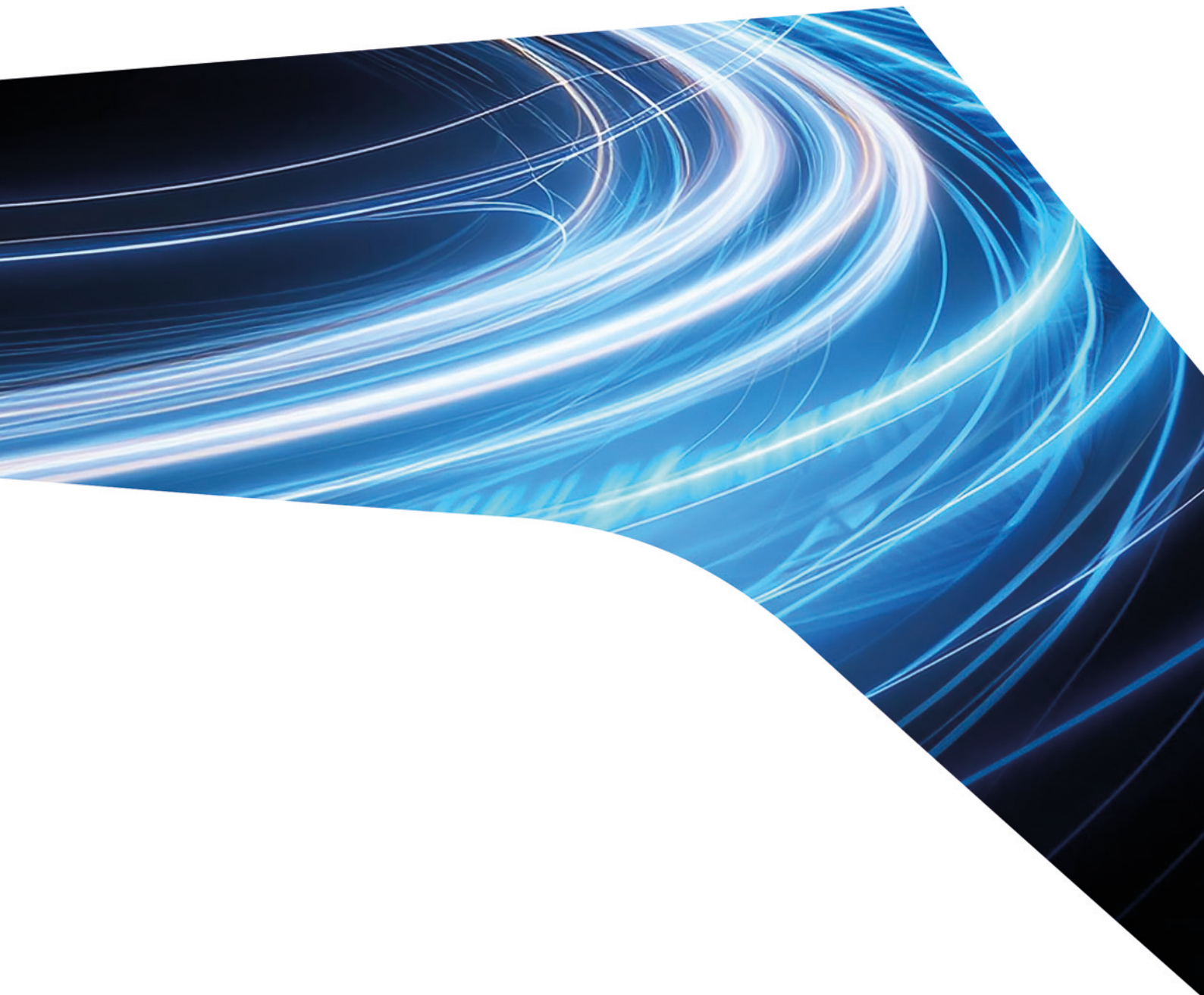




Off-Highway
Drive and Motion Systems
Mobile and Industrial Business



Off-Highway Drive and Motion Systems

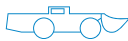


As an innovative leader, Dana Off-highway continuously improves the performance and efficiency of vehicles and machines worldwide. We aim to be the global pacesetter in efficient power conveyance and energy-management solutions.

Mobile



AGRICULTURE



MINING



MATERIAL HANDLING



CONSTRUCTION AND FORESTRY



COMMERCIAL TURF CARE

Industrial



BULK MATERIAL AND MINING



ONSHORE AND OFFSHORE MARINE



INDUSTRIAL AND STATIONARY EQUIPMENT



HEAVY INDUSTRY: STEEL, SUGAR, AND CEMENT



WASTE MANAGEMENT AND RENEWABLE ENERGY



PLASTIC AND RUBBER

Off-Highway **Brand Portfolio**

Supported by a legacy of innovation in conventional drivetrains, Dana Off-Highway is at the forefront of integrating mechanical and electrical components for alternative propulsion applications. We embrace evolution to be a step ahead in supporting new applications as they emerge and collaborating with customers as they develop tomorrow's vehicles.

Drivetrain and e-Drive Systems



Motion and e-Motion Systems



Gears and Shifting Solutions



Thermal Management



Sealing



Electric and Hybrid e-Drive Systems



Drive and Motion Solutions

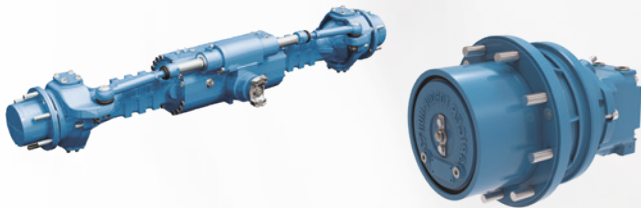
The drivetrain solutions you need, backed by global expertise and support.

Spicer™ Axles and Drives

Spicer™ axles are engineered to improve performance, tractive effort, and operator comfort in harsh working environments while also supporting on-road mobility through high torque density, high reliability, and robustness.

Our power-dense designs deliver maximum performance in a compact package that improves reliability, durability, stability, and safety.

Dana has a broad range of dedicated solutions matching the different application needs like torque density, specific duty cycle, braking performances, safety standard and robustness.



Spicer™ Driveshafts

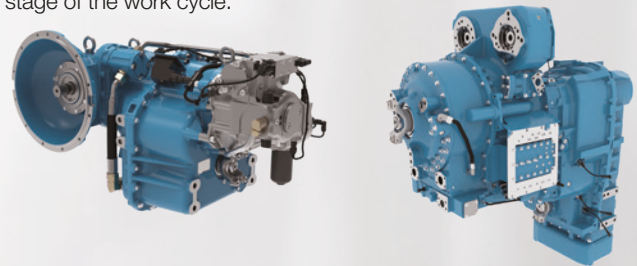
Built to withstand the roughest terrains and heaviest loads, Spicer driveshafts efficiently and reliably manage input torque to improve productivity, reduce operating costs, and simplify maintenance. They can be customized with a complete set of end fittings, flanges, and service options for any requirement.



Spicer™ Transmissions with Electronic Controls

From basic gearboxes to leading-edge powersplit configurations, Dana supplies a wide range of powerful, efficient transmissions and electronic controls that improve fuel efficiency, handling, tractive effort, and operator comfort while reducing noise and ensuring easy maintenance.

Our advanced electronic controls provide multiple smart operating modes that optimize productivity, monitoring and efficiency at every stage of the work cycle.



Graziano™ Custom Gears and Shifting Solutions

Our custom-designed high-precision gears and shafts improve the performance, reliability, and durability of final reduction components. We also support technically challenging and complex vehicle applications by leveraging our engineering expertise to supply customized crown wheel and pinion sets.

We offer a range of heavy-duty synchronizers and other shifting solutions that help vehicle and transmission manufacturers overcome the limited availability of engineering resources while giving vehicle operators better control, shifting performance and improved productivity.

Additionally, we leverage our in-house design, prototype, and validation capabilities to produce custom drive assemblies for highly specialized applications with accelerated development timelines.



Brevini™ Motion Systems

We serve OEMs as a single supplier for the wide variety of components that maximize the productivity and efficiency of vehicle work functions.

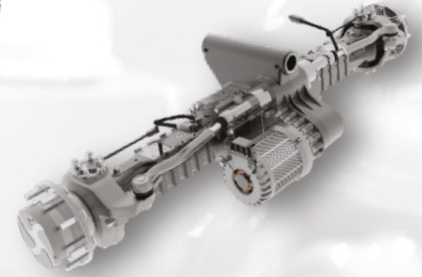
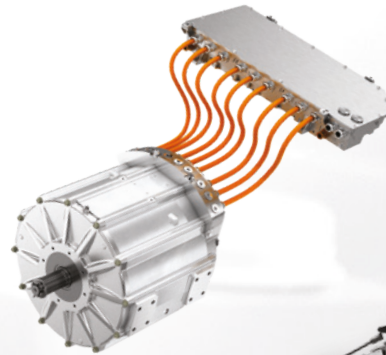
Our comprehensive selection of Brevini™ motion products includes gearboxes, slewing drives, winches and hydraulic solutions.



e-Drive and e-Motion Solutions

We leverage our complete portfolio of e-Propulsion Systems — e-Axles, e-Drive Units, and e-Hub Drives — as well as e-Powertrains, e-Motion Systems, and electrodynamic modules to enable vehicles to meet the highest standards for efficiency, reliability, and performance.

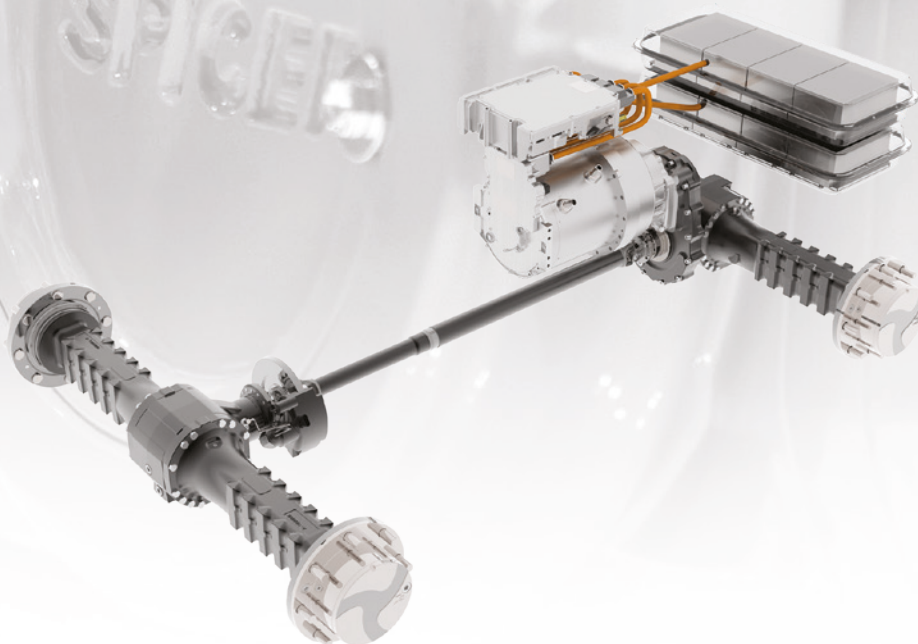
We can help OEMs adapt current ICE-driven applications with effective, low-risk, quick-to-market drive solutions today as we plan for future vehicle configurations with fully integrated systems that deliver superior productivity while reducing manufacturing complexity and total cost of ownership.



System Solutions

Vehicle intelligence, autonomous driving systems, AI, electrodynamics, telematics, cybersecurity, and other digital innovations are enabling quantum leaps in vehicle performance and efficiency.

Dana's multi-disciplinary team of system solutions engineers provides turnkey solutions for electric vehicle integration by collaborating with customers. Our holistic approach helps OEMs seamlessly integrate transformative digital technologies with Dana's proven drive and motion systems for the next generation of vehicles.

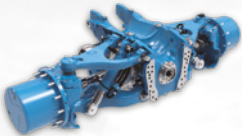


Drive Systems Spicer™ Axles

Agriculture



Tractors



Spicer™ Independent Front Suspension Axle

| Range | | |
|-------|-----|-----|
| 970 | 980 | 990 |



Spicer™ Standard Suspension Axle

| Range | | | |
|-------|-----|-----|-----|
| 730 | 740 | 750 | 770 |



Spicer™ Portal Axle

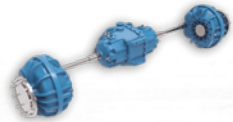
| Range | | |
|-------|-----|-----|
| P71 | P72 | P73 |



Spicer™ Modular Axle

| Range | | | | | |
|-------|-----|-----|-----|-----|-----|
| M20 | M30 | M40 | M50 | M60 | 770 |

Combines and Harvesters



Spicer™ Front Axle

| Range | |
|-------|-----|
| N07 | N09 |



Spicer™ Rear Standard Suspension Axle

| Range | | |
|-------|-----|-----|
| 730 | 740 | 750 |



Spicer™ Rear Adjustable Axle

| Range |
|-------|
| 733 |

Telehandlers



Spicer™ Planetary Steering Axle

| Range | | | | |
|-------|-----|-----|-----|-----|
| 211 | 212 | 223 | 213 | 214 |

Material Handling



Small Forklifts & AGVs



Spicer™ Planetary Steering Axle

| Range |
|-------|
| 141 |

Container Handlers



Spicer™ Planetary Non-Steering Axle

| Range | |
|-------|-----|
| 145 | 147 |

Forklift Trucks



Spicer™ Planetary Non-Steering Axle

| Range | | | |
|-------|-----|-----|-----|
| 137 | 138 | 139 | 144 |

Rough Terrain Cranes



Spicer™ Planetary Steering Axles

| Range |
|-------|
| 246 |

Ground Support Equipments



Spicer™ Planetary Non-Steering Axle

| Range | | | |
|-------|-----|-----|-----|
| 111 | 112 | 123 | 113 |



Spicer™ Planetary Steering Axle

| Range | | | | | |
|-------|-----|-----|-----|-----|-----|
| 211 | 212 | 213 | 223 | 214 | 246 |

Mining



Underground Mining Loaders



Spicer™ Planetary Non-Steering Axle

| Range | | | | |
|-------|-----|-----|-----|-----|
| 182 | 183 | 17D | 20D | 53R |

Mining Trucks



Spicer™ Planetary Non-Steering Axle

| Range | | | | |
|-------|-----|-----|-----|-----|
| 182 | 183 | 17D | 20D | 53R |

Drill Rigs



Spicer™ Planetary Non-Steering Axle

| Range | | | | | | | | |
|-------|-----|-----|-----|-----|-----|-----|-----|-----|
| 111 | 112 | 113 | 114 | 115 | 116 | 123 | 125 | 126 |

Spicer™ Planetary Steering Axle

| Range | |
|-------|-----|
| 213 | 223 |

Construction and Forestry



Compact Wheel Loaders



Spicer™ Planetary Non-Steering Axle

| Range | | | | | |
|-------|-----|-----|-----|-----|-----|
| 109 | 111 | 112 | 123 | 113 | 114 |

Large Wheel Loaders



Spicer™ Planetary Non-Steering Axle

| Range | | | |
|-------|-----|-----|-----|
| 115 | 116 | 125 | 126 |

Wheeled Excavators



Spicer™ Planetary Steering Axle

| Range | | | |
|-------|-----|-----|-----|
| 162 | 262 | 163 | 263 |



Spicer™ Planetary Non-Steering Axle

| Range | | | |
|-------|-----|-----|-----|
| 111 | 211 | 112 | 212 |

Telehandlers



Spicer™ Planetary Steering Axle

| Range | | | | |
|-------|-----|-----|-----|-----|
| 211 | 212 | 223 | 213 | 214 |

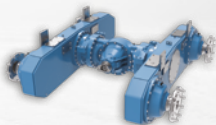
Single Drum Rollers



Spicer™ Planetary Non-Steering Axle

| Range | | |
|-------|-----|-----|
| 192 | 193 | 194 |

Motor Graders



Spicer™ Bogie Axle

| Range | | | | | |
|-------|------|------|------|------|------|
| GA10 | GA14 | GA17 | GA15 | GA20 | FG65 |

Forestry Applications



Spicer™ Rear Axle

| Range | | | | | |
|-------|-----|-----|-----|-----|-----|
| 113 | 114 | 115 | 116 | 125 | 126 |

Drive Systems

Spicer™ Wheel and Track Drives

Agriculture

Sprayers



Spicer Torque-Hub™
CT Series



Spicer Torque-Hub™
C0 Series

Windrowers



Spicer Torque-Hub™
C0 Series



Spicer Torque-Hub™
HW5 Series

Range

| | | | | | |
|------|---------|------|------|---------|------|
| CT11 | C016(*) | C021 | C024 | C030(*) | C036 |
|------|---------|------|------|---------|------|

Range

| | |
|------|-----|
| C024 | HW5 |
|------|-----|

(*) = under development

Material Handling

Rubber-Tire Gantry Cranes



Spicer Torque-Hub™
RCT Series



Spicer Torque-Hub™
PHC and TH Series

Crawler Cranes



Spicer Torque-Hub™
CTU Series



Spicer Torque-Hub™
RCT Series

Range

| | | |
|---------|---------|---------|
| RCT9083 | RCT9103 | RCT9133 |
|---------|---------|---------|

Range

| | |
|---------|-------|
| PHC3850 | TH510 |
|---------|-------|

Range

| | |
|-----------|-----------|
| CTU3500.1 | CTU3700.1 |
|-----------|-----------|

Range

| | | |
|---------|---------|---------|
| RCT9083 | RCT9103 | RCT9133 |
|---------|---------|---------|

Mining

Drill Rigs / Mobile Crushers and Screeners



Spicer Torque-Hub™
CTU Series



Spicer Torque-Hub™
RCT Series

Range

| | | | | |
|-----------|-----------|-----------|-----------|-----------|
| CTU3150.1 | CTU3200.1 | CTU3300.1 | CTU3500.1 | CTU3700.1 |
|-----------|-----------|-----------|-----------|-----------|

Range

| | | |
|---------|---------|---------|
| RCT9083 | RCT9103 | RCT9133 |
|---------|---------|---------|

Construction and Forestry



Compact Track Loaders



Spicer Torque-Hub™
CT Series

| Range | | | |
|-------|------|------|------|
| CT05 | CT07 | CT11 | CT17 |

Forestry Applications



Spicer Torque-Hub™
RCT Series

| Range | | |
|---------|---------|---------|
| RCT9083 | RCT9103 | RCT9133 |

MEWPs



Spicer Torque-Hub™
H Series Hydraulic

| Range | | | | | |
|-------|----|----|-----|-----|-----|
| 4H | 7H | 8H | 11H | 13H | 18H |



Spicer Torque-Hub™
eS-AW Series Electric

| Range | | | | |
|--------|--------|--------|--------|--------|
| eSAW04 | eSAW07 | eSAW11 | eSAW13 | eSAW17 |



Spicer Electrified™ e-Drive Drop Box,
Spindle and Hub Output

| Range | | | | |
|-------|-------|-------|-------|-------|
| eS04D | eS05D | eS08D | eS10S | eS10H |

Road Equipment



Spicer Torque-Hub™
RCT Series

| Range |
|---------|
| RCT7102 |



Spicer Torque-Hub™
CTU Series

| Range | | | | |
|-----------|-----------|-----------|-----------|-----------|
| CTU3150.1 | CTU3200.1 | CTU3300.1 | CTU3500.1 | CTU3700.1 |

Track Undercarriages



Spicer Torque-Hub™
CTU Series



Spicer Torque-Hub™
RCT Series

| Range | | |
|---------|---------|---------|
| RCT9083 | RCT9103 | RCT9133 |

Drive Systems Spicer™ Transmissions

Agriculture



Telehandlers



Powersplit Transmission

Range

HVT1



Powershift Transmission

Range

PS09 PSR09 T/VDT12000

Sprayers



Powersplit Transmission

Range

HVT2

Construction and Forestry



Wheel Loaders



Hydrostatic Transmission

Range

312 315 318 319



Hydrostatic Double Speed

Range

358 367



Powershift Transmission

Range

TE32 TE50



Powershift Transmission

Range

TE18 TZL16 TZL18



Powersplit Transmission

Range

HVT2

Mobile Elevated Work Platforms



Hydrostatic Transmission

Range

301

Telehandlers



Powershift Transmission

Range

T/VDT12000



Powersplit Transmission

Range

HVT1



Hydrostatic Transmission

Range

318



Hydrostatic Transmission

Range

319



Hydrostatic Two-Speed Transmission

Range

358 367 368

Forestry Equipments



Powersplit Transmission

Range

HVT2

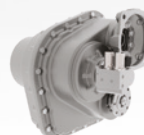
Wheeled Excavators



Hydrostatic Two-Speed Transmission

Range

358 367



Hydrostatic Transmission

Range

342 343

Motor Graders



Powershift Transmission

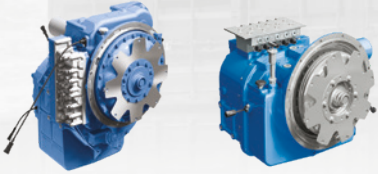
Range

TMG14

Material Handling



Forklifts



Powershift Transmission

Powershift Transmission

| Range | | | | | | |
|--------|--------|------|------|--------|------|------|
| T/TE08 | T12000 | TE08 | TE10 | T/TE14 | TE17 | TE30 |

Container Handlers



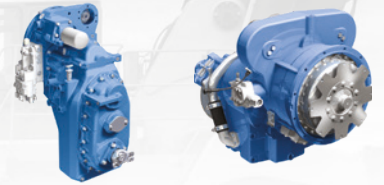
Powersplit Transmission

Powershift Transmission

| Range |
|-------|
| HVT2 |

| Range | | |
|--------|------|------|
| T/TE14 | TE17 | TE30 |

Rough-Terrain Cranes



Powershift Transmission

Powershift Transmission

| Range | |
|--------|-------|
| T20000 | 24000 |

| Range |
|--------|
| T/TE14 |

Mining



Underground Mining Loaders and Trucks



Powershift Transmission

Powershift Transmission

Powershift Transmission

Powershift Transmission

| Range | | |
|--------|-------|--------------|
| T20000 | 36000 | C8000 + 8000 |

| Range | | |
|--------|------|------|
| T/TE14 | TE32 | TE50 |

Utility Vehicles



Powershift Transmission

Powershift Transmission

| Range | | |
|--------|--------|-------|
| T12000 | T20000 | 24000 |

| Range |
|--------|
| T/TE14 |

Underground Mining Drill Rigs

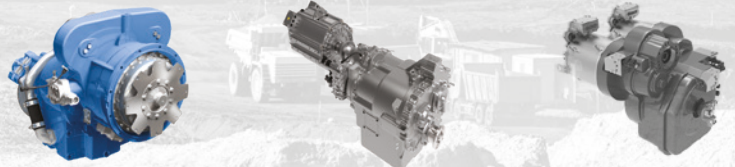


Powershift Transmission

| Range | |
|--------|-------|
| T20000 | 24000 |

| Range |
|--------|
| T/TE14 |

Mining Electrified



Powershift Electrified Transmission

Long Drop Powershift Transmission

e-Powershift Transmission

| Range | |
|--------|--------|
| eRTE14 | eRTE32 |

| Range |
|--------|
| eSP502 |

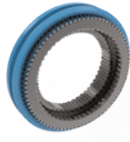
Drive Systems

Graziano™ Custom Gears and Shifting Solutions

Synchronizers



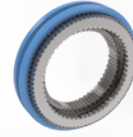
Graziano™ Synchronizer
DC 95/100



Graziano™ Synchronizer
SC 184



Graziano™ Synchronizer
TC 102/110/118



Graziano™ Synchronizer
CSS

Gears and Shafts



Graziano™ Gears



Graziano™ Shaft

Ring Gears



Graziano™ Ring Gears

Powershift Clutches



Graziano™ Powershift
Clutches



Graziano™ Powershift Units

Bevel Sets



Graziano™ Crown
Wheel and Pinion



Graziano™ Bevel Gear

Custom Gears

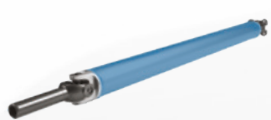


Fairfield™ Custom Gears

Drive Systems

Spicer™ Driveshafts

Tractors



Spicer™ SPL55



Spicer™ Wing™ Series 8.5C



Spicer™ Centered Double Cardan

Combine Harvesters



Spicer™ Double Universal Joint 93B35



Spicer™ Wing™ Series 7C

Reach Stackers



Spicer™ Wing™ Series 6C



Spicer™ Wing™ Series 7C

AGVs



Spicer™ Wing™ Series 5C

Forklifts



Spicer™ Wing™ Series 5C

Telehandlers



Spicer™ Double Universal Joint 82B30



Spicer™ 10-Series 1410

Motor Graders



Spicer™ Wing™ Series 7C

Compact Wheel Loaders



Spicer™ Centered Double Cardan 2015-CDC

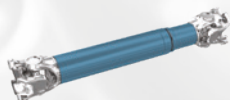


Spicer™ SPL55

Large Wheel Loaders

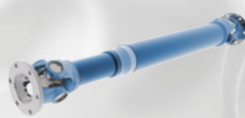


Spicer™ Wing™ Series 15C



Spicer™ Compact Plus™ 2045+

Wheeled Excavators



Spicer™ 10-Series 1410

Forestry Applications



Spicer™ Wing™ Series 7C with Bearing Support



Spicer™ Wing™ Series 8.5C

Underground Mining Loaders



Spicer™ Wing™ Series 9C

Drill Rigs



Spicer™ Wing™ Series 9C

Mining Trucks



Spicer™ Wing™ Series 14C

Motion Systems

With global expertise in the design and manufacturing of high-efficiency technologies for industrial and stationary equipment applications, Motion Systems fully integrates into Dana offer Brevini™ gearboxes, winches and hydraulic solutions, PIV™ extruders drives, GWB™ industrial driveshafts, Fairfield™ custom gears. Supported applications include on- and offshore equipment, green technologies, mining, heavy industries, and earthmoving.



Brevini™ Planetary Gearboxes



S-Range

| Range | Nominal Torque [Nm] |
|-------------|---------------------|
| S300-S20000 | 34,000-2,170,000 |



Industrial Slewing Drives

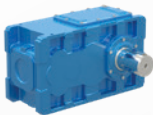
| Range | Nominal Torque [Nm] |
|----------------|---------------------|
| RPR030-RPR2050 | 5,000-24,000 |
| SLS300-SLS850 | 34,000-200,000 |



Industrial and E-Range Planetary Gearboxes

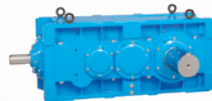
| Range | Nominal Torque [Nm] |
|---------------|---------------------|
| E10-E260 | 1,300-25,000 |
| EM1010-EM1320 | 1,000-24,000 |

Brevini™ Helical and Bevel Helical Gearboxes



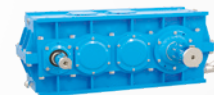
Brevini EvoMax™ Gearbox

| Range | Nominal Torque [Nm] |
|---|---------------------|
| E2H-E3H- E4H-E3B- E4B-E3C- E4C | 10,000-290,000 |



Posired™ 2

| Range | Nominal Torque [Nm] |
|-----------------------------|---------------------|
| PC-PD-PE-PLC-PLD 60 - 91 | 340,000-1,100,000 |
| PB / PLB 16 - 45 | 5,700-113,000 |



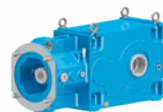
Posired™ N

| Range | Nominal Torque [Nm] |
|---------------|---------------------|
| ND-NE 18 - 56 | 8,200-286,000 |



Posired™ TS

| Range | Nominal Torque [Nm] |
|-------------|---------------------|
| TS18 - TS63 | 8,200-400,000 |



Posired™ D

| Range | Nominal Torque [Nm] |
|---------------|---------------------|
| ILC14 - ILC25 | 3,100-22,800 |

Brevini™ Gearboxes



Gearboxes

| Range | Power [Kw] |
|------------|------------|
| ML32 - 52 | 10-100 |
| B585 - 602 | 30-55 |
| RD33 - 52 | 6-12 |

Brevini™ Plano Helical Gearboxes



High Power



Posiplan

| Range | Nominal Torque [Nm] |
|-----------------------------|---------------------|
| SL2PLB85016 SL2PLB200031 | 90,000-2,170,000 |

| Range | Nominal Torque [Nm] |
|---------------|---------------------|
| PH, BPH 13-28 | 3,900-35,000 |

Brevini™ Gearmotors



Gearmotors

| Range | Nominal Torque [Nm] |
|------------------|---------------------|
| M, N, K, D 00-97 | 50-18,000 |

Brevini™ Winches



Hoisting Winches



Recovery Winches



Winch Drives

| Range | Max Line Pull at First Layer [kg] |
|-------------|-----------------------------------|
| DW 050-090 | 500-900 |
| BWE 015-160 | 1,500-16,000 |

| Range | Max Line Pull at First Layer [kg] |
|-------------------|-----------------------------------|
| BWT 10.000-30.000 | 10,000-30,000 |

| Range | Max Output Torque [Nm] |
|----------------|------------------------|
| PWD 2100-31100 | 10,000-110,000 |
| SLW 300-850 | 85,000-190,000 |
| SMW 1200-3500 | 300,000-850,000 |
| RCW 908-913 | 80,000-130,000 |

GWB™ Industrial Driveshaft

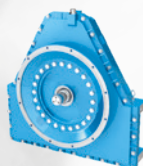


Driveshafts for Industrial Applications

| Range | Torque Range Tcs [Nm] | Flange Diameter [mm] |
|---------------------|-----------------------|----------------------|
| 687/688-598 | 35 up to 21,500 | 00-225 / 600-1,300 |
| 687-688 | 2,400-35,000 | 100-225 |
| 587 | 43,000-57,000 | 225-285 |
| 390/392/ 393/492 | 60,000-1,170,000 | 225-550 |
| 498/598 | 210,000-15,000,000 | 600-1,200 |

Keep Driveshaft - Special Design
super short coupling, tunnel shaft, high speed design, carbon fiber tube
electrical insulation, remote lubrication, automatic lubrication,
condition monitoring

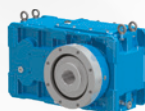
Brevini™ Pump Drives



BZ

| Range | Nominal Power [Kw] |
|-------|--------------------|
| BZ265 | 110-130 |
| BZ290 | 170-190 |
| BZ340 | 220-240 |
| BZ470 | 380-480 |

PIV™ Extruder Drives



Posirex



Positwin



Special Gearboxes for Plastic & Rubber

| Range | Nominal Torque [Nm] |
|---------------------|---------------------|
| XC-XD-XE 16 - 80 | 5,100-720,000 |

| Range | Centre Distance | Torque / Shaft [Nm] |
|-----------------|-----------------|---------------------|
| 15B2N 146B2N | 15-146 | 40-35,000 |

Motion Systems

Brevini™ Pumps



Axial Piston Pumps, Variable Displacement, Closed Loop

| Range | Displacement [cc/rev] | Max Pressure [bar] |
|-------|-----------------------|--------------------|
| HD1 | 55 | 450 |
| S6CV | 75-128 | 400 |



Axial Piston Pumps, Variable Displacement, Open Loop

| Range | Displacement [cc/rev] | Max Pressure [bar] |
|-------|-----------------------|--------------------|
| H1V | 54.8-225.1 | 350 |



Axial Piston Pumps, Fixed Displacement, Open Loop

| Range | Displacement [cc/rev] | Max Pressure [bar] |
|-------|-----------------------|--------------------|
| H1C | 6.1-225.1 | 350 |
| SH11C | 10.3-178.1 | 430 |



Gear Pumps, Fixed displacement, Open Loop

| Range | Displacement [cc/rev] | Max Pressure [bar] |
|---------------------|-----------------------|--------------------|
| OT groups 1 - 2 - 3 | 0.73 – 90 | 270 |
| Hercules group 2 | 4.1 – 30 | 270 |
| Silent plus group 2 | 4.1 – 30 | 250 |

Brevini™ Valves



Pre-Compensated Directional Control Valves

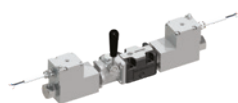
| Range | Inlet Flow [l/min]: | Max Pressure [bar] |
|---------------|---------------------|--------------------|
| HPV 41-77-310 | 160-250-600 (*) | 370-370-370 |

(*) = per Inlet Section



Bankable Valves

| Range | Max Flow [l/min] | Type |
|--------------------------------|------------------|--------------|
| CDC3 – CD3M – CD3 – CDH3 – CD5 | 80 | ON/OFF |
| CX3 – CXQ3 – CXDH3 – CFS3 | 55 | Proportional |



CETOP Valves

| Range | Inlet Flow [l/min] | Max Pressure [bar] |
|------------------------------|--------------------|--------------------|
| Size 2 (NG4) – Size 8 (NG25) | up to 600 | up to 400 |

Brevini™ Motors



Axial Piston Motors, Variable Displacement, Bent Axis

| Range | Displacement [cc/rev] | Max Pressure [bar] |
|---------|-----------------------|--------------------|
| SH7V/VR | 61-216 | 430 |
| SH9V | 62-216 | 430 |



Axial Piston Motors, Fixed Displacement, Bent Axis

| Range | Displacement [cc/rev] | Max Pressure [bar] |
|----------|-----------------------|--------------------|
| H1C | 6.1-225.1 | 350 |
| SH11C/CR | 10.3-178.1 | 430 |



Orbital Motors, Gerotor and Roller

| Range | Displacement [cc/rev] | Max Pressure [bar] |
|--------------|-----------------------|--------------------|
| BGM, BG | 13-400 | 225 / 165 |
| AR, BR, BRZV | 50-400 | 175 |
| HR, HT | 80-500 | 210 |



Gear Motors, Fixed Displacement

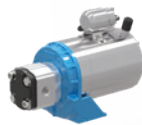
| Range | Displacement [cc/rev] | Max Pressure [bar] |
|---------------------|-----------------------|--------------------|
| OT groups 1 - 2 - 3 | 0.73 – 90 | 260 |
| Hercules gr 2 | 4.1 – 30 | 270 |

Brevini™ Power Units



Mini Powerpacks

| Range | Type |
|-------|--|
| MC | With 4 cavities for single and double acting circuits |
| FP | With flexible design thanks to multiple valve seats. Several circuits layout available |
| DTR | Custom Mini Powerpacks for telescopic dock levellers |
| MK | Custom Mini Powerpack for hanged/swing lip dock levellers |



Motorpumps

| Range | Type |
|-------|--|
| EP | With Ø115 motors and gr. 1 gear pumps |
| MP | With Ø80 motors and gr. 0.5 gear pumps |



Micro Powerpacks

| Range | Type |
|-------|--|
| FR | Micro Powerpack for space demanding applications, 4 cavities for single and double acting circuits |
| FW | Micro Powerpacks for double acting circuits with reversible pump |

Fairfield® Custom Drives



Jacking System Drives



Tram System Drives



Transfer Case



Custom Drive Components

| Range | Max Jacking Torque [Nm] |
|------------|-------------------------|
| S60A-S2000 | 82,000-2,260,00 |

Electrification Capabilities

Dana's comprehensive portfolio of drive and motion technologies helps OEMs efficiently transition toward electrification. Our multi-disciplinary team of engineers develops turnkey solutions ranging from plug-and-play components to fully integrated systems.

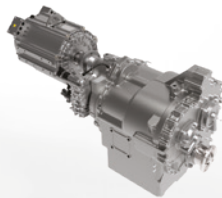
e-Drive



High Efficiency Transmission



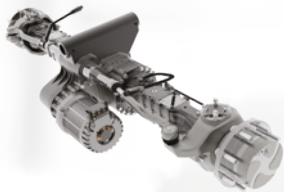
High Efficiency Transmission



e-Powershift Transmission



e-Powershift Transmission



e-Axle Compact



e-Axle Heavy



e-Hub Drive Compact



e-Hub Drive Heavy

e-Motion



e-Slew Drive



EHPS System

EV Components



Low-Voltage Motors



Low-Voltage Inverters



On-engine Generators



High-Voltage Traction Systems



High-Voltage Motors



High-Voltage Inverters



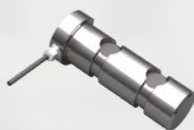
e-Software

Electronics and Mechatronics

Electronic Control Units



Force Sensors



Position Sensors



Inclinometer



Angle Transducer

CTIS



System Solutions

Dana is a world-class collaborator with OEMs in delivering innovative, best-in-class engineering solutions. With resources located near our customers, we can leverage our core competencies in systems development to produce ground-breaking technologies that boost business performance.

Our systems approach is combined with our industry-leading portfolio of advanced technologies to help OEMs maximize the value of their offerings and find a better way forward.

System Thinking

We adopt a **holistic perspective** to systems that fortifies our offerings

System Contents

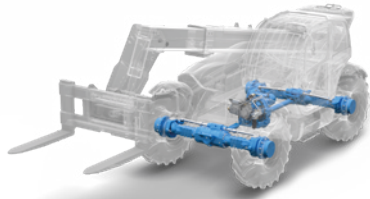
We develop **systems** by using our deep portfolio of innovations to address our **customers' needs**

Knowledge sharing

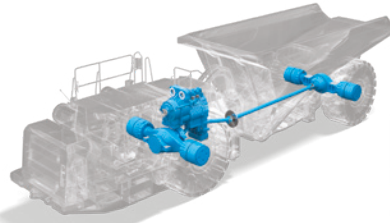
Our culture of **continuous improvement** enables our systems engineering teams to share best practices across markets and geographies

Think Why, Think Wider, Think Systems

Conventional



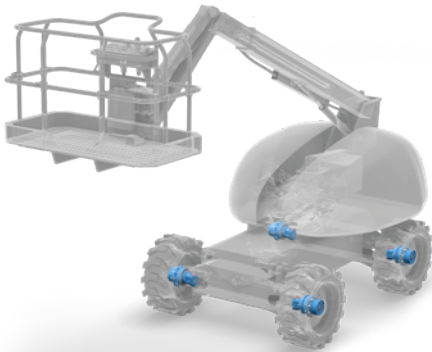
Telehandler



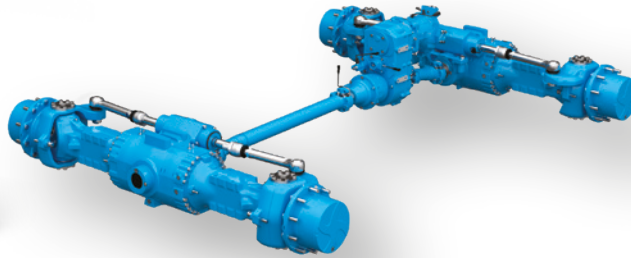
Mining Truck



Tractor

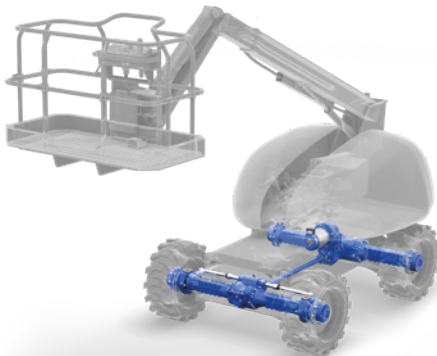


Articulated Boom Lift

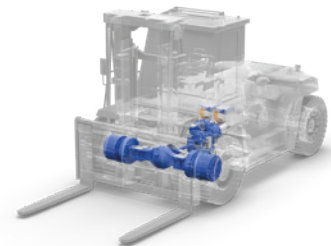


Forklift

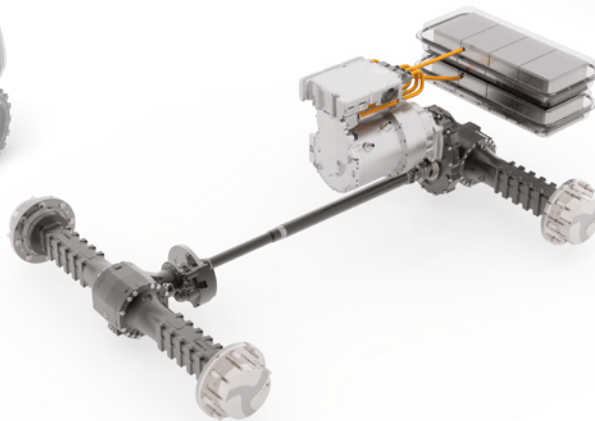
Electrified



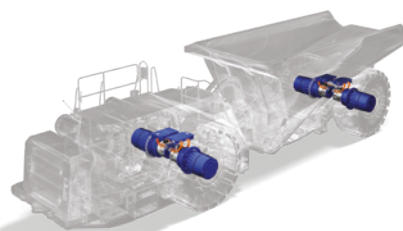
Articulated Boom Lift



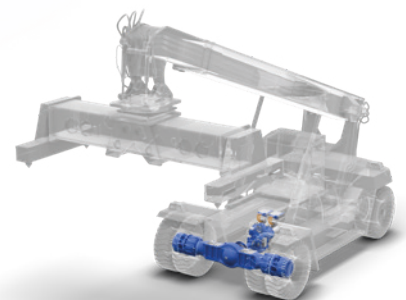
Forklift



Telehandler



Mining Truck



Reach Stacker

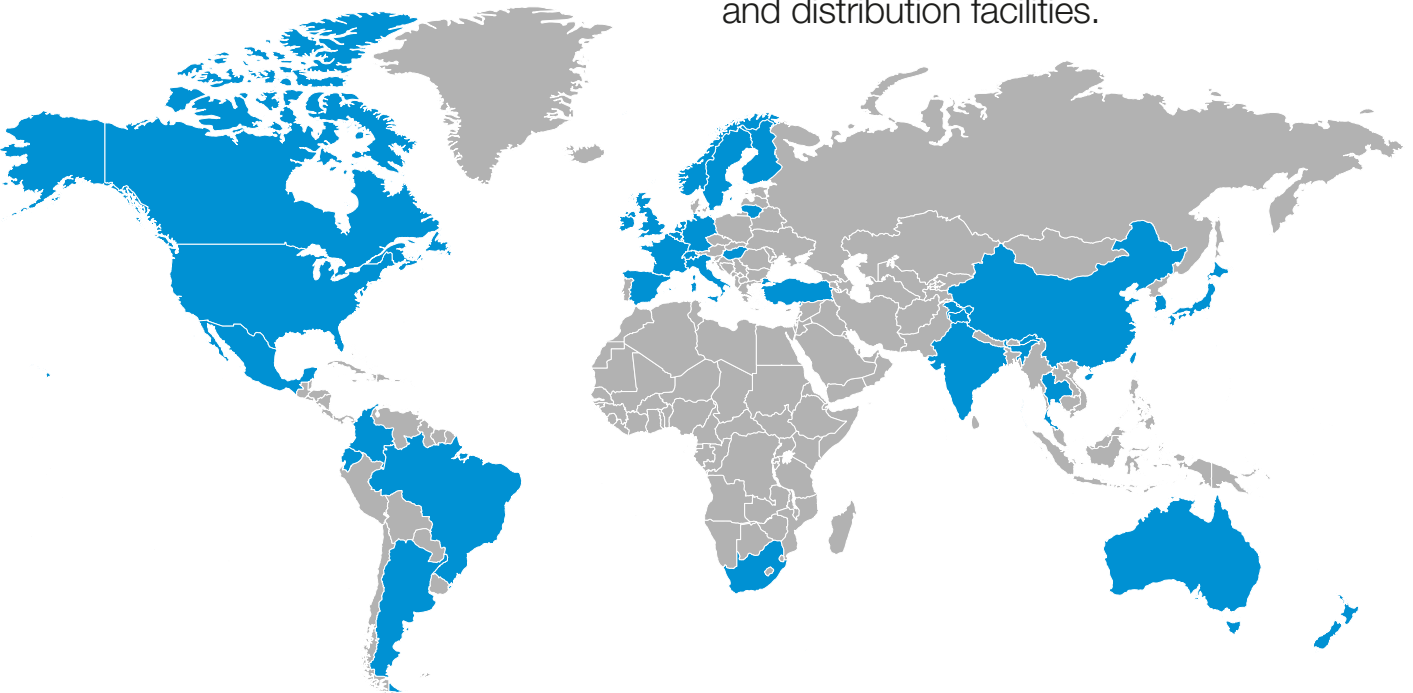
Global Strength

One of the ways we create value is by **positioning** our technical and manufacturing resources where customers need us globally.

Today, that's **30 countries** on **six continents**.

To help customers achieve success, top-tier suppliers must have a global perspective that can be adapted to meet local requirements and end-user expectations.

Dana's **worldwide leadership** is the key to serving clients around the world. We bring our global expertise to the local level with technologies customized to individual requirements through a network of strategically placed technology centers, manufacturing locations, service and assembly centers and distribution facilities.



Our strength is being over six continents thanks to our global logistic network.

Aftermarket Services

Our global expertise is delivered to customers at a local level through a constantly growing and improving aftermarket network. Strategically placed service centers provide solutions tailored to individual specifications by an experienced on-the-ground support team. We meet customer needs in every region, on every platform.



Genuine parts

Dana service parts are manufactured by Dana to the same high standards as original equipment (OE), because they are OE genuine parts.

When a part is replaced a complete interchangeability with existing parts provides total product compatibility, with no change in part numbers.

A non-original component can lead to significant vehicle costs down the road. We protect your vehicle durability and performance.

Dana Distribution Centers

Dana's global network of distribution centers, located in Europe, America, Asia and Australia, offer efficient service points supporting regional customer service, inventory, logistics and packaging operations.

DanaAftermarket.com

E-Commerce Platform

A technology enabled e-commerce platform that brings Dana's global off-highway network of distribution centers, products, services and premium brands to your device 24/7 to make better decisions, speed up your operations and ease doing business with Dana.

Using DanaAftermarket.com you can quickly:

- Search for part level detail
- View global availability in real time
- Place orders from your phone, desktop or tablet
- Access educational brochures, videos and training
- Order management documentation communicated in real time
- API developer portal enables cross platform integration and real time data exchange

Spicer™ Drivetrain catalog

The online Spicer™ product catalog features the extensive off-highway axles and driveshaft portfolio.

Quickly and conveniently locate products by model type or part number through the search functionality and access to usage descriptions and technical details to select optimal products for every aftermarket need.

The product database is always updated as new technologies become available.

Market-Driven Off-Highway Innovation

About Dana Incorporated

Over 39,000 Dana dreamers in over 30 countries drive mobility and transportation forward — wherever the road, or offroad, takes our customers and communities.

A leader in the design and manufacture of propulsion and energy-management solutions, Dana powers vehicles and machines in all mobility markets across the globe.

Delivering groundbreaking drive systems. Advancing revolutionary motion technologies. Championing leading-edge power management innovations across thermal technologies for e-Propulsion; controls and software; battery management systems; and fuel cell plates.

With a balanced portfolio — including complete in-house electrification capabilities — Dana provides class-leading products and systems supporting traditional, hybrid, and EV manufacturers. Everywhere.

About Dana Off-Highway Drive and Motion systems

Dana delivers fully optimized solutions to customers in the construction, agriculture, material handling, mining, and industrial markets.

Dana.com/oh
Dana-industrial.com/contact-us

Application Policy

Capacity ratings, features, and specifications vary depending upon the model and type of service. Application approvals must be obtained from Dana; contact your representative for application approval. We reserve the right to change or modify our product specifications, configurations, or dimensions at any time without notice.

