Product Catalogue

GD RECTIFIERS

The Custom Power Specialist

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About us

GD Rectifiers is a global manufacturer and distributor of products, services and solutions to commercial and industrial users of power electronic components.

We have been supplying power electronic components and customised devices to engineers, purchasing specialists and hobbyists for over 50 years. Our extensive product range includes power semiconductors, passive components, circuit protection devices, renewable energy products, thermal management solutions such as heatsinks and power semiconductor assemblies, magnetic transducers and wound products, and traction converters and subsystems.

We deliver unrivalled customer service, ensuring our high-quality components are delivered on time and in budget, making us one of the UK's leading distributors in the power electronics industry.

We have vast experience across a large range of markets, specialising in new and current technologies for industrial power control applications. A broad product offering has built our exceptional reputation as the go-to custom power specialist with cutting-edge experience across: Aviation, Automotive, Rail, Medical, Military, Industrial and Commercial industries.

Shop 150+ Products from Leading Manufacturers

Same Day & Next Day Delivery Available

Scheduled & Call-Off Orders Available

Component Obsolescence Support

Why choose GD Rectifiers

GD Rectifiers brings a wealth of power electronic component distribution experience with a track record of solving thermal management issues around the world.

- Over 55 years' experience in the power electronics industry
- Established partnerships with leading power electronic brands
- Design and manufacture own range of products with high-quality materials following strict internal processes and standards
- Highly skilled engineering and sales teams to support customers from design to delivery
- Buffer stock for OEMs
- Dedicated account management and component obsolescence support
- Flexible purchasing solutions
- Call-off and scheduled orders
- Same day and next day deliveries
- Shop from over 170,000+ components in stock
- Bespoke custom power products to suit you and your application
- Direct access to our design and engineering teams
- In-house contract manufacturing capabilities with fast time to market
- Expert technical support
- ISO 9001:2015 certified
- Strong engineering and sales teams, direct access to factories and their engineering teams with fast response times

Authorised Distributor

170,000+ Components In Stock

Competitive Pricing

Custom & Flexible Ordering

Expert Technical Support

Quality and Certifications

GD Rectifiers is committed to ensuring the production and delivery of high-quality products, we strive to provide our customers with products and services that exceed their expectations.

We work with some of the world's leading manufacturers for worldwide coverage in the power electronics industry, guaranteeing the best quality at all times.

As a leading independent distributor of power electronic components, we understand the importance of complying with UK and EU legislation recognised by the industry's governing bodies. Our quality procedures cover all of the production and delivery stages we carry out ensuring customer satisfaction and enabling continuous improvement.

GD Rectifiers products comply with the EU directive on the Restriction of Hazardous Substances (RoHS) and we are dedicated to maintaining quality, environmental and health and safety compliance throughout our business.

The following systems and procedures are in place to support our ability to deliver unrivalled customer service and product quality.

- ISO 9001:2015 - the leading quality management standard for business-to-business companies
- BS EN 60947-4-3:2014 - compliance in low-voltage switchgear and control gear, contactors and motor starters, AC semiconductor controllers and contactors for non-motor loads
- BS EN 60146-1-1:2010 - compliance in semiconductor converters, general requirements and line commutated converters, specification of basic requirements
- RISQ - the UK's rail industry supplier qualification scheme, providing a qualification and audit process

Technical Support

We work closely with engineers, buyers and procurement specialists to share our knowledge and aim to provide unbeatable technical support on every project, offering replacement part recommendations, cost effective sourcing solutions, obsolescence support and customised products and designs.

GD Rectifiers works as an extension to your business, providing support with inventory management, pricing, product availability and obsolescence. Delivering key component updates as and when we receive them, keeping our customers informed every step of the way is just one of the unique ways we work with our customers. We brainstorm solutions to help keep your project on track, minimising the stress and inconvenience your team have to endure to make it a pleasant buying process.

We are proud of our friendly technical team which helps customers through the design and component specification phase, helping source the right solution for them. Our team are experienced in sourcing the right technology, at the right price, at the right time. At GD Rectifiers, we specialise in sourcing modern day and obsolete components, supplying and often designing new power devices for the latest product launches and industry developments.

Our sales and engineering teams provide dedicated account management, and work directly with customers on product capabilities, supply chain management, budgets and mass production roll outs. GD Rectifiers' specialist sales team are hands-on with customer accounts, ensuring you get prompted to order the products you need at the right time to speed up delivery. Our sales team work closely with the factories to ensure we provide the best possible prices on the components you need, ensuring your supply chain stays on track.

We're excited to offer customers direct access to our technical and engineering teams, customers can liaise with the same representative from initial enquiry right the way through to delivery, saving you time on planning your project, costs, delivery and repeat order requirements.

Initial Enquiry → **Design & Prototyping Support** → **Competitive Pricing** → **Production & Delivery** → **After Sales Support**

Manufacturers

For over 55 years we have been providing products and custom power solutions to customers, suppliers and OEMs working across a wide range of industrial applications. As one of the UK's most trusted independent distributors of power electronic components, we partner with customers to offer support on design, prototyping, component obsolescence and everyday technical support

GD Rectifiers is proud to partner with some of the world's leading power electronic brands offering best in class components featuring the latest product technology. We stock more than 170,000 components sourced from over 25 leading manufacturers and provide a wide range of value-added solutions and technical expertise to thousands of customers.

Alongside our official distribution partners, we also have access to the following manufacturer product ranges.

Our Products

Semiconductors

GD Rectifiers provides state-of-the-art power semiconductors including diodes, thyristors, IGBTs, IGBT modules, MOSFETs, thyristor diode modules, rectifier bridges and silicon carbide (SiC) devices from some of the world's leading manufacturers including IXYS, IXYS UK Westcode, Littelfuse, Semikron, EDI and Dynex.

Learn More

Circuit Protection Devices

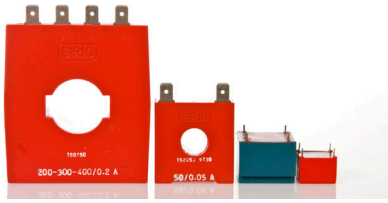
We offer a large range of circuit protection devices including semiconductor fuses, EMI-RFI filters, harmonic filters, medical and military filters, parallel filters, motor protection devices, power factor correction, varistors, surge arresters, surge protection modules and more from leading brands such as Bussmann, Mersen, IXYS, Littelfuse and Enerdoor.

Learn More

Passive Components

GD Rectifiers specialise in passive components; capacitors and resistors, magnetic transducers and wound products; current and voltage transformers, pulse, HF and current transformers, inductors, line reactors and single or three phase transformers from world leading manufacturers including Sirio, Telcon, API Capacitors and Enerdoor.

Learn More



Power Supplies & Transformers

We partner with some of the world's leading manufacturers to provide current transformers, current & voltage transformers and isolating & safety transformers and specialise in distributing products from Meth Srl, Meth Kft, Sirio and Telcon.

Learn More

Renewable Energy

GD Rectifiers offers an extensive range of renewable energy solutions, from LED lighting, solar power and wind power. We distribute renewable energy products from the following manufacturers: GD Rectifiers, IXYS, IXYS UK Westcode and, Semikron.

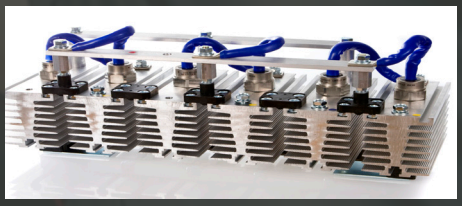
Learn More

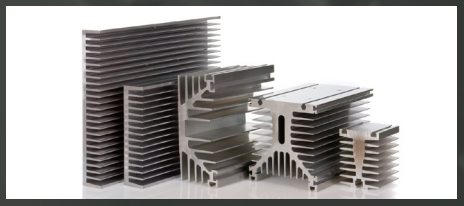
Traction Converters & Subsystems

We offer a wide range of traction converters and subsystems including, converters for trains, trams, coaches and locomotives alongside liquid cooling systems, trackside converters and power electronic building blocks. All of these traction products are manufactured by KONCAR and sold by GD Rectifiers.

Learn More

GD Rectifiers Own Products





Heatsinks

GD Rectifiers manufacture a large range of standard and custom designed heatsinks and hardware. The range includes natural and forced air-cooled heatsinks, closed loop water coolers, water and oil cooled heatsinks, LED heatsinks and hollow fin and solid fin heatsinks suitable for power semiconductors, LED lighting and commercial applications.

Learn More

Heatsinks

GD Rectifiers is one of the UK's leading manufacturers of standard and custom-made heatsinks, heatsink accessories and heatsink assemblies. We stock and machine the UK's largest range of heatsinks suitable for stud, modules and capsule semiconductors, alongside high-power LED applications.

We supply custom designed heatsinks to customers in the Rail, LED lighting, Solar, Electrical and Industrial Equipment, Automotive and Marine industries. Offering a full service from design to production, technical support and fast delivery, GD Rectifiers is a trusted heatsink designer and manufacturer.

Extruded heatsinks are the most commonly used type for thermal management. Our customers generally use extruded heatsinks for medium power systems both in natural and forced convection. We can supply standard profiles or work to bespoke outlines specified by customers to achieve optimal performance.

Our extruded heatsinks can be supplied raw or with a finish, such as anodising or powder coating.

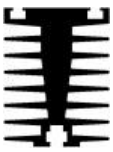
GD Rectifiers are experts in thermal management and specialise in standard and custom made heatsinks, cold plates, liquid cooling solutions and power assemblies. We offer an extensive range of air cooled and forced-air cooled aluminium heatsinks. We have a wide selection of high quality heatsinks readily available, with 50 profiles in stock and over 160 heatsink profiles in our catalogue. We offer bespoke and standard heatsink solutions at unbeatable prices and offer a next day delivery service.

Browse our heatsink range by device type, part number or comparison guide. The comparison guide allows you to compare the various sizes of each device.

GD Rectifiers offer technical support on all heatsinks including specific heat dissipation requirements.Please click on the heatsink part numbers below to view the datasheets for examples of the profiles we have in stock.

Visit our website for the full list of heatsink profiles available.

Stud Device Heatsinks



PS156

Small Isolated Device

PS136

Medium Isolated Device

PS140

High Efficiency Solid Fin Device

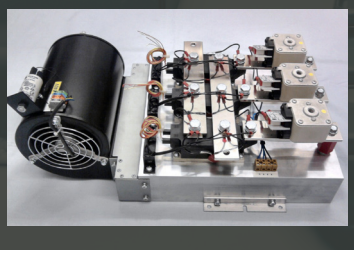
PSBF160A

Capsule Device

PS349

View all profiles in stock

Power Assemblies



GD Rectifiers also designs and manufactures high-quality power semiconductor assemblies to customer specifications using diodes, thyristors in a wide range of topologies with 24 designs available from three configurations, suitable for a wide range of applications.

We specialise in the design of a wide range of assemblies such as rectifiers, regulators, inverters, selenium suppressors, firing circuits/trigger modules and single-phase, three-phase and hex-phase assemblies. Our diode and thyristor rectifier assemblies are available from 5kW up to 5WM and are designed in-house, incorporating bespoke clamping systems and thermal management solutions.
We also offer a large selection of assembly components including semiconductor device clamps and heatsink profiles for maintaining thermal and electromechanical integrity of the components which can be used for diodes, thyristors, GTOs and IGBTs.

GD Rectifiers' power assemblies are typically used in:

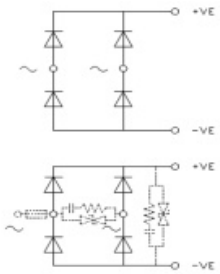
- High powered rectifiers
- High voltage rectifiers
- Resistance welding
- Plating
- Heating
- Lighting
- Cathodic protection
- Magnetic supplies
- Pulse power
- Variable speed drives
- Choppers
- Inverters
- Renewable energy applications
- Wind, solar and tidal energy markets

GD Rectifiers also offer a repair and replacement service for faulty or ageing semiconductor rectifiers, converters, inverters and regulators.

Learn More

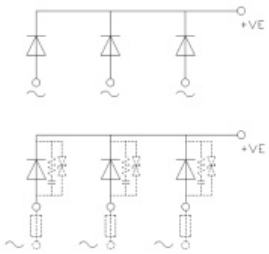
Custom designed high-power assemblies
from 5kW up to 5WM

Single Phase Assembly



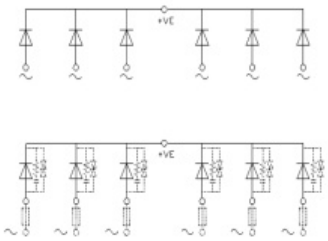
B2U

Three Phase Assembly



M3UK

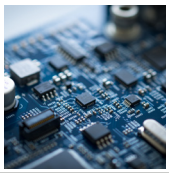
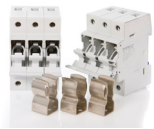
Hex Phase Assembly



M6UK

View all Power Assemblies

Products by Manufacturer

	Semiconductors IXYS A Littelfuse Technology · IXYS UK WESTCODE · IXYS Integrated Circuits Division · SEMIKRON innovation+service · edi · DYNEX
	Circuit Protection Devices GD RECTIFIERS The Custom Power Specialist · EATON Bussmann · mersen · Littelfuse · ENERDOOR Engineered by Finmotor · EICHHOFF · EICHHOFF KONDENSATOREN
	Passive Components apicapacitors · ENERDOOR Engineered by Finmotor · ARCOL · SIRIO Inductive Components
	Power Assemblies & Controllers GD RECTIFIERS The Custom Power Specialist · OCRAM POWER ELECTRONICS · united automation first in power electronics
	Renewable Energy Products GD RECTIFIERS The Custom Power Specialist · SEMIKRON innovation+service · IXYS A Littelfuse Technology · ANYSOLAR TOTAL SOLAR SYSTEM
	Power Supplies & Transformers GD RECTIFIERS The Custom Power Specialist · SIRIO Inductive Components · meth · meth ELECTRIC TRANSFORMERS SINCE 1980 · TELCON
	Traction Converters & Subsystems inem KONČAR Končar Electronics and Informatics, Inc
	Heatsinks & Hardware GD RECTIFIERS The Custom Power Specialist · ATC · BURNDY

Contract Manufacturing Services

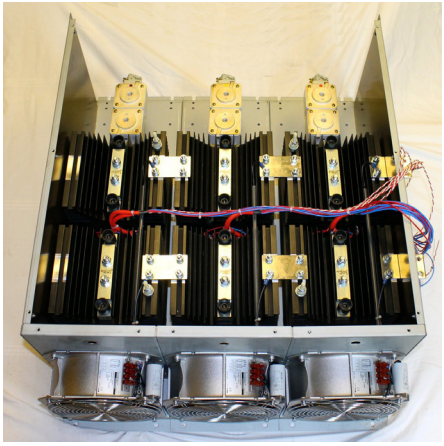
GD Rectifiers has invested heavily and continued to attract market leading customers with requirements to outsource all, or a significant part of their product manufacturing. GD Rectifiers' own product range caters to all high-power applications requiring support with control or power conversion, and products can be found in motion control, oil & gas, renewable energy, rail, industrial and HVAC applications.

GD Rectifiers covers all areas of thermal management and both the heatsinks and power assemblies adhere to strict international standards. The company provides unrivalled customer service and quality, and the GD Rectifiers quality management system is approved to ISO 9001:2015 and also complies with BS EN 60947-4-3:2014 and BS EN 60146-1-1:2010. GD Rectifiers own product range caters to all high-power applications requiring support with control or power conversion and products can be found in motion control, oil & gas, renewable energy, rail and industrial & HVAC applications.

GD Rectifiers continues to develop solid customer partnerships and strives to provide an exceptional service to existing and future customers within the contract electronic manufacturing marketplace.

Power Assemblies

- Design, manufacture and assemble bespoke high power semiconductor assemblies to suit any topology using diodes and thyristors.
- Choose from standard or customised state of-the-art power electronic assemblies
- Design partnership from concept to production
- Large range of power assemblies and controllers available - single phase, three phase and hex phase assemblies, rectifiers, regulators, inverters, selenium suppressors, firing circuits, trigger modules and rotating diode assemblies
- Choose from 24 designs available in three configurations
- Typical applications include: AC drives, DC drives, bridges, regulators, soft starts, energy optimisers, telecommunications, UPS and SMPS
- We design, test and deliver best in class products and have over 20 years of manufacturing expertise



Heatsinks

- Heatsink designer and manufacturer offering standard and customised designs and thermal management solutions
- 160+ profiles to choose from with over 50 profiles in stock
- Shop by device type or part number and compare profiles online
- Bespoke lengths and finishing options available
- Large range of heatsinks available - custom designed heatsinks, natural and forced-air cooled heatsinks, LED heatsinks, hollow fin heatsinks, solid fin heatsinks, water and oil cooled heatsinks
- Extensive range of heatsink accessories available including busbar insulators, busbars for modules, clamps for capsules, thermal compound, thermal trips, AC and DC fans
- Able to quote heatsink profiles outside of product range
- Confident that heatsink prices and lead times won't be beaten elsewhere

CNC Machining

- State-of-the-art CAD and CAM software
- Dedicated CNC machinery used purely for bespoke lengths specified by customers
- CNC machining capacity up to 2000mm with a saw capacity of 600mm x 200mm
- High quality batch-work machining
- Competitive pricing with short lead times

Whether your project is prioritised on price, time-to-market or being as green and environmentally friendly as possible, GD Rectifiers can help.

Get in touch with our team today, our manufacturing expertise is backed by insight and delivered with best in class quality.

Partnership Opportunities

Ways to work with us

Become an Agent

GD Rectifiers' vast range of products are sold worldwide and we're looking to partner with agents that share our passion for power electronics and are interested in selling our products in their region. Our agents provide a vital link to customers and potential customers, we work collaboratively to deliver the best solution for your territory. We are always looking for new agents who have the ambition to grow and scale their business using our top-quality products.

By joining our network of agents, you can benefit from GD Rectifiers' specialist product range and gain access to:

- Comprehensive product range and custom power solutions including our own products and services
- Specific offers that provide value to you and your customers
- Access to new and industry-leading products
- Access to marketing material and product guidance
- Training and ongoing technical support for sales teams

If you are interested in becoming an agent or require further information, please contact - marketing@gdrectifiers.co.uk

Supplier & Customer Referrals

We are looking to extend our supplier and referral networks; and are keen to support customers with any collaborative projects to establish mutually beneficial business opportunities. We frequently partner with manufacturers of transformer and rectifier panels to offer customers a turnkey solution and will refer customers to our supplier network if a project or product requirement is considered out of our manufacturing or distribution capabilities.

If you would like to find out more about our referral opportunities or would like to refer your customers to GD Rectifiers for projects out of scope, please contact our sales team today on 01444 243 452 / enquiries@gdrectifiers.co.uk.

Contract Manufacturing

GD Rectifiers has invested heavily in helping customers that choose to outsource all, or a significant part of their product manufacturing over the past five years. We work closely with customers from initial design through to ongoing manufacture and delivery.

Why work with us? Our collaborative approach to contract manufacturing has produced many commercial successes over the years, contact our sales team today to find out more about how we could work together on 01444 243 452 / enquiries@gdrectifiers.co.uk.

New Distribution Opportunities

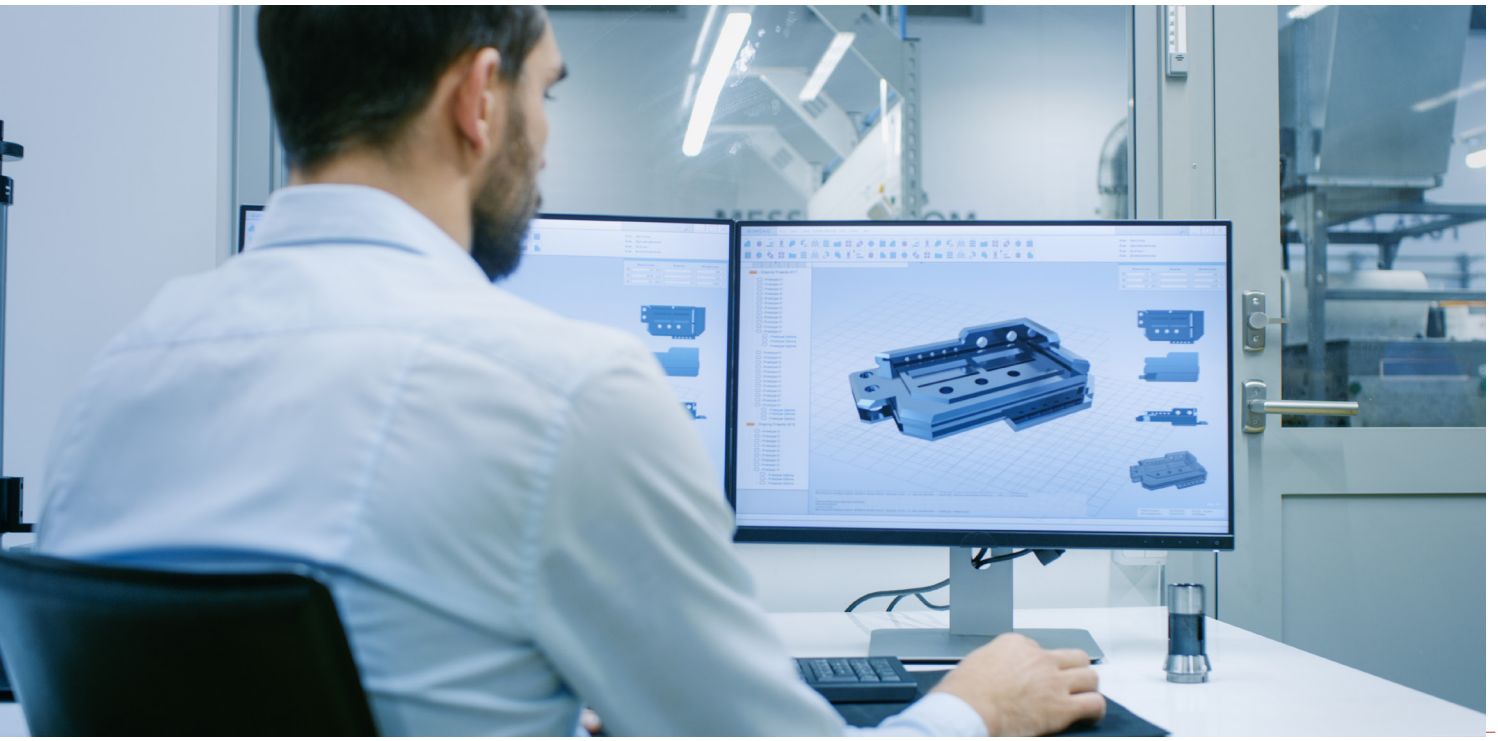
We are always looking to broaden our distribution network, as long as the products complement our existing specialist range of power electronic components.

Are you a leading OEM and specialise in power electronic components? Are you looking to expand your distributor network in the UK and Europe? Then we'd like to hear from you!

Contact our team today to discuss potential distribution opportunities - marketing@gdrectifiers.co.uk.

Why Partner with GD Rectifiers

- Over 55 years' experience in the power electronics industry
- Established partnerships with leading power electronic brands
- Design and manufacture own range of products with high-quality materials following strict internal processes and standards
- Highly skilled engineering and sales teams to support agents from initial quote to delivery
- Buffer stock available
- Dedicated account management and component obsolescence support
- Flexible purchasing solutions - call-off and scheduled orders
- Same day and next day deliveries
- Shop from over 170,000 components in stock
- Bespoke custom power products to suit your customer and their applications
- Direct access to our design and engineering teams
- In-house contract manufacturing capabilities with fast time to market
- Expert technical support - strong engineering and sales teams, direct access to factories and their engineering teams with fast response times
- ISO 9001:2015 certified



Engineering Expertise

Friendly Workplace

Training & Development

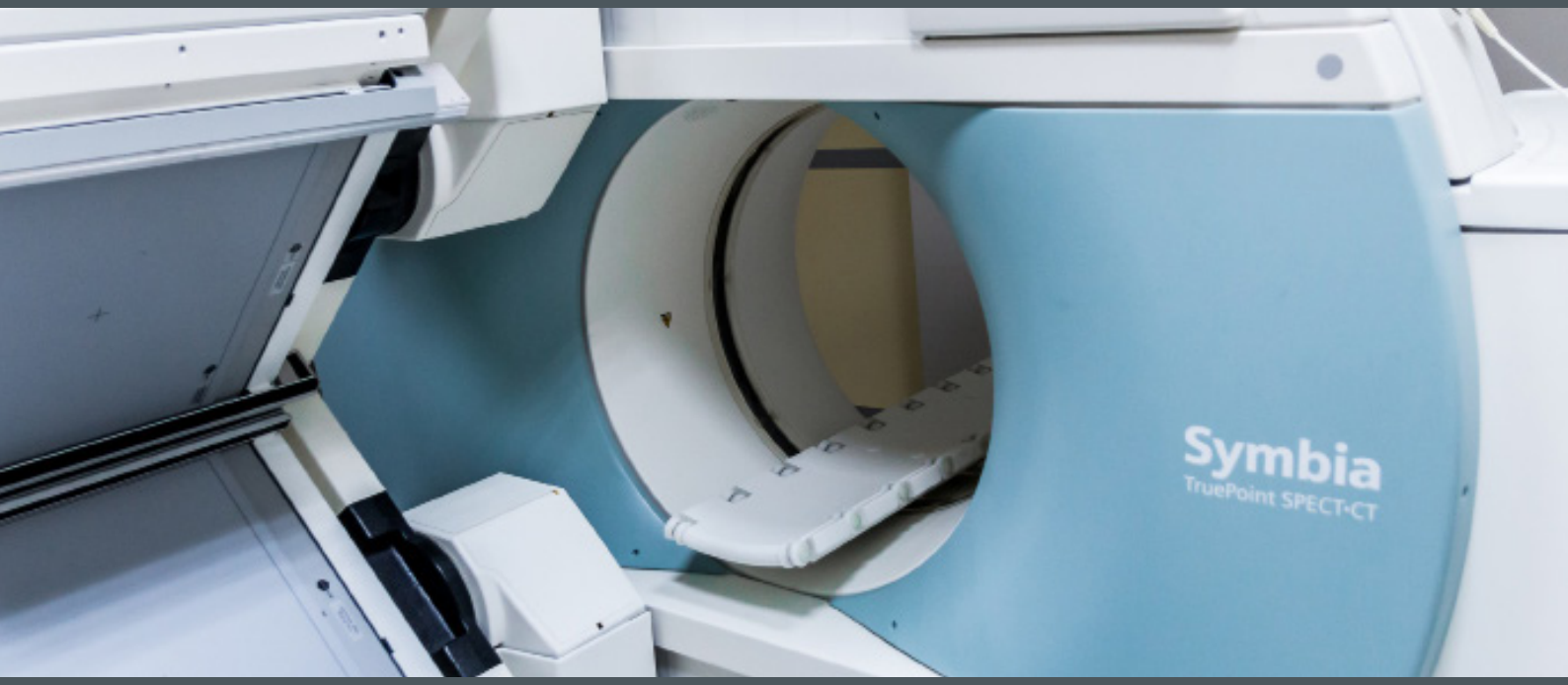
Rewards & Benefits

Markets & Applications

An extensive product offering has built GD Rectifiers exceptional reputation as the go-to custom power specialist with innovative experience across a wide range of applications, markets and industries.

- Aerospace
- Audio
- Automotive
- Battery Energy
- Broadcast
- Communications
- Computing
- Consumer Electronics
- Energy
- EV Charging
- Harsh Environments
- High Voltage
- Industrial
- Instrumentation
- IoT
- LED Lighting
- Lighting
- Low Power
- Maintenance & Repair
- Marine
- Medical
- Military Electronic Parts
- Mining
- Motor Control
- Oil & Gas
- Power Generation
- Power Management
- Power Supply
- Rail
- Renewable Energy
- Robotics
- Security
- Smart Grid
- Solar Power
- Wind Power

GD Rectifiers utilises its dedicated team of engineers to help customers with voltage, current and frequency requirements, alongside thermal management and circuit protection design challenges.



As a distributor for some of the world's leading manufacturers in the field, we supply power electronic components to a diverse range of applications, which most commonly include battery energy storage systems, electrical maintenance and repair, EV charging, gas & oil, high voltage, industrial & HVAC, medical, motor control, motor drives, power supply, rail and renewable energy.

Location

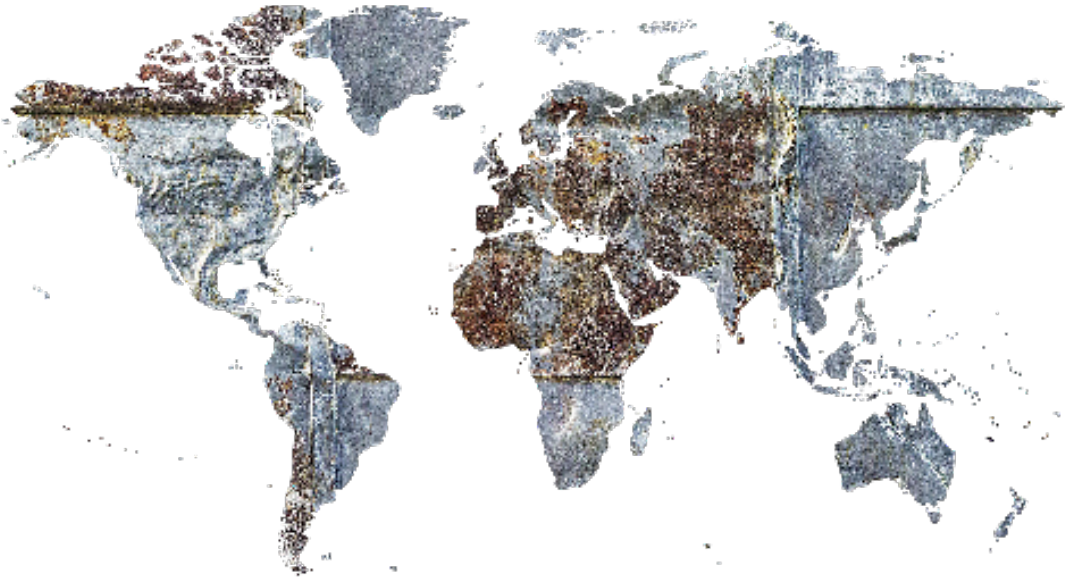
GD Rectifiers' Head Office is based in Burgess Hill, West Sussex, UK. Our sales team travel across the country to meet with customers, showcasing our latest products, services and manufacturer brands. We also offer online meetings via Zoom, Google Meet, Microsoft Teams and Skype which is useful when multiple teams and locations are involved in product discovery, design and review meetings.

Call Us
Contact us today on 01444 243 452 for the quickest response

Write To Us
Simply email enquiries@gdrectifiers.co.uk and we'll get back to you

Enquire With Us
Open an enquiry form to recieve a quick quote

Request A Call Back
Speak to a member of our team today



Countries we sell to

A global presence with a large network of customers, we sell over 150 different products to more than 59 countries. Our products are used in a wide range of applications worldwide and carry international standards and certifications.

Australia
Belarus
Belgium
Bulgaria
Brazil
Canada
Channel Islands
China
Columbia
Cyprus
Czech Republic
Denmark
Ecuador
Estonia
Finland
France
Germany
Ghana
Greece
Hong Kong
Iceland
India
Indonesia
Ireland
Israel
Italy
Japan
Kazakstan
Korea
Kosovo
Macedonia
Malta
Morocco
Netherlands
Nigeria
Norway
Oman
Philippines
Poland
Portugal
Qatar
Romania
Saudia Arabia
Sinagpore
Slovakia
Slovenia
South Africa
Spain
Sweden
Switzerland
Taiwan
Thailand
Turkey
UAE
UK
USA
Venezuela
Vietnam

Phone
01444 243 452

Email
enquiries@gdrectifiers.co.uk

Address
GD Rectifiers Ltd, Bentley House,
2 William Way, Burgess Hill,
West Sussex, RH15 9AG

Connect with us

GD RECTIFIERS

The Custom Power Specialist