

# 船用柴油机

## Marine Diesel Engines



**GDF** 广州柴油机厂股份有限公司  
GUANGZHOU DIESEL ENGINE FACTORY CO.,LTD



厂区掩映在绿树之中 Tree-lined plant

公司新的厂区鸟瞰图 Aerial view of the company

## 历史悠久 实力雄厚

广州柴油机厂股份有限公司（原广州柴油机厂）是中国柴油机制造业中历史最悠久的企业之一，她的前身是协同和机器厂，始建于1911年，1915年她成功地制造出中国第一台柴油机。今天的广州柴油机厂股份有限公司已经发展成为中国华南地区最大的柴油机专业生产企业，具有批量生产柴油机的能力。

## 产品齐全 品质卓越

广州柴油机厂股份有限公司(英文缩写: GDF)主要生产320、230、G26、G32、KU30A等五种系列的中速柴油机，产品功率范660kW-6000kW。柴油机具有运行稳定性和可靠性高，储备功率充足，低油耗，低排放，维护方便，运行成本低的特点，深受广大用户欢迎。

230SG系列天然气发动机是根据目前国际市场需要，按照节能减排的设计理念，与挪威船舶技术研究所合作研发的新产品，获得CCS颁发的产品型式认可证书。

GDF建立了严格的质量管理体系，获得了英国皇家认证协会（UKAS）颁发的质量管理体系ISO9001认可证书，同时获得了CCS、BV、GL、NK、LR、DNV等多国船级社的工厂认可和产品认可证书。

GDF生产的中速柴油机完全符合IMO-Tier II 规定的排放标准。

GDF生产的各种中速柴油机广泛应用于各类船舶主、辅机，可配套遥控装置、推力轴承、各类联轴节及齿轮箱；可两端输出功率，带动各类工程机械；还可提供驾控台、集控台或监控台，并实现驾控、集控、机旁操作的三者相互转换，具有性能良好、报警功能齐全、操作方便等优点，适合各种客滚船、油船、散货船、集装箱船、拖轮、渔轮、疏浚工程船及海军舰船作主机或辅机动力之用。



Guangzhou Diesel Engine Factory Co., Ltd. "GDF" (Formerly known as Guangzhou Diesel Engine Factory) known as Hip Tung Wo Machinery Factory established in 1911, who made the first diesel engine in China in 1915. Now, the factory has become the largest factory manufacturing diesel engines in the South China with the capacity of mass production of diesel engines.

GDF manufactures mainly series 230, 320, G26, G32 and KU30A medium-speed with output from 660kW to 6000kW. The new product 230SG series nature gas engine is designed by Norwegian Marine Technology Research Institute cooperated with our company according to the Energy Saving and Emission Reduction Principle and the market demand. This diesel engine has many features such as stable operation and high reliability, sufficient margin power, low fuel consumption, low emission, low running cost and easy to maintain thus warmly received by users.

GDF has obtained the CCS, BV, GL, NK, LR and DNV Factory Authorization and Certificates and has established a strict quality management system ISO9001.

The exhaust emission of the medium-speed diesel engines manufactured by GDF is in conformity with the NOx emission standard issued by IMO-Tier II.

The medium-speed diesel engines from GDF with the power taken

out from the both ends of the crankshaft are widely used as the marine main or auxiliary engine of ro-ro vehicle ship, oil tankers, container ships, bulk ships, tugboats, dredger, ocean engineering ship and ocean official ship and can be equipped with remote-controlled device, thrusting bearings and all kinds of coupling and gearboxes according to the requirements from users. Furthermore, we can supply steering, central controlling, monitoring and engine-side operating consoles with a good performance, a complete alarms, easy operation and capable of changeover each other.

GDF also manufactures generating sets with the output of 500kW to 4180kW. These generating sets are equipped with the diesel engine from the factory as their motive machines and the first-rated generator and electrical device with the many features such as low fuel oil consumption, low noise level, easy parallel to power grids and capable of long term operation with a good performance, and the generating sets equipped with the emergency device can be automated for supply of power thus are ideal stand-by or emergency power equipment for power stations and plants etc.

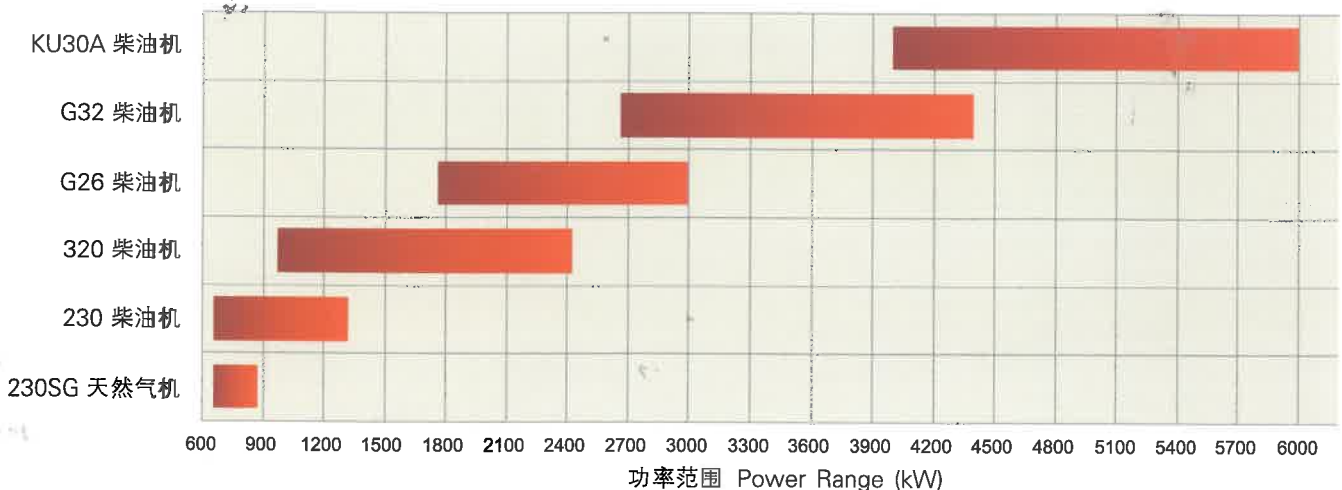
All medium-speed diesel engines of 320, 230, G32 and KU30A series and generating sets from our factory can be operated on heavy fuel oil of 180cSt/50°C, 380cSt/50°C or of 1500 sec. Red No 1/100°F, 3500 sec. Red No 1/100°F.

## 专业创造 品质超群

GDF生产500kW—4180kW的各种规格柴油发电机组，是采用我公司生产的柴油机配套优质的发电机和电控设备而组成，具有噪声低、油耗省，并网容易和可长时间运转的良好性能；带有应急装置的柴油发电机组还可实现供电的自动化，是用户理想的自备电站和发电厂可靠的保安备用电源。

GDF生产320、230、G26、G32、KU30A系列的各种规格船用主机及船、陆用中速柴油发电机组，可燃用运动粘度180厘沱/50°C、380厘沱/50°C或雷氏1号粘度1500秒/100°F、3500秒/100°F的重油。

## 功率范围 Power Range





• 先进的设备——数控曲轴磨床  
• Advanced Equipment-Numerical Control Crankshaft Grinding Machine



• 先进的设备——五面体加工中心  
• Advanced Equipment-Machining Center

GDF是一家技术密集型企业，产品从设计、制造、测试到投放市场，是一项复杂的系统工程。

设计方面，我们积极与国内外著名的科研所合作，应用计算机PLM、CAD、三维有限元软件进行设计、研制新产品，持续加强新产品质量改进，使我们的新产品拥有较高的技术含量。

制造方面，我们拥有专业的生产线和先进的设备，从铸造、机加工到总装配，我们都严格执行工艺纪律，以工艺提升制造水平，打造企业竞争力。

测试方面，我们选用精密的测试仪器，运用先进的测试手段，保证产品的技术精度，突显我们的品牌优势。

GDF is concentrated technology enterprise. The manufacturing product is a complex system engineering: design, manufacture, measuring, test and marketing.

In design, We have cooperated with famous institution home and abroad to design the diesel engine by means of PLM and CAD software, and have been improving the quality of products continuously to make our product have high technical content. In manufacture, We have special production line and advanced devices to make the enterprise own competitive power including casting, machine and assembly production line.

In measuring, We use precise testing instrument by means of advanced testing methods to guarantee the accuracy of product.

- 企业通过ISO9001质量管理体系认证
- The certificate of conformity of quality management system certification gained by the factory

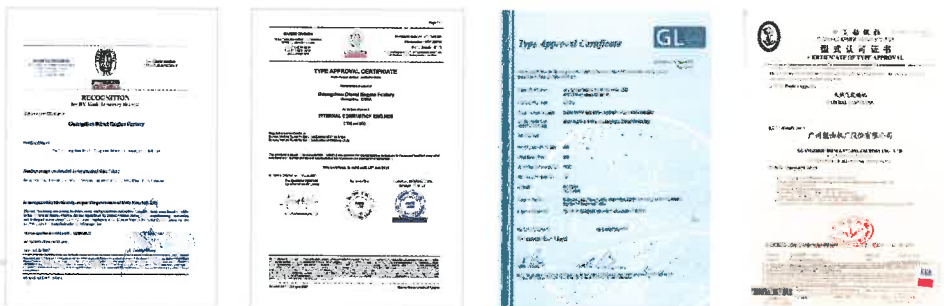


- 先进的设备——定梁龙门加工中心
- Advanced Equipment-Batching Gantry Machining Centre

Pentahedron



- 质量管理体系认证证书
- Certificate of Conformity of Quality Management System Certification
- 认证注册证书
- Certificate of Registration



- BV对工厂的认可
- Recognition for BV Model II Survey Scheme
- BV型式认可证书
- BV Type Approval Certificate
- GL型式认可证书
- GL Type Approval Certificate
- 天然气机型式认可证书
- Certificate of Type Approval of Natural gas





- 采用我公司2台8230ZC船用柴油机作主动力力的五星级新世纪游轮“世纪钻石”号
- The "CENTURY DIAMOND" New Century Cruises Equipped With Our 2 Sets of 8230ZC Marine Diesel Engine As Its Propelling Unit.

### 230系列柴油机性能特点 BRIEF INTRODUCTION TO SERIES 230 ENGINES CHARACTERISTICS

6230型船用柴油机是我公司与中国船舶重工集团公司711研究所在总结我国中速船用柴油机成功经验的基础上，遵照引进、消化、吸收、创新的技术引进原则联合开发的新型中速柴油机，该机各项性能指标均达到九十年代国际同类产品先进水平，并具有外形简洁、结构合理、性能稳定、工作可靠、操作维护方便、经济性好等优点。

230系列柴油机为四冲程、直列式、直接喷射、废气涡轮增压、中间空气冷却，不可逆转的柴油机。有6缸、8缸，功率660~1324kW等规格。可燃用运动粘度380cSt/50℃或雷氏1号粘度3500秒/100°F的重油。

The Series 230 engine is a turbocharged, irreversible, single action, four stroke, in-line, direct injection, and medium speed diesel one with a charging cooler, capable of being operated on heavy fuel oil of 380cSt/50℃ or of 3500 sec.Red.No.1/100°F. The engine with 6 or 8 cylinders and with the output of 660 to 1324kW. 6230 is a new product developed by our company in cooperation with the Shanghai Marine Diesel Engine Institute on the base of the successful experience in diesel engine design and use, on the principle of assimilation of advanced technologies and improvement upon of them, and by adoption of the advanced structure of the other engines, with many features such as a simple outline, reasonable construction, reliable performance, easy operation and maintenance.

### 适宜选用230船用柴油机作主机船舶类型 230 engine used as the main engine of following ships

- |                     |                       |
|---------------------|-----------------------|
| • 挖泥船               | • 内河船                 |
| • Dredgers          | • Riverboats          |
| • 工程船               | • 客滚船                 |
| • Engineering ships | • Ro-Ro vehicle ships |
| • 化学品船              | • 油船                  |
| • Chemical ships    | • Oil tankers         |
| • 散货船               | • 拖轮                  |
| • Bulk carriers     | • Tugboats            |



- "海洋石油252"海洋环保工作船 用四台8230ZC型柴油机（四机双可调桨）
- "HAIYANG SHI YOU 252" Ocean Environment Protection Engineering Ship-8230ZC × 4



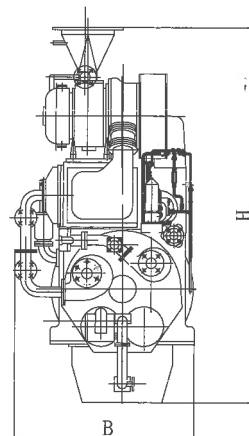
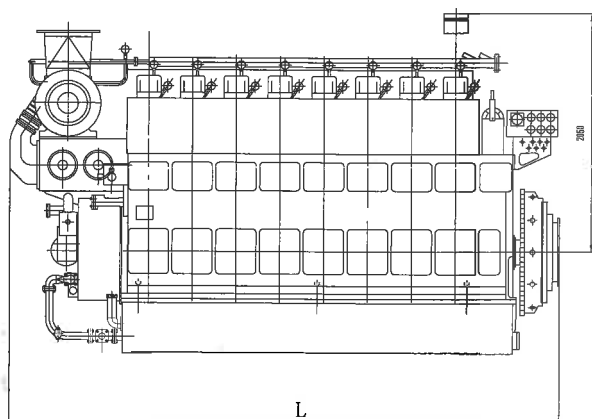
### 主要技术参数

The main specifications parameters

项目Item	型号Model	6230ZC-1	6230ZC	6230ZC	6230ZC-4	8230ZC	8230ZC-4
气缸直径 Cylinder bore	mm	230					
活塞行程 Piston stroke	mm	300					
气缸数 No. of cylinders		6				8	
持续功率 MCR	kW/Ps	660/898	730/993	810/1100	960/1300	1100/1500	1324/1800
转速 Speed at MCR	r/min	750	750	750	900	750	900
平均有效压力 Mean effective pressure	MPa	1.41	1.56	1.73	1.712	1.73	1.771
最高燃烧压力 Max.combustion pressure	MPa	≤13.0	≤13.0	≤13.5	≤14.0	≤13.5	≤14.0
燃油消耗率 Specific fuel oil consumption g/kW.h at 85% MCR at 100% MCR		190					
		192					
润滑油消耗率 Specific lube oil consumption g/kW.h		1.0					
主要尺寸 Main Dimensions (LxBxH)	mm	3852x1353x2718			3898x1353x2792	4638x1353x2792	
重量 Weight	kg	11500			11700	14500	

### 230系列柴油机外形尺寸

230 Series Diesel Engine Overall Dimensions





- "长能9号" 液化石油气运输船 使用8320ZCd-8 型柴油机做主机
- "CHANGNENG 9" LPG Transport Ship 8320ZCd-8 Diesel Engine

### 320系列柴油机性能特点 BRIEF INTRODUCTION TO SERIES 320 ENGINES CHARACTERISTICS

6320型船用柴油机曾获全国科学大会奖，该机结构紧凑，性能先进，振动性能良好，达到国内中速机的先进水平，并且有工作可靠，操作维护方便，经济性好的优点。

320系列船用柴油机为四冲程、水冷、直接喷射、废气涡轮增压、中间空气冷却的柴油机，有6缸、8缸、12缸，功率971~2426kW等多种规格，可燃用运动粘度180厘沱/50℃或雷氏1号粘度1500秒/100°F的重油。

320系列船用柴油机可根据客户需求配套遥控装置、各类联轴节、齿轮箱及其它工程机械。

6320 awarded with the prize of the National Conference of Science of China, with many features such as a simple outline, reasonable construction, reliable performance, easy operation and maintenance.

The series 320 diesel engine, is a turbocharged, four stroke, water cooled, direct injection. In-line, and medium speed diesel one with a charging air cooler.

The engine with 6, 8, or 12 cylinders and with the output of 971 to 2426kW has many features such as heavy fuel oil of 180cSt/50°C or of 1500 secretary. Red. Number 1/100°F.

On the request of users, the engine can be equipped with remote-controlled device, all kinds of coupling, gear boxes and other engineering machinery separately.

### 适宜选用320船用柴油机作主机船舶类型

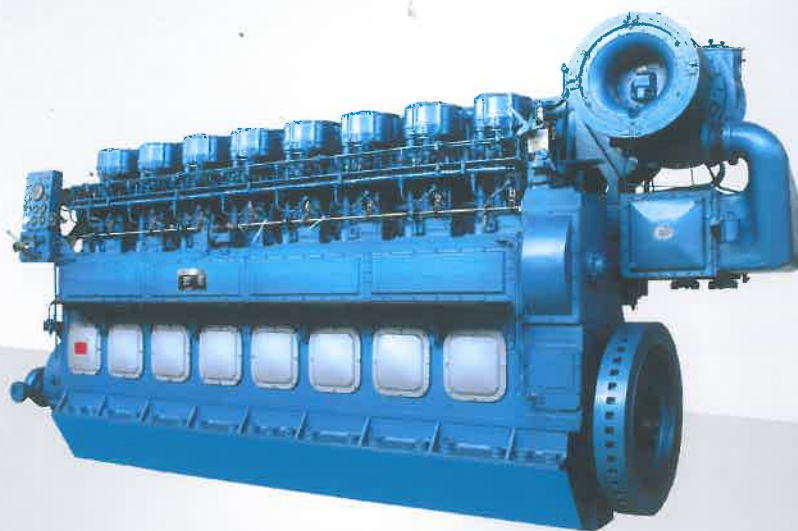
320 engine used as the main engine of following ships

- |                       |                 |
|-----------------------|-----------------|
| • 客滚船                 | • 拖轮            |
| • Ro-Ro vehicle ships | • Tugboats      |
| • 油船                  | • 渔轮            |
| • Oil tankers         | • Fishing ships |
| • 集装箱船                | • 疏浚工程船         |
| • Container ships     | • Dredgers      |
| • 散货船                 | • 海军舰船          |
| • Bulk carriers       | • Naval ships   |



- "广浚一号" 拖轮使用两台8320ZCd-8柴油机
- "GUANG JUN 1" Tugboats-8320ZCd-8 x 2 Diesel Engine





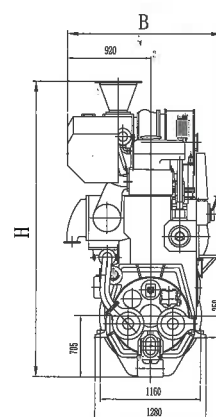
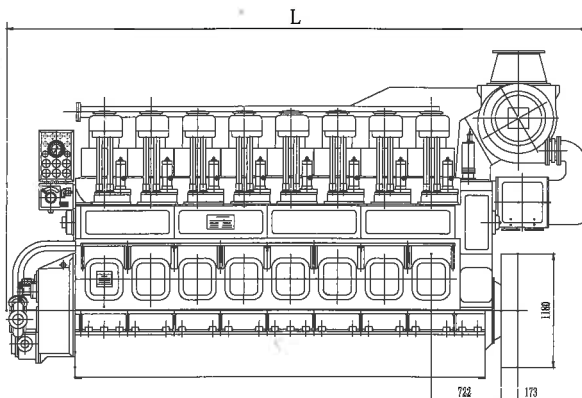
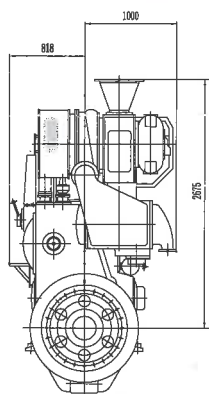
### 主要技术参数

The main specifications parameters

项目Item	型号Model	6320ZCd	6320ZCd-2	6320ZCd-4	6320ZCd-6	6320ZCd-4	8320ZCd-6	8320ZCd-8	12V320ZCd
气缸直径 Cylinder bore	mm	320							
活塞行程 Piston stroke	mm	440							
气缸数 No. of cylinders		6				8			12
持续功率 MCR	kW/Ps	971/1320	1103/1500	1324/1800	1545/2100	1765/2400	2060/2800	2206/3000	2426/3300
转速 Speed at MCR	r/min	400	428	500	525	500	525	525	450
平均有效压力 Mean effective pressure	MPa	1.372	1.457	1.495	1.662	1.495	1.662	1.782	1.523
最高燃烧压力 Max.combustion pressure	MPa	≤9.5	≤10.3	≤12.5	≤12.5	≤12.5	≤12.5	≤13.5	≤12
燃油消耗率 Specific fuel oil consumption g/kW.h									
at 85% MCR		196		189		196		186	192
at 100% MCR		198		191		198		189	194
润滑油消耗率 Specific lube oil consumption g/kW.h		1.2							
主要尺寸 Main Dimensions (LxBxH)	mm	4859x1613x3055		4934x1818x3239		6010x1818x3480		6010x1853x3480	5660x2470x3426
重量 Weight	kg	23000				30000			35000

### 320系列柴油机外形尺寸

320 Series Diesel Engine Overall Dimensions





- G26柴油机适合客滚船、油船、集装箱船、散货船、拖轮、疏浚工程船、海洋工程船及海洋公务船等船舶做主、辅机用
- G26 engine represents the idea solution for propulsion in the main or auxiliary engines of ro-ro vehicle ship, oil tankers, container ships, bulk ships, tugboats, dredger, ocean engineering ship and ocean official ship etc.

### **G26**系列柴油机性能特点 BRIEF INTRODUCTION TO SERIES G26 ENGINES CHARACTERISTICS

G26系列柴油机是我公司自主研发的新一代产品，是在我公司长期积累的大量设计、计算、试验数据和丰富的制造经验基础上，吸取国际先进技术开发成功的。可燃用380厘沱/50℃的重油，曲轴采用全平衡结构整机振动小，柴油机自由端可以输出100%的额定功率。

G26系列柴油机为轮机人员提供一个更为简洁的操作平台。更小的吊缸高度，模块化多功能及人性化设计，轮机人员操作简化的同时降低了劳动强度。

提高产品使用可靠性、经济性，满足环保法规要求，使客户获得利益最大化是我们不懈的追求。

G26系列柴油机适用于船用主、辅机，及陆用电站动力。

The series G26 diesel engine is a self-developed new product, and it is developed successfully based on much calculation for a long time, test data and abundant manufacture experience, also absorbed the advanced technique from international brand engines, can use 380cSt/50℃ HFO, the crankshaft adopts full balanced construction so the whole engine vibration is small, and the engine can be output of 100% rated power from free end. The engine operation is reliability with high economy, and meets environmental regulations. Making clients satisfied is our untiring pursuit.

G26 engine shall supply the more compact operating platform for the engine persons. The much small lifting cylinder height, modular, multi functional and humanization design, not only decrease the person operation, but also reduce the labor intensity.

G26 engine can apply to marine main, auxiliary engine, and land generating station.







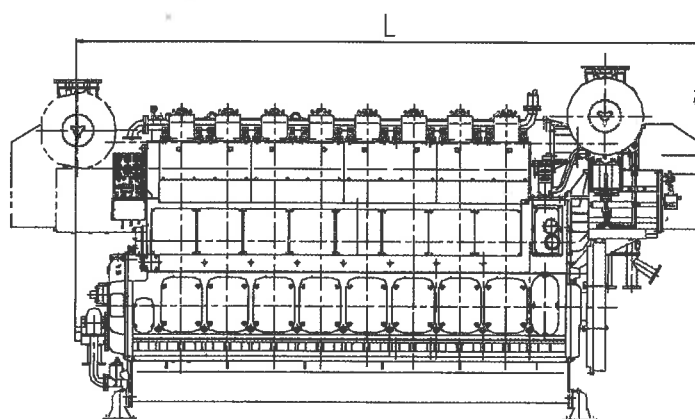
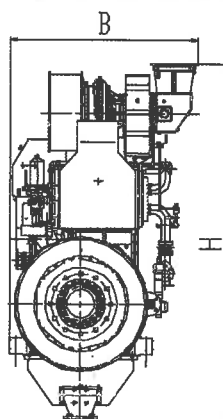
### 主要技术参数

The main specifications parameters

项目Item	型号Model	6G26E	6G26	8G26	9G26
气缸直径 Cylinder bore	mm	260			
活塞行程 Piston stroke	mm	390			
气缸数 No. of cylinders		6		8	9
持续功率 MCR	kW/Ps	1760/2400	1998/2700	2664/3600	3000/4080
转速 Speed at MCR	r/min	750			
平均有效压力 Mean effective pressure	MPa	2.26	2.57	2.57	2.57
最高燃烧压力 Max.combustion pressure	MPa	19.0	21		
燃油消耗率 Specific fuel oil consumption g/kW.h					
	at 85% MCR	183			
	at 100% MCR	185			
润滑油消耗率 Specific lube oil consumption g/kW.h		0.8			
主要尺寸 Main Dimensions (LxBxH)	mm	5153x1685x3386		6043.5x1810x3463	6478x1810x3463
重量 Weight	kg	26000		30000	33000

### G26系列柴油机外形尺寸

G26 Series Diesel Engine Overall Dimensions





- 琼州海峡"粤海铁3号"、"粤海铁4号"火车渡轮 每条船用两台8G32型柴油机做主机
- Qiongzhou Channel "YUEHAI RAILWAY No.3" Ferry And "YUEHAI RAILWAY No.4" Ferry- 8G32×2 Diesel Engine Respectively

### **G32** 系列柴油机性能特点 BRIEF INTRODUCTION TO SERIES G320 ENGINES CHARACTERISTICS

G32型船用柴油机是GDF近年开发的新产品，产品技术结构和性能指标处于国内领先地位，达到本世纪初国际同类产品的先进水平。

G32型船用柴油机为四冲程、水冷、直接喷射、废气涡轮增压、中间空气冷却、不可逆转的柴油机。有6缸、8缸、9缸，功率2665~4400kW等规格，可燃用运动粘度380厘沱/50℃或雷氏1号粘度3500秒/100°F的重油。

The series G32 diesel engine is a new product developed by GDF in recent years. It has advanced technology and wonderful performance keeping ahead in the home market and has reached the level of the like products in the world in the turn of this century.

The G32 engine is a turbocharged, four strokes, water cooled, directly injected and irreversible one with a charging air cooler. The engine with 6, 8 or 9 cylinders and with the output of 2665 to 4400kW, can be operated on heavy fuel oil of 380cSt/50℃ or 3500 sec.Red.No.1/100°F.

### 适宜选用G32船用柴油机作主机船舶类型 G32 engine used as the main engine of following ships

- 客滚船
- Ro-Ro vehicle ships
- 油船
- Oil tankers
- 集装箱船
- Container ships
- 散货船
- Bulk carriers
- 拖轮
- Tugboats
- 渔轮
- Fishing ships
- 疏浚工程船
- Dredgers
- 海军舰船
- Naval ships
- 多用途工作船
- AHTS



- "济海8005" 海洋工作船 用6G32A×2主机
- "JIHAI 8005" Ocean Engineering Ship-6G32A×2





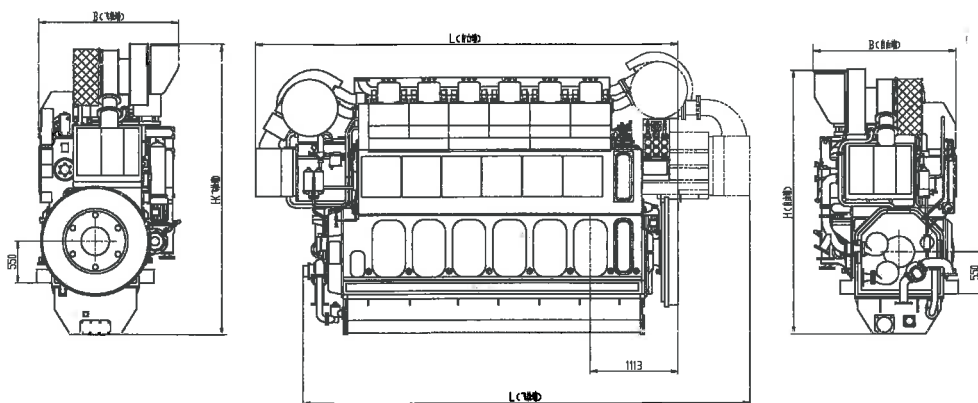
### 主要技术参数

The main specifications parameters

项目Item	型号Model	6G32	6G32A	8G32	8G32A	9G32
气缸直径 Cylinder bore	mm	320				
活塞行程 Piston stroke	mm	480				
气缸数 No. of cylinders		6		8		9
持续功率 MCR	kW/Ps	2665/3600	2930/4000	3552/4800	3906/5310	4400/6000
转速 Speed at MCR	r/min	600				
平均有效压力 Mean effective pressure	MPa	2.30	2.53	2.30	2.53	2.53
最高燃烧压力 Max.combustion pressure	MPa	≤19.0				
燃油消耗率 Specific fuel oil consumption g/kW.h	at 85% MCR	183				
	at 100% MCR	185				
润滑油消耗率 Specific lube oil consumption g/kW.h		0.8				
主要尺寸 Main Dimensions	mm					
增压器自由端 Free end (LxBxH)		5580x1924x3490		6727x1904x3455		7257x1910x3745
增压器飞轮端 Flywheel end (LxBxH)		5829x1924x3650		6895x1904x3570		7420x1910x3820
重量 Weight	kg	36500		46000		54000

### G32系列柴油机外形尺寸

G32 Series Diesel Engine Overall Dimensions





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### 横浜制作所

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### Yokohama Dockyard & Machinery Works

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**广州柴油机厂股份有限公司是三菱重工  
KU30A型柴油机在中国的生产和销售合作  
伙伴。**

GDF signed partnership with MHI in  
manufacturing and selling for KU30A  
diesel engines in China.

自1917年开始,三菱重工就致力于柴油机的制造和研发。各种柴油机能够满足客户的一般用途和特殊用途。三菱重工先进的研发和生产技术在日本和国外都得到了高度评价。

三菱四冲程中速柴油机特点:运行稳定性和可靠性高,储备功率充足;低油耗、低排放;维护方便、运行成本低。

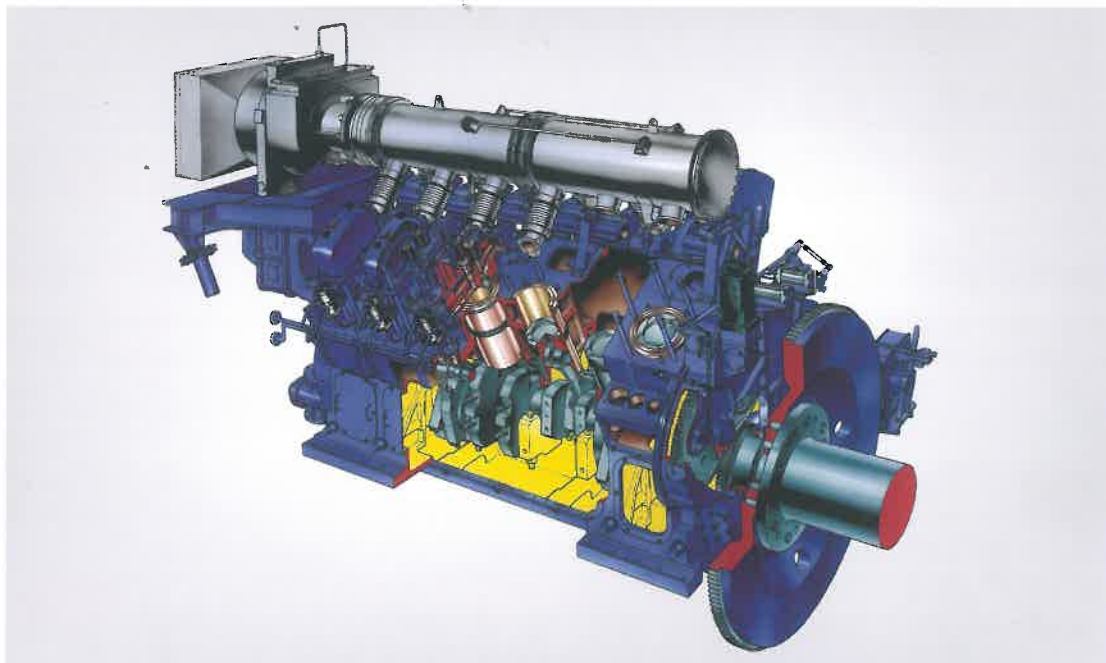
Since 1917, MITSUBISHI HEAVY INDUSTRIES, LTD (MHI) has been manufacturing and designing Diesel Engines. Diesel engines from MHI can meet the users' common and special requirements. MHI's advanced technology in designing and manufacturing has earned high reputation in Japan and overseas.

The features of medium speed diesel engines with four-stroke: stable operation and high reliability, sufficient margin power, low fuel consumption, low emission, low running cost and easy to maintain etc.



- 可靠性高 High Reliability
- 经济性好 Good Economy
- 油耗低 Low Fuel Consumption
- 可燃380cSt/50℃重油 Can be operated on HFO with 380cSt/50℃





### 主要技术参数

The main specifications parameters

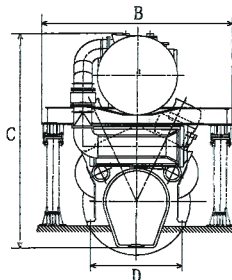
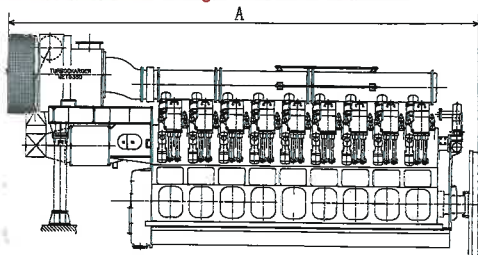
项目Item	型式 Type	V型, 四冲程, 筒状活塞, 直接喷射, 单转向, 涡轮增压, 中冷。 V-type, 4-stroke, trunk piston, direct injection, non-reversible, turbocharged with intercooler.			
型号 Model			12KU30A	14KU30A	16KU30A
气缸数 Number of cylinders			12	14	16
气缸直径 Cylinder bore		mm	300		
活塞行程 Piston stroke		mm	380		
最大持续 功率 MCR	功率 Power	kW/PS	4000/5440	4700/6392	5350/7276
	转速 Speed	r/min	750		
	平均有效压力 Brake mean effective pressure	MPa	1.99		
	活塞平均速度 Mean piston speed	m/s	9.50		
旋转方向(从飞轮端视) Direction of rotation (seen from flywheel end)			顺时针 Clockwise		
净重 Net weight		ton	40	48	54
燃油消耗率* Specific fuel oil consumption at 85% MCR at 100% MCR		g/kW.h			
			184 186		

\* 燃油消耗率基准条件按产品技术文件

The basic condition for SFOC refers to the technical document of product

### KU30A系列柴油机外形尺寸

KU30A Series Diesel Engine Overall Dimensions



机型 Model	A	B	C	D
12KU30A	6355	2900	3400	1700
14KU30A	7145	2900	3720	1700
16KU30A	7685	2900	3720	1700
18KU30A	8225	2900	3720	1700



• 侧推螺旋桨  
Side thrust propeller

- GDF为“海洋石油252”海洋环保工作船提供主推进动力装置
- GDF Supplying Main Propulsion Power Unit For "HAIYANG SHIYOU 252" Ocean Environment Protection Engineering Ship

### 主推进动力装置 MAIN PROPULSION POWER UNIT

GDF一直以来致力于船用中速柴油机的设计、制造，具备批量供应660kW~6000kW（900Ps~8200Ps）的船用中速柴油机的能力。

我公司不但能向客户供应船用中速柴油机，而且还致力于向客户提供全套动力系统总成的解决方案，为各种海上船舶和海面作业提供船舶机械推进及操纵系统。我们通过与生产厂家、设计院的密切合作，并基于丰富的实践经验，已从单一的柴油机生产商发展到提供主推进动力装置的供应商，具备为客户提供全套动力系统总成解决方案的能力。在向用户供应全套动力系统的同时，在整个船舶建造过程中，我公司还为客户提供质量控制，进度控制，安装调试和维修保养的全部服务。

GDF has devoted itself to designing and manufacturing the marine medium-speed diesel engines for the long time past with the capacity of batch supply of 660kW~6000kW (900Ps~8200Ps) marine medium-speed diesel engines. Our company not only supplies marine medium-speed diesel engines, but also devotes to supplying the solution of the complete set of propulsion power system to the customers, Which the propulsion system and the remote control system for the open sea ship and offshore operation are supplied to customers. This kind of supply is based on the professional technology which has been tested practically. We has developed to be a supplier of main propulsion power unit from a single manufacturer of diesel engines with the technical plan design capacity of the complete set of propulsion power system with the support of parts manufacturers, designing

### 主推进动力装置方案 MAIN PROPULSION POWER UNIT PLAN

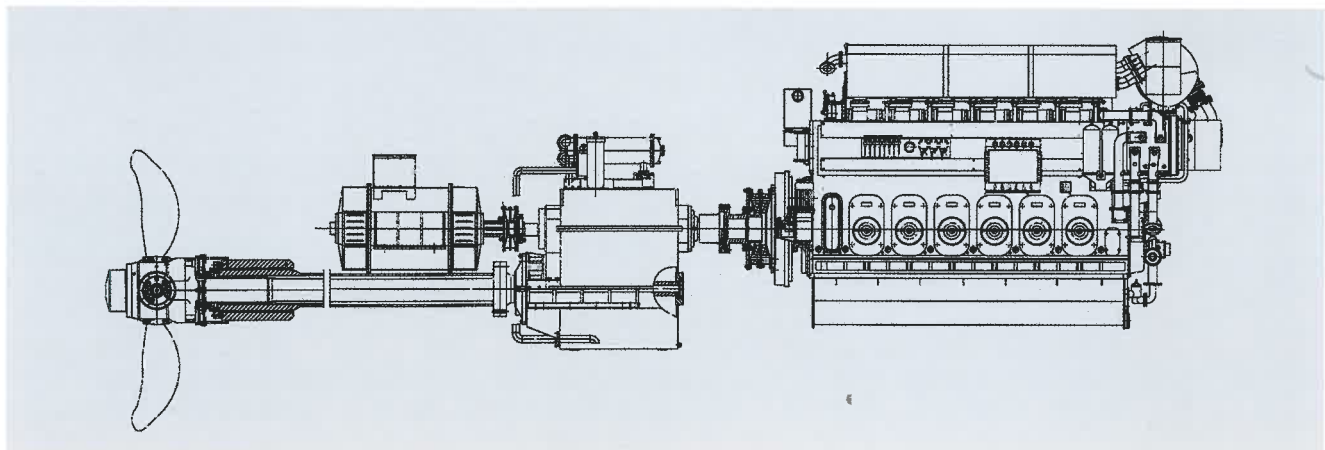
- 柴油机 Diesel Engine
- 弹性联轴器 Elastic Coupling
- 齿轮箱 Gearbox
- 定距桨 Fixed pitch propeller
- 可调距螺旋桨 Controllable pitch propeller
- 遥控系统 Remote control system
- 中间轴 Intermediate shaft
- 艉轴 Tail shaft
- 轴带发电机 Shaft generator
- 艏艉侧推 Bow and tail side thrust unit
- 联合操作系统 Combined operation system



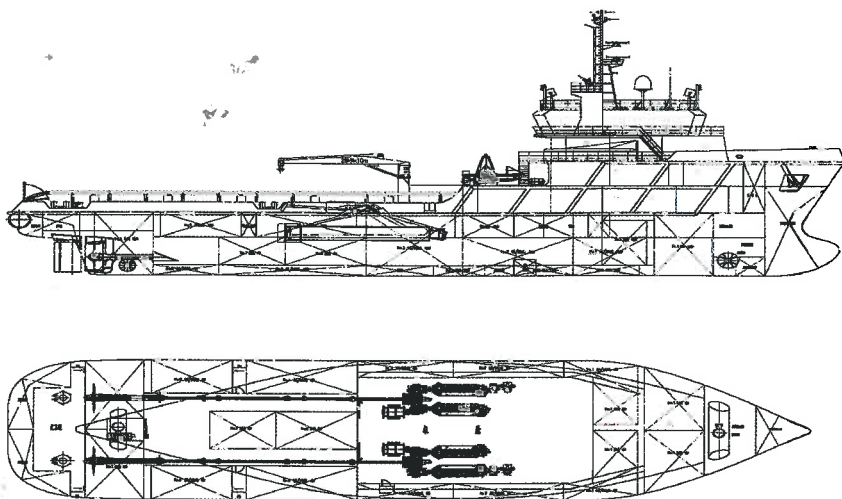
• 轮机舱 Engine Room

institutes and the customers. We supply the complete set of propulsion power system, at the same time, we also supply the complete services such as quality control, schedule control, commissioning and maintenance throughout the building process.





- "济海8005" 海洋工作船主推进装置案例(6G32A型柴油机)
- "JI HAI 8005" Shipping Instance of Main Propulsion Power Unit For Ocean Engineering Ship(6G32A Diesel Engine)



- "海洋石油252" 海洋工作船推进动力装置(四台8230ZC柴油机双桨)
- Main Propulsion Power Unit "HAIYANG SHIYOU 252" Ocean Engineering Ship



- RATO-R联轴器
- Elastic Coupling

供油单元  
HFO SUPPLY UNIT



供油单元性能特点  
PERFORMANCE CHARACTERISTICS FOR  
HFO SUPPLY UNIT

供油单元是GDF选用Alfa Laval公司的粘温控制系统(MkII)和板式加热器(CBM26)等组装而成, 是保证重油进入柴油机的压力、粘度和温度的重要设备。单元可在重油和柴油间灵活切换。当常用泵组出现故障时, 备用泵组可自动投入运行。该单元具有使用方便、可靠、结构紧凑等优点。可提供供油单元CCS产品证书。

The HFO supply unit made by GDF with the Viscosity-Temperature Control System (MkII) from Alfa Laval and final heater (CBM26) is the crucial equipment to ensure the right. The unit can be switched between DO and HFO flexibly and the standby pump unit can be put into operation automatically when something happens to the normal pump unit. The unit has many features such as easy operation, reliable performance and compact construction, etc., and the CCS certificate of fuel supply unit can be provided.

主要技术参数  
The main specifications parameters

项目Item	型号Model	HFOE.04C.00	HFOE.03C.00
Alfa Laval粘温控制系统 Alfa Laval viscosity-temperature control system		Mk II	Mk II
供油量 Oil supply capacity	m <sup>3</sup> /h	3	1.5
重油循环量 HFO circulation capacity	m <sup>3</sup> /h	6	3
柴油输出压力 DFO output pressure	MPa	0.2 ~ 0.3	0.2 ~ 0.3
重油输出压力 HFO output pressure	MPa	0.4 ~ 0.5(180cSt/50℃重油HFO) 0.45 ~ 0.55(380cSt/50℃重油HFO)	0.4 ~ 0.5(180cSt/50℃重油HFO) 0.45 ~ 0.55(380cSt/50℃重油HFO)
重油输出粘度 HFO output viscosity	cSt	12 ~ 14	12 ~ 14
加热介质 Heating media		蒸气或导热油 Steam or Heat conduction oil	蒸气或导热油 Steam or Heat conduction oil
加热介质需求量 Required steam capacity		按型号配置 According to model of HFO supply unit	按型号配置 According to model of HFO supply unit
长*宽*高 L*B*H	mm	2300x1400x2282	2300x1400x1760
重量 Weight	kg	1100	1065
适用油品 Applicable oil	cSt/50℃	180HFO、380HFO	180HFO、380HFO



分离机模块  
HFO SEPARATING MODULE



分离机模块性能特点  
PERFORMANCE CHARACTERISTICS FOR  
HFO SEPARATING MODULE

分离机模块是GDF选用Alfa Laval 公司的重油分离机、板式加热器(CBM26-40)和螺杆式供油泵等组装而成, 是柴油机燃用重油时必不可少的设备。单元使用方便、可靠、减少现场大量的管路连接。

The HFO separating module made in GDF with the HFO separator from Alfa Laval, plate type heater(CBM26-40) and screw fuel oil supply pump is indispensable for HFO operation of the engine. This unit has many features of easy operation, reliable performance, and reduction of on-the spot pipeline connection, etc.

主要技术参数  
The main specifications parameters

项目Item	型号Model	HFOE.01C.00A		HFOE.02C.00A	
Alfa Laval分离机型号 Alfa Laval separator model		PA615		PA605	
最大有效分离量 Max.capacity of effective separation L/h		2200	1600	1300	950
适用油品 Applicable oil	cSt/50℃	180HFO	380HFO	180HFO	380HFO
分离温度 Separation temperature	℃	98		98	
工作空气压力 Air operating pressure	MPa	0.5 ~ 0.7		0.5 ~ 0.7	
工作水压力 Water operating pressure	MPa	0.2 ~ 0.6		0.2 ~ 0.6	
加热介质 Heating media		蒸气(Steam)或导热油(Heat conduction oil)		蒸气(Steam)或导热油(Heat conduction oil)	
加热介质需求量 Required steam capacity		蒸气(Steam)110kg/h或导热油(Heat conduction oil)3m³/h		蒸气(Steam)60kg/h或导热油(Heat conduction oil)1.5m³/h	
长*宽*高 L*B*H	mm	1100x1100x1260		1100x1100x1260	
重量 Weight	kg	1000		1000	



# 创新世纪动力

Power for new century

## ■ 广州柴油机厂股份有限公司 (原广州柴油机厂)

**GUANGZHOU DIESEL ENGINE FACTORY CO., LTD (FORMERLY KNOWN AS GUANGZHOU DIESEL ENGINE FACTORY)**

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Address: No.73, East, Fangcun Road, Guangzhou, China.

电话(Tel): 0086-20-81891619 传真(Fax): 0086-20-81892297

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**工程部: 广州市芳村大道东73号**

After-sales Department: No.73, East, Fangcun Road, Guangzhou.

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**配件销售: 广州市芳村大道东73号**

Spare Parts Sale: No.73, East, Fangcun Road, Guangzhou.

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**泉州服务中心: 福建省泉州市坪山路碧水湾2B-02号**

Quanzhou Service Centre: No. 2B-02, Bishuiwan, Pingshan Road, Quanzhou City, China.

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**大连特约维修服务中心: 大连市中山区上海路3号上影大厦2207室**

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