

# Nihon Spindle

Leading Eco-Technology

## KGS Series

• Energy Saving • Space Saving



Open Circuit Induced Draft Crossflow Type Cooling Tower

## Contents



Product Overview	3
Corporate Profile	4 - 5
Standard Features	6
Optional Features	7
Selection Table	8 - 13
Technical Specification	14 - 19
Tower Information	20 - 24
- Model Name	
- Dimensions & Layout	
Construction & Materials	25
Engineering Specifications	26
Certificate of Warranty	27
Japan Cooling Tower Institute (JCI)	28
Cooling Technology Institute (CTI)	29
Certification Letter from CTI	30- 34
Past Project Portfolio	35

## Nihon Spindle KGS Series



### Product Overview

- Open Circuit & Induced Draft
- Crossflow Technology & Maintenance Friendly
- Modular System & Multiple Cell Configuration
- Gravity Flow & Nozzle Free Water Distribution System
- High Efficiency Fills with Low Drift Technology and Adhesive-Free
- Energy Efficiency<sup>(1)</sup> from as low as 0.011kW per m<sup>3</sup>/hr.
- Product footprint<sup>(2)</sup> from as low as 0.029m<sup>2</sup> per m<sup>3</sup>/hr
- Thermal Performance Rating for single and multiple cell configurations certified by Cooling Technology Institute (CTI)
- Design & Manufacturing Standards certified by Japan Cooling Tower Institute (JCI) in accordance to Japan Industrial Standards (JIS)



Notes (1) & (2): Data based on inlet temperature 37.0°C, outlet temperature 32°C and ambient wetbulb temperature 27.0°C as per JCI standard



## A Trusted Global Brand

Nihon Spindle is one of the many accomplished brands acquired by Sumitomo Heavy Industries Limited, which forms part of the largest Japanese keiretsu famously known as Sumitomo Group.

Founded in 1918, Nihon Spindle excelled in the field of cooling tower developments for over 50 years and we continue to lead a new field of eco-technologies as a pioneer in high efficiency cooling towers. In-house research & development programs conducted at multiple test facilities in Nihon Spindle plants across Asia Pacific has contributed to the successful creation of a new breed of cooling towers that consume less energy with minimal water losses, the ideal eco-friendly solution for our end user.

### A Successful History

- 1918 Nihon Spindle Manufacturing was founded in Osaka (Japan) as a limited partnership, producing spindles and key components for textile machines
- 1961 Nihon Spindle Manufacturing commenced full production and distribution of cooling towers
- 1972 Nihon Spindle Manufacturing developed its first FRP Cold Water Basin
- 1980 Nihon Spindle Manufacturing developed Low Noise technology in accordance to JCI standards
- 1983 The first cooling tower sold in Malaysia through Sumitomo Corporation
- 1985 Nihon Spindle Manufacturing developed Super Low Noise technology in accordance to JCI standards
- 1986 Distribution and manufacturing rights for UN series cooling towers granted to Linear Group Malaysia
- 1995 Dalian Spindle Cooling Towers Co. Ltd established in Dalian, China
- 2007 NS Cooling Towers Sdn Bhd established by Nihon Spindle Manufacturing as its third worldwide manufacturing plant in August as the main support hub for Malaysia and other worldwide markets except China and Japan
- 2008 Nihon Spindle Manufacturing launched WA & KX series cooling towers, thermal performance rated and certified by CTI
- 2009 NS Cooling Towers Sdn Bhd renamed to Nihon Spindle Cooling Towers Sdn Bhd in November
- 2012 Nihon Spindle Manufacturing launched JS series cooling towers, a new line of cooling towers with improved energy efficiency
- 2013 Nihon Spindle Manufacturing launched KG series cooling towers with premium energy efficiency, thermal performance rated and certified by CTI
- 2014 Nihon Spindle Manufacturing launched JK series cooling towers with improved energy efficiency and thermal performance
- 2015 Nihon Spindle Manufacturing launched KG-S series cooling towers with improved energy efficiency and thermal performance

## Our Dedicated Team



With high-tech manufacturing plants at multiple locations across Asia Pacific, Nihon Spindle carefully deploys its team of expertise to ensure all manufacturing and quality standards are stringently adhered to at all times, both internally within Nihon



Spindle plants and externally through its approved vendors for each plant. The highly competent professionals of Nihon Spindle Japan have been specifically appointed to manage important areas including manufacturing and assembly



process, engineering and in-house R&D, material procurement, vendor audit, quality assurance and quality control. Working as a team with the local expertise of each plant, we are confidently proud of every Nihon Spindle product delivered worldwide.

## Field Proven Quality & Reliability



Nihon Spindle products are certified by Japan Cooling Tower Institute (JCI) in accordance to Japanese Industrial Standards (JIS). These standards are strictly applied over a wide range of areas including product and component design, material selection and



manufacturing process, test procedure and methodology, lifecycle and maintenance protocol, water quality standards. Nihon Spindle employs a team of in-house auditors at each plant as part of its quality control to strictly audit each Nihon Spindle plant and



its corresponding approved vendors. Our in-house auditors shall ensure all components and supplies are manufactured to Japan Industrial Standards (JIS), subsequently ensuring a longer product lifespan and greater product reliability to our end users.

## Research and Development Centre



As a testament to our long term commitment in the field of cooling tower development, Nihon Spindle contributes direct investment into each manufacturing plant across Asia Pacific. Our manufacturing plant in Malaysia include multiple test facilities that function as part of the quality control requirements, as well as to execute long term research and development programs for technological



innovations. Our facility includes the first Cooling Tower Thermal Performance Test Platform in Malaysia, designed and built by then CTI tester Mr. Terry Watt in 1996. This test platform combined with a dedicated test office covers a total floor space of 15,000 square feet with digital thermocouple sensors embedded at multiple locations along the piping system, complex array of variable



pumps and diesel boilers to simulate specific operating conditions and highly accurate data acquisition sensors such as in-line flow meters, motorized psychrometers and outdoor wind sensors. Other facilities built specifically for in-process quality controls include static fan balancing, dynamic fan balancing, multiple axis vibration test, motor test, basin leak tests etc.

## Standard Features



### Crossflow Technology

Introduced in the 1960s, crossflow technology provided countless advantages over conventional counterflow technology. A void section inside crossflow cooling towers allow instant and tool-free access to the internals of each cooling tower. This feature enables periodic maintenance and inspection on critical components such as fills, drive system and piping array to be conducted safely with ease, reducing downtime and maintenance cost. A perforated maintenance walkway runs internally between each endwall, serving as a dry platform for technicians to conduct routine works safely with ease. A properly maintained cooling tower will consistently deliver higher thermal performances over a poorly maintained cooling tower. With over 50 years of research in the field of crossflow technology, Nihon Spindle successfully developed its largest single-cell capacity crossflow cooling tower, delivering over 1,500RT in accordance to JIS B8609 standards by Japan Cooling Tower Institute (JCI).



### High Efficiency Fills and Low Drift Technology

Fills are essentially the beating heart of all cooling towers with evaporative cooling technology. Nihon Spindle is proud to be one of the few manufacturers worldwide that has ventured into the engineering of fill technology since 1960s. Our vast experience through decades of research in fill engineering enabled the creation of high efficiency fills with maximum thermal performance. Our latest fill technology incorporates unique studs to interlock fill sheets without adhesives, simplifying field works and improved fill cleaning for extended lifecycle and consistent reliability. In addition, the integration of drift eliminators onto Nihon Spindle fill technology ensure minimal water drift loss to prevent legionella's disease and enhanced water conservation. Technological features above have been developed by Nihon Spindle R&D team in part to exercise its social responsibility for a healthier and greener future.



### Gravity Flow Water Distribution System

Our unique distribution system is designed to evenly deliver hot water by natural gravity flow across the fill section without nozzle sprays or grommets. The elimination of nozzle sprays and grommets ensure choke-free water flow at all times, while the absence of nozzle sprays allow for water flow by natural gravity or zero energy flow without additional pumping requirements. In addition, the absence of nozzle sprays and grommets completely eliminates any replacement cost of such parts. Nihon Spindle distribution system is a proprietary technology designed specifically for the use with Nihon Spindle fills. Nihon Spindle gravity flow distribution systems have been field proven successfully since 1960s with continuous refinement over the years through technological advancement and complex engineering secrets of Nihon Spindle R&D team.

## Optional Features

### Vibration Isolator



Installed at specific points at the cooling tower base, this option provides an effective way to isolate vibrations generated from the cooling tower. Available at various deflection rates and color coded to the rated load.

### Vibration Switch



Design specifically to safeguard the drive system of each cooling tower. In the event of excessive vibrations detected at the motor or fan unit, this option automatically disrupts the power supply to the motor unit and prevents consequential damages to the tower.

### TEAO Motor



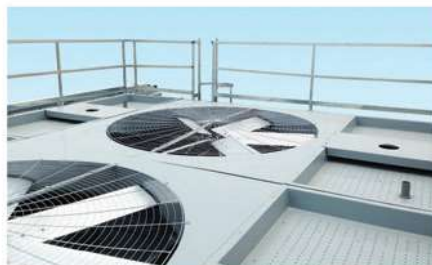
Totally Enclosed, Air Over (TEAO) type motors are designed specifically for in-stream operations by utilising discharge air to cool the motor. This enables installation within the cooling tower, reducing noise and vibration. Available in IE2 / EFF1 (High Efficiency) and IE3 (Premium Efficiency) rated to IEC 60034-30 & NEMA standards, custom voltage, frequency and ingress protection class.

### Rust Protection



For installations that require additional protection against corrosion, epoxy powder coating can be applied onto the standard hot dipped galvanized steel (HDGS) parts as a secondary protection. Other optional materials include stainless steel 304 and 316 grades.

### Safety Railing Set



Complete with hand, knee and toe guards along the upper perimeter, this option provides a safer workspace at high elevation of each cooling tower top deck. This option include caged ladder as added protection to the standard ladders.

### Distribution Basin Cover



Constructed entirely of UV retardant Fibreglass Reinforced Polyester (FRP), this option provides excellent protection of the distribution basins against the harmful UV rays in sunlight. The tool-free and removable covers shall withstand up to a maximum load of 180kg/m<sup>2</sup>.

### Extended Discharge Hood



This option provides an excellent and cost effective way to divert the discharge air wherever necessary. Constructed entirely of UV retardant Fibreglass Reinforced Polyester (FRP), this option is designed specifically for Nihon Spindle fan cylinders. Available at multiple height options, straight type or elbow type.

### Mechanical Drive System



Right angle reduction gears are recommended for cooling towers subject to extended operational hours. This option provides enhanced reliability and minimal downtime, rated in accordance with American Gear Manufacturers Association (AGMA) and Cooling Technology Institute (CTI) Standards.

### Others



For a complete list of optional features, kindly contact your local representatives for further details.

**Selection Table: Standard Models**

Model	Overall Dimension & Motor				Circulating Water Flowrate ( m3 per hour )								
	Width	Length	Height	Motor	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32
	(mm)	(mm)	(mm)	(kW)	27 °C			28 °C			29 °C		
KG-SQN201-A	1,750	3,585	2,880	1.5	76.3	67.6	55.9	66.4	59.1	49.3	55.7	49.9	★
KG-SQN201-B	1,750	3,585	2,880	2.2	86.5	76.6	63.4	75.2	67.0	55.9	63.0	56.5	47.7
KG-SQN201-C	1,750	3,585	2,880	3.7	103.4	91.6	75.7	89.9	80.1	66.8	75.4	67.6	57.0
KG-SQN201-D	1,750	3,585	2,880	5.5	118.8	105.2	87.0	103.3	92.0	76.7	86.6	77.7	65.5
KG-SQN201-E	1,750	3,585	2,880	7.5	125.7	111.4	92.1	109.3	97.3	81.2	91.6	82.2	69.4
KG-SRN201-A	1,850	3,685	2,880	1.5	81.2	71.9	59.5	70.6	62.9	52.4	59.2	53.1	★
KG-SRN201-B	1,850	3,685	2,880	2.2	92.0	81.5	67.4	80.0	71.2	59.4	67.1	60.1	50.8
KG-SRN201-C	1,850	3,685	2,880	3.7	110.0	97.5	80.6	95.7	85.2	71.1	80.2	71.9	60.7
KG-SRN201-D	1,850	3,685	2,880	5.5	126.5	112.1	92.7	110.0	98.0	81.7	92.2	82.7	69.8
KG-SRN201-E	1,850	3,685	2,880	7.5	133.4	118.2	97.7	116.0	103.3	86.2	97.3	87.2	73.6
KG-SAN20A1-A	2,050	3,785	2,880	1.5	87.7	77.7	64.3	76.3	67.9	56.7	64.0	57.4	★
KG-SAN20A1-B	2,050	3,785	2,880	2.2	99.3	88.0	72.8	86.4	76.9	64.2	72.4	65.0	54.8
KG-SAN20A1-C	2,050	3,785	2,880	3.7	118.5	105.0	86.9	103.1	91.8	76.6	86.4	77.5	65.4
KG-SAN20A1-D	2,050	3,785	2,880	5.5	135.9	120.4	99.6	118.2	105.3	87.8	99.1	88.9	75.0
KG-SAN20A1-E	2,050	3,785	2,880	7.5	149.0	132.0	109.2	129.6	115.4	96.3	108.7	97.4	82.2
KG-SAN201-A	2,050	3,785	2,880	1.5	91.1	80.7	66.7	79.2	70.5	58.8	66.4	59.5	★
KG-SAN201-B	2,050	3,785	2,880	2.2	103.2	91.5	75.7	89.8	80.0	66.7	75.3	67.5	57.0
KG-SAN201-C	2,050	3,785	2,880	3.7	123.6	109.5	90.6	107.5	95.7	79.8	90.1	80.8	68.2
KG-SAN201-D	2,050	3,785	2,880	5.5	142.6	126.3	104.5	124.0	110.4	92.1	104.0	93.2	78.7
KG-SBN201-A	2,250	3,985	2,880	1.5	98.4	87.2	72.1	85.6	76.2	63.6	71.8	64.4	★
KG-SBN201-B	2,250	3,985	2,880	2.2	111.5	98.8	81.7	97.0	86.4	72.0	81.3	72.9	61.5
KG-SBN201-C	2,250	3,985	2,880	3.7	133.4	118.2	97.7	116.0	103.3	86.2	97.3	87.2	73.6
KG-SBN201-D	2,250	3,985	2,880	5.5	153.5	136.0	112.5	133.5	118.9	99.2	111.9	100.4	84.7
KG-SBN201-E	2,250	3,985	2,880	7.5	164.5	145.8	120.6	143.1	127.4	106.3	120.0	107.6	90.8
KG-SBN221-A	2,250	4,020	3,080	1.5	103.4	91.7	75.9	90.0	80.2	66.9	75.5	67.7	★
KG-SBN221-B	2,250	4,020	3,080	2.2	116.8	103.5	85.6	101.6	90.5	75.5	85.2	76.4	64.5
KG-SBN221-C	2,250	4,020	3,080	3.7	139.4	123.6	102.2	121.3	108.0	90.2	101.7	91.3	77.0
KG-SBN221-D	2,250	4,020	3,080	5.5	160.1	141.9	117.4	139.3	124.1	103.5	116.8	104.8	88.5
KG-SBN221-E	2,250	4,020	3,080	7.5	178.6	158.3	131.0	155.4	138.4	115.5	130.3	116.9	98.7
KG-SBN261-B	2,250	4,092	3,490	2.2	126.4	112.1	92.8	110.0	98.0	81.9	92.3	82.8	70.0
KG-SBN261-C	2,250	4,092	3,490	3.7	150.0	133.1	110.2	130.6	116.4	97.2	109.6	98.4	83.1
KG-SBN261-D	2,250	4,092	3,490	5.5	171.4	152.0	125.9	149.2	133.0	111.0	125.2	112.4	94.9
KG-SBN261-E	2,250	4,092	3,490	7.5	190.8	169.2	140.1	166.1	148.0	123.6	139.4	125.1	105.7
KG-SBN261-F	2,250	4,092	3,490	11.0	★	★	152.3	★	152.3	141.2	152.3	142.9	120.8
KG-SBN301-C	2,250	4,162	3,890	3.7	158.8	140.9	116.7	138.3	123.3	103.0	116.1	104.3	88.2
KG-SBN301-D	2,250	4,162	3,890	5.5	181.1	160.6	133.1	157.7	140.6	117.5	132.4	118.9	100.5
KG-SBN301-E	2,250	4,162	3,890	7.5	200.7	178.9	148.2	175.6	156.5	130.8	147.4	132.4	111.9
KG-SBN301-F	2,250	4,162	3,890	11.0	200.7	200.7	169.0	200.2	178.5	149.1	168.1	150.9	127.6
KG-SBN301-G	2,250	4,162	3,890	15.0	★	★	173.5	★	★	161.9	173.5	163.9	138.6
KG-SCN20A1-A	2,350	4,085	2,880	1.5	100.9	89.5	74.0	87.8	78.2	65.2	73.6	66.0	★
KG-SCN20A1-B	2,350	4,085	2,880	2.2	113.9	101.0	83.5	99.1	88.2	73.6	83.1	74.5	62.9
KG-SCN20A1-C	2,350	4,085	2,880	3.7	136.1	120.6	99.8	118.4	105.4	87.9	99.3	89.0	75.1
KG-SCN20A1-D	2,350	4,085	2,880	5.5	156.5	138.7	114.7	136.1	121.2	101.1	114.1	102.3	86.4
KG-SCN20A1-E	2,350	4,085	2,880	7.5	172.3	152.7	126.3	149.9	133.5	111.3	125.7	112.7	95.1
KG-SCN201-A	2,350	4,085	2,880	1.5	103.8	92.0	76.1	90.3	80.4	67.1	75.7	67.9	★
KG-SCN201-B	2,350	4,085	2,880	2.2	117.6	104.2	86.2	102.3	91.1	76.0	85.8	76.9	64.9
KG-SCN201-C	2,350	4,085	2,880	3.7	141.0	124.9	103.3	122.6	109.2	91.1	102.8	92.2	77.8
KG-SCN201-D	2,350	4,085	2,880	5.5	162.9	144.4	119.4	141.7	126.2	105.2	118.8	106.5	89.9
KG-SCN201-E	2,350	4,085	2,880	7.5	172.3	152.7	126.3	149.9	133.5	111.3	125.7	112.7	95.1
KG-SCN22A1-A	2,350	4,120	3,080	1.5	106.0	93.9	77.7	92.2	82.1	68.5	77.3	69.4	★
KG-SCN22A1-B	2,350	4,120	3,080	2.2	119.3	105.8	87.5	103.8	92.5	77.1	87.1	78.1	65.9

★ Kindly Refer To Manufacturer Or Representative For Additional Information.



Selection Table: Standard Models

Model	Overall Dimension & Motor				Circulating Water Flowrate ( m3 per hour )								
	Width	Length	Height	Motor	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32
	(mm)	(mm)	(mm)	(kW)		27 °C			28 °C			29 °C	
KG-SCN22A1-C	2,350	4,120	3,080	3.7	142.1	125.9	104.2	123.6	110.1	91.9	103.7	93.0	78.5
KG-SCN22A1-D	2,350	4,120	3,080	5.5	163.2	144.7	119.7	142.0	126.5	105.5	119.1	106.8	90.2
KG-SCN22A1-E	2,350	4,120	3,080	7.5	181.7	161.1	133.3	158.1	140.8	117.5	132.6	118.9	100.4
KG-SCN22A1-F	2,350	4,120	3,080	11.0	★	★	140.4	★	148.4	123.8	139.7	125.3	105.8
KG-SCN221-A	2,350	4,120	3,080	1.5	109.5	97.1	80.3	95.3	84.9	70.8	79.9	71.7	★
KG-SCN221-B	2,350	4,120	3,080	2.2	123.7	109.6	90.7	107.6	95.8	80.0	90.2	80.9	68.3
KG-SCN221-C	2,350	4,120	3,080	3.7	147.7	130.9	108.3	128.5	114.5	95.5	107.8	96.7	81.6
KG-SCN221-D	2,350	4,120	3,080	5.5	170.5	151.1	125.0	148.3	132.1	110.2	124.4	111.6	94.2
KG-SCN221-E	2,350	4,120	3,080	7.5	★	158.6	140.3	158.6	148.3	123.7	139.6	125.3	105.8
KG-SCN261-B	2,350	4,192	3,490	2.2	134.6	119.4	98.9	117.2	104.4	87.2	98.4	88.3	74.6
KG-SCN261-C	2,350	4,192	3,490	3.7	159.9	141.8	117.4	139.2	124.0	103.6	116.8	104.8	88.6
KG-SCN261-D	2,350	4,192	3,490	5.5	183.9	163.1	135.1	160.1	142.7	119.1	134.4	120.6	101.9
KG-SCN261-E	2,350	4,192	3,490	7.5	205.6	182.4	151.0	179.0	159.5	133.2	150.2	134.8	113.9
KG-SCN261-F	2,350	4,192	3,490	11.0	★	★	159.2	★	★	147.9	159.2	149.7	126.5
KG-SCN301-C	2,350	4,262	3,890	3.7	170.2	151.0	125.1	148.2	132.1	110.4	124.4	111.7	94.5
KG-SCN301-D	2,350	4,262	3,890	5.5	195.1	173.1	143.4	169.9	151.5	126.6	142.6	128.1	108.3
KG-SCN301-E	2,350	4,262	3,890	7.5	210.2	192.2	159.3	188.7	168.2	140.6	158.4	142.2	120.3
KG-SCN301-F	2,350	4,262	3,890	11.0	210.2	210.2	182.8	210.2	193.1	161.3	181.9	163.3	138.1
KG-SCN301-G	2,350	4,262	3,890	15.0	★	★	★	★	★	169.5	182.2	171.6	145.1
KG-SDN261-B	2,750	4,492	3,540	2.2	152.8	135.5	112.2	133.0	118.5	99.0	111.6	100.2	84.6
KG-SDN261-C	2,750	4,492	3,540	3.7	180.8	160.4	132.8	157.4	140.3	117.1	132.1	118.5	100.2
KG-SDN261-D	2,750	4,492	3,540	5.5	207.4	183.9	152.3	180.5	160.8	134.3	151.5	135.9	114.9
KG-SDN261-E	2,750	4,492	3,540	7.5	231.9	205.7	170.3	201.9	179.9	150.2	169.4	152.1	128.5
KG-SDN261-F	2,750	4,492	3,540	11.0	★	★	196.5	203.7	203.7	173.3	195.4	175.4	148.2
KG-SDN301-C	2,750	4,562	3,940	3.7	193.0	171.2	141.9	168.1	149.9	125.2	141.1	126.7	107.1
KG-SDN301-D	2,750	4,562	3,940	5.5	220.7	195.8	162.2	192.2	171.3	143.2	161.4	144.9	122.5
KG-SDN301-E	2,750	4,562	3,940	7.5	246.4	218.6	181.1	214.6	191.3	159.9	180.2	161.8	136.8
KG-SDN301-F	2,750	4,562	3,940	11.0	248.2	248.2	207.7	246.1	219.4	183.3	206.6	185.5	156.9
KG-SDN301-G	2,750	4,562	3,940	15.0	★	★	214.5	★	★	200.2	214.5	202.6	171.3
KG-SEN261-C	3,050	4,792	3,540	3.7	190.2	168.7	139.7	165.6	147.6	123.2	139.0	124.7	105.4
KG-SEN261-D	3,050	4,792	3,540	5.5	217.5	192.9	159.7	189.3	168.7	140.9	158.9	142.6	120.5
KG-SEN261-E	3,050	4,792	3,540	7.5	242.6	215.2	178.2	211.2	188.2	157.2	177.2	159.1	134.4
KG-SEN261-F	3,050	4,792	3,540	11.0	276.6	246.9	204.4	242.3	215.9	180.3	203.3	182.5	154.2
KG-SEN261-G	3,050	4,792	3,540	15.0	★	★	208.9	★	★	194.7	208.9	197.1	166.5
KG-SEN301-C	3,050	4,862	3,940	3.7	202.7	179.8	149.0	176.5	157.3	131.5	148.2	133.0	112.5
KG-SEN301-D	3,050	4,862	3,940	5.5	231.1	205.0	169.8	201.2	179.4	149.9	168.9	151.7	128.2
KG-SEN301-E	3,050	4,862	3,940	7.5	257.1	228.1	189.0	223.9	199.6	166.8	188.0	168.8	142.7
KG-SEN301-F	3,050	4,862	3,940	11.0	276.6	260.8	216.1	256.0	228.2	190.7	214.9	193.0	163.2
KG-SEN301-G	3,050	4,862	3,940	15.0	276.6	276.6	240.9	276.6	254.4	212.6	239.6	215.1	181.9
KG-SEN301-H	3,050	4,862	3,940	18.5	★	★	★	★	★	223.2	★	225.8	191.0
KG-SFN261-C	3,450	5,092	3,540	3.7	211.4	187.5	155.2	184.0	164.0	136.9	154.4	138.6	117.1
KG-SFN261-D	3,450	5,092	3,540	5.5	241.2	213.9	177.2	210.0	187.1	156.3	176.2	158.2	133.6
KG-SFN261-E	3,450	5,092	3,540	7.5	269.3	238.8	197.7	234.4	208.9	174.4	196.7	176.5	149.1
KG-SFN261-F	3,450	5,092	3,540	11.0	309.1	274.2	227.0	269.1	239.8	200.2	225.8	202.7	171.2
KG-SFN261-G	3,450	5,092	3,540	15.0	★	★	237.7	★	★	221.4	237.7	224.1	189.4
KG-SFN301-C	3,450	5,162	3,940	3.7	233.9	207.5	171.9	203.7	181.6	151.7	171.0	153.5	129.8
KG-SFN301-D	3,450	5,162	3,940	5.5	267.3	237.2	196.5	232.8	207.5	173.4	195.5	175.5	148.4
KG-SFN301-E	3,450	5,162	3,940	7.5	298.0	264.4	219.0	259.5	231.3	193.3	217.9	195.6	165.4
KG-SFN301-F	3,450	5,162	3,940	11.0	314.6	303.7	251.6	298.1	265.8	222.1	250.3	224.7	190.0
KG-SFN301-G	3,450	5,162	3,940	15.0	314.6	314.6	282.2	314.6	298.0	249.0	280.7	252.0	213.1
KG-SFN301-H	3,450	5,162	3,940	18.5	★	★	★	★	★	253.8	★	256.8	217.2

★ Kindly Refer To Manufacturer Or Representative For Additional Information.

**Selection Table: Low Noise models**

Model	Overall Dimension & Motor				Circulating Water Flowrate ( m3 per hour )								
	Width	Length	Height	Motor	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32
	(mm)	(mm)	(mm)	(kW)	27 °C			28 °C			29 °C		
KG-SQL201-A	1,750	3,585	2,880	1.5	76.3	67.6	55.9	66.4	59.1	49.3	55.7	49.9	★
KG-SQL201-B	1,750	3,585	2,880	2.2	86.2	76.4	63.2	75.0	66.8	55.7	62.9	56.4	47.6
KG-SQL201-C	1,750	3,585	2,880	3.7	102.6	90.9	75.2	89.2	79.4	66.2	74.8	67.1	56.6
KG-SQL201-D	1,750	3,585	2,880	5.5	118.0	104.5	86.5	102.6	91.4	76.2	86.0	77.1	65.1
KG-SQL201-E	1,750	3,585	2,880	7.5	125.7	111.4	92.1	109.3	97.3	81.2	91.6	82.2	69.4
KG-SRL201-A	1,850	3,685	2,880	1.5	81.2	71.9	59.5	70.6	62.9	52.4	59.2	53.1	★
KG-SRL201-B	1,850	3,685	2,880	2.2	91.5	81.1	67.1	79.6	70.9	59.1	66.7	59.8	50.5
KG-SRL201-C	1,850	3,685	2,880	3.7	109.0	96.6	79.9	94.8	84.4	70.4	79.5	71.3	60.2
KG-SRL201-D	1,850	3,685	2,880	5.5	125.3	111.0	91.8	109.0	97.1	81.0	91.4	81.9	69.2
KG-SRL201-E	1,850	3,685	2,880	7.5	133.4	118.2	97.7	116.0	103.3	86.2	97.3	87.2	73.6
KG-SAL20A1-A	2,050	3,785	2,880	1.5	87.7	77.7	64.3	76.3	67.9	56.7	64.0	57.4	★
KG-SAL20A1-B	2,050	3,785	2,880	2.2	98.9	87.6	72.5	86.0	76.6	63.9	72.1	64.7	54.6
KG-SAL20A1-C	2,050	3,785	2,880	3.7	117.5	104.1	86.1	102.2	91.0	75.9	85.7	76.8	64.8
KG-SAL20A1-D	2,050	3,785	2,880	5.5	134.5	119.2	98.6	117.0	104.2	86.9	98.1	88.0	74.2
KG-SAL20A1-E	2,050	3,785	2,880	7.5	149.0	132.0	109.2	129.6	115.4	96.3	108.7	97.4	82.2
KG-SAL201-A	2,050	3,785	2,880	1.5	91.1	80.7	66.7	79.2	70.5	58.8	66.4	59.5	★
KG-SAL201-B	2,050	3,785	2,880	2.2	102.9	91.2	75.4	89.5	79.7	66.5	75.0	67.3	56.8
KG-SAL201-C	2,050	3,785	2,880	3.7	122.7	108.7	89.9	106.7	95.0	79.2	89.5	80.2	67.7
KG-SAL201-D	2,050	3,785	2,880	5.5	141.1	125.0	103.4	122.7	109.3	91.1	102.9	92.2	77.9
KG-SBL201-A	2,250	3,985	2,880	1.5	98.4	87.2	72.1	85.6	76.2	63.6	71.8	64.4	★
KG-SBL201-B	2,250	3,985	2,880	2.2	111.4	98.7	81.6	96.9	86.3	72.0	81.2	72.8	61.5
KG-SBL201-C	2,250	3,985	2,880	3.7	132.6	117.5	97.2	115.3	102.7	85.6	96.7	86.7	73.2
KG-SBL201-D	2,250	3,985	2,880	5.5	152.2	134.9	111.6	132.4	117.9	98.3	111.0	99.5	84.0
KG-SBL201-E	2,250	3,985	2,880	7.5	164.5	145.8	120.6	143.1	127.4	106.3	120.0	107.6	90.8
KG-SBL221-A	2,250	4,020	3,080	1.5	103.4	91.7	75.9	90.0	80.2	66.9	75.5	67.7	★
KG-SBL221-B	2,250	4,020	3,080	2.2	116.8	103.5	85.6	101.6	90.5	75.5	85.2	76.4	64.5
KG-SBL221-C	2,250	4,020	3,080	3.7	138.7	123.0	101.7	120.7	107.5	89.7	101.2	90.8	76.7
KG-SBL221-D	2,250	4,020	3,080	5.5	158.6	140.6	116.3	138.0	122.9	102.6	115.7	103.8	87.7
KG-SBL221-E	2,250	4,020	3,080	7.5	177.6	157.4	130.2	154.5	137.6	114.8	129.6	116.2	98.1
KG-SBL261-B	2,250	4,092	3,490	2.2	126.5	112.2	92.9	110.1	98.1	81.9	92.4	82.9	70.1
KG-SBL261-C	2,250	4,092	3,490	3.7	149.3	132.4	109.7	130.0	115.8	96.7	109.1	97.9	82.7
KG-SBL261-D	2,250	4,092	3,490	5.5	170.9	151.6	125.5	148.8	132.6	110.7	124.9	112.1	94.7
KG-SBL261-E	2,250	4,092	3,490	7.5	189.7	168.2	139.3	165.1	147.1	122.9	138.6	124.3	105.1
KG-SBL261-F	2,250	4,092	3,490	11.0	★	★	153.1	★	153.1	141.2	153.1	142.9	120.7
KG-SBL301-C	2,250	4,162	3,890	3.7	158.4	140.5	116.4	137.9	122.9	102.7	115.8	103.9	87.9
KG-SBL301-D	2,250	4,162	3,890	5.5	180.6	160.2	132.8	157.3	140.2	117.2	132.1	118.6	100.3
KG-SBL301-E	2,250	4,162	3,890	7.5	200.4	177.8	147.3	174.5	155.6	130.0	146.5	131.5	111.2
KG-SBL301-F	2,250	4,162	3,890	11.0	200.7	200.7	168.6	199.7	178.0	148.8	167.7	150.5	127.3
KG-SBL301-G	2,250	4,162	3,890	15.0	★	★	173.5	★	★	161.9	173.5	163.9	138.6
KG-SCL20A1-A	2,350	4,085	2,880	1.5	100.9	89.5	74.0	87.8	78.2	65.2	73.6	66.0	★
KG-SCL20A1-B	2,350	4,085	2,880	2.2	113.9	101.0	83.5	99.1	88.2	73.6	83.1	74.5	62.9
KG-SCL20A1-C	2,350	4,085	2,880	3.7	135.4	120.0	99.3	117.8	104.9	87.5	98.8	88.6	74.7
KG-SCL20A1-D	2,350	4,085	2,880	5.5	155.1	137.4	113.7	134.9	120.1	100.2	113.1	101.4	85.6
KG-SCL20A1-E	2,350	4,085	2,880	7.5	172.3	152.7	126.3	149.9	133.5	111.3	125.7	112.7	95.1
KG-SCL201-A	2,350	4,085	2,880	1.5	103.8	92.0	76.1	90.3	80.4	67.1	75.7	67.9	★
KG-SCL201-B	2,350	4,085	2,880	2.2	117.5	104.1	86.1	102.2	91.0	75.9	85.7	76.8	64.8
KG-SCL201-C	2,350	4,085	2,880	3.7	140.8	124.8	103.2	122.5	109.1	91.0	102.7	92.1	77.7
KG-SCL201-D	2,350	4,085	2,880	5.5	161.3	142.9	118.2	140.3	124.9	104.2	117.6	105.5	89.0
KG-SCL201-E	2,350	4,085	2,880	7.5	172.3	152.7	126.3	149.9	133.5	111.3	125.7	112.7	95.1
KG-SCL22A1-A	2,350	4,120	3,080	1.5	106.0	93.9	77.7	92.2	82.1	68.5	77.3	69.4	★
KG-SCL22A1-B	2,350	4,120	3,080	2.2	119.4	105.9	87.6	103.9	92.5	77.2	87.1	78.2	66.0

★ Kindly Refer To Manufacturer Or Representative For Additional Information.

Selection Table: Low Noise Models

Model	Overall Dimension & Motor				Circulating Water Flowrate ( m3 per hour )									
	Width	Length	Height	Motor	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32	
	(mm)	(mm)	(mm)	(kW)		27 °C			28 °C			29 °C		
KG-SCL22A1-C	2,350	4,120	3,080	3.7	141.4	125.3	103.7	123.0	109.6	91.4	103.2	92.5	78.1	
KG-SCL22A1-D	2,350	4,120	3,080	5.5	161.7	143.3	118.6	140.7	125.3	104.6	118.0	105.8	89.4	
KG-SCL22A1-E	2,350	4,120	3,080	7.5	180.1	159.6	132.1	156.7	139.6	116.5	131.4	117.9	99.5	
KG-SCL22A1-F	2,350	4,120	3,080	11.0	★	★	140.4	157.4	148.4	123.8	139.7	125.3	105.8	
KG-SCL221-A	2,350	4,120	3,080	1.5	109.5	97.1	80.3	95.3	84.9	70.8	79.9	71.7	★	
KG-SCL221-B	2,350	4,120	3,080	2.2	123.6	109.5	90.6	107.5	95.8	79.9	90.2	80.9	68.3	
KG-SCL221-C	2,350	4,120	3,080	3.7	147.6	130.8	108.2	128.4	114.4	95.4	107.7	96.6	81.6	
KG-SCL221-D	2,350	4,120	3,080	5.5	168.7	149.6	123.7	146.8	130.8	109.1	123.1	110.4	93.2	
KG-SCL221-E	2,350	4,120	3,080	7.5	188.5	167.1	138.2	164.0	146.1	121.9	137.5	123.4	104.2	
KG-SCL261-B	2,350	4,192	3,490	2.2	134.8	119.5	99.0	117.3	104.5	87.3	98.4	88.3	74.6	
KG-SCL261-C	2,350	4,192	3,490	3.7	159.8	141.7	117.3	139.1	124.0	103.5	116.7	104.8	88.5	
KG-SCL261-D	2,350	4,192	3,490	5.5	182.5	161.9	134.0	158.9	141.6	118.2	133.3	119.7	101.1	
KG-SCL261-E	2,350	4,192	3,490	7.5	203.0	180.0	149.1	176.7	157.5	131.5	148.3	133.1	112.4	
KG-SCL261-F	2,350	4,192	3,490	11.0	★	★	159.2	★	159.2	147.9	159.2	149.7	126.5	
KG-SCL301-C	2,350	4,262	3,890	3.7	170.0	150.8	124.9	148.0	131.9	110.2	124.3	111.6	94.3	
KG-SCL301-D	2,350	4,262	3,890	5.5	193.7	171.9	142.4	168.7	150.4	125.7	141.6	127.2	107.5	
KG-SCL301-E	2,350	4,262	3,890	7.5	210.2	191.0	158.3	187.5	167.2	139.7	157.4	141.3	119.5	
KG-SCL301-F	2,350	4,262	3,890	11.0	210.2	210.2	181.7	210.2	191.9	160.3	180.7	162.2	137.2	
KG-SCL301-G	2,350	4,262	3,890	15.0	★	★	182.2	★	★	169.5	182.2	171.6	145.1	
KG-SDL261-B	2,750	4,492	3,540	2.2	152.8	135.5	112.2	133.0	118.5	99.0	111.6	100.2	84.6	
KG-SDL261-C	2,750	4,492	3,540	3.7	180.7	160.3	132.7	157.3	140.2	117.0	132.0	118.5	100.1	
KG-SDL261-D	2,750	4,492	3,540	5.5	206.7	183.3	151.8	179.9	160.3	133.9	151.0	135.5	114.5	
KG-SDL261-E	2,750	4,492	3,540	7.5	230.7	204.6	169.4	200.8	178.9	149.4	168.5	151.2	127.8	
KG-SDL261-F	2,750	4,492	3,540	11.0	236.8	233.4	193.3	229.1	204.2	170.5	192.3	172.5	145.8	
KG-SDL301-C	2,750	4,562	3,940	3.7	192.6	170.8	141.6	167.7	149.5	124.9	140.8	126.4	106.9	
KG-SDL301-D	2,750	4,562	3,940	5.5	220.1	195.3	161.8	191.7	170.9	142.8	161.0	144.5	122.2	
KG-SDL301-E	2,750	4,562	3,940	7.5	244.8	217.2	180.0	213.2	190.1	158.8	179.0	160.7	135.9	
KG-SDL301-F	2,750	4,562	3,940	11.0	248.2	247.8	205.4	243.3	216.9	181.2	204.3	183.4	155.1	
KG-SDL301-G	2,750	4,562	3,940	15.0	★	★	214.5	★	★	200.2	214.5	202.6	171.3	
KG-SEL261-C	3,050	4,792	3,540	3.7	189.8	168.3	139.4	165.2	147.2	122.9	138.6	124.4	105.1	
KG-SEL261-D	3,050	4,792	3,540	5.5	216.9	192.3	159.3	188.8	168.2	140.5	158.4	142.2	120.1	
KG-SEL261-E	3,050	4,792	3,540	7.5	240.3	213.1	176.5	209.2	186.4	155.7	175.6	157.5	133.1	
KG-SEL261-F	3,050	4,792	3,540	11.0	275.1	244.0	202.0	239.5	213.4	178.2	201.0	180.4	152.4	
KG-SEL261-G	3,050	4,792	3,540	15.0	★	★	208.9	★	★	194.7	208.9	197.1	166.5	
KG-SEL301-C	3,050	4,862	3,940	3.7	202.5	179.6	148.8	176.3	157.2	131.3	148.0	132.9	112.4	
KG-SEL301-D	3,050	4,862	3,940	5.5	230.4	204.4	169.3	200.6	178.8	149.4	168.4	151.2	127.9	
KG-SEL301-E	3,050	4,862	3,940	7.5	255.2	226.4	187.6	222.2	198.1	165.5	186.6	167.5	141.6	
KG-SEL301-F	3,050	4,862	3,940	11.0	276.6	258.3	214.1	253.6	226.1	188.9	212.9	191.2	161.6	
KG-SEL301-G	3,050	4,862	3,940	15.0	276.6	276.6	237.7	276.6	251.0	209.8	236.4	212.3	179.5	
KG-SEL301-H	3,050	4,862	3,940	18.5	★	★	239.3	★	★	223.2	239.3	225.8	191.0	
KG-SFL261-C	3,450	5,092	3,540	3.7	211.4	187.5	155.2	184.0	164.0	136.9	154.4	138.6	117.1	
KG-SFL261-D	3,450	5,092	3,540	5.5	241.4	214.0	177.2	210.1	187.2	156.3	176.3	158.2	133.7	
KG-SFL261-E	3,450	5,092	3,540	7.5	267.0	236.8	196.1	232.4	207.1	172.9	195.0	175.0	147.9	
KG-SFL261-F	3,450	5,092	3,540	11.0	306.8	272.1	225.3	267.1	238.0	198.7	224.2	201.2	170.0	
KG-SFL261-G	3,450	5,092	3,540	15.0	★	★	237.7	★	★	221.4	237.7	224.1	189.4	
KG-SFL301-C	3,450	5,162	3,940	3.7	233.8	207.4	171.9	203.6	181.5	151.7	170.9	153.5	129.8	
KG-SFL301-D	3,450	5,162	3,940	5.5	266.9	236.7	196.2	232.4	207.2	173.1	195.1	175.2	148.1	
KG-SFL301-E	3,450	5,162	3,940	7.5	297.7	264.0	218.8	259.2	231.1	193.1	217.6	195.4	165.2	
KG-SFL301-F	3,450	5,162	3,940	11.0	314.6	303.5	251.5	297.9	265.6	221.9	250.1	224.6	189.9	
KG-SFL301-G	3,450	5,162	3,940	15.0	314.6	314.6	277.9	314.6	293.5	245.2	276.4	248.2	209.8	
KG-SFL301-H	3,450	5,162	3,940	18.5	★	★	★	★	★	253.8	★	256.8	217.2	

★ Kindly Refer To Manufacturer Or Representative For Additional Information.

**Selection Table: Super Low Noise Models**

Model	Overall Dimension & Motor				Circulating Water Flowrate ( m3 per hour )								
	Width	Length	Height	Motor	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32
	(mm)	(mm)	(mm)	(kW)	27 °C			28 °C			29 °C		
KG-SQS201-A	1,750	3,585	2,880	1.5	75.5	66.9	55.4	65.7	58.5	48.8	55.1	49.4	★
KG-SQS201-B	1,750	3,585	2,880	2.2	85.2	75.5	62.4	74.1	66.0	55.0	62.1	55.7	47.0
KG-SQS201-C	1,750	3,585	2,880	3.7	101.2	89.7	74.1	88.0	78.4	65.4	73.8	66.2	55.8
KG-SQS201-D	1,750	3,585	2,880	5.5	115.3	102.2	84.5	100.3	89.3	74.5	84.1	75.4	63.6
KG-SRS201-A	1,850	3,685	2,880	1.5	80.2	71.1	58.8	69.8	62.2	51.8	58.5	52.5	★
KG-SRS201-B	1,850	3,685	2,880	2.2	90.6	80.3	66.4	78.8	70.2	58.5	66.1	59.2	50.0
KG-SRS201-C	1,850	3,685	2,880	3.7	107.5	95.3	78.8	93.5	83.3	69.4	78.4	70.3	59.3
KG-SRS201-D	1,850	3,685	2,880	5.5	123.2	109.2	90.3	107.2	95.5	79.6	89.9	80.6	68.0
KG-SRS201-E	1,850	3,685	2,880	7.5	131.3	116.3	96.2	114.2	101.7	84.8	95.7	85.9	72.5
KG-SAS20A1-A	2,050	3,785	2,880	1.5	86.9	77.0	63.7	75.6	67.3	56.1	63.4	56.8	★
KG-SAS20A1-B	2,050	3,785	2,880	2.2	98.2	87.0	72.0	85.4	76.0	63.4	71.6	64.2	54.2
KG-SAS20A1-C	2,050	3,785	2,880	3.7	116.0	102.8	85.0	100.9	89.9	74.9	84.6	75.9	64.0
KG-SAS20A1-D	2,050	3,785	2,880	5.5	132.9	117.8	97.4	115.6	102.9	85.9	96.9	86.9	73.3
KG-SAS20A1-E	2,050	3,785	2,880	7.5	146.2	129.6	107.2	127.2	113.3	94.5	106.6	95.6	80.7
KG-SAS201-A	2,050	3,785	2,880	1.5	90.0	79.8	66.0	78.3	69.7	58.2	65.6	58.9	★
KG-SAS201-B	2,050	3,785	2,880	2.2	101.7	90.2	74.6	88.5	78.8	65.7	74.2	66.5	56.2
KG-SAS201-C	2,050	3,785	2,880	3.7	121.2	107.4	88.8	105.4	93.9	78.3	88.4	79.2	66.9
KG-SAS201-D	2,050	3,785	2,880	5.5	139.5	123.6	102.2	121.3	108.0	90.1	101.7	91.2	77.0
KG-SBS201-A	2,250	3,985	2,880	1.5	97.7	86.6	71.6	85.0	75.7	63.1	71.3	63.9	★
KG-SBS201-B	2,250	3,985	2,880	2.2	110.3	97.7	80.8	95.9	85.4	71.2	80.4	72.1	60.8
KG-SBS201-C	2,250	3,985	2,880	3.7	131.2	116.2	96.1	114.1	101.6	84.7	95.7	85.8	72.4
KG-SBS201-D	2,250	3,985	2,880	5.5	150.5	133.4	110.3	130.9	116.6	97.2	109.7	98.4	83.1
KG-SBS201-E	2,250	3,985	2,880	7.5	164.5	145.8	120.6	143.1	127.4	106.3	120.0	107.6	90.8
KG-SBS221-A	2,250	4,020	3,080	1.5	102.8	91.1	75.4	89.4	79.6	66.4	75.0	67.3	★
KG-SBS221-B	2,250	4,020	3,080	2.2	115.6	102.5	84.8	100.6	89.6	74.8	84.4	75.7	63.9
KG-SBS221-C	2,250	4,020	3,080	3.7	137.4	121.7	100.7	119.5	106.4	88.8	100.2	89.9	75.9
KG-SBS221-D	2,250	4,020	3,080	5.5	156.7	138.9	114.9	136.3	121.4	101.3	114.3	102.5	86.6
KG-SBS221-E	2,250	4,020	3,080	7.5	174.1	154.3	127.7	151.5	134.9	112.6	127.1	114.0	96.2
KG-SBS261-B	2,250	4,092	3,490	2.2	125.4	111.3	92.1	109.2	97.3	81.3	91.6	82.2	69.5
KG-SBS261-C	2,250	4,092	3,490	3.7	147.9	131.1	108.6	128.7	114.7	95.8	108.0	96.9	81.9
KG-SBS261-D	2,250	4,092	3,490	5.5	168.4	149.4	123.7	146.6	130.6	109.1	123.0	110.4	93.3
KG-SBS261-E	2,250	4,092	3,490	7.5	186.6	165.5	137.0	162.4	144.7	120.8	136.3	122.3	103.3
KG-SBS261-F	2,250	4,092	3,490	11.0	195.8	188.3	155.9	184.8	164.7	137.5	155.1	139.2	117.6
KG-SBS301-C	2,250	4,162	3,890	3.7	157.0	139.3	115.4	136.7	121.9	101.8	114.8	103.0	87.1
KG-SBS301-D	2,250	4,162	3,890	5.5	178.0	157.9	130.8	155.0	138.2	115.5	130.1	116.8	98.8
KG-SBS301-E	2,250	4,162	3,890	7.5	197.2	174.9	144.9	171.7	153.1	127.9	144.2	129.4	109.4
KG-SBS301-F	2,250	4,162	3,890	11.0	200.7	199.9	165.6	196.2	174.9	146.1	164.7	147.9	125.1
KG-SCS20A1-A	2,350	4,085	2,880	1.5	100.1	88.7	73.4	87.1	77.6	64.7	73.0	65.5	★
KG-SCS20A1-B	2,350	4,085	2,880	2.2	112.8	99.9	82.7	98.1	87.4	72.9	82.2	73.8	62.2
KG-SCS20A1-C	2,350	4,085	2,880	3.7	133.7	118.5	98.0	116.3	103.6	86.4	97.5	87.4	73.8
KG-SCS20A1-D	2,350	4,085	2,880	5.5	153.1	135.7	112.2	133.2	118.6	98.9	111.7	100.1	84.5
KG-SCS20A1-E	2,350	4,085	2,880	7.5	169.9	150.6	124.5	147.8	131.6	109.8	123.9	111.1	93.8
KG-SCS201-A	2,350	4,085	2,880	1.5	103.6	91.8	75.9	90.1	80.2	66.9	75.5	67.7	★
KG-SCS201-B	2,350	4,085	2,880	2.2	116.5	103.2	85.4	101.3	90.2	75.2	84.9	76.2	64.3
KG-SCS201-C	2,350	4,085	2,880	3.7	138.5	122.8	101.5	120.5	107.3	89.5	101.0	90.6	76.5
KG-SCS201-D	2,350	4,085	2,880	5.5	159.6	141.4	117.0	138.8	123.6	103.1	116.4	104.3	88.1
KG-SCS201-E	2,350	4,085	2,880	7.5	172.3	152.7	126.3	149.9	133.5	111.3	125.7	112.7	95.1
KG-SCS22A1-A	2,350	4,120	3,080	1.5	105.3	93.3	77.2	91.6	81.6	68.1	76.8	68.9	★
KG-SCS22A1-B	2,350	4,120	3,080	2.2	118.2	104.7	86.7	102.8	91.6	76.4	86.2	77.3	65.3
KG-SCS22A1-C	2,350	4,120	3,080	3.7	139.8	123.9	102.5	121.6	108.3	90.4	102.0	91.5	77.2

★ Kindly Refer To Manufacturer Or Representative For Additional Information.

### Selection Table: Super Low Noise Models

Model	Overall Dimension & Motor				Circulating Water Flowrate ( m3 per hour )									
	Width	Length	Height	Motor	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32	37 / 32	38 / 32	40 / 32	
	(mm)	(mm)	(mm)	(kW)		27 °C			28 °C			29 °C		
KG-SCS22A1-D	2,350	4,120	3,080	5.5	159.8	141.6	117.2	139.0	123.8	103.3	116.6	104.6	88.3	
KG-SCS261-D	2,350	4,192	3,490	5.5	180.1	159.7	132.3	156.8	139.7	116.7	131.6	118.1	99.8	
KG-SCS261-E	2,350	4,192	3,490	7.5	201.2	178.4	147.7	175.1	156.0	130.3	146.9	131.9	111.4	
KG-SCS261-F	2,350	4,192	3,490	11.0	★	★	159.2	★	159.2	147.9	159.2	149.7	126.5	
KG-SCS301-C	2,350	4,262	3,890	3.7	167.8	148.8	123.3	146.1	130.2	108.8	122.7	110.1	93.1	
KG-SCS301-D	2,350	4,262	3,890	5.5	191.6	169.9	140.8	166.8	148.7	124.2	140.0	125.7	106.3	
KG-SCS301-E	2,350	4,262	3,890	7.5	210.2	187.6	155.5	184.2	164.2	137.2	154.7	138.8	117.4	
KG-SCS301-F	2,350	4,262	3,890	11.0	210.2	210.2	178.4	210.2	188.4	157.4	177.4	159.3	134.7	
KG-SCS301-G	2,350	4,262	3,890	15.0	210.2	210.2	185.3	210.2	195.7	163.5	184.3	165.5	139.9	
KG-SDS261-B	2,750	4,492	3,540	2.2	152.0	134.8	111.6	132.3	117.9	98.4	111.0	99.6	84.2	
KG-SDS261-C	2,750	4,492	3,540	3.7	178.8	158.5	131.3	155.6	138.7	115.8	130.6	117.2	99.0	
KG-SDS261-D	2,750	4,492	3,540	5.5	204.0	180.9	149.8	177.6	158.3	132.2	149.0	133.8	113.0	
KG-SDS261-E	2,750	4,492	3,540	7.5	227.0	201.3	166.7	197.6	176.1	147.0	165.8	148.8	125.7	
KG-SDS261-F	2,750	4,492	3,540	11.0	248.2	230.2	190.7	226.0	201.4	168.2	189.7	170.2	143.8	
KG-SDS301-C	2,750	4,562	3,940	3.7	191.1	169.5	140.5	166.4	148.3	124.0	139.7	125.4	106.1	
KG-SDS301-D	2,750	4,562	3,940	5.5	217.4	192.8	159.8	189.3	168.8	141.0	158.9	142.7	120.7	
KG-SDS301-E	2,750	4,562	3,940	7.5	241.4	214.1	177.4	210.2	187.4	156.6	176.5	158.4	134.0	
KG-SDS301-F	2,750	4,562	3,940	11.0	248.2	244.3	202.4	239.8	213.8	178.6	201.3	180.8	152.8	
KG-SDS301-G	2,750	4,562	3,940	15.0	248.2	248.2	219.5	248.2	231.8	193.7	218.3	196.0	165.7	
KG-SES261-C	3,050	4,792	3,540	3.7	188.2	166.9	138.2	163.8	146.0	121.9	137.5	123.4	104.2	
KG-SES261-D	3,050	4,792	3,540	5.5	214.7	190.4	157.7	186.9	166.5	139.1	156.8	140.8	118.9	
KG-SES261-E	3,050	4,792	3,540	7.5	237.8	210.9	174.6	207.0	184.5	154.0	173.7	155.9	131.7	
KG-SES261-F	3,050	4,792	3,540	11.0	271.3	240.6	199.3	236.2	210.5	175.8	198.2	177.9	150.3	
KG-SES261-G	3,050	4,792	3,540	15.0	★	251.6	216.6	251.6	228.8	191.1	215.5	193.4	163.4	
KG-SES301-C	3,050	4,862	3,940	3.7	200.7	178.1	147.5	174.8	155.8	130.2	146.8	131.8	111.4	
KG-SES301-D	3,050	4,862	3,940	5.5	228.4	202.6	167.9	198.9	177.3	148.2	167.0	149.9	126.8	
KG-SES301-E	3,050	4,862	3,940	7.5	252.4	223.9	185.5	219.8	196.0	163.7	184.5	165.7	140.1	
KG-SES301-F	3,050	4,862	3,940	11.0	276.6	254.8	211.1	250.1	223.0	186.3	210.0	188.5	159.4	
KG-SES301-G	3,050	4,862	3,940	15.0	276.6	275.0	227.9	270.0	240.7	201.1	226.7	203.5	172.1	
KG-SFS261-C	3,450	5,092	3,540	3.7	209.8	186.0	154.0	182.6	162.7	135.9	153.2	137.5	116.2	
KG-SFS261-D	3,450	5,092	3,540	5.5	238.7	211.7	175.3	207.8	185.2	154.6	174.4	156.5	132.2	
KG-SFS261-E	3,450	5,092	3,540	7.5	264.9	234.9	194.5	230.6	205.5	171.6	193.5	173.7	146.7	
KG-SFS261-F	3,450	5,092	3,540	11.0	299.5	265.6	219.9	260.7	232.3	194.0	218.8	196.3	165.9	
KG-SFS261-G	3,450	5,092	3,540	15.0	★	272.5	247.7	272.5	261.6	218.5	246.4	221.1	186.8	
KG-SFS301-C	3,450	5,162	3,940	3.7	233.9	207.5	171.9	203.7	181.6	151.7	171.0	153.5	129.8	
KG-SFS301-D	3,450	5,162	3,940	5.5	263.9	234.1	194.0	229.8	204.9	171.2	192.9	173.2	146.5	
KG-SFS301-E	3,450	5,162	3,940	7.5	293.4	260.3	215.7	255.5	227.8	190.3	214.5	192.6	162.9	
KG-SFS301-F	3,450	5,162	3,940	11.0	314.6	297.6	246.6	292.1	260.4	217.6	245.2	220.2	186.2	
KG-SFS301-G	3,450	5,162	3,940	15.0	314.6	314.6	276.4	314.6	291.9	243.9	274.9	246.8	208.7	
KG-SFS301-H	3,450	5,162	3,940	18.5	★	★	★	★	★	253.8	★	256.8	217.2	
KG-SCS22A1-E	2,350	4,120	3,080	7.5	177.1	157.0	129.9	154.1	137.3	114.5	129.2	115.9	97.9	
KG-SCS22A1-F	2,350	4,120	3,080	11.0	★	157.4	140.4	157.4	148.4	123.8	139.7	125.3	105.8	
KG-SCS221-A	2,350	4,120	3,080	1.5	109.3	96.9	80.2	95.1	84.7	70.7	79.8	71.5	★	
KG-SCS221-B	2,350	4,120	3,080	2.2	122.5	108.6	89.9	106.6	94.9	79.2	89.4	80.2	67.7	
KG-SCS221-C	2,350	4,120	3,080	3.7	145.4	128.9	106.6	126.5	112.7	94.0	106.1	95.2	80.4	
KG-SCS221-D	2,350	4,120	3,080	5.5	167.0	148.0	122.5	145.3	129.4	108.0	121.9	109.3	92.3	
KG-SCS221-E	2,350	4,120	3,080	7.5	186.2	165.0	136.5	162.0	144.3	120.4	135.9	121.9	102.9	
KG-SCS261-B	2,350	4,192	3,490	2.2	133.4	118.3	97.9	116.1	103.5	86.4	97.4	87.4	73.9	
KG-SCS261-C	2,350	4,192	3,490	3.7	157.5	139.7	115.7	137.1	122.2	102.0	115.1	103.3	87.2	

★ Kindly Refer To Manufacturer Or Representative For Additional Information.

## Technical Specification: Standard Models

Model	Width		Length			Height			Fan		Weight		Piping Connection					Sound Level (d B(A))		
	-		Base	Overall	Body	Fan	Overall	Diameter	Motor	Dry	Operating	Inlet	Outlet	Drain	Overflow	Make-up	W Side	L Side	Fan 45°	
	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(kW)	(kg)	(kg)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	2 m	2 m	1.5 m	
KG-SQN201-A	1,750	3,270	3,585	2,540	340	2,880	1,500	1.5	773	1,912	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	58.7	62.2	67.7		
KG-SQN201-B	1,750	3,270	3,585	2,540	340	2,880	1,500	2.2	776	1,915	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	61.9	65.4	70.9		
KG-SQN201-C	1,750	3,270	3,585	2,540	340	2,880	1,500	3.7	775	1,914	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	64.2	67.7	73.2		
KG-SQN201-D	1,750	3,270	3,585	2,540	340	2,880	1,500	5.5	778	1,917	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	64.7	68.2	73.7		
KG-SQN201-E	1,750	3,270	3,585	2,540	340	2,880	1,500	7.5	788	1,927	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	65.8	69.3	74.8		
KG-SRN201-A	1,850	3,370	3,685	2,540	340	2,880	1,600	1.5	811	2,043	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.4	62.9	68.4		
KG-SRN201-B	1,850	3,370	3,685	2,540	340	2,880	1,600	2.2	812	2,044	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	61.7	65.2	70.7		
KG-SRN201-C	1,850	3,370	3,685	2,540	340	2,880	1,600	3.7	813	2,045	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	64.8	68.3	73.8		
KG-SRN201-D	1,850	3,370	3,685	2,540	340	2,880	1,600	5.5	819	2,051	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	66.0	69.5	75.0		
KG-SRN201-E	1,850	3,370	3,685	2,540	340	2,880	1,600	7.5	822	2,054	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	65.8	69.3	74.8		
KG-SAN20A1-A	2,050	3,470	3,785	2,540	340	2,880	1,700	1.5	869	2,261	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.8	63.3	68.8		
KG-SAN20A1-B	2,050	3,470	3,785	2,540	340	2,880	1,700	2.2	870	2,262	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	62.1	65.6	71.1		
KG-SAN20A1-C	2,050	3,470	3,785	2,540	340	2,880	1,700	3.7	872	2,263	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.4	68.9	74.4		
KG-SAN20A1-D	2,050	3,470	3,785	2,540	340	2,880	1,700	5.5	881	2,273	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.9	69.4	74.9		
KG-SAN20A1-E	2,050	3,470	3,785	2,540	340	2,880	1,700	7.5	883	2,275	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	67.0	70.5	76.0		
KG-SAN201-A	2,050	3,470	3,785	2,540	340	2,880	1,850	1.5	874	2,266	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	60.0	63.5	69.0		
KG-SAN201-B	2,050	3,470	3,785	2,540	340	2,880	1,850	2.2	876	2,268	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	62.2	65.7	71.2		
KG-SAN201-C	2,050	3,470	3,785	2,540	340	2,880	1,850	3.7	884	2,275	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.5	69.0	74.5		
KG-SAN201-D	2,050	3,470	3,785	2,540	340	2,880	1,850	5.5	884	2,276	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	66.7	70.2	75.7		
KG-SBN201-A	2,250	3,670	3,985	2,540	340	2,880	2,000	1.5	942	2,532	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.8	63.3	68.8		
KG-SBN201-B	2,250	3,670	3,985	2,540	340	2,880	2,000	2.2	943	2,533	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	63.2	66.7	72.2		
KG-SBN201-C	2,250	3,670	3,985	2,540	340	2,880	2,000	3.7	950	2,540	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.6	69.1	74.6		
KG-SBN201-D	2,250	3,670	3,985	2,540	340	2,880	2,000	5.5	952	2,543	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	66.7	70.2	75.7		
KG-SBN201-E	2,250	3,670	3,985	2,540	340	2,880	2,000	7.5	957	2,547	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	67.4	70.9	76.4		
KG-SBN221-A	2,250	3,670	4,020	2,740	340	3,080	2,000	1.5	1,027	2,672	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.7	63.2	68.7		
KG-SBN221-B	2,250	3,670	4,020	2,740	340	3,080	2,000	2.2	1,029	2,673	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.2	66.7	72.2		
KG-SBN221-C	2,250	3,670	4,020	2,740	340	3,080	2,000	3.7	1,031	2,675	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.6	69.1	74.6		
KG-SBN221-D	2,250	3,670	4,020	2,740	340	3,080	2,000	5.5	1,038	2,682	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	66.6	70.1	75.6		
KG-SBN221-E	2,250	3,670	4,020	2,740	340	3,080	2,000	7.5	1,042	2,687	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	66.5	70.0	75.5		
KG-SBN261-B	2,250	3,670	4,092	3,150	340	3,490	2,000	2.2	1,083	2,891	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.2	66.7	72.2		
KG-SBN261-C	2,250	3,670	4,092	3,150	340	3,490	2,000	3.7	1,090	2,898	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.6	69.1	74.6		
KG-SBN261-D	2,250	3,670	4,092	3,150	340	3,490	2,000	5.5	1,092	2,900	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	66.8	70.3	75.8		
KG-SBN261-E	2,250	3,670	4,092	3,150	340	3,490	2,000	7.5	1,096	2,904	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	67.6	71.1	76.6		
KG-SBN261-F	2,250	3,670	4,092	3,150	340	3,490	2,000	11.0	1,103	2,911	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	68.6	72.1	77.6		
KG-SBN301-C	2,250	3,670	4,162	3,550	340	3,890	2,000	3.7	1,232	3,148	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.6	69.1	74.6		
KG-SBN301-D	2,250	3,670	4,162	3,550	340	3,890	2,000	5.5	1,235	3,151	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	66.8	70.3	75.8		
KG-SBN301-E	2,250	3,670	4,162	3,550	340	3,890	2,000	7.5	1,237	3,153	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	67.5	71.0	76.5		
KG-SBN301-F	2,250	3,670	4,162	3,550	340	3,890	2,000	11.0	1,244	3,160	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	68.6	72.1	77.6		
KG-SBN301-G	2,250	3,670	4,162	3,550	340	3,890	2,000	15.0	1,273	3,189	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	68.8	72.3	77.8		
KG-SCN20A1-A	2,350	3,770	4,085	2,540	340	2,880	2,000	1.5	985	2,680	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.7	63.2	68.7		
KG-SCN20A1-B	2,350	3,770	4,085	2,540	340	2,880	2,000	2.2	987	2,681	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	63.2	66.7	72.2		
KG-SCN20A1-C	2,350	3,770	4,085	2,540	340	2,880	2,000	3.7	996	2,690	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.6	69.1	74.6		
KG-SCN20A1-D	2,350	3,770	4,085	2,540	340	2,880	2,000	5.5	1,013	2,707	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	66.7	70.2	75.7		
KG-SCN20A1-E	2,350	3,770	4,085	2,540	340	2,880	2,000	7.5	1,017	2,711	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	67.6	71.1	76.6		
KG-SCN201-A	2,350	3,770	4,085	2,540	340	2,880	2,200	1.5	1,003	2,698	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	60.0	63.5	69.0		
KG-SCN201-B	2,350	3,770	4,085	2,540	340	2,880	2,200	2.2	1,002	2,696	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.5	67.0	72.5		
KG-SCN201-C	2,350	3,770	4,085	2,540	340	2,880	2,200	3.7	1,026	2,720	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.8	69.3	74.8		
KG-SCN201-D	2,350	3,770	4,085	2,540	340	2,880	2,200	5.5	1,030	2,725	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	67.7	71.2	76.7		
KG-SCN201-E	2,350	3,770	4,085	2,540	340	2,880	2,200	7.5	1,032	2,727	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	68.1	71.6	77.1		
KG-SCN22A1-A	2,350	3,770	4,120	2,740	340	3,080	2,000	1.5	1,094	2,845	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.7	63.2	68.7		
KG-SCN22A1-B	2,350	3,770	4,120	2,740	340	3,080	2,000	2.2	1,092	2,844	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.2	66.7	72.2		

## Technical Specification: Standard Models

Model	Width		Length		Height		Fan		Weight		Piping Connection					Sound Level (dB(A))		
	-	Base	Overall	Body	Fan	Overall	Diameter	Motor	Dry	Operating	Inlet	Outlet	Drain	Overflow	Make-up	W Side	L Side	Fan 45°
	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(kW)	(kg)	(kg)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	2 m	2 m	1.5 m
KG-SCN22A1-C	2,350	3,770	4,120	2,740	340	3,080	2,000	3.7	1,113	2,864	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.6	69.1	74.6
KG-SCN22A1-D	2,350	3,770	4,120	2,740	340	3,080	2,000	5.5	1,123	2,874	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	66.6	70.1	75.6
KG-SCN22A1-E	2,350	3,770	4,120	2,740	340	3,080	2,000	7.5	1,124	2,875	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	66.4	69.9	75.4
KG-SCN22A1-F	2,350	3,770	4,120	2,740	340	3,080	2,000	11.0	1,132	2,883	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	68.3	71.8	77.3
KG-SCN221-A	2,350	3,770	4,120	2,740	340	3,080	2,200	1.5	1,114	2,866	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	60.0	63.5	69.0
KG-SCN221-B	2,350	3,770	4,120	2,740	340	3,080	2,200	2.2	1,109	2,860	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.5	67.0	72.5
KG-SCN221-C	2,350	3,770	4,120	2,740	340	3,080	2,200	3.7	1,146	2,897	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	65.8	69.3	74.8
KG-SCN221-D	2,350	3,770	4,120	2,740	340	3,080	2,200	5.5	1,142	2,893	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	67.7	71.2	76.7
KG-SCN221-E	2,350	3,770	4,120	2,740	340	3,080	2,200	7.5	1,141	2,892	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	67.4	70.9	76.4
KG-SCN261-B	2,350	3,770	4,192	3,150	340	3,490	2,200	2.2	1,149	3,072	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.5	67.0	72.5
KG-SCN261-C	2,350	3,770	4,192	3,150	340	3,490	2,200	3.7	1,171	3,094	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	66.0	69.5	75.0
KG-SCN261-D	2,350	3,770	4,192	3,150	340	3,490	2,200	5.5	1,177	3,099	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	67.7	71.2	76.7
KG-SCN261-E	2,350	3,770	4,192	3,150	340	3,490	2,200	7.5	1,183	3,106	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	67.5	71.0	76.5
KG-SCN261-F	2,350	3,770	4,192	3,150	340	3,490	2,200	11.0	1,205	3,128	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	68.8	72.3	77.8
KG-SCN301-C	2,350	3,770	4,262	3,550	340	3,890	2,200	3.7	1,335	3,371	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	65.9	69.4	74.9
KG-SCN301-D	2,350	3,770	4,262	3,550	340	3,890	2,200	5.5	1,340	3,376	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	67.6	71.1	76.6
KG-SCN301-E	2,350	3,770	4,262	3,550	340	3,890	2,200	7.5	1,348	3,384	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	68.1	71.6	77.1
KG-SCN301-F	2,350	3,770	4,262	3,550	340	3,890	2,200	11.0	1,369	3,405	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	68.1	71.6	77.1
KG-SCN301-G	2,350	3,770	4,262	3,550	340	3,890	2,200	15.0	1,372	3,407	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	69.0	72.5	78.0
KG-SDN261-B	2,750	4,070	4,492	3,200	340	3,540	2,475	2.2	1,469	3,838	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.0	66.5	72.0
KG-SDN261-C	2,750	4,070	4,492	3,200	340	3,540	2,475	3.7	1,473	3,841	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	66.7	70.2	75.7
KG-SDN261-D	2,750	4,070	4,492	3,200	340	3,540	2,475	5.5	1,480	3,848	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	67.6	71.1	76.6
KG-SDN261-E	2,750	4,070	4,492	3,200	340	3,540	2,475	7.5	1,486	3,854	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	69.7	73.2	78.7
KG-SDN261-F	2,750	4,070	4,492	3,200	340	3,540	2,475	11.0	1,523	3,891	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	69.8	73.3	78.8
KG-SDN301-C	2,750	4,070	4,562	3,600	340	3,940	2,475	3.7	1,638	4,140	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	66.7	70.2	75.7
KG-SDN301-D	2,750	4,070	4,562	3,600	340	3,940	2,475	5.5	1,643	4,145	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	67.6	71.1	76.6
KG-SDN301-E	2,750	4,070	4,562	3,600	340	3,940	2,475	7.5	1,653	4,155	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	69.7	73.2	78.7
KG-SDN301-F	2,750	4,070	4,562	3,600	340	3,940	2,475	11.0	1,671	4,172	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	69.9	73.4	78.9
KG-SDN301-G	2,750	4,070	4,562	3,600	340	3,940	2,475	15.0	1,696	4,197	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	70.2	73.7	79.2
KG-SEN261-C	3,050	4,370	4,792	3,200	340	3,540	2,475	3.7	1,684	4,437	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	65.6	69.1	74.6
KG-SEN261-D	3,050	4,370	4,792	3,200	340	3,540	2,475	5.5	1,689	4,443	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	68.5	72.0	77.5
KG-SEN261-E	3,050	4,370	4,792	3,200	340	3,540	2,475	7.5	1,699	4,453	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	69.7	73.2	78.7
KG-SEN261-F	3,050	4,370	4,792	3,200	340	3,540	2,475	11.0	1,716	4,470	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	69.9	73.4	78.9
KG-SEN261-G	3,050	4,370	4,792	3,200	340	3,540	2,475	15.0	1,741	4,495	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	69.5	73.0	78.5
KG-SEN301-C	3,050	4,370	4,862	3,600	340	3,940	2,475	3.7	1,841	4,744	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	65.6	69.1	74.6
KG-SEN301-D	3,050	4,370	4,862	3,600	340	3,940	2,475	5.5	1,847	4,749	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	68.6	72.1	77.6
KG-SEN301-E	3,050	4,370	4,862	3,600	340	3,940	2,475	7.5	1,853	4,756	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	69.7	73.2	78.7
KG-SEN301-F	3,050	4,370	4,862	3,600	340	3,940	2,475	11.0	1,874	4,777	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	69.9	73.4	78.9
KG-SEN301-G	3,050	4,370	4,862	3,600	340	3,940	2,475	15.0	1,905	4,807	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	70.5	74.0	79.5
KG-SEN301-H	3,050	4,370	4,862	3,600	340	3,940	2,475	18.5	1,931	4,834	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	70.5	74.0	79.5
KG-SFN261-C	3,450	4,670	5,092	3,200	340	3,540	2,775	3.7	1,939	5,198	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.2	69.7	75.2
KG-SFN261-D	3,450	4,670	5,092	3,200	340	3,540	2,775	5.5	1,946	5,205	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	68.4	71.9	77.4
KG-SFN261-E	3,450	4,670	5,092	3,200	340	3,540	2,775	7.5	1,952	5,211	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	68.1	71.6	77.1
KG-SFN261-F	3,450	4,670	5,092	3,200	340	3,540	2,775	11.0	1,971	5,230	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	69.2	72.7	78.2
KG-SFN261-G	3,450	4,670	5,092	3,200	340	3,540	2,775	15.0	1,996	5,255	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	69.6	73.1	78.6
KG-SFN301-C	3,450	4,670	5,162	3,600	340	3,940	3,048	3.7	2,199	5,627	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	67.2	70.7	76.2
KG-SFN301-D	3,450	4,670	5,162	3,600	340	3,940	3,048	5.5	2,207	5,635	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	68.0	71.5	77.0
KG-SFN301-E	3,450	4,670	5,162	3,600	340	3,940	3,048	7.5	2,228	5,656	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	69.0	72.5	78.0
KG-SFN301-F	3,450	4,670	5,162	3,600	340	3,940	3,048	11.0	2,234	5,662	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	70.7	74.2	79.7
KG-SFN301-G	3,450	4,670	5,162	3,600	340	3,940	3,048	15.0	2,266	5,694	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	69.5	73.0	78.5
KG-SFN301-H	3,450	4,670	5,162	3,600	340	3,940	3,048	18.5	2,284	5,712	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	71.2	74.7	80.2



## Technical Specification: Low Noise Models

Model	Width		Length			Height			Fan		Weight		Piping Connection					Sound Level (dB(A))		
	-		Base	Overall	Body	Fan	Overall	Diameter	Motor	Dry	Operating	Inlet	Outlet	Drain	Overflow	Make-up	W Side	L Side	Fan 45°	
	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(kW)	(kg)	(kg)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	2 m	2 m	1.5 m	
KG-SQL201-A	1,750	3,270	3,585	2,540	340	2,880	1,500	1.5	773	1,912	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	58.7	62.2	67.7		
KG-SQL201-B	1,750	3,270	3,585	2,540	340	2,880	1,500	2.2	776	1,915	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	60.2	63.7	69.2		
KG-SQL201-C	1,750	3,270	3,585	2,540	340	2,880	1,500	3.7	775	1,914	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	61.1	64.6	70.1		
KG-SQL201-D	1,750	3,270	3,585	2,540	340	2,880	1,500	5.5	778	1,917	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.4	65.9	71.4		
KG-SQL201-E	1,750	3,270	3,585	2,540	340	2,880	1,500	7.5	788	1,927	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	61.8	65.3	70.8		
KG-SRL201-A	1,850	3,370	3,685	2,540	340	2,880	1,600	1.5	811	2,043	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.4	62.9	68.4		
KG-SRL201-B	1,850	3,370	3,685	2,540	340	2,880	1,600	2.2	812	2,044	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.9	63.4	68.9		
KG-SRL201-C	1,850	3,370	3,685	2,540	340	2,880	1,600	3.7	813	2,045	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	61.7	65.2	70.7		
KG-SRL201-D	1,850	3,370	3,685	2,540	340	2,880	1,600	5.5	819	2,051	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.4	65.9	71.4		
KG-SRL201-E	1,850	3,370	3,685	2,540	340	2,880	1,600	7.5	822	2,054	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	62.5	66.0	71.5		
KG-SAL20A1-A	2,050	3,470	3,785	2,540	340	2,880	1,700	1.5	869	2,261	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.8	63.3	68.8		
KG-SAL20A1-B	2,050	3,470	3,785	2,540	340	2,880	1,700	2.2	870	2,262	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	60.1	63.6	69.1		
KG-SAL20A1-C	2,050	3,470	3,785	2,540	340	2,880	1,700	3.7	872	2,263	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.1	65.6	71.1		
KG-SAL20A1-D	2,050	3,470	3,785	2,540	340	2,880	1,700	5.5	881	2,273	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.8	66.3	71.8		
KG-SAL20A1-E	2,050	3,470	3,785	2,540	340	2,880	1,700	7.5	883	2,275	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.6	67.1	72.6		
KG-SAL201-A	2,050	3,470	3,785	2,540	340	2,880	1,850	1.5	874	2,266	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	60.0	63.5	69.0		
KG-SAL201-B	2,050	3,470	3,785	2,540	340	2,880	1,850	2.2	876	2,268	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	61.4	64.9	70.4		
KG-SAL201-C	2,050	3,470	3,785	2,540	340	2,880	1,850	3.7	884	2,275	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.2	65.7	71.2		
KG-SAL201-D	2,050	3,470	3,785	2,540	340	2,880	1,850	5.5	884	2,276	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.9	66.4	71.9		
KG-SBL201-A	2,250	3,670	3,985	2,540	340	2,880	2,000	1.5	942	2,532	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.8	63.3	68.8		
KG-SBL201-B	2,250	3,670	3,985	2,540	340	2,880	2,000	2.2	943	2,533	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	62.1	65.6	71.1		
KG-SBL201-C	2,250	3,670	3,985	2,540	340	2,880	2,000	3.7	950	2,540	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.1	66.6	72.1		
KG-SBL201-D	2,250	3,670	3,985	2,540	340	2,880	2,000	5.5	952	2,543	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.8	66.3	71.8		
KG-SBL201-E	2,250	3,670	3,985	2,540	340	2,880	2,000	7.5	957	2,547	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.8	67.3	72.8		
KG-SBL221-A	2,250	3,670	4,020	2,740	340	3,080	2,000	1.5	1,027	2,672	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.7	63.2	68.7		
KG-SBL221-B	2,250	3,670	4,020	2,740	340	3,080	2,000	2.2	1,029	2,673	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.1	65.6	71.1		
KG-SBL221-C	2,250	3,670	4,020	2,740	340	3,080	2,000	3.7	1,031	2,675	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.1	66.6	72.1		
KG-SBL221-D	2,250	3,670	4,020	2,740	340	3,080	2,000	5.5	1,038	2,682	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.8	66.3	71.8		
KG-SBL221-E	2,250	3,670	4,020	2,740	340	3,080	2,000	7.5	1,042	2,687	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	64.2	67.7	73.2		
KG-SBL261-B	2,250	3,670	4,092	3,150	340	3,490	2,000	2.2	1,083	2,891	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.0	65.5	71.0		
KG-SBL261-C	2,250	3,670	4,092	3,150	340	3,490	2,000	3.7	1,090	2,898	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.8	67.3	72.8		
KG-SBL261-D	2,250	3,670	4,092	3,150	340	3,490	2,000	5.5	1,092	2,900	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	64.4	67.9	73.4		
KG-SBL261-E	2,250	3,670	4,092	3,150	340	3,490	2,000	7.5	1,096	2,904	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	65.0	68.5	74.0		
KG-SBL261-F	2,250	3,670	4,092	3,150	340	3,490	2,000	11.0	1,103	2,911	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	65.7	69.2	74.7		
KG-SBL301-C	2,250	3,670	4,162	3,550	340	3,890	2,000	3.7	1,232	3,148	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.7	67.2	72.7		
KG-SBL301-D	2,250	3,670	4,162	3,550	340	3,890	2,000	5.5	1,235	3,151	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	64.3	67.8	73.3		
KG-SBL301-E	2,250	3,670	4,162	3,550	340	3,890	2,000	7.5	1,237	3,153	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	65.0	68.5	74.0		
KG-SBL301-F	2,250	3,670	4,162	3,550	340	3,890	2,000	11.0	1,244	3,160	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	65.6	69.1	74.6		
KG-SBL301-G	2,250	3,670	4,162	3,550	340	3,890	2,000	15.0	1,273	3,189	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	65.4	68.9	74.4		
KG-SCL20A1-A	2,350	3,770	4,085	2,540	340	2,880	2,000	1.5	985	2,680	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.7	63.2	68.7		
KG-SCL20A1-B	2,350	3,770	4,085	2,540	340	2,880	2,000	2.2	987	2,681	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	62.1	65.6	71.1		
KG-SCL20A1-C	2,350	3,770	4,085	2,540	340	2,880	2,000	3.7	996	2,690	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.1	66.6	72.1		
KG-SCL20A1-D	2,350	3,770	4,085	2,540	340	2,880	2,000	5.5	1,013	2,707	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.5	67.0	72.5		
KG-SCL20A1-E	2,350	3,770	4,085	2,540	340	2,880	2,000	7.5	1,017	2,711	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	64.2	67.7	73.2		
KG-SCL201-A	2,350	3,770	4,085	2,540	340	2,880	2,200	1.5	1,003	2,698	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	60.0	63.5	69.0		
KG-SCL201-B	2,350	3,770	4,085	2,540	340	2,880	2,200	2.2	1,002	2,696	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.4	65.9	71.4		
KG-SCL201-C	2,350	3,770	4,085	2,540	340	2,880	2,200	3.7	1,026	2,720	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.5	67.0	72.5		
KG-SCL201-D	2,350	3,770	4,085	2,540	340	2,880	2,200	5.5	1,030	2,725	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	64.0	67.5	73.0		
KG-SCL201-E	2,350	3,770	4,085	2,540	340	2,880	2,200	7.5	1,032	2,727	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	64.3	67.8	73.3		
KG-SCL22A1-A	2,350	3,770	4,120	2,740	340	3,080	2,000	1.5	1,094	2,845	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	59.7	63.2	68.7		
KG-SCL22A1-B	2,350	3,770	4,120	2,740	340	3,080	2,000	2.2	1,092	2,844	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.0	65.5	71.0		



## Technical Specification: Low Noise Models

Model	Width		Length		Height			Fan		Weight		Piping Connection					Sound Level (dB(A))		
	-	Base	Overall	Body	Fan	Overall	Diameter	Motor	Dry	Operating	Inlet	Outlet	Drain	Overflow	Make-up	W Side	L Side	Fan 45°	
	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(kW)	(kg)	(kg)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	2 m	2 m	1.5 m	
KG-SCL22A1-C	2,350	3,770	4,120	2,740	340	3,080	2,000	3.7	1,113	2,864	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.1	66.6	72.1	
KG-SCL22A1-D	2,350	3,770	4,120	2,740	340	3,080	2,000	5.5	1,123	2,874	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.5	67.0	72.5	
KG-SCL22A1-E	2,350	3,770	4,120	2,740	340	3,080	2,000	7.5	1,124	2,875	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	64.4	67.9	73.4	
KG-SCL22A1-F	2,350	3,770	4,120	2,740	340	3,080	2,000	11.0	1,132	2,883	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	64.2	67.7	73.2	
KG-SCL221-A	2,350	3,770	4,120	2,740	340	3,080	2,200	1.5	1,114	2,866	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	60.0	63.5	69.0	
KG-SCL221-B	2,350	3,770	4,120	2,740	340	3,080	2,200	2.2	1,109	2,860	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.4	65.9	71.4	
KG-SCL221-C	2,350	3,770	4,120	2,740	340	3,080	2,200	3.7	1,146	2,897	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.4	66.9	72.4	
KG-SCL221-D	2,350	3,770	4,120	2,740	340	3,080	2,200	5.5	1,142	2,893	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	64.0	67.5	73.0	
KG-SCL221-E	2,350	3,770	4,120	2,740	340	3,080	2,200	7.5	1,141	2,892	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	64.6	68.1	73.6	
KG-SCL261-B	2,350	3,770	4,192	3,150	340	3,490	2,200	2.2	1,149	3,072	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	62.4	65.9	71.4	
KG-SCL261-C	2,350	3,770	4,192	3,150	340	3,490	2,200	3.7	1,171	3,094	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.4	66.9	72.4	
KG-SCL261-D	2,350	3,770	4,192	3,150	340	3,490	2,200	5.5	1,177	3,099	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	64.6	68.1	73.6	
KG-SCL261-E	2,350	3,770	4,192	3,150	340	3,490	2,200	7.5	1,183	3,106	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	64.5	68.0	73.5	
KG-SCL261-F	2,350	3,770	4,192	3,150	340	3,490	2,200	11.0	1,205	3,128	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	66.2	69.7	75.2	
KG-SCL301-C	2,350	3,770	4,262	3,550	340	3,890	2,200	3.7	1,335	3,371	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	63.4	66.9	72.4	
KG-SCL301-D	2,350	3,770	4,262	3,550	340	3,890	2,200	5.5	1,340	3,376	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	64.5	68.0	73.5	
KG-SCL301-E	2,350	3,770	4,262	3,550	340	3,890	2,200	7.5	1,348	3,384	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	65.2	68.7	74.2	
KG-SCL301-F	2,350	3,770	4,262	3,550	340	3,890	2,200	11.0	1,369	3,405	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	66.1	69.6	75.1	
KG-SCL301-G	2,350	3,770	4,262	3,550	340	3,890	2,200	15.0	1,372	3,407	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	66.9	70.4	75.9	
KG-SDL261-B	2,750	4,070	4,492	3,200	340	3,540	2,475	2.2	1,469	3,838	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	63.0	66.5	72.0	
KG-SDL261-C	2,750	4,070	4,492	3,200	340	3,540	2,475	3.7	1,473	3,841	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	64.1	67.6	73.1	
KG-SDL261-D	2,750	4,070	4,492	3,200	340	3,540	2,475	5.5	1,480	3,848	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	65.3	68.8	74.3	
KG-SDL261-E	2,750	4,070	4,492	3,200	340	3,540	2,475	7.5	1,486	3,854	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	65.7	69.2	74.7	
KG-SDL261-F	2,750	4,070	4,492	3,200	340	3,540	2,475	11.0	1,523	3,891	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	66.3	69.8	75.3	
KG-SDL301-C	2,750	4,070	4,562	3,600	340	3,940	2,475	3.7	1,638	4,140	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	64.8	68.3	73.8	
KG-SDL301-D	2,750	4,070	4,562	3,600	340	3,940	2,475	5.5	1,643	4,145	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	65.2	68.7	74.2	
KG-SDL301-E	2,750	4,070	4,562	3,600	340	3,940	2,475	7.5	1,653	4,155	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	65.9	69.4	74.9	
KG-SDL301-F	2,750	4,070	4,562	3,600	340	3,940	2,475	11.0	1,671	4,172	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	66.2	69.7	75.2	
KG-SDL301-G	2,750	4,070	4,562	3,600	340	3,940	2,475	15.0	1,696	4,197	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	66.5	70.0	75.5	
KG-SEL261-C	3,050	4,370	4,792	3,200	340	3,540	2,475	3.7	1,684	4,437	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	64.8	68.3	73.8	
KG-SEL261-D	3,050	4,370	4,792	3,200	340	3,540	2,475	5.5	1,689	4,443	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	65.3	68.8	74.3	
KG-SEL261-E	3,050	4,370	4,792	3,200	340	3,540	2,475	7.5	1,699	4,453	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	65.9	69.4	74.9	
KG-SEL261-F	3,050	4,370	4,792	3,200	340	3,540	2,475	11.0	1,716	4,470	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.2	69.7	75.2	
KG-SEL261-G	3,050	4,370	4,792	3,200	340	3,540	2,475	15.0	1,741	4,495	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.5	70.0	75.5	
KG-SEL301-C	3,050	4,370	4,862	3,600	340	3,940	2,475	3.7	1,841	4,744	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	64.7	68.2	73.7	
KG-SEL301-D	3,050	4,370	4,862	3,600	340	3,940	2,475	5.5	1,847	4,749	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	65.2	68.7	74.2	
KG-SEL301-E	3,050	4,370	4,862	3,600	340	3,940	2,475	7.5	1,853	4,756	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	65.8	69.3	74.8	
KG-SEL301-F	3,050	4,370	4,862	3,600	340	3,940	2,475	11.0	1,874	4,777	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.1	69.6	75.1	
KG-SEL301-G	3,050	4,370	4,862	3,600	340	3,940	2,475	15.0	1,905	4,807	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.5	70.0	75.5	
KG-SEL301-H	3,050	4,370	4,862	3,600	340	3,940	2,475	18.5	1,931	4,834	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	67.3	70.8	76.3	
KG-SFL261-C	3,450	4,670	5,092	3,200	340	3,540	2,775	3.7	1,939	5,198	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	64.9	68.4	73.9	
KG-SFL261-D	3,450	4,670	5,092	3,200	340	3,540	2,775	5.5	1,946	5,205	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.1	69.6	75.1	
KG-SFL261-E	3,450	4,670	5,092	3,200	340	3,540	2,775	7.5	1,952	5,211	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.7	70.2	75.7	
KG-SFL261-F	3,450	4,670	5,092	3,200	340	3,540	2,775	11.0	1,971	5,230	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.9	70.4	75.9	
KG-SFL261-G	3,450	4,670	5,092	3,200	340	3,540	2,775	15.0	1,996	5,255	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	67.6	71.1	76.6	
KG-SFL301-C	3,450	4,670	5,162	3,600	340	3,940	3,048	3.7	2,199	5,627	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	64.8	68.3	73.8	
KG-SFL301-D	3,450	4,670	5,162	3,600	340	3,940	3,048	5.5	2,207	5,635	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.2	69.7	75.2	
KG-SFL301-E	3,450	4,670	5,162	3,600	340	3,940	3,048	7.5	2,228	5,656	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	66.7	70.2	75.7	
KG-SFL301-F	3,450	4,670	5,162	3,600	340	3,940	3,048	11.0	2,234	5,662	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	68.2	71.7	77.2	
KG-SFL301-G	3,450	4,670	5,162	3,600	340	3,940	3,048	15.0	2,266	5,694	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	68.6	72.1	77.6	
KG-SFL301-H	3,450	4,670	5,162	3,600	340	3,940	3,048	18.5	2,284	5,712	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	68.6	72.1	77.6	

## Technical Specification: Super Low Noise Models

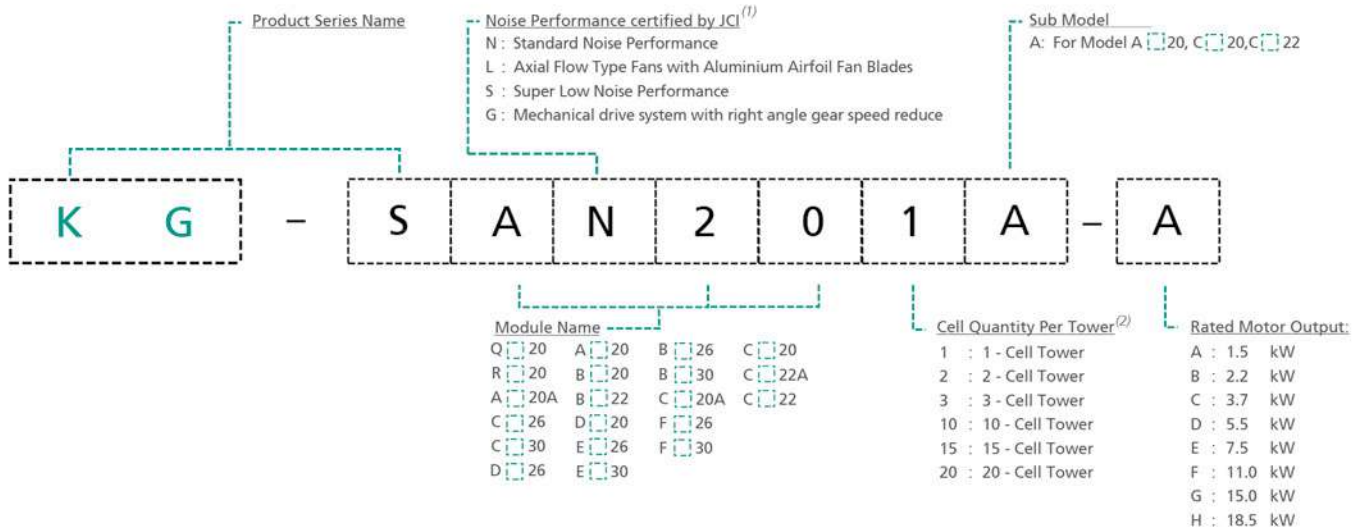
Model	Width		Length			Height			Fan		Weight		Piping Connection					Sound Level (d B(A))		
	-		Base	Overall	Body	Fan	Overall	Diameter	Motor	Dry	Operating	Inlet	Outlet	Drain	Overflow	Make-up	W Side	L Side	Fan 45°	
	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(kW)	(kg)	(kg)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	2 m	2 m	1.5 m	
KG-SQS201-A	1,750	3,270	3,585	2,540	340	2,880	1,500	1.5	773	1,912	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	54.5	58.0	63.5		
KG-SQS201-B	1,750	3,270	3,585	2,540	340	2,880	1,500	2.2	776	1,915	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	55.4	58.9	64.4		
KG-SQS201-C	1,750	3,270	3,585	2,540	340	2,880	1,500	3.7	775	1,914	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	56.6	60.1	65.6		
KG-SQS201-D	1,750	3,270	3,585	2,540	340	2,880	1,500	5.5	778	1,917	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	57.4	60.9	66.4		
KG-SRS201-A	1,850	3,370	3,685	2,540	340	2,880	1,600	1.5	811	2,043	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	55.0	58.5	64.0		
KG-SRS201-B	1,850	3,370	3,685	2,540	340	2,880	1,600	2.2	812	2,044	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	55.8	59.3	64.8		
KG-SRS201-C	1,850	3,370	3,685	2,540	340	2,880	1,600	3.7	813	2,045	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	57.1	60.6	66.1		
KG-SRS201-D	1,850	3,370	3,685	2,540	340	2,880	1,600	5.5	819	2,051	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	57.7	61.2	66.7		
KG-SRS201-E	1,850	3,370	3,685	2,540	340	2,880	1,600	7.5	822	2,054	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	58.1	61.6	67.1		
KG-SAS20A1-A	2,050	3,470	3,785	2,540	340	2,880	1,700	1.5	869	2,261	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	55.4	58.9	64.4		
KG-SAS20A1-B	2,050	3,470	3,785	2,540	340	2,880	1,700	2.2	870	2,262	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	56.2	59.7	65.2		
KG-SAS20A1-C	2,050	3,470	3,785	2,540	340	2,880	1,700	3.7	872	2,263	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	57.4	60.9	66.4		
KG-SAS20A1-D	2,050	3,470	3,785	2,540	340	2,880	1,700	5.5	881	2,273	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.1	61.6	67.1		
KG-SAS20A1-E	2,050	3,470	3,785	2,540	340	2,880	1,700	7.5	883	2,275	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.7	62.2	67.7		
KG-SAS201-A	2,050	3,470	3,785	2,540	340	2,880	1,850	1.5	874	2,266	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	55.7	59.2	64.7		
KG-SAS201-B	2,050	3,470	3,785	2,540	340	2,880	1,850	2.2	876	2,268	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	56.4	59.9	65.4		
KG-SAS201-C	2,050	3,470	3,785	2,540	340	2,880	1,850	3.7	884	2,275	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	57.6	61.1	66.6		
KG-SAS201-D	2,050	3,470	3,785	2,540	340	2,880	1,850	5.5	884	2,276	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.5	62.0	67.5		
KG-SBS201-A	2,250	3,670	3,985	2,540	340	2,880	2,000	1.5	942	2,532	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	56.2	59.7	65.2		
KG-SBS201-B	2,250	3,670	3,985	2,540	340	2,880	2,000	2.2	943	2,533	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	57.0	60.5	66.0		
KG-SBS201-C	2,250	3,670	3,985	2,540	340	2,880	2,000	3.7	950	2,540	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.3	61.8	67.3		
KG-SBS201-D	2,250	3,670	3,985	2,540	340	2,880	2,000	5.5	952	2,543	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.7	62.2	67.7		
KG-SBS201-E	2,250	3,670	3,985	2,540	340	2,880	2,000	7.5	957	2,547	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	59.0	62.5	68.0		
KG-SBS221-A	2,250	3,670	4,020	2,740	340	3,080	2,000	1.5	1,027	2,672	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	56.1	59.6	65.1		
KG-SBS221-B	2,250	3,670	4,020	2,740	340	3,080	2,000	2.2	1,029	2,673	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	57.0	60.5	66.0		
KG-SBS221-C	2,250	3,670	4,020	2,740	340	3,080	2,000	3.7	1,031	2,675	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.2	61.7	67.2		
KG-SBS221-D	2,250	3,670	4,020	2,740	340	3,080	2,000	5.5	1,038	2,682	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.9	62.4	67.9		
KG-SBS221-E	2,250	3,670	4,020	2,740	340	3,080	2,000	7.5	1,042	2,687	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	59.5	63.0	68.5		
KG-SBS261-B	2,250	3,670	4,092	3,150	340	3,490	2,000	2.2	1,083	2,891	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	57.6	61.1	66.6		
KG-SBS261-C	2,250	3,670	4,092	3,150	340	3,490	2,000	3.7	1,090	2,898	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.8	62.3	67.8		
KG-SBS261-D	2,250	3,670	4,092	3,150	340	3,490	2,000	5.5	1,092	2,900	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	58.8	62.3	67.8		
KG-SBS261-E	2,250	3,670	4,092	3,150	340	3,490	2,000	7.5	1,096	2,904	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	59.8	63.3	68.8		
KG-SBS261-F	2,250	3,670	4,092	3,150	340	3,490	2,000	11.0	1,103	2,911	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	60.7	64.2	69.7		
KG-SBS301-C	2,250	3,670	4,162	3,550	340	3,890	2,000	3.7	1,232	3,148	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.7	62.2	67.7		
KG-SBS301-D	2,250	3,670	4,162	3,550	340	3,890	2,000	5.5	1,235	3,151	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	59.3	62.8	68.3		
KG-SBS301-E	2,250	3,670	4,162	3,550	340	3,890	2,000	7.5	1,237	3,153	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	59.8	63.3	68.8		
KG-SBS301-F	2,250	3,670	4,162	3,550	340	3,890	2,000	11.0	1,244	3,160	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	60.9	64.4	69.9		
KG-SCS20A1-A	2,350	3,770	4,085	2,540	340	2,880	2,000	1.5	985	2,680	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	56.2	59.7	65.2		
KG-SCS20A1-B	2,350	3,770	4,085	2,540	340	2,880	2,000	2.2	987	2,681	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	57.0	60.5	66.0		
KG-SCS20A1-C	2,350	3,770	4,085	2,540	340	2,880	2,000	3.7	996	2,690	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.2	61.7	67.2		
KG-SCS20A1-D	2,350	3,770	4,085	2,540	340	2,880	2,000	5.5	1,013	2,707	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.9	62.4	67.9		
KG-SCS20A1-E	2,350	3,770	4,085	2,540	340	2,880	2,000	7.5	1,017	2,711	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	59.2	62.7	68.2		
KG-SCS201-A	2,350	3,770	4,085	2,540	340	2,880	2,200	1.5	1,003	2,698	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	56.4	59.9	65.4		
KG-SCS201-B	2,350	3,770	4,085	2,540	340	2,880	2,200	2.2	1,002	2,696	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	57.2	60.7	66.2		
KG-SCS201-C	2,350	3,770	4,085	2,540	340	2,880	2,200	3.7	1,026	2,720	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.4	61.9	67.4		
KG-SCS201-D	2,350	3,770	4,085	2,540	340	2,880	2,200	5.5	1,030	2,725	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	59.2	62.7	68.2		
KG-SCS201-E	2,350	3,770	4,085	2,540	340	2,880	2,200	7.5	1,032	2,727	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	59.5	63.0	68.5		
KG-SCS22A1-A	2,350	3,770	4,120	2,740	340	3,080	2,000	1.5	1,094	2,845	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	56.1	59.6	65.1		
KG-SCS22A1-C	2,350	3,770	4,120	2,740	340	3,080	2,000	3.7	1,113	2,864	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.2	61.7	67.2		

## Technical Specification: Super Low Noise Models

Model	Width		Length		Height		Fan		Weight		Piping Connection					Sound Level (dB(A))		
	-	Base	Overall	Body	Fan	Overall	Diameter	Motor	Dry	Operating	Inlet	Outlet	Drain	Overflow	Make-up	W Side	L Side	Fan 45°
	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(kW)	(kg)	(kg)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	(Size x Qty)	2 m	2 m	1.5 m
KG-SCS22A1-D	2,350	3,770	4,120	2,740	340	3,080	2,000	5.5	1,123	2,874	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.8	62.3	67.8
KG-SCS22A1-E	2,350	3,770	4,120	2,740	340	3,080	2,000	7.5	1,124	2,875	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	59.2	62.7	68.2
KG-SCS22A1-F	2,350	3,770	4,120	2,740	340	3,080	2,000	11.0	1,132	2,883	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	59.8	63.3	68.8
KG-SCS221-A	2,350	3,770	4,120	2,740	340	3,080	2,200	1.5	1,114	2,866	100A x 2	125A x 1	50A x 1	50A x 1	25A x 2	56.3	59.8	65.3
KG-SCS221-B	2,350	3,770	4,120	2,740	340	3,080	2,200	2.2	1,109	2,860	100A x 2	150A x 1	50A x 1	50A x 1	25A x 2	57.2	60.7	66.2
KG-SCS221-C	2,350	3,770	4,120	2,740	340	3,080	2,200	3.7	1,146	2,897	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.4	61.9	67.4
KG-SCS221-D	2,350	3,770	4,120	2,740	340	3,080	2,200	5.5	1,142	2,893	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	59.2	62.7	68.2
KG-SCS221-E	2,350	3,770	4,120	2,740	340	3,080	2,200	7.5	1,141	2,892	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	59.3	62.8	68.3
KG-SCS261-B	2,350	3,770	4,192	3,150	340	3,490	2,200	2.2	1,149	3,072	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.1	61.6	67.1
KG-SCS261-C	2,350	3,770	4,192	3,150	340	3,490	2,200	3.7	1,171	3,094	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.5	62.0	67.5
KG-SCS261-D	2,350	3,770	4,192	3,150	340	3,490	2,200	5.5	1,177	3,099	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	59.4	62.9	68.4
KG-SCS261-E	2,350	3,770	4,192	3,150	340	3,490	2,200	7.5	1,183	3,106	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	60.3	63.8	69.3
KG-SCS261-F	2,350	3,770	4,192	3,150	340	3,490	2,200	11.0	1,205	3,128	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	61.0	64.5	70.0
KG-SCS301-C	2,350	3,770	4,262	3,550	340	3,890	2,200	3.7	1,335	3,371	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	59.2	62.7	68.2
KG-SCS301-D	2,350	3,770	4,262	3,550	340	3,890	2,200	5.5	1,340	3,376	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	59.9	63.4	68.9
KG-SCS301-E	2,350	3,770	4,262	3,550	340	3,890	2,200	7.5	1,348	3,384	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	60.1	63.6	69.1
KG-SCS301-F	2,350	3,770	4,262	3,550	340	3,890	2,200	11.0	1,369	3,405	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	61.0	64.5	70.0
KG-SCS301-G	2,350	3,770	4,262	3,550	340	3,890	2,200	15.0	1,372	3,407	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	61.2	64.7	70.2
KG-SDS261-B	2,750	4,070	4,492	3,200	340	3,540	2,475	2.2	1,469	3,838	125A x 2	150A x 1	50A x 1	50A x 1	25A x 2	58.0	61.5	67.0
KG-SDS261-C	2,750	4,070	4,492	3,200	340	3,540	2,475	3.7	1,473	3,841	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	59.5	63.0	68.5
KG-SDS261-D	2,750	4,070	4,492	3,200	340	3,540	2,475	5.5	1,480	3,848	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	60.2	63.7	69.2
KG-SDS261-E	2,750	4,070	4,492	3,200	340	3,540	2,475	7.5	1,486	3,854	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	60.3	63.8	69.3
KG-SDS261-F	2,750	4,070	4,492	3,200	340	3,540	2,475	11.0	1,523	3,891	125A x 2	150A x 1	50A x 1	50A x 1	40A x 2	61.8	65.3	70.8
KG-SDS301-C	2,750	4,070	4,562	3,600	340	3,940	2,475	3.7	1,638	4,140	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	59.4	62.9	68.4
KG-SDS301-D	2,750	4,070	4,562	3,600	340	3,940	2,475	5.5	1,643	4,145	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	60.1	63.6	69.1
KG-SDS301-E	2,750	4,070	4,562	3,600	340	3,940	2,475	7.5	1,653	4,155	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	60.8	64.3	69.8
KG-SDS301-F	2,750	4,070	4,562	3,600	340	3,940	2,475	11.0	1,671	4,172	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	61.7	65.2	70.7
KG-SDS301-G	2,750	4,070	4,562	3,600	340	3,940	2,475	15.0	1,696	4,197	125A x 2	200A x 1	50A x 1	50A x 1	40A x 2	62.2	65.7	71.2
KG-SES261-C	3,050	4,370	4,792	3,200	340	3,540	2,475	3.7	1,684	4,437	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	59.4	62.9	68.4
KG-SES261-D	3,050	4,370	4,792	3,200	340	3,540	2,475	5.5	1,689	4,443	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	60.7	64.2	69.7
KG-SES261-E	3,050	4,370	4,792	3,200	340	3,540	2,475	7.5	1,699	4,453	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	60.8	64.3	69.8
KG-SES261-F	3,050	4,370	4,792	3,200	340	3,540	2,475	11.0	1,716	4,470	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	61.7	65.2	70.7
KG-SES261-G	3,050	4,370	4,792	3,200	340	3,540	2,475	15.0	1,741	4,495	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	62.2	65.7	71.2
KG-SES301-C	3,050	4,370	4,862	3,600	340	3,940	2,475	3.7	1,841	4,744	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	60.0	63.5	69.0
KG-SES301-D	3,050	4,370	4,862	3,600	340	3,940	2,475	5.5	1,847	4,749	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	60.6	64.1	69.6
KG-SES301-E	3,050	4,370	4,862	3,600	340	3,940	2,475	7.5	1,853	4,756	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	60.7	64.2	69.7
KG-SES301-F	3,050	4,370	4,862	3,600	340	3,940	2,475	11.0	1,874	4,777	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	61.6	65.1	70.6
KG-SES301-G	3,050	4,370	4,862	3,600	340	3,940	2,475	15.0	1,905	4,807	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	62.2	65.7	71.2
KG-SFS261-C	3,450	4,670	5,092	3,200	340	3,540	2,775	3.7	1,939	5,198	125A x 2	200A x 1	80A x 1	80A x 1	40A x 2	60.1	63.6	69.1
KG-SFS261-D	3,450	4,670	5,092	3,200	340	3,540	2,775	5.5	1,946	5,205	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	61.0	64.5	70.0
KG-SFS261-E	3,450	4,670	5,092	3,200	340	3,540	2,775	7.5	1,952	5,211	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	61.7	65.2	70.7
KG-SFS261-F	3,450	4,670	5,092	3,200	340	3,540	2,775	11.0	1,971	5,230	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	62.2	65.7	71.2
KG-SFS261-G	3,450	4,670	5,092	3,200	340	3,540	2,775	15.0	1,996	5,255	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	62.6	66.1	71.6
KG-SFS301-C	3,450	4,670	5,162	3,600	340	3,940	3,048	3.7	2,199	5,627	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	61.0	64.5	70.0
KG-SFS301-D	3,450	4,670	5,162	3,600	340	3,940	3,048	5.5	2,207	5,635	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	61.2	64.7	70.2
KG-SFS301-E	3,450	4,670	5,162	3,600	340	3,940	3,048	7.5	2,228	5,656	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	62.1	65.6	71.1
KG-SFS301-F	3,450	4,670	5,162	3,600	340	3,940	3,048	11.0	2,234	5,662	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	62.5	66.0	71.5
KG-SFS301-G	3,450	4,670	5,162	3,600	340	3,940	3,048	15.0	2,266	5,694	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	63.4	66.9	72.4
KG-SFS301-H	3,450	4,670	5,162	3,600	340	3,940	3,048	18.5	2,284	5,712	150A x 2	200A x 1	80A x 1	80A x 1	40A x 2	63.9	67.4	72.9

# Tower Information

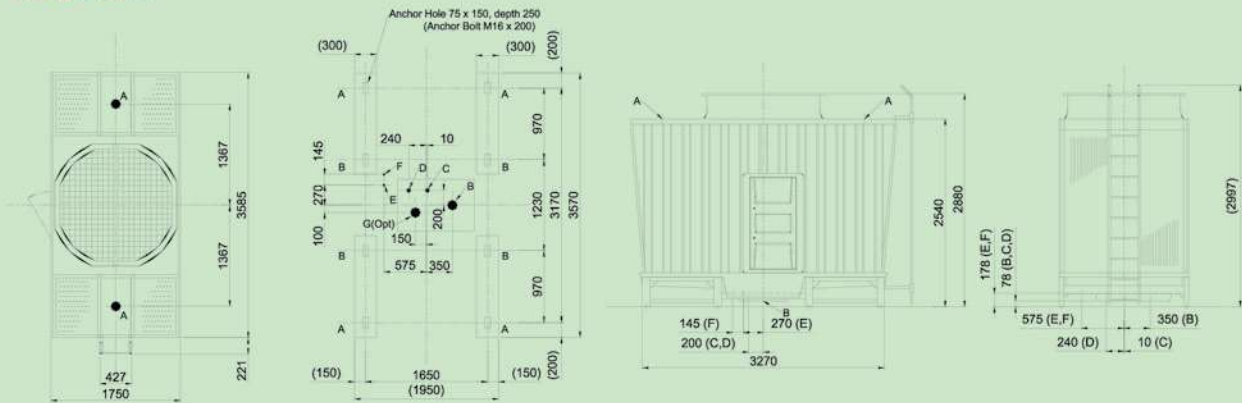
## Definition of Model Name



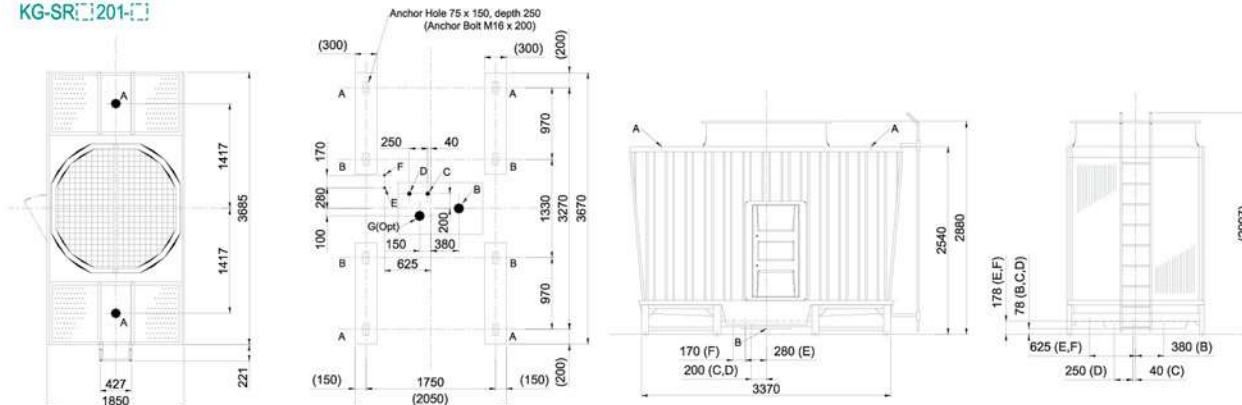
Note (1): Japan Cooling Tower Institute (JCI).

Note (2): Multi-cell configuration for crossflow type cooling towers do not require thermal derating as air-intake ratio is directly proportionate to number of cells. In other words, no limitations to number of cells per tower.

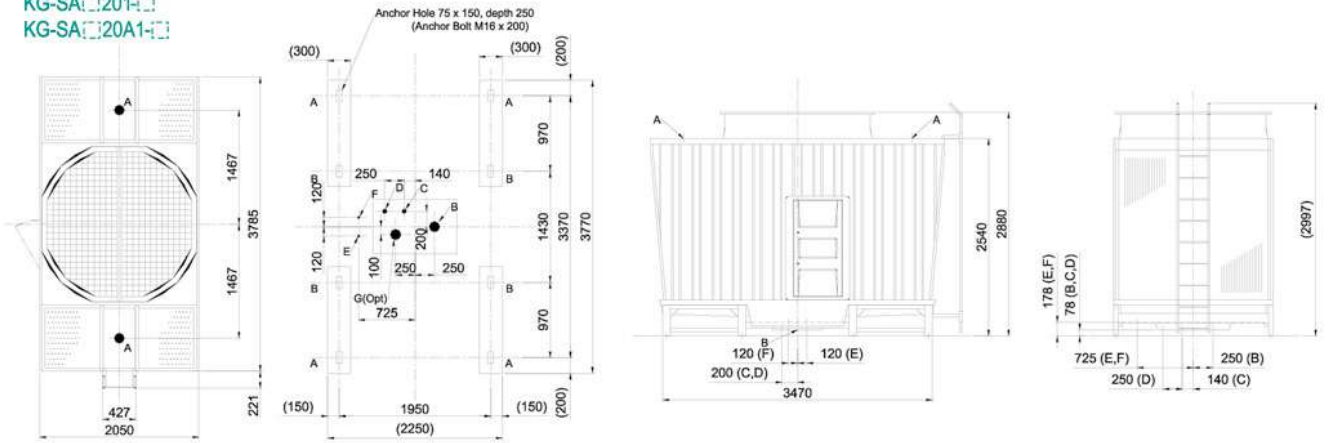
KG-SQ □201-□



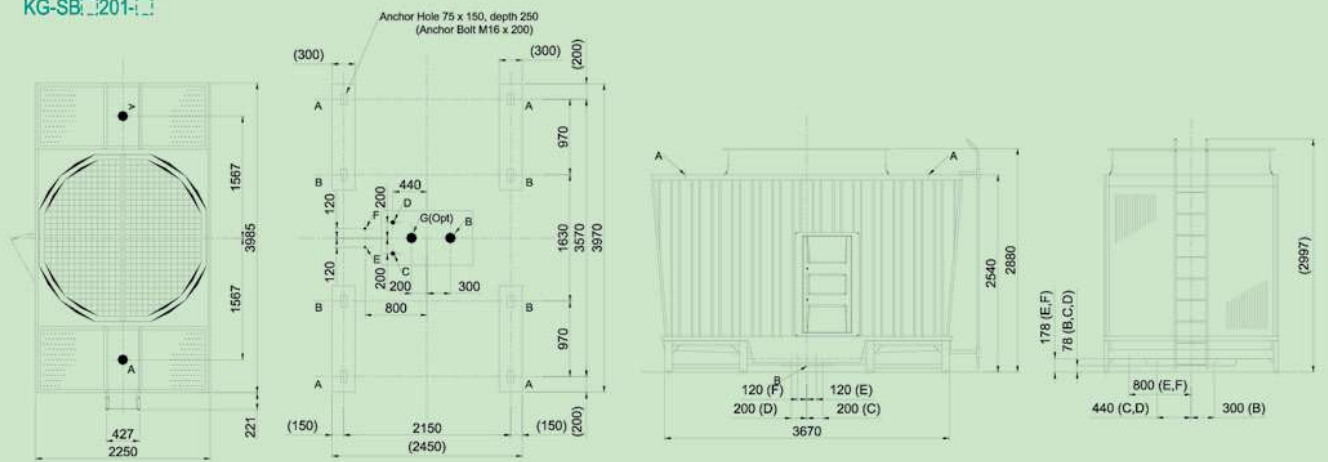
KG-SR □201-□



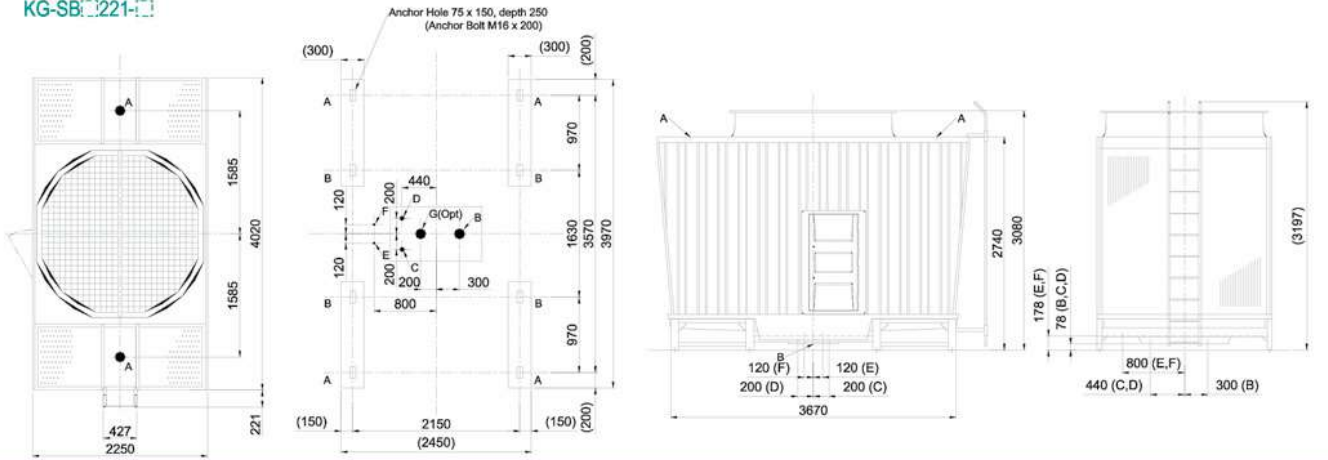
KG-SA 201-  
KG-SA 20A1-



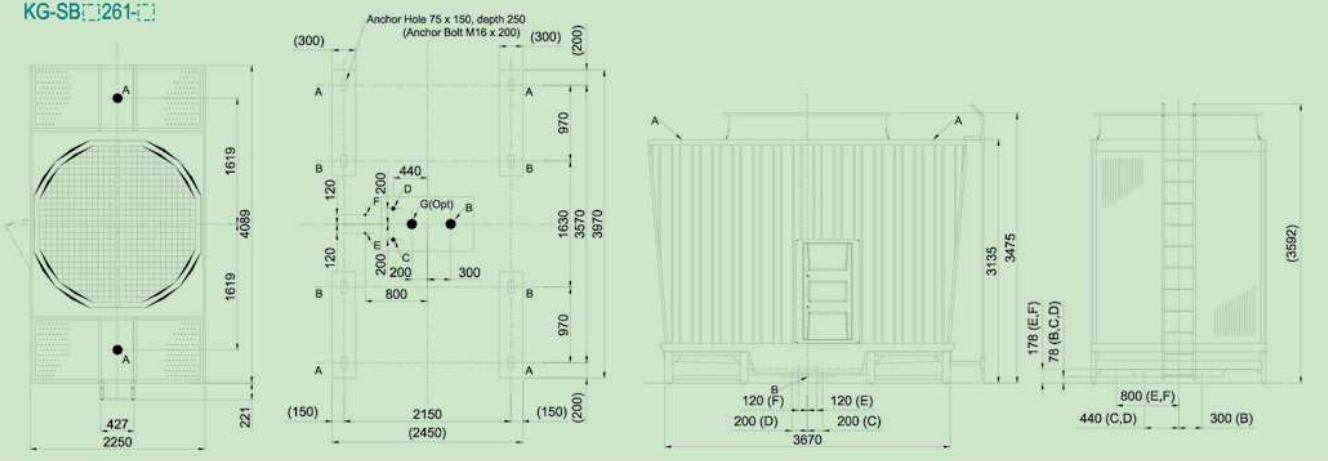
KG-SB 201-



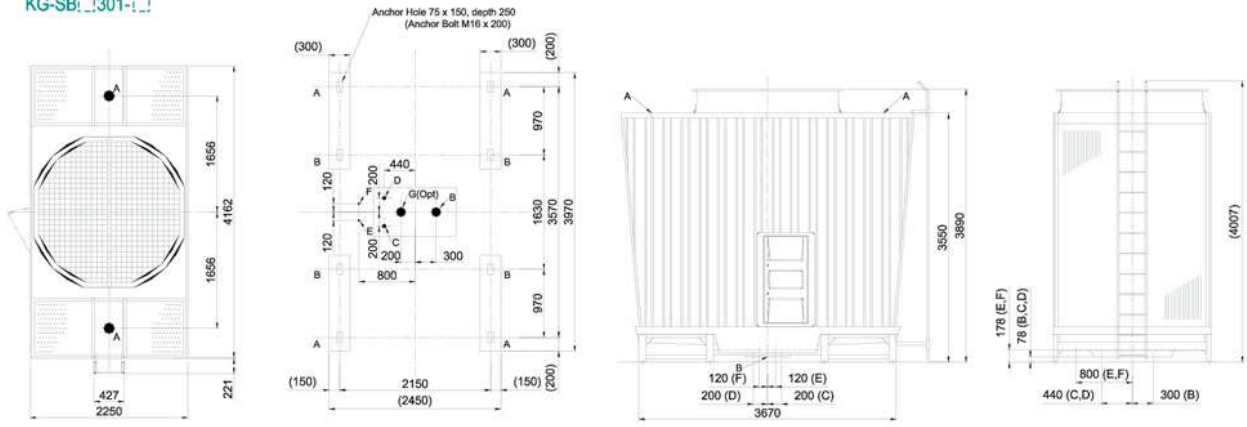
KG-SB 221-



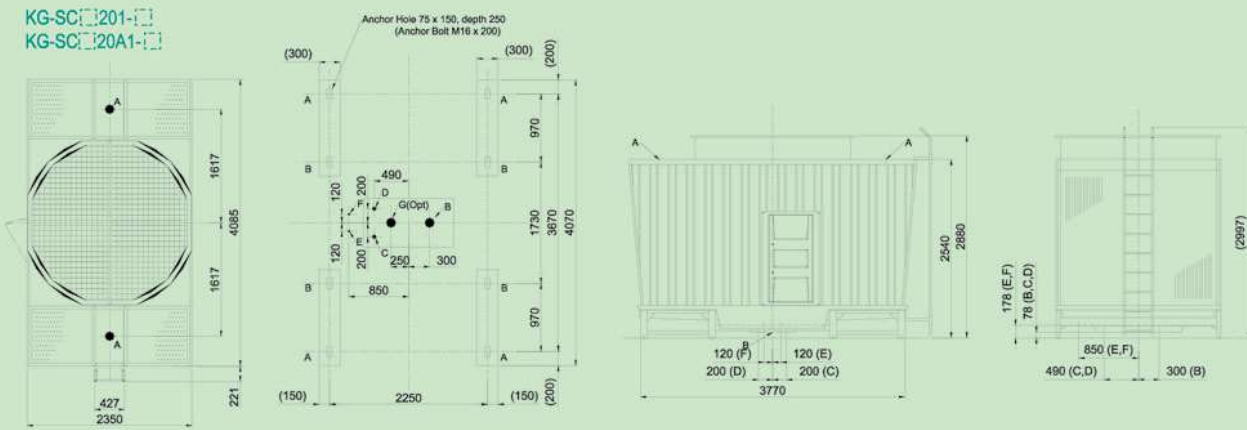
KG-SB 261-



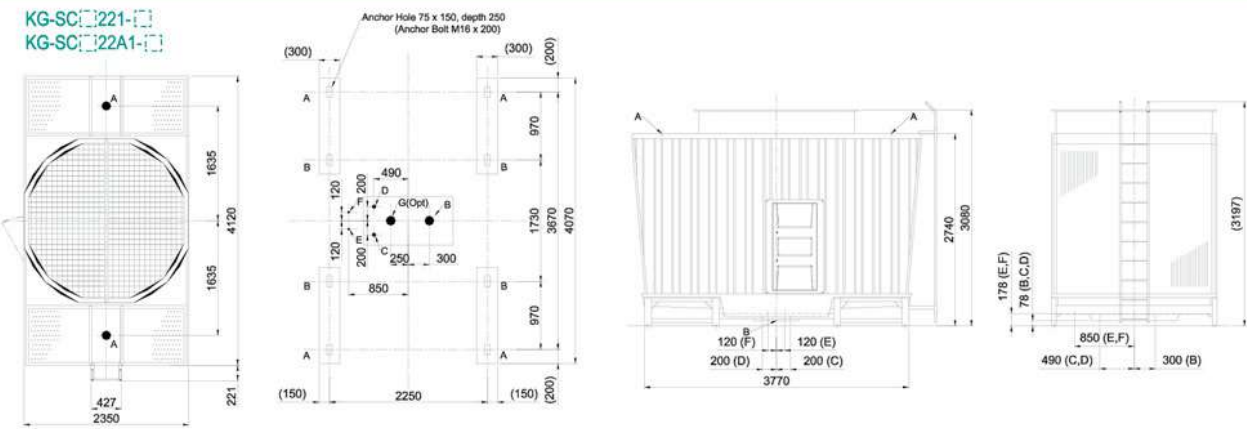
KG-SB□301-□



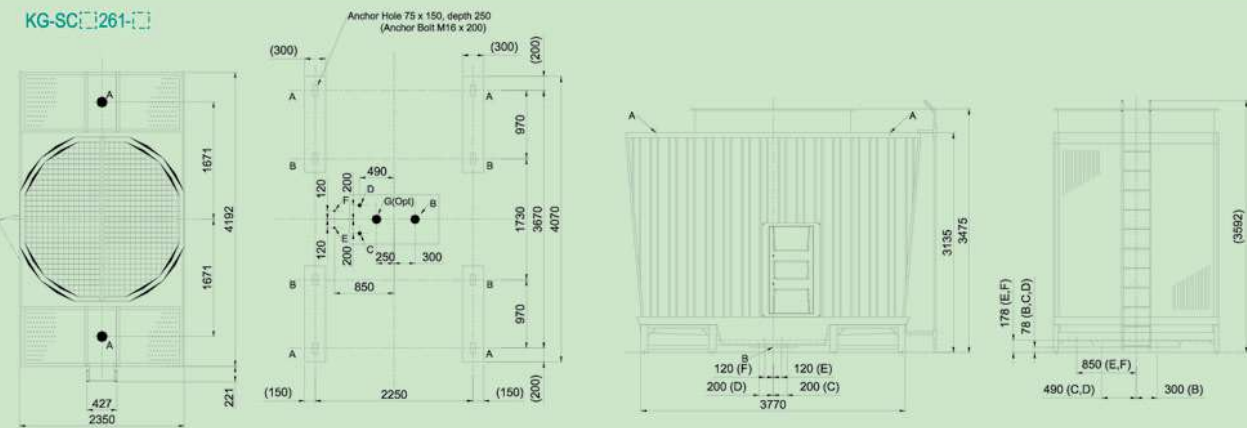
KG-SC□201-□  
KG-SC□20A1-□



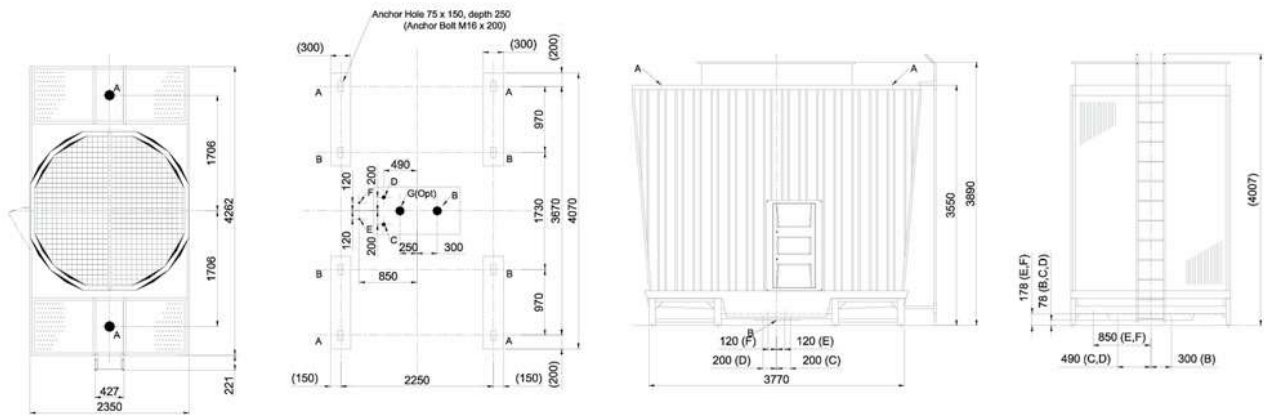
KG-SC□221-□  
KG-SC□22A1-□



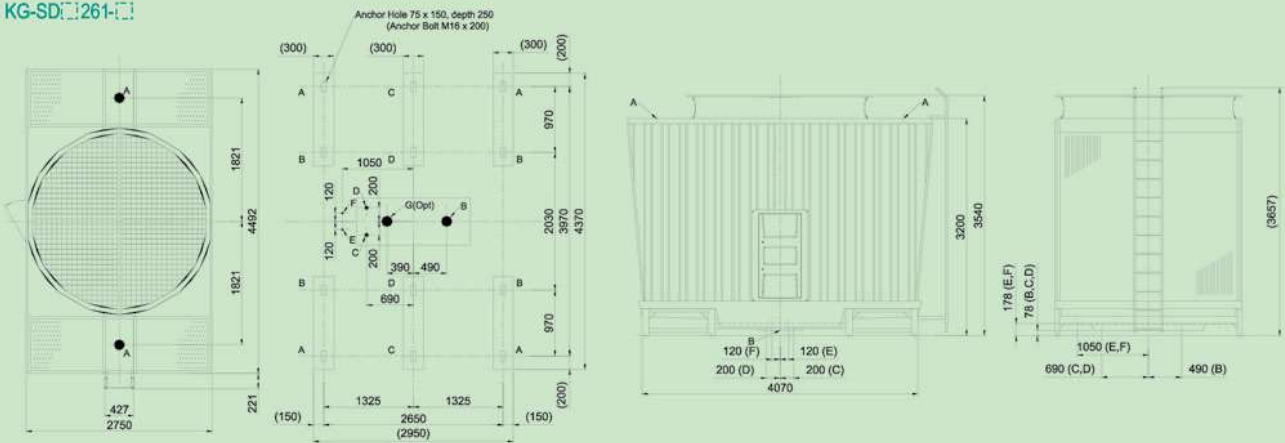
KG-SC□261-□



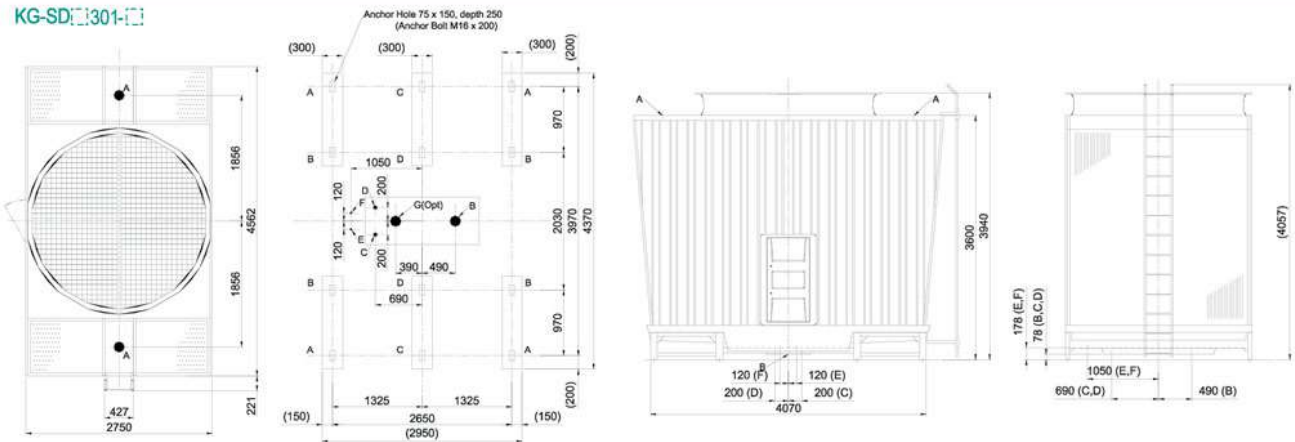
**KG-SC** 301



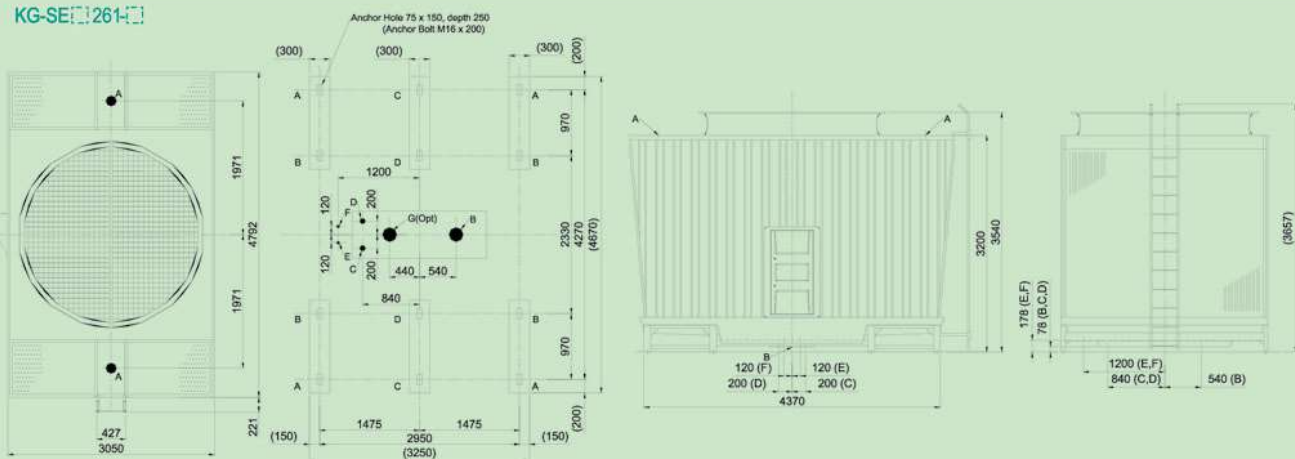
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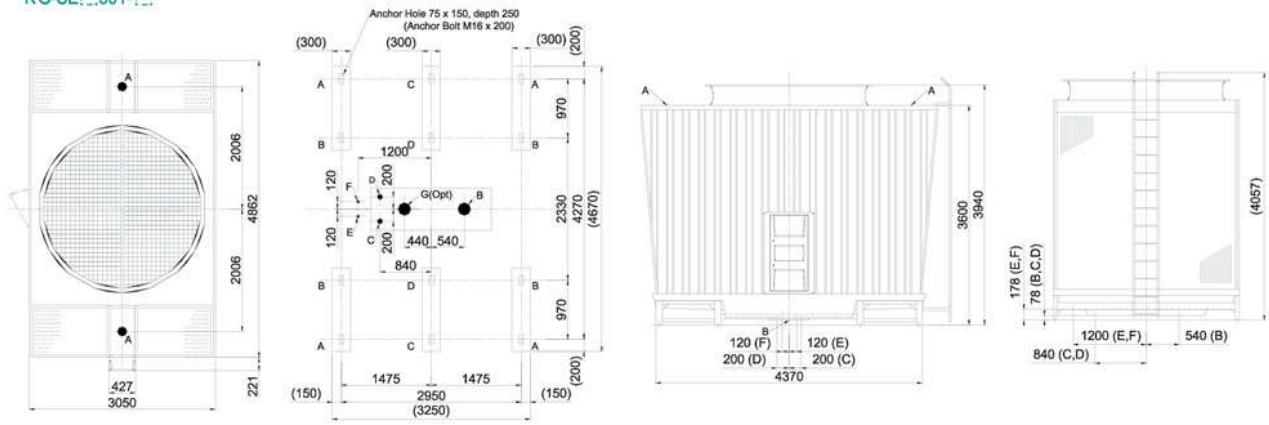
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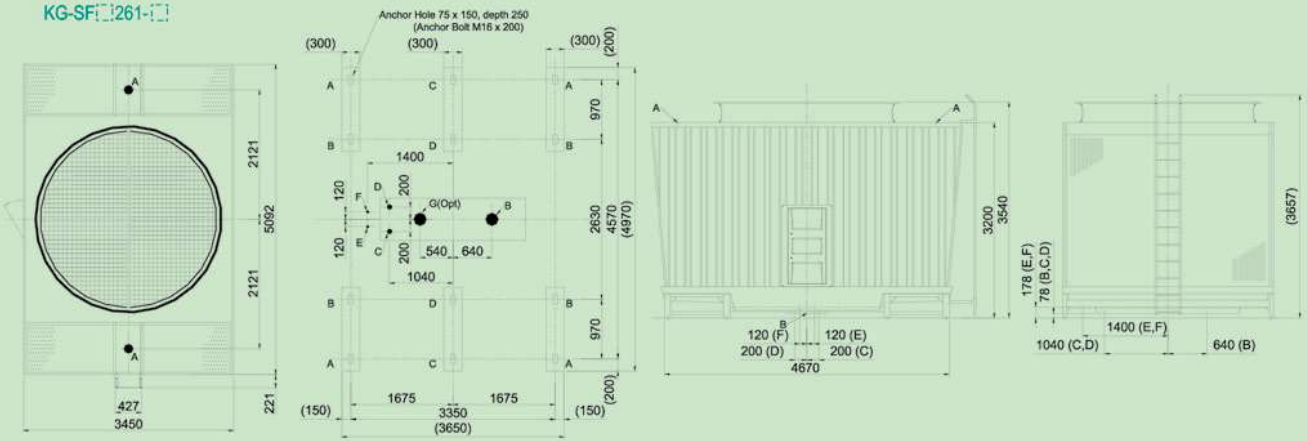
**KG-SE** 261



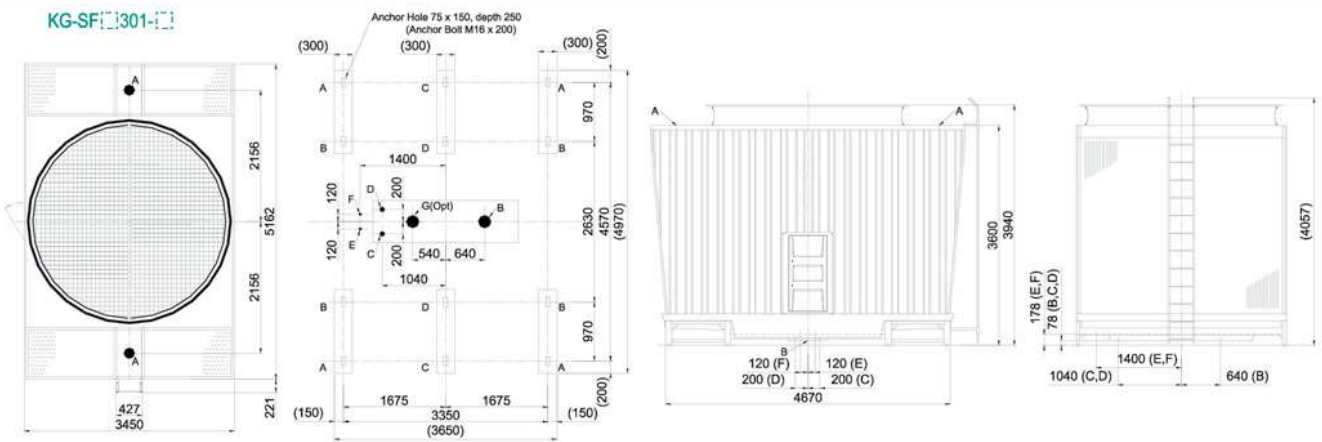
KG-SE □301-□



KG-SF □261-□



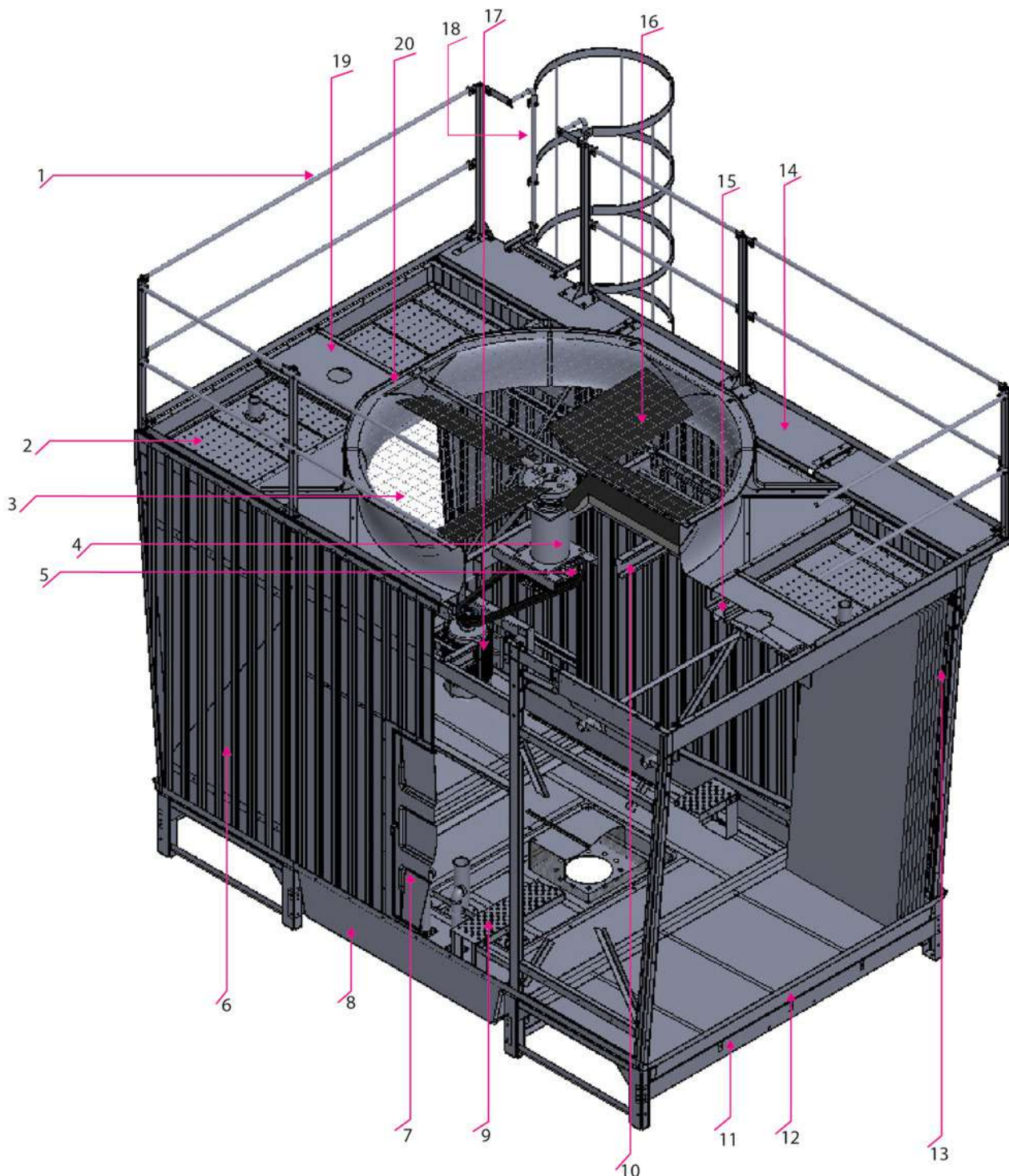
KG-SF □301-□





## Construction & Materials

Part	Material	Part	Material
1. Safety Rail	HDGS	11. Non-Wetted Steel Structure	HDGS
2. Distribution Basin	HDGS	12. Cold Water Basin	FRP
3. Fan Guard	HDGS	13. Hanging Type Fills	UPVC
4. Fan Bearing Assembly	HDGS	14. Top Deck	FRP
5. Pulley & V-Belt	-	15. Scattering Bar	PVC
6. Outerwall Casing	FRP	16. Airfoil Axial Flow Fan	Aluminium
7. Access Door	FRP	17. <u>T</u> otally <u>E</u> nclosed <u>A</u> ir <u>O</u> ver Motor	-
8. Outlet Sump	FRP	18. External Ladder	HDGS
9. Maintenance Walkway	HDGS	19. Distribution Box	HDGS
10. Wetted Steel Structure	HDGS	20. Fan Cylinder	FRP



## Engineering Specification

### Operating Conditions

Each cooling tower is manufactured to cool \_\_\_\_\_ liters per second of circulating water (flowrate) from \_\_\_\_\_ °C entering water temperature (hot water) to \_\_\_\_\_ °C leaving water temperature (cold water) at \_\_\_\_\_ °C entering ambient wet bulb temperature. The cooling towers are guaranteed to perform under the specified conditions and its thermal performance shall be rated by Cooling Technology Institute (CTI)

### Structure

The cooling tower structure shall be constructed from hot dipped zinc galvanized steel (HDGS). All galvanizing process shall be carried out in accordance to ISO1461:1999 standards. The cooling tower casing shall be constructed from FRP (UV-retardant Fiberglass Reinforced Polyester).

### Cold Water Basin

The cold water basin shall be constructed in multiple sections and made entirely from UV retardant Fibreglass Reinforced Polyester (FRP). Each cold water basin shall be made of FRP and equipped with a drain outlet for ease of cleaning.

### Drive System

The drive system shall comprise of pulleys and V-belts. V-belts shall be fabric-impregnated and tensioned according to manufacturer recommendations.

### Fills

Constructed entirely from UV-treated polyvinyl chloride (UPVC) and thermo-vacuum formed with intricate patterns shall facilitate for an even spread of water over the heat transfer surface with cross flow induced draft of air. Drift eliminators and water stoppers shall be an integral part of the film type fills. Fills shall be suspended from upper tubular structures and held together by interlocking studs without adhesives.

### Mechanical Skid

The mechanical skid shall be constructed of hot dipped zinc galvanized steel (HDGS) and bolted directly onto the inner vertical structures of the cooling tower. Hot dipped zinc galvanized steel (HDGS) fan guard shall be installed above the fan cylinder for added protection to the fan unit.

### Motor

The fan motor(s) shall be constructed in a totally enclosed, air over (TEAO) enclosure capable of withstanding up to IP55 and Class F insulation, specifically designed for cooling tower service. The motor shall be located beneath the fan cylinder inside the cooling tower for minimal impact on external noise and vibrations. The motor(s) shall be mounted inside the discharge air stream for effective cooling as required for TEAO enclosed motors.

### Water Distribution System

The hot water distribution shall be of open gravity flow and basin shall be constructed from hot dipped zinc galvanized steel (HDGS) without spray nozzles or grommets. Complex arrays of distribution holes shall evenly sprinkle water through natural gravity flow. U-channel bars shall be installed beneath each basin to facilitate the scattering effects of water evenly onto the fill section.

### Fan Section

Fans shall be axial flow type with aerofoil aluminum fan blades designed to provide the necessary airflow for heat transfer. Fan blades shall be assembled, balanced and pitched. The fan shall operate inside the fan cylinder, which provides a streamlined air entry and minimum tip clearance for maximum fan efficiency.

### Access

Access door constructed of UV retardant Fiberglass Reinforced Polyester (FRP) shall facilitate instant and tool-free entry into the inner sections of the cooling tower for inspection and maintenance works. A maintenance walkway constructed of hot dipped zinc galvanized steel (HDGS) shall be installed above the cold water basin and water level, this walkway shall span between end walls inside the cooling tower. External access ladder constructed of hot dipped zinc galvanized steel (HDGS) shall be installed on the cooling tower exterior to facilitate direct access to the top deck section.

Specifications & Data are accurate at the time of publication, verification should be made at the time of purchase

The MANUFACTURER reserves full rights for all amendments without prior notice

### SAFETY PRECAUTIONS MUST BE PRACTICED AT ALL TIMES TO AVOID ACCIDENTS & DAMAGES

Operation, Maintenance and Repair of this equipment must only be executed by qualified personnel

WARRANTY: refer to Certificate of Warranty for complete details



# WARRANTY

## *Certificate of Warranty*

Warranties: Seller warrants that the equipment products sold under this contract shall be free of defects in material and workmanship for a period of a twelve (12) months from the date of equipment startup or eighteen (18) months from the date of shipment, or whichever occurs first. Replacement parts provided by seller under its original equipment warranty obligations are warranted against defects in material and workmanship for a period of twelve (12) months from the date of shipment or until expiration of their original warranty, or whichever is the first to occur. Parts purchased after expiration are warranted against defects in material and workmanship for a period of twelve (12) months from dates of shipment. Written notice of any defects shall be given to Seller immediately upon discovery by Buyer, and shall fully describe the claim defect. Defective parts shall be repaired or replace F.O.B. point of shipment, not provided that inspection by Seller verifies the claimed defect (s). This shall be the Buyer's exclusive remedy.



This warranty does not cover the cost of removing, shipping or reinstalling the equipment. Repairs made without the prior written approval of Seller shall be void all warranties covering material and workmanship. Any descriptions of the product (s) in the contract are for the sole purpose of identification and do not constitute a warranty. In the interest of product improvement, Seller reserves the right to change specification and product design without incurring any liability therefore. The foregoing express warranties or those set forth elsewhere on this document are the only warranties of Seller applicable to the product (s) sold under contract. Seller's warranties do not apply to defects in product (s) for which payment in full has not been received by Seller, and said warranties do not cover normal wear and tear or the erosion, corrosion and / or deterioration of the product (s) from unusual causes. No warranties by Seller shall apply to accessories manufactured by others, in as much as they warranted separately by their respective manufacturers, except as stated above. Buyers assumes liability for and shall bear the costs of compliance with all laws, regulation, codes, standards or ordinances applicable to the location, operation and maintenance of the product (s) and air-conditioning system duct intakes, etc. no representative or agent of Seller is authorized to enlarge upon the express warranties of seller.

Liability / Indemnification: Seller shall not be liable for any damages caused by delay in delivery of the products. Buyer shall not hold harmless and indemnify against Seller from and against all liability, claim losses, damages and expenses (including attorney's fees) for personal injury and property damage arising out of Buyer's improper unloading, handling or use of the product subject to this order, and for Buyer's infringement of another's property rights. The Seller maximum liability from any causes whatsoever, whether in breach of contract, tort (including negligence), strict liability, or otherwise, shall not exceed the contract price. Neither Buyer or Seller shall in any event be liable to the other, whether such liability arises out of breach of contract, tort (including negligence) strict liability or any other cause or form of action, for any consequential, special, indirect or incidental damages, including but not limited to loss of actual or anticipated profits or loss of use arising out of this contract, other than such damages resulting from the willful misconduct of Buyer or Seller.

## Japan Cooling Tower Institute



The Japan Cooling Tower Institute (JCI) was established in 1963 for the purpose of improving the quality of cooling towers through vast research programs specifically in the field of technical and manufacturing aspects of cooling towers. The institute conveniently serves as a third party independent source to provide non-bias and up-to-date information to the public for over 5 decades.

Established over 50 years ago, the Japan Cooling Tower Institute produced numerous standards and test codes to ensure its participating members deliver the highest quality standards and product performance. Amongst the many publications released, the following standards and codes have been applied to cooling tower manufacturers.

### Refrigeration Ton (RT) by the Japan Cooling Tower Institute (JCI)

RT is the standard unit of measurement associated with cooling tower capacity and is defined by the Japan Cooling Institute. 1RT is equivalent to specific heat rejection quantity necessary in order to reduce fluid temperature from 37°C to 32°C at a circulating fluid flowrate of 0.78 cubic meters per hour and ambient wet bulb temperature of 27°C. For [more information](http://www.coolingtower.jp/), please visit <http://www.coolingtower.jp/>

### Water Quality Standards by Japan Refrigeration and Air Conditioning Industry Association (JRAIA)

Water is one of the key elements present in all open circuit type cooling towers. This precious element flows through all intended heat transfer surfaces of a cooling tower. In other words, the construction and thermal efficiencies of a cooling tower can be affected in the presence of poor water quality.

The Japan Cooling Tower Institute identified the importance of good water quality and has specified the water quality standards by JRAIA to all its participating members.

For more information on JRAIA standards, please visit <http://www.jraia.or.jp/english/>

1964	Cooling Tower Terminology and Performance Standards for Cooling Towers for Air Conditioning
1966	Standards for Cooling Towers for Air Conditioning
1973	Sound Level Measurement Standards for Cooling Towers
1978	Sound Level Standards for Cooling Towers: Centrifugal Water Chillers-Low-Sound Type
1979	Sound Level Standards for Cooling Towers: Centrifugal Water Chillers-Ultra Low-Sound Type
1981	Seismic Resistance Design and Construction Standards
1984	Daily Checklist and Emergency Checklist for Cooling Towers
1989	Sound Level Standards for Cooling Towers: Double Effect Type Absorption Chillers-Low-Sound and Ultra Low-Sound Types
1991	Sound Level Standards for Cooling Towers: Centrifugal Water Chillers-Low-Sound and Ultra Low-Sound Types Revised Sound Level Standards for Cooling Towers: Double Effect Type Absorption Chillers-Low-Sound and Ultra Low-Sound Types
1994	Criteria and Testing of Corrosion Proof for Cooling Towers against Salty Air
2005	Basic Specifications for Vapor Plume Abatement Cooling Towers Cooling Tower Maintenance and Service Life
2008	Performance Tests for Mechanical Draft Cooling Towers: JIS B 8609
2010	Sound Level Standards for Closed Circuit Cooling Towers Revised Criteria of Corrosion Proof for Cooling Towers against Salty Air Thermal Performance Tests for Mechanical Draft Cooling Towers
2011	Revised Sound Level Standards for Open Circuit Cooling Towers Revised Sound Level Standards for Closed Circuit Cooling Towers

## Cooling Technology Institute

Established nearly 30 years ago, Cooling Technology Institute (CTI) is a non-profitable and self-governing technical association headquartered in the USA. This institute maintains and expands a broad-base membership comprising of individuals and organizations interested in the field of evaporative heat transfer systems, cooling towers and cooling technology.



website: [www.cti.org](http://www.cti.org)

The world-renowned institute is dedicated to ensure acceptable quality levels and thermal performance ratings of evaporative heat transfer systems by establishing standardized testing and certification programs. Cooling Tower Institute is the leading authority in thermal performance verification for cooling towers and all testing activities are conducted through CTI Multi-Agency Tower Performance Test Program, delivering independent and non-bias comparisons of the actual operating performance of a specific cooling tower against its designed performance. This prestigious certification ensures all certified cooling towers are capable of delivering the thermal performance as per their published thermal ratings.

To verify the authenticity and validity of CTI certifications of all cooling tower manufacturers, please visit:

<http://www.cti.org/certification.shtml>



Thermal Performance Certified  
by the Cooling Technology Institute  
for KGS Series  
Certification Validation No. 12-33-02

Nihon Spindle is proud to announce that all thermal performance ratings for its entire line of KG series cooling towers have been certified by Cooling Technology Institute (CTI) in accordance to ATC-105 test code and CTI Certification Standard STD-201(11).

## Certification Letter from CTI



# COOLING TECHNOLOGY INSTITUTE

P. O. Box 681807, Houston, Texas 77268 • 3845 Cypress Creek Parkway, Ste 420, Houston, Texas 77068  
Phone: 281.583.4087 • Fax: 281.537.1721 • email: [vmanser@cti.org](mailto:vmanser@cti.org) • <http://www.cti.org>

January 8, 2015  
(Revision 2)

Nihon Spindle Manufacturing Company, Ltd.  
HVAC Division  
Shioe 4-2-30, Amagasaki-shi  
Hyogo, 661-8510 Japan

Subject: CTI Cooling Tower Certification for the  
Nihon Spindle Manufacturing Company, Ltd.  
KG Series of Cooling Towers

Gentlemen:

The Nihon Spindle Manufacturing Company, Ltd., line of KG Series induced-draft, cross-flow cooling towers, as described in your original application and subsequent revisions through December 10, 2014, has satisfactorily fulfilled the requirements for certification of thermal performance by the Cooling Technology Institute (CTI), as set forth in the CTI Certification Standard STD-201(13). A listing of the four-hundred-six (406) primary models of the line of KG Series cooling towers presently encompassed by this certification is included with this letter for reference.

The Nihon Spindle Manufacturing Company, Ltd., line of KG Series cooling towers has been assigned and should begin to use CTI Certification Validation Number C33B-12R02 (originally 12-33-02). You are hereby authorized and encouraged to display the CTI Certification Logo in all pertinent literature and are required to affix the CTI Certification Label on all towers comprising the line, as provided in the Certification Standard.

This CTI Certification requires the successful completion of a CTI Annual Reverification Test on a different model each year to remain in effect in the subsequent year.

Very truly yours,

Michael G. Womack, PE  
CTI Thermal Certification Administrator



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**Nihon Spindle Manufacturing Company, Ltd.**  
**KGS Series of CTI Certified Cooling Towers**  
**CTI Certification Validation Number C33B-12R02**  
**January 8, 2015 (Revision 2)**

KG-S Group – Normal Type

SQN201-A	SBN221-A	SCN201A-A	SDN261-B	SFN261-C
SQN201-B	SBN221-B	SCN201A-B	SDN261-C	SFN261-D
SQN201-C	SBN221-C	SCN201A-C	SDN261-D	SFN261-E
SQN201-D	SBN221-D	SCN201A-D	SDN261-E	SFN261-F
SQN201-E	SBN221-E	SCN201A-E	SDN261-F	SFN261-G
SRN201-A	SBN261-B	SCN201-A	SDN301-C	SFN301-C
SRN201-B	SBN261-C	SCN201-B	SDN301-D	SFN301-D
SRN201-C	SBN261-D	SCN201-C	SDN301-E	SFN301-E
SRN201-D	SBN261-E	SCN201-D	SDN301-F	SFN301-F
SRN201-E	SBN261-F	SCN201-E	SDN301-G	SFN301-G
				SFN301-H
SAN201A-A	SBN301-C	SCN221A-A	SEN261-C	
SAN201A-B	SBN301-D	SCN221A-B	SEN261-D	
SAN201A-C	SBN301-E	SCN221A-C	SEN261-E	
SAN201A-D	SBN301-F	SCN221A-D	SEN261-F	
SAN201A-E	SBN301-G	SCN221A-E	SEN261-G	
		SCN221A-F		
SAN201-A			SEN301-C	
SAN201-B		SCN221-A	SEN301-D	
SAN201-C		SCN221-B	SEN301-E	
SAN201-D		SCN221-C	SEN301-F	
		SCN221-D	SEN301-G	
SBN201-A		SCN221-E	SEN301-H	
SBN201-B				
SBN201-C		SCN261-B		
SBN201-D		SCN261-C		
SBN201-E		SCN261-D		
		SCN261-E		
		SCN261-F		
		SCN301-C		
		SCN301-D		
		SCN301-E		
		SCN301-F		
		SCN301-G		



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**Nihon Spindle Manufacturing Company, Ltd.**  
**KGS Series of CTI Certified Cooling Towers**  
**CTI Certification Validation Number C33B-12R02**  
**January 8, 2015 (Revision 2)**

KG-S Group – Low Noise Type

SQL201-A	SBL221-A	SCL201A-A	SDL261-B	SFL261-C
SQL201-B	SBL221-B	SCL201A-B	SDL261-C	SFL261-D
SQL201-C	SBL221-C	SCL201A-C	SDL261-D	SFL261-E
SQL201-D	SBL221-D	SCL201A-D	SDL261-E	SFL261-F
SQL201-E	SBL221-E	SCL201A-E	SDL261-F	SFL261-G
SRL201-A	SBL261-B	SCL201-A	SDL301-C	SFL301-C
SRL201-B	SBL261-C	SCL201-B	SDL301-D	SFL301-D
SRL201-C	SBL261-D	SCL201-C	SDL301-E	SFL301-E
SRL201-D	SBL261-E	SCL201-D	SDL301-F	SFL301-F
SRL201-E	SBL261-F	SCL201-E	SDL301-G	SFL301-G
				SFL301-H
SAL201A-A	SBL301-C	SCL221A-A	SEL261-C	
SAL201A-B	SBL301-D	SCL221A-B	SEL261-D	
SAL201A-C	SBL301-E	SCL221A-C	SEL261-E	
SAL201A-D	SBL301-F	SCL221A-D	SEL261-F	
SAL201A-E	SBL301-G	SCL221A-E	SEL261-G	
		SCL221A-F		
SAL201-A			SEL301-C	
SAL201-B		SCL221-A	SEL301-D	
SAL201-C		SCL221-B	SEL301-E	
SAL201-D		SCL221-C	SEL301-F	
		SCL221-D	SEL301-G	
SBL201-A		SCL221-E	SEL301-H	
SBL201-B				
SBL201-C		SCL261-B		
SBL201-D		SCL261-C		
SBL201-E		SCL261-D		
		SCL261-E		
		SCL261-F		
		SCL301-C		
		SCL301-D		
		SCL301-E		
		SCL301-F		
		SCL301-G		





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**Nihon Spindle Manufacturing Company, Ltd.**  
**KGS Series of CTI Certified Cooling Towers**  
**CTI Certification Validation Number C33B-12R02**  
**January 8, 2015 (Revision 2)**

KG-S Group – Super Low Noise Type

SQS201-A	SBS221-A	SCS201A-A	SDS261-B	SFS261-C
SQS201-B	SBS221-B	SCS201A-B	SDS261-C	SFS261-D
SQS201-C	SBS221-C	SCS201A-C	SDS261-D	SFS261-E
SQS201-D	SBS221-D	SCS201A-D	SDS261-E	SFS261-F
	SBS221-E	SCS201A-E	SDS261-F	SFS261-G
SRS201-A				
SRS201-B	SBS261-B	SCS201-A	SDS301-C	SFS301-C
SRS201-C	SBS261-C	SCS201-B	SDS301-D	SFS301-D
SRS201-D	SBS261-D	SCS201-C	SDS301-E	SFS301-E
SRS201-E	SBS261-E	SCS201-D	SDS301-F	SFS301-F
	SBS261-F	SCS201-E	SDS301-G	SFS301-G
SAS201A-A				SFS301-H
SAS201A-B	SBS301-C	SCS221A-A	SES261-C	
SAS201A-C	SBS301-D	SCS221A-B	SES261-D	
SAS201A-D	SBS301-E	SCS221A-C	SES261-E	
SAS201A-E	SBS301-F	SCS221A-D	SES261-F	
		SCS221A-E	SES261-G	
SAS201-A		SCS221A-F		
SAS201-B			SES301-C	
SAS201-C		SCS221-A	SES301-D	
SAS201-D		SCS221-B	SES301-E	
		SCS221-C	SES301-F	
SBS201-A		SCS221-D	SES301-G	
SBS201-B		SCS221-E		
SBS201-C				
SBS201-D		SCS261-B		
SBS201-E		SCS261-C		
		SCS261-D		
		SCS261-E		
		SCS261-F		
		SCS301-C		
		SCS301-D		
		SCS301-E		
		SCS301-F		
		SCS301-G		

See Notes Below for Optional Accessories and Constructions



## COOLING TECHNOLOGY INSTITUTE

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**Nihon Spindle Manufacturing Company, Ltd.**  
**KGS Series of CTI Certified Cooling Towers**  
**CTI Certification Validation Number C33B-12R02**  
**January 8, 2015 (Revision 2)**

### Footnotes:

1. Multiple cell configurations of the single cell models above are also available but not listed individually. Multi-cell configurations are end-wall to end-wall arrangements of the single cell designs which do not impact the air flow rate or capacity of the individual cells, and are included in the certification. See example model number below.
2. Certification includes alternate structural materials.
  - Hot dipped galvanized steel structure (Standard)
  - Stainless steel structure
3. Certification includes alternated drive configurations.
  - Belt & pulley drive (Standard)
  - Gear reducer drive
4. Certification includes alternate water inlet configurations.
  - External inlet pipe (Standard)
  - Internal inlet pipe
5. Certification includes alternate cold water basin configurations.
  - Integral cold water basin (Standard)
  - Without cold water basin
6. Certification includes optional handrail and caged ladder.
7. Certification includes optional hot water basin covers.
8. Certification includes optional discharge hood (Straight or elbow type)
9. Suffix '-X' is affixed to model numbers of units that are not CTI Certified, due either to application or product accessories or modifications.
10. Certified Model Number Example: KG- SCS302-C  
Where,
  - KG = Product Line Designation
  - SCS30 = Model Number (super low noise type)
  - '2' = 2-Cell Configuration (two times rated capacity of primary model)
  - '-C' = Fan Motor Size Code

## Past Project Portfolio



Kiarong Mosque  
Brunei



Menara Astra Tower  
Indonesia



Siam Discovery Center  
Thailand



Aman Central Mall  
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AIA Tower  
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Thermal Performance Certified  
by the Cooling Technology Institute  
for KGS Series  
Certification Validation No. 12-33-02