Cabinet Thermal Solutions

With industry leading DC brushless fan technology, Delta provides high quality, reliable and energy-efficient cabinet thermal management solutions for a range of industries and applications. With 38 manufacturing facilities, 60 R&D labs and 7,000 R&D engineers worldwide, Delta offers products that maximize operating performance while reducing downtime and assuring the best thermal protection for enclosed electronics and equipment. Delta's operations are ISO-9001, ISO-14001, ISO-14064, OHSAS-18001 and TS-16949 certified.

- Heat Exchangers
- Air Conditioners
- Thermoelectric Coolers
- Heaters

Web: www.CoolYourCabinet.com
Email: cabinet-thermal-solutions@deltaww.com

DELTA
Smarter. Greener. Together.

Why Delta?

Fan technology is pivotal to the performance of any cabinet thermal management solution. As the world's number one provider of DC brushless fans and blowers, Delta engineers products for increased reliability, efficiency and low noise.

Delta fans and thermal management products are used in applications where precision is paramount – from sensitive electronics and computing devices to outdoor enclosures and equipment that support our developing infrastructure.

A frequent recipient of international awards and recognition for innovation, design and corporate social responsibility, Delta is committed to its mission of "providing innovative, clean, and energy-efficient solutions for a better tomorrow."

Heat Exchangers

Delta air-to-air heat exchangers are a closed-loop system with advanced fan and core technology to bring internal enclosure temperatures to ambient. Delta heat exchangers feature Delta DC brushless fans engineered to run continuously for 80,000 hours, or nine years. Standard and custom designs are available.

- High quality Delta DC brushless fan component for reduced energy consumption and low noise
- Intelligent core design for effective thermal transfer
- Easy installation and maintenance access

	48VDC External Mount			48VDC Roof Mount		24VDC Internal Mount	
Model	HEX100PC	HEX150PC	HEX200PC	HEX050QA	HEX080QA	HEX010VA	HEX020VA
Cooling Capacity	90 W/K	135 W/K	185 W/K	50 W/K	80 W/K	10 W/°C	20 W/°C
Dimensions (inch)	27.2H x 14.2W x 9.5D	27.2H x 21.7W x 9.5D	27.2H x 27.6W x 9.5D	6.1H x 21.7W x 17.0D	10.4H x 21.9W x 19.7D	16.3H x 10.8W x 2.6D	23.2H x 11.1W x 3.9D
Dimensions (mm)	690H x 360W x 242D	690H x 550W x 242D	690H x 700W x 242D	155H x 550W x 434D	265H x 555W x 500D	415H x 275W x 65D	590H x 283W x 99D
Rated Voltage	48VDC	48VDC	48VDC	48VDC	48VDC	24VDC	24VDC
Operating Current (A)	3.6	5.8	6.6	1.4	1.5	1.2	0.9
Noise (dB-A) @1.5M	70	73	74	64	64	61	54
Weight (lbs / Kg)	28.7 / 13.0	44.1 / 20.0	52.9 / 24.0	19.8 / 9.0	33.1 / 15.0	8.8 / 4.0	15.4 / 7.0

	48VDC Internal Mount									
Model	HEX050PA	HEX100PB	HEX150PB	HEX200PB	HEX060PA	HEX080PD	HEX120PA	HEX160PA	HEX200PA	HEX260PA-A
Cooling Capacity	45 W/°C	100 W/°C	150 W/°C	200 W/°C	60 W/°C	80 W/°C	120 W/°C	160 W/°C	200 W/K	230 W/K
Dimension (inch)	19.7H x 17.5W x 6.0D	25H x 14W x 11D	25.2H x 21.7W x 10.9D	25.2H x 27.6W x 10.9D	33.5H x 19.7W x 5.8D	37.4H x 17.7W x 5.9D	45.3H x 18.5W x 7.6D	50.9H x 22.3W x 9.6D	43.3H x 19.7W x 7.9D	55.1H x 25.6W x 10.2D
Dimension (mm)	500H x 445W x 152D	640H x 360W x 278D	640H x 550W x 278D	640H x 700W x 278D	850H x 500W x 148D	950H x 450W x 150D	1151H x 471W x 193D	1294H x 567W x 243D	1100H x 500W x 200D	1400H x 650W x 260D
Rated Voltage	48VDC	48VDC	48VDC	48VDC	48VDC	48VDC	48VDC	48VDC	48VDC	48VDC
Operating Current (A)	1.2	3.6	5.8	7.9	0.6	2.2	4.1	3.1	6.6	10.0
Noise (dB-A) @1.5M	65	70	73	74	62	65	64	65	74	75
Weight (lbs / Kg)	22.0 / 10.0	16.0 / 35.0	44.1 / 20.0	52.9 / 24.0	37.5 / 17.0	41.9 / 19.0	72.8 / 33.0	88.2 / 40.0	57.3 / 26.0	81.6 / 37.0

Air Conditioners

Delta air conditioners use active compressor-based cooling to keep internal enclosure temperatures below ambient. These slim air cons employ a variable speed DC inverter compressor and dual rotor design to achieve a high COP with reduced vibration and low operating noise. All Delta air conditioners feature Delta's high quality DC brushless fans engineered to run continuously for a minimum of 80,000 hours, or nine years. Standard and custom designs are available.

- High quality Delta DC brushless fan component for reduced energy consumption and low noise
- Variable speed DC inverter compressor
- Slim size

	48VDC				48VDC Slim		
Model	HEC0800PB	HEC1000PB	HEC1200PB	HEC1500PB	HEC0800PC	HEC1000PC	HEC1200PC
Cooling Capacity	2720 BTU/hr 800W	3400 BTU/hr 1000W	4010 BTU/hr 1200W	5100 BTU/hr 1500W	2720 BTU/hr 800W	3400 BTU/hr 1000W	4080 BTU/hr 1200W
Dimensions (inch)	27.6H x 19.7W x 7.9D	27.6H x 19.7W x 7.9D	27.6H x 19.7W x 7.9D	27.6H x 19.7W x 7.9D	31.3H x 15.0W x 6.4D	31.3H x 15.0W x 6.4D	31.3H x 15.0W x 6.4D
Dimensions (mm)	700H x 500W x 200D	700H x 500W x 200D	700H x 500W x 200D	700H x 500W x 200D	796H x 383W x 163D	796H x 383W x 163D	796H x 383W x 163D
Rated Voltage	48VDC	48VDC	48VDC	48VDC	48VDC	48VDC	48VDC
Operating Current (A)	3.9	5.6	7.3	12.5	3.8	5.5	8.2
Noise (dB-A) @ 1.5M	62	62	62	62	52	52	52
Weight (lbs / Kg)	61.7 / 28.0	61.7 / 28.0	61.7 / 28.0	61.7 / 28.0	59.5 / 27.0	59.5 / 27.0	59.5 / 27.0

	230VAC		230VAC with Heater	
Model	HEC0500BFA	HEC0700BFA	HEC0500FFA	HEC0700FFA
Cooling Capacity	1870 BTU 550W	2380 BTU 700W	1870 BTU 550W	2380 BTU 700W
Dimensions (inch)	21.7H x 11.6W x 6.3D	21.7H x 11.6W x 6.3D	21.7H x 11.6W x 6.3D	21.7H x 11.6W x 6.3D
Dimensions (mm)	550H x 295W x 160D	550H x 295W x 160D	550H x 295W x 160D	550H x 295W x 160D
Rated Voltage	230VAC	230VAC	230VAC	230VAC
Operating Current (A)	1.3	1.4	1.3	1.4
Noise (dB-A) @ 1.5M	58	58	58	58
Weight (lbs / Kg)	35.3 / 16.0	35.3 / 16.0	35.3 / 16.0	35.3 / 16.0

Thermoelectric Coolers

Delta thermoelectric coolers provide slightly below ambient cooling in tight spaces. A TEC module is a sandwich of components (Peltier chip, heat sinks and fans) which provides cooling without the need for refrigerant or a compressor. All Delta TEC's incorporate Delta DC brushless fans engineered to run continuously for 80,000 hours, or nine years. Standard and custom designs are available.

- High quality Delta DC brushless fan component for reduced energy consumption and low noise
- Built-in controller
- Self-test function and LED alarms

	48VDC				24VDC	
Model	HET200PB	HET200PC	HET200PC-B	HET400PA	HET200VB	HET200VC
Cooling Capacity	200W	200W	200W	400W	200W	200W
Dimensions (inch)	7.1H x 15.7W x 8.2D	7.1H x 15.7W x 6.6D	7.1H x 15.7W x 5.6D	8.3H x 17.7W x 9.0D	7.1H x 15.7W x 8.2D	7.1H x 15.7W x 6.6D
Dimensions (mm)	180H x 400W x 208D	181H x 400W x 169D	181H x 400W x 143D	210H x 450W x 228D	180H x 400W x 208D	181H x 400W x 169D
Rated Voltage	48VDC	48VDC	48VDC	48VDC	24VDC	24VDC
Operating Current (A)	7.4	6.1	7.4	11.7	12.2	12.0
Noise (dB-A) @1.5M	58	58	62	62	58	58
Weight (lbs / Kg)	19.8 / 9.0	13.2 / 6.0	13.2 / 6.0	24.2 / 11.0	19.8 / 9.0	13.2 / 6.0

Heaters

Cabinet heaters provide protection for enclosed electronics and equipment in low temperature environments. Delta heaters have a Positive Temperature Coefficient (PTC) heating element for increased safety and reduced operating costs. PTC heaters generate only the heat necessary for a desired temperature, versus at a constant rate, saving energy while helping to prevent overheating and burnout. All Delta heaters feature Delta's high quality DC brushless fan component engineered to run continuously for a minimum of 80,000 hours, or nine years. Standard and custom designs are available.

- High quality Delta DC brushless fan component for reduced energy consumption and low noise
- PTC heating element for extended reliability
- 90-degree air flow and rack mount solutions to fit more spaces

	48VDC		230VAC				
Model	HEH100PA	HEH100PB	HEH030BA	HEH050BA	HEH070BA	HEH100BA	HEH150BA
Heating Capacity	1000W	1000W	300W	500W	700W	1000W	1500W
Dimensions (inch)	9.4W x 7.3W x 2.9D	1.7H x 19.0W x 7.0D	5.9H x 5.7W x 1.8D	5.9H x 5.7W x 1.8D	5.9H x 5.7W x 1.8D	9.2H x 7.3W x 2.3D	9.2H x 7.3W x 2.3D
Dimensions (mm)	240H x 185W x 57D	44H x 483W x 177D	150H x 145W x 45D	150H x 145W x 45D	150H x 145W x 45D	235H x 185W x 58D	235H x 185W x 58D
Rated Voltage	48VDC	48VDC	230VAC	230VAC	230VAC	230VAC	230VAC
Inrush Current (A)	32.0	28.0	5.0	7.0	9.5	10.0	15.0
Weight (lbs / Kg)	3.3 / 1.5	5.0 / 2.3	3.3 / 1.5	3.3 / 1.5	3.3/1.5	3.3 / 1.5	3.3 / 1.5

Product Value Proposition

Fan Technology	DC brushless fan component from world's #1 DC fan manufacturer = *Lower energy consumption, less vibration and noise, longer fan life.*
Low Noise	Up to 30% quieter than other market offerings = *Acceptable for use in more areas i.e. residential.*
Energy Saving	DC power input with variable speed fan = *Lower operating costs. Less cost of ownership. Higher ROI.*
Small Size	Same or better performance in smaller, slimmer package = *Frees up cabinet space for critical components. Better aesthetics.*
Smart Operation	Various communication and control options = *Predictive maintenance. Fewer truck rolls. Higher ROI.*
Service	Extensive authorized service network with available 24-hour response = *Less downtime. Time and labor expense savings.*
Availability	Standard product staged in the U.S. for immediate shipment = *Product when you need it to accommodate project schedules.*
Reliability	Expected service life is a minimum of 10 years = *Less downtime. Better network stability. Fewer truck rolls.*

Contact us about your next project. | cabinet-thermal-solutions@deltaww.com

	Asia-Pacific (China)	Americas	EMEA	Total
Sales Offices	96(52)	20	37	153
Plant Sites	32(22)	4	2	38
R&D Centers	42(23)	7	11	60

About Delta

Smarter. Greener. Together.

Delta's Mission

Our company mission is "To provide innovative, clean and energy efficient solutions for a better tomorrow" supported by a product portfolio that features a range of energy-saving solutions including fans and thermal management, electrical vehicle chargers, solar inverters, industrial automation products and LED display systems. Delta's operations are ISO-9001, ISO-14001, ISO-14064, OHSAS-18001 and TS-16949 certified.

The World's Leading Provider of DC Brushless Fans

Delta Group is the world's largest manufacturer of DC Brushless fans and a leading provider of switching power supplies – a $7.5 billion global company with 38 manufacturing facilities, 60 R&D labs and U.S. headquarters in Fremont, CA.

Dedicated to improving the environment

From 2010 to 2015, Delta's high efficiency products saved 6.4M tons of CO_2 for our customers. Among its many energy-saving products, Delta has developed the world's first server power supply to achieve 80 Plus Titanium energy efficiency, which is greater than 96% efficiency.

Delta will continue its dedication to developing technologies and solutions to help ensure a sustainable future.

When Precision is Paramount

Delta DC Brushless fans are used in applications where precision is paramount, including Information Technology, Telecommunications, Consumer Electronics, Industrial and Automotive industries..

Please visit our global website **www.deltaww.com** for a more comprehensive look at Delta operations, products and company profile.

Dealer Address:

Smarter. Greener. Together.

Learn more about Delta Cabinet Thermal Solutions at:
CoolYourCabinet.com

Delta Products Corporation
46101 Fremont Boulevard
Fremont, CA 94538

Request a Quote at:
cabinet-thermal-solutions@deltaww.com

Design and specifications subject to change without notice.

Rev. 01/2017

OCEAN CHIPS
Океан Электроники
Поставка электронных компонентов

Компания «Океан Электроники» предлагает заключение долгосрочных отношений при поставках импортных электронных компонентов на взаимовыгодных условиях!

Наши преимущества:

- Поставка оригинальных импортных электронных компонентов напрямую с производств Америки, Европы и Азии, а так же с крупнейших складов мира;
- Широкая линейка поставок активных и пассивных импортных электронных компонентов (более 30 млн. наименований);
- Поставка сложных, дефицитных, либо снятых с производства позиций;
- Оперативные сроки поставки под заказ (от 5 рабочих дней);
- Экспресс доставка в любую точку России;
- Помощь Конструкторского Отдела и консультации квалифицированных инженеров;
- Техническая поддержка проекта, помощь в подборе аналогов, поставка прототипов;
- Поставка электронных компонентов под контролем ВП;
- Система менеджмента качества сертифицирована по Международному стандарту ISO 9001;
- При необходимости вся продукция военного и аэрокосмического назначения проходит испытания и сертификацию в лаборатории (по согласованию с заказчиком);
- Поставка специализированных компонентов военного и аэрокосмического уровня качества (Xilinx, Altera, Analog Devices, Intersil, Interpoint, Microsemi, Actel, Aeroflex, Peregrine, VPT, Syfer, Eurofarad, Texas Instruments, MS Kennedy, Miteq, Cobham, E2V, MA-COM, Hittite, Mini-Circuits, General Dynamics и др.);

Компания «Океан Электроники» является официальным дистрибьютором и эксклюзивным представителем в России одного из крупнейших производителей разъемов военного и аэрокосмического назначения «**JONHON**», а так же официальным дистрибьютором и эксклюзивным представителем в России производителя высокотехнологичных и надежных решений для передачи СВЧ сигналов «**FORSTAR**».

AVIC JONHON

«JONHON» (основан в 1970 г.)

Разъемы специального, военного и аэрокосмического назначения:

(Применяются в военной, авиационной, аэрокосмической, морской, железнодорожной, горно- и нефтедобывающей отраслях промышленности)

«FORSTAR» (основан в 1998 г.)

ВЧ соединители, коаксиальные кабели, кабельные сборки и микроволновые компоненты:

(Применяются в телекоммуникациях гражданского и специального назначения, в средствах связи, РЛС, а так же военной, авиационной и аэрокосмической отраслях промышленности).

FORSTAR®

Телефон: 8 (812) 309-75-97 (многоканальный)
Факс: 8 (812) 320-03-32
Электронная почта: ocean@oceanchips.ru
Web: http://oceanchips.ru/
Адрес: 198099, г. Санкт-Петербург, ул. Калинина, д. 2, корп. 4, лит. А