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Mitsubishi Electric Asia **Corporate Brochure**

About Us

Established in 1977, Mitsubishi Electric Asia is a subsidiary of Mitsubishi Electric Corporation, a recognised world leader in manufacturing and sales of electric and electronic equipment and has been offering high-performance products and services to homes, businesses and industries in Asia Pacific.

At Mitsubishi Electric Asia, we live by our pledged commitment to change for the better with every move we make.

VISION

An as employer of choice, we will be the market leader and the preferred provider of innovative products and solutions in Asia.

MISSION

We exist to enhance quality of life of our customers and contribute to the well-being of our employees, society and environment.

CORE VALUES

Commitment

We bring the best benefits to our customers, employees, shareholders, society and environment for total satisfaction.

Ownership

We take initiative to deliver best efforts through personal responsibility and accountability.

Renewal

We achieve innovation by continuously transforming our heartset and mindset.

Ethics

We value good corporate governance and conduct ourselves with integrity and transparency.

The Three Principles

Our origins can be traced back to Yataro Iwasaki (1603-1867), the founder of the Mitsubishi Group, from which Mitsubishi Electric was born. His philosophy of justice and duty to society is summarised in a creed articulated by Koyata Iwasaki, the fourth president of the Mitsubishi organisation. The creed is called the sankōryō or "Three Principles," and evolved into the guiding principles we follow today. Mitsubishi Electric and other Mitsubishi companies share these three tenets of Iwasaki's management philosophy:

Corporate Responsibility to Society

Strive to enrich society, both materially and spiritually, while contributing towards the preservation of the global environment.

Integrity and Fairness

Maintain principles of transparency and openness, conducting business with integrity and fairness.

Global Understanding through Business

Expand business, based on an all-encompassing global perspective.

Guided by this common heritage, Mitsubishi Electric transforms these words into action, pursuing thoroughgoing compliance and a variety of philanthropic and environmental activities to enhance quality of life globally.



The Three Principles



Corporate Statement

"Changes for the Better", the corporate statement of the Mitsubishi Electric Group, represents our goal and attitude to always strive to achieve "something better", as we continue to change and grow. It is a statement that promises "to create an even better tomorrow" for our customers by the initiative of each and every one of our employees, who seeks to improve themselves by aiming for "the better" and daily aim to "improve technologies, services and creativity", as stated in our corporate philosophy.

Titsubishi lectric uality

Service Quality Vision

Simply meeting industry standards, however stringent, is not enough. Our aim is to exceed them and improve ourselves with every step taken. We call this drive – **Mitsubishi Electric Quality (MEQ)**.

MEQ is our way of defining new standards with everything we produce and the way we work. This drive for quality is a distinctive trait of Mitsubishi Electric, and it stands for delivering uncompromising excellence to our customers in everything we do.

This is why our high-quality home appliances, advanced industrial products, reliable public infrastructure systems and premier space technologies are known for providing customers with new levels of **comfort**, **efficiency and reliability**.

Our Service Commitment



To consistently provide good customer service is our pledge to all external and internal customers. By inculcating good service values, we boost the internal service culture among departments. This would in turn provide a happy, healthy and synergistic working environment and thus result in a positive customer service experience.

The MEQ Experience

Delivering Servicewith Pride and Care

We strive to deliver the Mitsubishi Electric Quality (MEQ) experience through our customer support, demonstrating our commitment to deliver quality and value to our customers. Our customer care and technical specialists are well-trained and equipped with the latest knowledge in their areas of expertise, providing customers with excellent care support.

At Mitsubishi Electric Asia, our Customer Care and Technical Centre for air conditioners, refrigerators and fans, provide customers with dependable servicing and prompt repair advice on our products.

Our ASEAN Factory Automation Engineering and Numerical Control Service Centres support our customers' businesses through a wide range of services including technical consultation, renewal of CNC controller system, repairs and after-sales technical support.



7

Milestones

1977 ◀

Establishment of Melco Sales Singapore Pte Ltd offering consumer and industrial products

1998

Change of company name to Mitsubishi Electric Asia Pte Ltd

2005

Corporate culture was reformed and we established our Vision, Mission and Core Values, and marked the beginning of our involvement in Corporate Social Responsibility activities

2007

- 30th Anniversary Celebration
- Establishment of Bangalore branch, India
- Establishment of wholly owned subsidiary, Melco Sales Malaysia Sdn. Bhd. (Renamed as Mitsubishi Electric Sales Malaysia Sdn. Bhd. in 2013)¹

2009

Awarded The Singapore HR Award 2009 – Leading HR Practices Award in Corporate Social Responsibility by Singapore Human Resource Institute

▶1995

Change of company name to Mitsubishi Electric Sales Singapore Pte Ltd

2003

Spin-off our semiconductor business (key revenue business) to Renesas Technology Corporation, established by Hitachi and Mitsubishi Electric Corporation

▶ 2006

Establishment of New Delhi branch, India

► 2008 Establishment of Gu

Establishment of Gurgaon branch, India

¹Company established by Mitsubishi Electric Asia and Mitsubishi Electric Corporation

MES BARTILLE

2010

Establishment of subsidiary, Mitsubishi Electric India Pvt. Ltd.¹

2012

Establishment of subsidiary, P.T. Mitsubishi Electric Indonesia¹

2014

- Establishment of representative branch office in Yangon, Myanmar
- Awarded the BCA Green Mark Platinum Award for Building by Building and Construction Authority

2016

- Awarded the bizSAFE Level 4 Certification, a national programme launched by the Workplace Safety & Health (WSH) Council
 - Awarded the Singapore Service Class Certification by SPRING Singapore

2019

Establishment of Business Solutions and Development
Division to offer consumers our comprehensive suite
of products and solutions

2021

Mitsubishi Electric Corporation marks its 100th year of operations and continue to develop innovative and high-performance technologies that will benefit the world

▶ 2011

Establishment of subsidiary, Mitsubishi Electric Vietnam Co., Ltd.¹

▶ 2013

Establishment of regional operating headquarter, Mitsubishi Electric Asia (Thailand) Co., Ltd.¹

▶ 2015

Commencement of sales function in Mitsubishi Electric Asia (Thailand) Co., Ltd.

▶2017

40th Anniversary Celebration

>2020

- Awarded the Singapore Quality Class with Service Certification by Enterprise Singapore
- In a time of COVID-19 pandemic, we stay resilient in overcoming the challenges faced by transforming our business operations to achieve sustainability



Creating a Better Environment for Everyone

From factories to homes, from trains to buildings, Mitsubishi Electric is revolutionising the world around us. Through our innovative technologies, we are contributing to our society to create a greener and better tomorrow.

Pg10 **HOME PRODUCTS**

- Electric Fans
- Refrigerators



Hand Dryer

Pg12 AIR CONDITIONING **SYSTEMS**

- Residential Air Conditioning
- Commercial Air Conditioning
- Chillers

Pg14 **VENTILATION SYSTEMS**

- Commercial and Industrial **Ventilation Systems**
- Residential Ventilation Systems



Pg27 ASIA PURCHASING CENTRE





Pg26 PUBLIC UTILITY SYSTEMS

Water Treatment Systems



Pg25

ADVANCED ELECTRONICS SYSTEMS

Competent Solutions for National Safety and Security



Pg24 SPACE SYSTEMS

- Satellite Systems
- Ground Systems



Pg22 **ENERGY SYSTEMS**

- Power Distribution and **Energy Monitoring System**
- Uninterruptible Power Supply (UPS)
- Micro-Grid and Photovoltaic **Power Solutions**



Pg21 **TRANSPORTATION SYSTEMS**

Rail Systems



Pg20 INDUSTRIAL AUTOMATION **MACHINERY**

- Computerised Numerical Controller (CNC)
- Processing Machines



- Instant Photo Printers
- Medical Printers



Pg16

VISUAL INFORMATION SYSTEMS

- Large-Scale LED Displays
- Display Wall Systems



SEMICONDUCTORS AND DEVICES

- Power Devices
- High-Frequency and Optical Devices



Pg18 INDUSTRIAL AUTOMATION SYSTEMS

- e-F@ctory
- Maisart
- e-F@ctory Alliance



The Art of Living

A sustainable future begins at home. Your eco-conscious lifestyle is made effortless as every Mitsubishi Electric product is designed to be energy-efficient and reliable while ensuring minimal carbon footprint.

Starting from the essentials of your home – the electric fan and refrigerator – we are committed in delivering comfort, quality and reliability to your everyday life.

Electric Fans Mitsubishi Electric fans are reliable, quiet, energy-efficient and incorporate premium safety standards. Engineered with pride, our fans are designed to suit virtually any interior. Refrigerators Designed and engineered in the pursuit of excellence, our refrigerators have been developed with superior food preservation technologies and tested with uncompromising precision. This results in a range of feature-driven refrigerators that are specially designed to keep food fresh as nature intended.

Folio Series Refrigerators

Mitsubishi Electric's Folio Series has a Versa Compartment equipped with our very own Supercool Freezing Technology, which ensures no ice crystals are formed when the food's temperature is lowered to below its freezing point, thereby preventing it from becoming solid and aids preservation of food freshness. With the Soft Freezing feature, you can now save cooking time and reduce food wastage by cutting through the soft freezed food and take only

Another of its unique function – the Vitamin Factory – makes use of LED sunlight to promote photosynthesis in the vegetables compartment, by acting on the chlorophyll in vegetables, keeping them greener and fresher.





Smarter Drying Begins with Jet Towels

Mitsubishi Electric developed the world's first dual-jet high-speed hand dryer in 1993, and the popularity has continued to grow ever since. Today, our range of Jet Towels can be found installed in offices, hotels, restaurants, shopping centres, schools and other public facilities across Singapore.



Hand Dryer

Mitsubishi Electric's Jet Towel is engineered to last, eco-friendly, economical and is hygiene-certified by NSF International (an independent third-party public safety health and standards organisation).

Over the years, Jet Towel's features have evolved to improve our user experience. This ranges from ultra-quiet operation (56dB), use of antibacterial plastics that curb the growth of bacteria certified by SIAA (Society of Industrial Technology for Antimicrobial Articles), to 0.1 second quick response for the Jet Towel to detect hands and begin dispensing air. With low running costs and easy maintenance, Mitsubishi Electric's Jet Towel is the hand drying solution for everyday use.

Jet Towel

Our Jet Towel features a high-efficiency brushless motor – a contact-free rotor that eliminates wear and tear – which offers strong gusts of air that dry hands in as fast as 3-4 seconds¹, while promising a motor life of over seven years of use*.

In addition, all parts that come in contact with water are anti-microbial treated for better sanitation.

¹JT-SB216JSH2 specifications *Based on in-house testing, 1,000 uses per day.









Jet Towel Mini Jet Towel Smart



Cooling Solutions for Every **Environment**

Mitsubishi Electric has led the way in air conditioning systems with the use of innovative technologies for over 60 years. As the world leader in residential, commercial and industrial air conditioning systems, we constantly pursue comfort, quality, high-performance and energy efficiency solutions with minimum impact on our environment.



Residential Air Conditioning

Designed for the comfort of your home. Mitsubishi Electric Starmex air conditioning system is capable of delivering better performance and greater operation efficiency, translating to energy savings for your household. It is also designed for easy cleaning without the need for special tools, taking away the hassle of difficult maintenance. In addition, the excellent energy-efficient Starmex is one of the quietest air conditioning systems in the market today.

Commercial Air Conditioning

For today's energy-conscious society, it is no longer sufficient to design an air conditioning system just to get a building interior cool and comfortable. Engineers have to address concerns such as energy efficiency to keep costs low, adaptability to cater to differing scenarios, and high reliability to ensure lasting comfort throughout a building's operation. To meet the multitude of modern demands, Mitsubishi Electric designed the City Multi, an air conditioning system that pushes the boundaries of variable refrigerant flow (VRF) technology while utilising *R410a refrigerant with zero ODP.

*R410a refrigerant is chlorine-free and non-flammable with zero Ozone Depletion Potential (ODP).

Starmex Series Air Conditioning

Mitsubishi Electric is the first in the industry to offer the widest range of 5 ticks Excellent Energy Efficient

Removal efficiency of particulates sizes ranging 0.3~2µm after operation for 200min using FN20 microparticle catching filter in 28m³ enclosed space with tidal circulation volume of 0.5/hr (in-house test).











Absolute Peace & Quiet



Inverter Control Technology

Our unique technology allows reduction in electricity consumption for more energy-efficient performance



Hassle Free Cleaning

Reachable Inner vent for easy clean

Chillers

Chiller systems have been used for decades to deliver controlled cooling and heating to buildings. Mitsubishi Electric designs, manufactures and provides the industries with highly efficient, reliable and economically viable chiller solutions via CLIMAVENETA brand, a European leader in central climate control systems for chillers and chilling equipment with over 49 years of experience. Our extensive portfolio delivers the most complete range of advanced solutions, providing enhanced usability, advanced remote control system, energy efficiency and environmental sustainability to modern buildings.

Modular Water Cooled Oil Free Centrifugal Chiller

TECS-W/L-M Series Modular Water Cooled Oil Free Centrifugal Chiller was specifically designed to target on energy efficiency reconstruction applications. With the advantage of its compact and modular design, it is most demanded in replacement of old and low efficient units, in particular, for applications with limited transportation and installation space.







Healthier Air Quality with Lasting Comfort

Responding to the demand for excellent indoor air quality in the modern built environment, Mitsubishi Electric never stops innovating and perfecting our ventilation products to offer energy-efficient ventilation solutions that minimise air pollutants and maximise the standards of health and comfort level. Our original motors are low-noise operation yet powerful in airflow – a feature realised through the design that optimises aerodynamic characteristics.



Commercial and Industrial Ventilation Systems

A hygienic, clean and comfortable environment at your premises is made easy with Mitsubishi Electric's wide range of ventilation products, from air curtain, air conducting fan, high pressure fan to commercial ceiling fan. Our ventilation solutions can help generate airflow, minimise air pollutants, remove air stagnation to reducing air temperature variation throughout large spaces, regardless the climate conditions outdoors.

Residential Ventilation Systems

Prevent moisture development and improve your home's hygiene with Mitsubishi Electric's innovative new 5-blade "Extra Winglet Fan" - adapting the same concept as the aircraft's wing, which controls the direction of airflow and reduces the air vortex which causes noise. It is energy-efficient, easy to clean and incorporates Dual Barrier Coating to prevent dust accumulation, promising prolonged product lifespan.

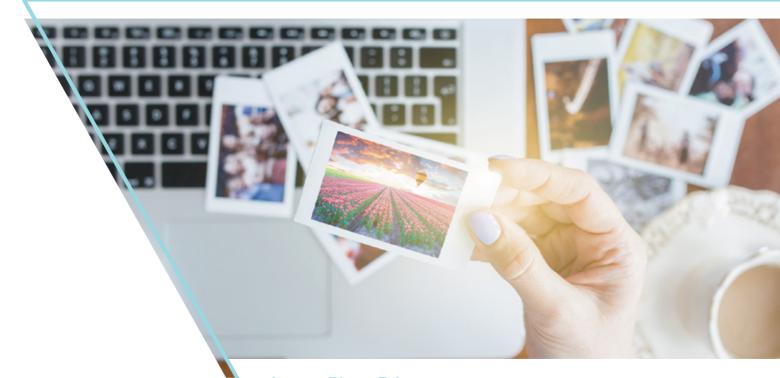


Mitsubishi Electric Air Curtains are equipped with quiet propeller fans that deliver high volume airflow while minimising energy consumption. In addition, the original twin-nozzle design divides the output airflow into two parts before combining them into a straight flow, hence generating a more powerful blow. This allows air to be carried for a longer distance and optimises its operating ability even in large spaces.



High Speed, **High Quality**

Combining the utmost in image quality along with ultra-high speed, large volume printing and low-maintenance, Mitsubishi Electric ensures high fidelity when printing delicate detailed images. One applaudable feature has got to be our proprietary print-head control engine and image processing algorithms that bring imagery to life, on print.



Instant Photo Printers

Powered by the dye sublimation technology, our series of high capacity photo printers are your solution in delivering high definition photographs with amazing photo finish and colour durability in just a few seconds. Advanced features include the ribbon patch rewind function, wireless printing options, dust-resistant design and a more compact design for easy integration into photo booths. Media reloads are also made faster and simpler so that you never have to miss a moment.

Medical Printers

Our industrial printers feature colour and monochrome medical printers that combine high resolution, high-speed printing and jam-free reliability to meet the rigorous demands of today's medical and scientific applications. The outstanding detail and image clarity make them suitable for microscopy and scientific research prints, as well as medical applications such as ultrasound, endoscopy, fluoroscopy, and nuclear medicine.

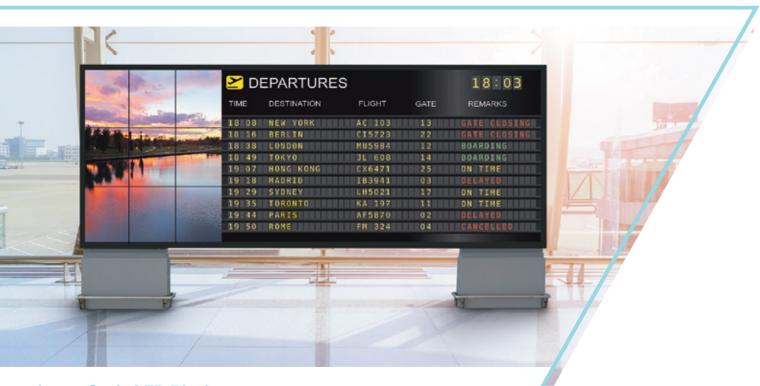
Digital Color Dye Sublimation Technology

With Mitsubishi Electric's digital color dye sublimation technology, be assured that you will be able to achieve the highest quality prints with excellent colour reproduction, almost identical to those developed in a professional photo lab. The dye sublimation technology dries prints instantly and protects them from discolouration with its water-resistant advanced finishing.



The Ultimate Visual Experience

In today's information-driven society, Mitsubishi Electric advances communication through its cutting-edge visual information technology, and at the same time, delivers cost savings throughout the product life cycle with innovative features and higher energy efficiency – setting the new benchmark in brilliance and reliability.



Large-Scale LED Displays

Mitsubishi Electric leads the way in visual communications as the world's first* outdoor large-scale display system developer. The notable creation – Diamond VisionTM – features a wide viewing angle and the Real BlackTM LED technology is capable of bringing you the most spectacular viewing experience even under extreme environments and weather conditions.

*IEEE Milestone Award presented by the Institute of Electrical and Electronics Engineers (IEEE).

Display Wall Systems

Mitsubishi Electric delivers true performance, clarity and accuracy with our lineup of indoor LCD Display Walls. It features full high-definition LED-backlit panels with high brightness and contrast and an ultra-thin 0.44mm bezel¹ which allows smooth integration of images into multi-screen applications to create a near seamless uninterrupted information display. Combined with space-saving design, system flexibility and multiple performance enhancing features, it is tailored to suit diversified applications from digital billboards to mission critical command and control centres.

¹Model LM55P4(W)

Narrow Pixel Pitch Direct View LED (NPP-LED)

Mitsubishi Electric's NPP-LED display walls offer a seamless wide-angle view and excellent visual performance, specifically engineered for every command and control room environment that requires 24/7 continuous operations. Designed and made in Japan, its key features include anti-burn-in for static image display, smooth curve layout option and the active power peak saving function that optimises image brightness to reduce operational cost.



Performance Matters

Along with superior reliability and efficiency, the semiconductors and devices we produce at Mitsubishi Electric are helping to bring about innovations in emerging markets such as Artificial Intelligence, Internet of Things and 5G network.



Power Devices

From household appliances such as air conditioners and washing machines to the automotive industry, railway traction systems and industrial robots, Mitsubishi Electric has been developing energy-efficient power modules which can support all the equipment mentioned, and at the same time, reduce carbon emissions and fuel consumption, changing the way energy is used.

High-Frequency and Optical Devices

High-frequency devices are equipped with wireless communications devices, for satellite communications and radio communications systems, while optical devices are embedded in optical fiber communications devices. Mitsubishi Electric helps to establish information and communications networks, bridging continents, cities and households.



This series of Mitsubishi Electric's Large DIPIPM+TM transfer-mold intelligent power modules allow loading-converter circuits to realise simpler and more compact designs for use in air conditioners and industrial applications. One of the modules, PSS100NE1CT, achieved the world's first* high-density output of 100A/1200V in its transfer-mold package, making it suitable for 56kW class package air conditioners.

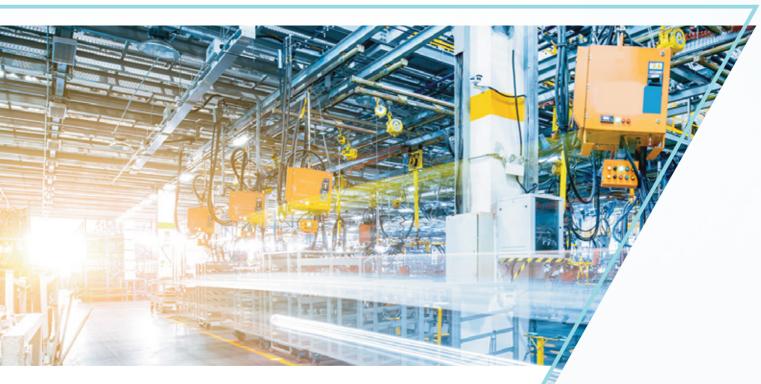
according to Mitsubishi Electric research as of 7 May 2019

Mitsubishi Electric Diode InfraRed Sensor (MelDIR)

MelDIR is a thermal sensor for applications in the fields of security, people counting, thermal scanning, patient monitoring and smart buildings. Newly launched in 2019, MelDIR accurately distinguishes between humans and other heat sources and enables the identification of specific human behavior, such as walking, running or raising hands. These are achieved with its high-pixel, high-thermal-resolution images, using the thermal diode infrared sensor technology that Mitsubishi Electric developed.

Automation Solutions for the Future

As a leading global manufacturer and supplier of industrial automation products and solutions, Mitsubishi Electric has a mission to help customers achieve their digital manufacturing aspirations - bringing higher productivity and quality to the factory floor.



The Comprehensive Solution for Smart Factories

From controllers, drive products, graphic operation terminals to industrial robots. Mitsubishi Electric has earned the respect of manufacturers around the world for our operational technology. With the introduction of Industrial Internet of Things (IIoT) and Industry 4.0, a trend towards automation and data exchange in manufacturing technologies and processes, the industrial world has came to a major turning point. Mitsubishi Electric's forethought launched the e-F@ctory in 2003, and has since, gone beyond the barriers of companies and standards to connect both technologies of factory automation and IT to achieve total cost reduction for development, production and maintenance. Together with our extensive service networks around the globe, we are ready to support our customers in achieving their digital manufacturing ambition.



Realising a Smart Factory with Open Integrated Network

CC-Link IE TSN is the first to combine gigabit Ethernet bandwidth with Time Sensitive Networking (TSN). It has increased openness while further strengthening performance and functionality. CC-Link IE TSN realises high performance, high function control communication by using time-sharing method. Real time communication by time-sharing and next-generation industrial network technology allows large volume and high-speed communication in sites where different networks can coexist on a single cable.

Integrating CC-Link IE TSN with Mitsubishi Electric's e-F@ctory solutions accelerates the realisation of a smart factory solution, which reduces total cost while improving operations, production yield, and efficient management of the supply chain. Furthermore, Mitsubishi Electric has introduced a variety of factory automation products compatible with CC-Link IE TSN technology, which enable robust integration of all factory devices in a single network.





The Compact AI with Infinite Possibilities

Digitalising the plants with distributed and supervisory control systems allows companies to improve visualisation for operators. However, most of the decision-making is still based on the operator's experience, intuition and judgment, which is arduous to gauge and fine-tune. Furthermore, the growing focus on sustainable manufacturing now requires businesses to respond to social, economic and environmental concerns in a holistic manner. Mitsubishi Electric addresses these challenges and introduced "Maisart", an abbreviation for "Mitsubishi Electric's AI creates the State-of-the-ART in technology" - a brand name for our proprietary Artificial Intelligence (AI) technology. It emphasises compact deep-learning algorithms, instrumental knowledge for efficient reinforcement learning and efficient time-series big data analysis. Along with edge computing, we help businesses overcome environmental hurdles, make products smarter and everyday life more intuitive, convenient, and secure.



Your Global Partner, Local Friend

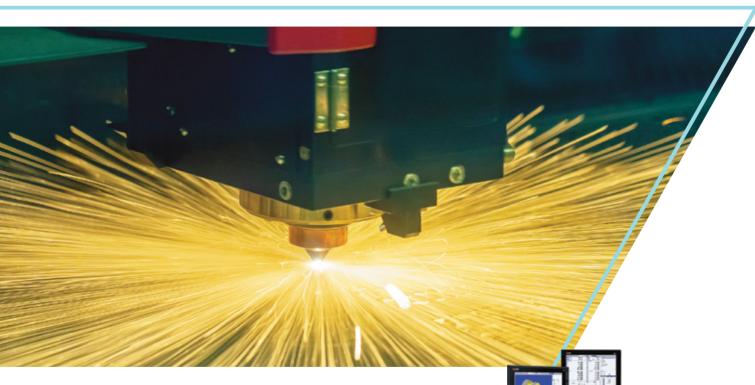
The e-F@ctory Alliance programme leverages Mitsubishi Electric's e-F@ctory advanced technologies and the expertise of Alliance Partners to help companies develop and automate impactful, large-scale production. Our growing collaboration with over 800 partners* across all manufacturing fields delivers optimal solution in modern cloud computing, machine learning, Artificial Intelligence, big data analytics, and self-optimising industrial equipment and facilities. This added value enables seamless flow of information throughout the plant and benefits customers with enhanced productivity and simultaneously reduces maintenance and operating costs.



*As of April 2020

Delivering Speed and Precision

Globally and across multiple industries, factories are benefiting from Mitsubishi Electric's extensive lineup of processing systems with next-generation technology that does the job with incredible precision and mission-critical reliability.



Computerised Numerical Controller (CNC)

Mitsubishi Electric's CNC empowers the manufacturing industry with unlimited possibilities with the capability to create innovative value. Our CNC-dedicated CPU delivers high productivity, usability and flexibility, which enables operators to implement ever more complex machining in an easy and efficient manner.

Processing Machines

Mitsubishi Electric's advanced machines and technologies play key roles in manufacturing the most demanding instruments, including high precision engineering tools such as medical equipment, semiconductors, electronic devices, household electrical appliances, aerospace engine components and sheet metal working equipment. The optimal cutting speed, extreme machining accuracy and user-friendly systems, do the job with incredible reliability – delivering uncompromised performance.

GX-F Series Fiber Laser

Powered with our in-house designed oscillator, Mitsubishi Electric's GX-F Series Fiber Laser adapts to high peak pulse conditions and optimally controls the beam and focus position. It can pierce through a 25mm mild steel at 0.8 second*, which significantly improves the productivity for thick plates. In addition, our proprietary Advance Gas Reduction (AGR-eco) controls gas flow to reduce nitrogen gas consumption by up to 90%1.

*For 8kW oscillator ¹Compared to our CO₂ laser

SV-P Series Electrical Discharge Machining

The SV-P Series incorporates Mitsubishi Electric's Al technology (Maisart*) and D-CUBES control unit to achieve high accuracy and high productivity. The capability of Maisart emphasises compact deep-learning algorithms and instrumental knowledge for efficient reinforcement learning and efficient time-series big data analysis. By leveraging the power of edge computing, we make the manufacturing process smarter and everyday life more intuitive, convenient, and secure.

*Maisart stands for "Mitsubishi Electric's AI creates the State-of-the-ART in technology

We Bring You Places

Mitsubishi Electric plays an important role in tomorrow's world of mobility. Combining its comprehensive strengths with advanced technologies, our transportation solutions provide you with safety, security, comfort and ecology.



Rail Systems

Since the 1950s, Mitsubishi Electric has been developing and manufacturing reliable, safe, comfortable railway transport through innovative solutions such as state-of-the-art products and systems, first-class maintenance and service networks. Our wide range of rolling stock systems consists of: Propulsion System, Brake System, Mobile Mapping System, Passenger Information System, Railway Car Fan Linedelier, Train Control Monitoring System and Auxiliary Power Supply System.

With a sustainable society at heart, we set the mission to optimise energy use via high-level environmental performing technologies, such as low-energy consumption rolling stock, effective utilisation of regenerated electric power and levelling of power loads. Today, Mitsubishi Electric railway products and services are being introduced to railway systems in numerous countries around the world.

Connecting the City with Robust Rail Solutions

Sustainable social infrastructure is essential in Singapore's nation growth, increasingly dense urban environment and growing population. The Thomson-East Coast Line (Contract T251), a completely automated and driverless Mass Rapid Transit (MRT) rail project in Singapore, aims to improve the city's connectivity and ease congestion. Slated for completion in 2024, it is expected to serve approximately half a million commuters a day.

The modernised transport system will be employed with 364 train cars and equipped with Mitsubishi Electric's leading-edge railway systems:

- Propulsion system using SiC power module
- Train control and monitoring system (TCM)
- Passenger information system
- Auxiliary power syste



Mitsubishi Electric's energy systems contribute to the stable and efficient flow of energy supplies across the globe, powering the growth of industries, businesses and homes. From power generation, transmission to delivery of electricity, Mitsubishi Electric is innovating the power infrastructure with eco-conscious, energy-saving solutions, everywhere we do business.

Power Distribution and Energy Monitoring Systems

Mitsubishi Electric plays an active role in the management of power distribution across buildings, factories, public utility, residential and marine industries. Our wide and comprehensive range of low to medium voltage breakers, contactors, together with energy monitoring solution, creates the future in the electrical industry, by providing reliable, safe and quality products which adhere to international standards, as well as being a key player in providing e-F@ctory comprehensive solutions, marching to the beat of industry 4.0's energy monitoring and saving segment.



Uninterruptible Power Supply (UPS) for Data Centre

Uninterrupted uptime is the key to implement highly reliable and cost effective IT infrastructure. Mitsubishi Electric's Uninterruptible Power Supply (UPS) systems support data centres, providing businesses with an 'Always On' assurance. Our UPS features Mitsubishi Electric's world-renowned Insulated Gate Bipolar Transistor (IGBT) and 3-level topology circuit, which realises high efficiency at low load and reduces energy cost. The high-performance, resilient multi-module system supports up to eight units and takes up less space (up to 27% smaller than industry's offerings).



Uninterruptible Power Supply (UPS)

In today's 24/7 on-demand world, any downtime is intolerable, as mission-critical business systems will be greatly affected. As a top manufacturer and supplier of UPS in Japan since 1964, Mitsubishi Electric has been addressing the importance of a stable and continuous power supply, which garnered us a reputation for high reliability and value. Going forward, Mitsubishi Electric intends to contribute to electricity infrastructure worldwide through further improvements in product performance, reliability and maintenance.

Micro-Grid and Photovoltaic Power Solutions

Mitsubishi Electric provides sustainable and energy efficient micro-grid solutions for infrastructures and utilities as well as photovoltaic power solutions for buildings and large-scale solar farms, lightening the load of fossil fuel produced electrical power. With its control capability, the micro-grid can be isolated from the larger network, with little to no disturbance, thus provides a higher reliable power source. By tapping into the energy platform technology, our key goal is to contribute to a low-carbon environment and help remote communities produce their own source of electrical supply.



ENERGY SYSTEMS

Supporting You from Space

Discover the beauty of the universe, protecting our homes from natural disasters and communicating with ease and speed – Mitsubishi Electric is leveraging its comprehensive space systems solutions, in creating technological advances for tomorrow's challenges.

Satellite Systems

Since the 1960s, Mitsubishi Electric has been recognised as a leading contributor to hundreds of space projects worldwide. It leads us with distinct advantage when it comes to designing, building, launching and controlling satellites, because we also specialise in delivering solar panel, antenna, amplification, tracking, control and ground station system technologies that make satellites practical to own and operate.

Ground Systems

Mitsubishi Electric holds the key global presence in the domain of ground systems, providing ground control stations for satellites and rockets tracking, as well as optical and radio telescopes for astronomical observation.

New DS2000 Satellite

Committed to deliver exceptional quality and reliability backed by the decades of successful mission life, Mitsubishi Electric introduced the New DS2000 satellite in 2019. It offers an increased power output from 18kW to 25kW, an all-electric propulsion system, customisable mission subsystems and an enhanced communication beam system. The upgraded features aim to support the ever-changing market demands, giving more power, speed, coverage and capacity for 4K/Ultra HD (UHD) data transmission, at a lower cost and shorter delivery time.

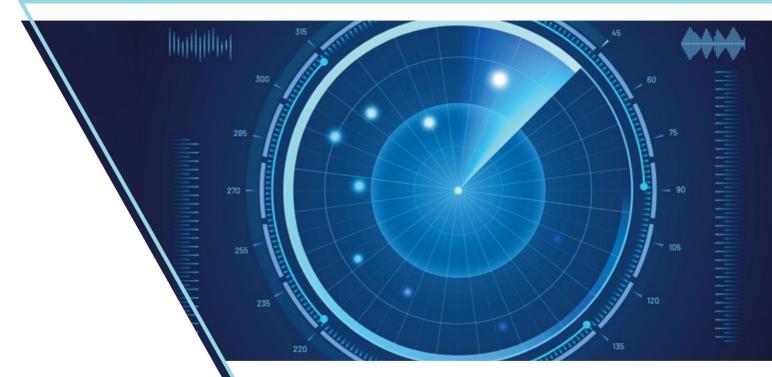
Quasi-Zenith Satellite System (QZSS)

Mitsubishi Electric delivers highly accurate positioning solutions with the Quasi-Zenith Satellite System (QZSS), even in areas where GPS signals are obstructed by skyscrapers and mountainous terrain. With the plan to expand QZSS to a seven-satellite constellation by 2023, it aims to provide highly precise 3D geographic information, with margin of error as low as 10-centimeters*, in the Asian Region.

*When combined with Mitsubishi Electric's positioning receivers and Mobile Mapping System (MMS)

Contributing to National Security

Leveraging the comprehensive expertise and track record of developing and manufacturing advanced electronics, Mitsubishi Electric further broadens its business fields with technologies and solutions which contribute to each country's national security.



Competent Solutions for National Safety and Security

National security and crisis preparedness are matters of priority. Mitsubishi Electric contributes to risk prevention and mitigation solutions with robust real-time surveillance and countermeasure technologies. Our array of advanced electronics includes Drone Deterrence System, Helicopter Satellite Communications System, Shipboard Monitoring System, Doppler Lidar System, and a wide range of TR Modules and SSPA Components.

Drone Deterrence System

Mitsubishi Electric's Drone Deterrence System utilises radio wave technology to effectively detect and jam commercial drones from up to 3km away. Its compact design and one-touch instant jamming function makes it extremely portable, easy to operate and is capable under all weather and lightning conditions.

Helicopter Satellite Communications System (HSA)

The Helicopter Satellite Communications System, developed and manufactured by Mitsubishi Electric, enables direct satellite data link from helicopters for transmission of aerial images in real-time and bypassing the need for ground relay stations. This significantly enhances crisis response and coordination activities for disaster relief. The system promises quick and stable data transmission of up to 10Mbps, without interruption caused by challenging terrains such as mountains or buildings.



Water for Life

For more than 50 years, Mitsubishi Electric has been making clean and safe to drink water, utilising its ozone treatment technology, bringing health and environmental benefits to the society.



Water Treatment Systems

Mitsubishi Electric produces ozone generation water treatment systems of various capacities for industrial applications and municipal government use, from purifying water for homes and businesses, to treating used water and returning it to water courses. To provide a more efficient water system, we also offer technologies ranging from sensors to communication and information processing systems. They function to monitor water volume and quality and aid the integration and control of water treatment facilities.

Ozone Generator

Mitsubishi Electric tapped on the strong oxidising properties of ozone (O_3) to effectively fight bacteria and viruses, reduce concentrations of iron, manganese, and sulphur, and eliminate unpleasant tastes and odours in the water purification process. As ozone is made of oxygen and reverts to pure oxygen, it vanishes without a trace after use and leaves no burden on the environment. This makes the water produced safer and better tasting than water from conventional methods, which utilises chlorine or other treatments. The new ozone generators also feature improved ozone generating capacity per electrode, reduced power consumption and a compact size ozone generator cell.



Asia Purchasing Centre



Our Sustainability Efforts

Mitsubishi Electric Asia places our responsibilities as good corporate citizen at the core of our corporate management where we strive to create economic and social value through integrating the concept of sustainable development goals (SDGs) into our management strategy.

We reinforce corporate ethics and compliance through enhancing training, promote company-wide awareness of SDGs and strengthening internal control. Active measures are continuously taken to improve areas of quality management, environmental preservation, philanthropy and communication with stakeholders.

Through these initiatives, we will contribute to realising a vibrant and sustainable society through all of our activities.

Environmental Sustainability Vision 2050

Under our Environmental Vision 2021, Mitsubishi Electric has been carrying out initiatives to realise a low-carbon, recycling-based society that functions in harmony with nature, reflecting Mitsubishi Electric's resolution to operate as a responsible, eco-minded corporate citizen.

Looking ahead to April 2021 and well beyond, the company's new Environmental Sustainability Vision 2050 pledges to "Protect the air, land and water with our hearts and technologies to sustain a better future for all."

This vision towards 2050 positions environmental protection as an even greater corporate priority and our future course for implementing key initiatives will also be based on the following Three Environmental Action Guidelines:

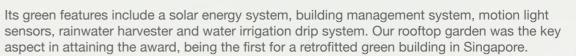


- To apply diverse technologies in wide-ranging business areas to resolve environmental issues
- To develop business innovations for future generations
- Preserve biodiversity through publicity and sharing of new values and lifestyles



BCA Green Mark Building

We obtained the BCA Green Mark Platinum Award in 2014, a significant achievement for an existing (old) building that was not originally designed for environmental performance.









Respect Nature and Preserve Biodiversity

Respecting biodiversity is our way of living. We educate and encourage employees to make green choices in their everyday lives, through environmental awareness initiatives such as the Reuse, Reduce and Recycle programmes, beach clean-up, nature excursions, and leadership training to promote nature observation and conservation.

Edible Garden

Self-sustainability is a type of sustainable living in which nothing is consumed other than what is produced by the self-sufficient individuals. Our home-grown gardening enthusiasts encouraged rooftop gardening amongst fellow colleagues to grow edible plants and fruits for self-sustainability.



Our Compass for a Better Tomorrow

Caring Hands & Loving Hearts

Mitsubishi Electric Asia regards its corporate social responsibility (CSR) initiatives as the foundation of our corporate management. We are committed to creating a fair and equitable society, where our actions will make positive, beneficial and even influential impact on others.

Education

We recognise the importance of shaping the future of our next generation, to support them as tomorrow's leaders. Mitsubishi Electric Asia fulfils that through partnerships with various educational institutions to enhance their learning facilities, provide internship opportunities, sponsors scholarships and collaborations that help develop the younger generation holistically.



Pathway School.

Memorandum of Understanding between Mitsubishi Electric Asia, Peace Myanmar Electric Holding and SMVTI Vocational Training Institute (SMVTI) to cooperate in enhancing the training of SMVTI's Facility Technology (Air-conditioning).



Philanthropy

We believe that giving goes beyond financial aid. Mitsubishi Electric Asia undertakes community-based volunteering activities and works closely with non-profit organisations, envisioning a society where "no one will be left behind".



Chinese New Year celebration and prawn fishing with elderly from APEX Day Rehabilitation Centre (ADRC).



32

Our People

We aim to inspire and bring our people to greater heights.



People are our greatest asset; they are the driver to our success. We believe every individual possesses unique strengths that will spark big ideas when brought together.

Our people are encouraged to pursue continuous self-development and take ownership of their growth on a personal and professional level. Our leaders will lead by example and inspire our people with best practices to help them achieve business goals as a team. Through the growth journey, outstanding individuals and teams who support and exemplify Mitsubishi Electric Asia's values and service quality values, will be recognised for their contributions.

We regard our people as part of our family. Therefore, an inclusive, safe and healthy work environment is constantly emphasised. A variety of benefits are also offered to help our people stay healthy in order to manage both work and family needs.

We see passion in our people, and together, we will continue to create endless values for our stakeholders - enhancing the quality of life for our society.

Healthy Lifestyle

We hold various health and wellness activities all year round, such as badminton, K-pop dance, yoga, health talks, health screening and more.





Safe & Healthy Workplace

We are bizSAFE certified, operating our business adhering to the Workplace Safety and Health legislation. In addition, we have a Company Emergency Response Team (CERT), comprising of trained employees who will help to mitigate and control any emergency situation during the initial stage prior to SCDF's arrival.

Social & Recreational

We engage our workforce through activities such as festive celebrations, company trips, bazaars, movie days, bowling competitions and more.

We believe that infusing fun into the workplace helps employees foster camaraderie, creativity and cohesion amongst colleagues, and at the same time, builds a positive and vibrant work culture.





Staff Recognition

Deserving employees are applauded for their contributions during the annual President's Award, Long Service Award and Japan HQ Award.

Training & Team Building

Employees are empowered to identify their own learning needs, to hone the necessary skills and knowledge. Occasional team building sessions are also organised to strengthen team synergy, productivity and performance at work.



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