

# FULL CIRCUIT

SRI LANKA ELECTRICAL AND ELECTRONIC EXPORTS NEWSLETTER  
FIRST EDITION | MARCH 2022



**EDB**  
SRI LANKA  
EXPORT DEVELOPMENT BOARD

## COVID-19 AND THE GLOBAL ELECTRICAL AND ELECTRONIC TRADE

PAGE 13

## POST-PANDEMIC WAY FORWARD FOR SRI LANKA

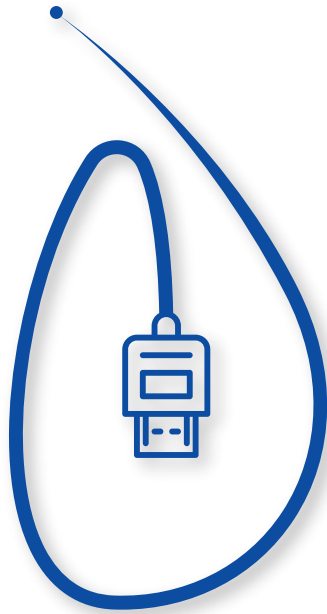
PAGE 16



**SLEE**

SRI LANKA  
ELECTRICAL AND ELECTRONICS

*Power to the World*



# **SLEE**

**SRI LANKA  
ELECTRICAL AND ELECTRONICS**

---

*Power to the World*

**SURELY THE BEST IS  
MADE IN SRI LANKA**

## THE E-FACTOR

### Sri Lankan **E**lectrical & **E**lectronic **E**xports, an **E**mergent player in **E**nriching **E**conomic growth

Sri Lanka has, over the past decade, envisioned export-led economic growth. As a country we are now in an era that such a drive is critical, relevant, and paramount for economic recovery and progress. A few key sectors were earmarked and identified within The National Exports Strategy framework to be the impetuses in these exports-led economic growth plans. Amongst them, the Electrical and Electronic sector is recognized as a sector that has unparalleled potential to make a significant impact.

As an export sector, the Electrical and Electronic industry has slowly but gradually shown a steady growth over the past years and is now beginning to show greater might and prospects for the future. The knowledge base and skilled middle-tier tech workforce it possesses, enhances the industry's innovation and disruption capability. Sri Lanka's reputation in serving global market niches exhibiting exemplary delivery records and service flexibility, and its incomparable geographical setting, only strengthens its unique capability to present a 'design to delivery' value proposition to the world.

The Covid-19 pandemic showed no mercy to any industry around the world. It had its own impact on the Electrical and Electronic sector in Sri Lanka too. Yet the general sentiment within the industry of the post-pandemic 'positives outweighing the negatives', promises a much brighter and rapid progression within the sector. Especially so, in a new-normal where technology will

play a greater role in human existence in every sphere of activity, thus presenting a hitherto unfound export market potential.

Sri Lanka Export Development Board, is the country's apex body in export promotion. In our endeavour to Enable, Enrich and Empower the local exporters, and to Engage and Enlighten the global buyers of what Sri Lanka has to offer, with this inaugural issue we are happy to launch the 'Full Circuit' quarterly eNews letter, presenting an insightful publication that reflects upon the Electrical and Electronic sector. Our inaugural edition is focused on the challenges and opportunities the global pandemic has thrown upon the industry, the most timely and relevant topic to discuss.

Contrasting the pre-pandemic export performances of Sri Lanka's Electrical and Electronic exports against the post-pandemic export growth potential, is a dream that cannot be any bigger or better. Humbled by the universal acknowledgment of its 'Quality and Genuity', there is absolutely no doubt that the Electrical and Electronic sector in Sri Lanka is fast gearing up, expanding, gathering momentum, and enhancing capacity and capability to capture the post pandemic export opportunities, and will become a significant contributor towards our country's economic development and progression.

**FULL CIRCUIT, will Endow that Endeavour.**

# THE FUTURE LOOKS PROMISING FOR THE SRI LANKAN EXPORTER



**Mr. Suresh De Mel**

**Chairman of the Sri Lanka Export Development Board**  
elaborates on his optimism for the future of our  
Electrical and Electronics Export Industry.

Having had to struggle to survive the crushing impact of the global pandemic, much of the economic attitude is full of doom and gloom. Yet with his visionary forethought, Mr. Suresh De Mel doesn't believe that this will be the case for Sri Lanka's Electrical and Electronics Export Industry.

**Q.** As the Chairman of Sri Lanka's apex body that is leading the charge in an export-led economic growth drive for the country, what are your thoughts on the impact of the Covid-19 pandemic on global trade in general?

**A.** With the rapid spread of the Covid-19 pandemic, there was tremendous uncertainty globally. These were unprecedented circumstances that affected not only trade but the very existence of humanity. To make matters worse, by the time the pandemic arrived, the world was already dealing with a trade shift due to the conflict between China and USA and other countries. This resulted in a lack of containers, lack of ships and various other issues which were detrimental to world trade. This naturally affected Sri Lanka but we were not alone in feeling the impact, almost every other country felt the pressure too.

On the brighter side, due to such circumstances in the last two years, the world was forced to rapidly adapt and adopt cloud-based operations. As a result, the development of technology related to such operations has progressed tremendously. In fact, Microsoft estimates that the progress has advanced us forward by almost ten years. Organisations were forced to rely on virtual technology for interacting, whether internally for meetings and discussions, or externally for events such as trade fairs and business conferences. The virtual platforms used to conduct these virtual operations have been upgraded to a great degree to improve their user-friendliness and efficiency, thus giving rise to a rapid advancement. These aspects of technology have become an integral part of global trade and the evolution of that technology has become a launch pad for future trade advancement.

**Q.** Do the negatives of the economic impact outweigh the positives?

**A.** I strongly believe the positives outweigh the negatives when it comes to global trade. The pandemic forced us into action to make a positive adjustment. It made us rethink established practices and work towards better value chain integration, efficiency in product development, advanced planning and preparedness as well as contingency planning.

Although we are a relatively small player in the global market, we felt all the exterior pressures that came with the pandemic. Yet, I believe the export industry did much better than expected, as evidenced by an increase in all exports. In particular, the USA economy is booming, and is a large market for us. We proved that we can perform well in a crisis. The pandemic forced us out of hibernation and complacency and allowed our latent potential to shine. I believe we have always had the potential, unfortunately it took a crisis to prove ourselves, and this year we performed better than before.

**Q.** When the international news reported threats of an imminent pandemic in early 2020, what were the preparatory steps that the Export Development Board (EDB) identified in order to support the local export industries to face potential challenges?

**A.** This was an unexpected situation, no one anticipated the speed, duration and extent of the impact, therefore it was difficult to be prepared. For a while we had to take a one day at a time approach. With the first lockdown, factories were forced to close indefinitely and the support of EDB had to be sought for them

to resume operations safely, for example prioritising vaccinations and granting of curfew passes. We even increased our Help Desk services from only one to fourteen, so that we were easily accessible to give guidance. The EDB also worked with our network of diplomatic missions and embassies around the world to provide Sri Lankan businesses and brands with the latest information on the fast-changing global markets during the COVID-19 pandemic.

When supply chain issues arose, webinars were organised to engage dialogue with exporters, ports authority, terminal workers, logistics, shippers and others involved. These discussions helped the exporters realise that these were global issues and not just a localised issue that could easily be resolved internally. Technology helped get all the stakeholders together to have a Q&A discussion and helped ease the confusion, fears and frustrations. It helped stakeholders understand and appreciate the actual situation. This awareness wouldn't have happened if it wasn't for the virtual working patterns that arose as a result of the pandemic. Organising such an event so quickly and efficiently on a physical platform would have been difficult even if there was no pandemic. It helped improve cooperation between stakeholders and exporters to work for their common interest.

Like many organisations that are used to a process of paperwork, the state agencies had to quickly adapt and digitise their work extensively in order to serve the public. Overall, digitalisation and online services have improved efficiency. Since exporters now have the option of accessing state agencies on virtual platforms, there is greater efficiency, time management and record keeping.

**Q.** The challenges, constraints, and financial hardships this pandemic threw at all businesses was unprecedented. In your view, amongst all the export-oriented industries in Sri Lanka, which were the most affected industries? And why?

**A.** We found that rather than by sector, it was the scale of business that determined the impact. The most affected was probably all small and medium enterprises. These industries depend on a consistent cycle of business. When their factories shut down, they were unable to fulfil their orders, this was compounded by curfews which resulted in transportation and other supply chain problems. Be it electrical and electronics manufacturers, textile factories, or agriculture processing plants, the small and medium scale businesses were most affected as the unprecedented hardships tendered the usual modes of conducting business unviable.

Challenges were also faced when import restrictions were put in place, which affected many industries especially the ones in the Electrical and Electronics sector.

In this respect, the government assistance in terms of loan moratoriums and low interest loans helped many struggling businesses.





**Q.** Narrowing down onto the focus sector of today's interview, how did the pandemic impact the Sri Lankan Electrical and Electronic Industry?

**A.** Let us start with the negative impacts. The list seems endless, including difficulties in the import of raw materials, freight rates, shipping, travel restrictions, and infection outbreaks; all of which contributed to factories being forced to shut down. Thankfully with vaccinations the problem of infection spread has subsided and stabilised.

In the case of the Electrical and Electronic industry, they were also affected by the import restrictions, as well as foreign exchange issues related to the import of raw materials.

**Q.** What was the buyers' response to the pandemic, did they have confidence in us?

**A.** Sri Lanka has a reputation for being a reliable manufacturer in the global market. The over-dependence on China for global electrical needs resulted in a trade shift and new sourcing of suppliers. This opened up interest in Sri Lanka's potential for component manufacturing. Sri Lanka was exposed to new markets as buyers started looking to diversify their supply chain. In fact, the South Asian region is booming in that respect. Sri Lanka should take advantage of this growing interest and demand and expand more in this area.

**Q.** What were the EDB's immediate relief measures, facilitating measures, and other responses to support the Electronic and Electrical exporters specifically, when the country went into a total lock down in late March 2020?

**A.** Initially the industry was impacted by the import restrictions, especially on raw materials. The EDB were able to intervene and negotiate with the Finance Ministry. We were able to get clearance so that items were released from the temporary suspension list because it affected many electrical component manufacturers. The EDB was also able to intervene swiftly and arrange for travel permits and curfew passes which made it possible for the factories to operate despite the lockdown. The EDB also took steps to migrate many of our services onto virtual platforms, thereby enabling the exporters as well as buyers to conduct their businesses with minimum hindrances despite the pandemic. Webinars were also conducted to educate the export community on steps that can be taken to mitigate the situation and on the way forward for us as an industry.

**Q.** Looking forward to the light at the end of the dark Pandemic tunnel, of all the export-oriented industries in the country, which sector responded swiftly, and in which sectors do you reckon would gain the most from the post-covid new normal?

**A.** Sri Lanka's major merchandise exporter is the apparel industry. They were able to readjust themselves and come back to speed. In fact, they captured the growing demand for Personal Protection Equipment (PPE) and masks and were able to enter new markets. We have also seen tremendous 47% growth in total volume increase by the rubber sector due to the increased demand for gloves and safety equipment. The coconut sector has also grown quite significantly by 41%, perhaps due to the growing interest in its health benefits. With the surging need for digitisation, the ICT sector grew by 33%. Further our spice trade became a new area that made a significant mark. The Electrical and Electronic sector was recorded as the 5th most grown sector between the years 2019 to 2021. In relation to the Electronic and Electrical sector, they seem to be provided with better prospects than before. This is due to them being one of the focused sectors of our National Export Strategy, which we as a country, have been developing for many years.

**Q.** Why do you think these sectors are at an advantage over the others?

**A.** There are several reasons for this, these sectors have been able to benefit from Sri Lanka's many advantages, they include; emergence of a new breed of innovative and ambitious entrepreneurs, shorter lead times, high value low volume markets, quality talent, location advantage, excellent language competencies, quality infrastructure and technology, as well as reputation for high quality and timely delivery. In addition, support from China and other trade relations, especially free-trade agreements have been beneficial to us. In fact, we have seen significant growth in the free-trade agreement markets, with a 34% growth in the last year.

**Q.** You mentioned the Electrical and Electronic sector as one that will benefit with greater export opportunities in terms of product offerings and the market demand. Can you please explain a few of those unique opportunities that have surfaced for the Sri Lankan Exporters of Electrical and Electronic products and services?

**A.** One of the greatest opportunities of the pandemic, especially for developing countries like Sri Lanka, was that it relatively levelled the playing field. All countries, whether developed, developing or underdeveloped were at a standstill economically and socially due to the forced lockdowns.



Consumers and importers alike were forced to procure their needs through digital platforms. This gave them the impetus to browse and source their requirements with the touch of a button. This in turn gave rise to the awareness that the marketplace available to them was actually vast and global. They realised that they no longer had to rely on traditional sources. This gives Sri Lanka the chance to gain a competitive advantage by differentiating themselves with the quality of our products and services. It gives us the opportunity to showcase ourselves to new and unanticipated markets and not just stick to our established markets.

The pandemic gave us better exposure to the global market. The EDB is working with foreign diplomatic missions and trade agencies in order to gain more visibility since the Electronic and Electrical sector is in our National Export Strategy. We are also promoting our vibrant ICT sector which can synergise with the Electronic and Electrical sector, especially in the area of product development.

**Q.** 2021 has been a record-breaking year for the Electrical and Electronic sector in terms of export earnings, beating the previous best and recording US\$422 million. Does this indicate the emergence of an export sector in Sri Lanka that will be an impetus in the country's export-led growth plans?

**A.** Yes, without a doubt. This is a stable and attractive sector, which gives it a competitive advantage over other manufacturers. In any manufacturing sector the main challenge is the labour force. I believe this sector is able to pay competitive salaries. As better salaries are paid, it will also help with the talent retention in Sri Lanka.

**Q.** There is an ambitious export earnings target from the Electrical and Electronic sector of US\$1 billion by 2025, do you think it is possible? And what is the EDB's road map towards that goal?

**A.** It is achievable. Especially when we study the growth of our sectors over the recent years and our performance as an industry, despite a global pandemic, this does not seem impossible.

The EDB has already done a lot and has much more planned towards getting there. One of the steps we have taken towards strategically working towards achieving this goal is to understand the talent. We have worked to understand the labour pool, especially in identifying skills gaps as well as training and development requirements. Following this study, vocational training activities have been designed and are being implemented to bridge the identified gaps. This is the baseline for the way forward, so the sector can differentiate themselves and build customer loyalty by providing quality products and services.

**Q.** Please share your final thoughts that you would like to share with the Sri Lankan exporters of Electrical and Electronic products and services, and your message to overseas buyers and potential investors in this sector.

**A.** Exporters need to gain insight and exposure to the changing global demands and trends. The EDB can help create more opportunities for organisations to have b2b meetings in this regard. In addition, attention should also be given to promoting research and development so that we can be ahead of the curve in creating innovative products.

Exporters also need to attract investments, including foreign direct investment to make a commitment to come to Sri Lanka and develop these industries. In order to create awareness for investors to see Sri Lanka's potential and make a commitment to investment, we should actively participate and lobby for international trade fairs.

To importers, I say, we invite and welcome you to engage with us and see the immense potential for mutual growth that Sri Lanka has to offer.

#### INTERVIEWEE DETAILS

Suresh de Mel  
Chairman  
Sri Lanka Export Development Board

“

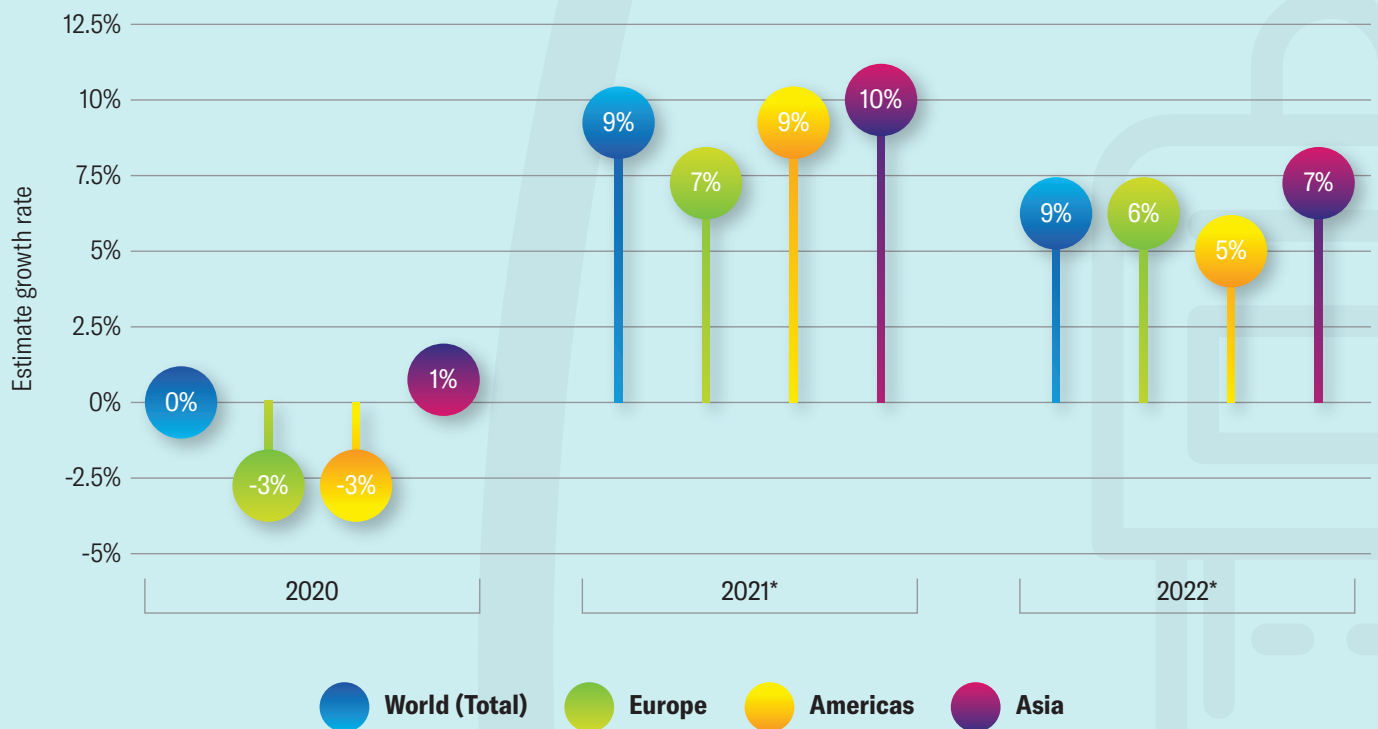
**I strongly believe the positives outweigh the negatives when it comes to global trade. The pandemic forced us into action to make a positive adjustment.**

”



# A STORY IN STATS

## ESTIMATED GROWTH RATES FOR THE GLOBAL ELECTRONICS INDUSTRY FROM 2020 TO 2022, BY REGION

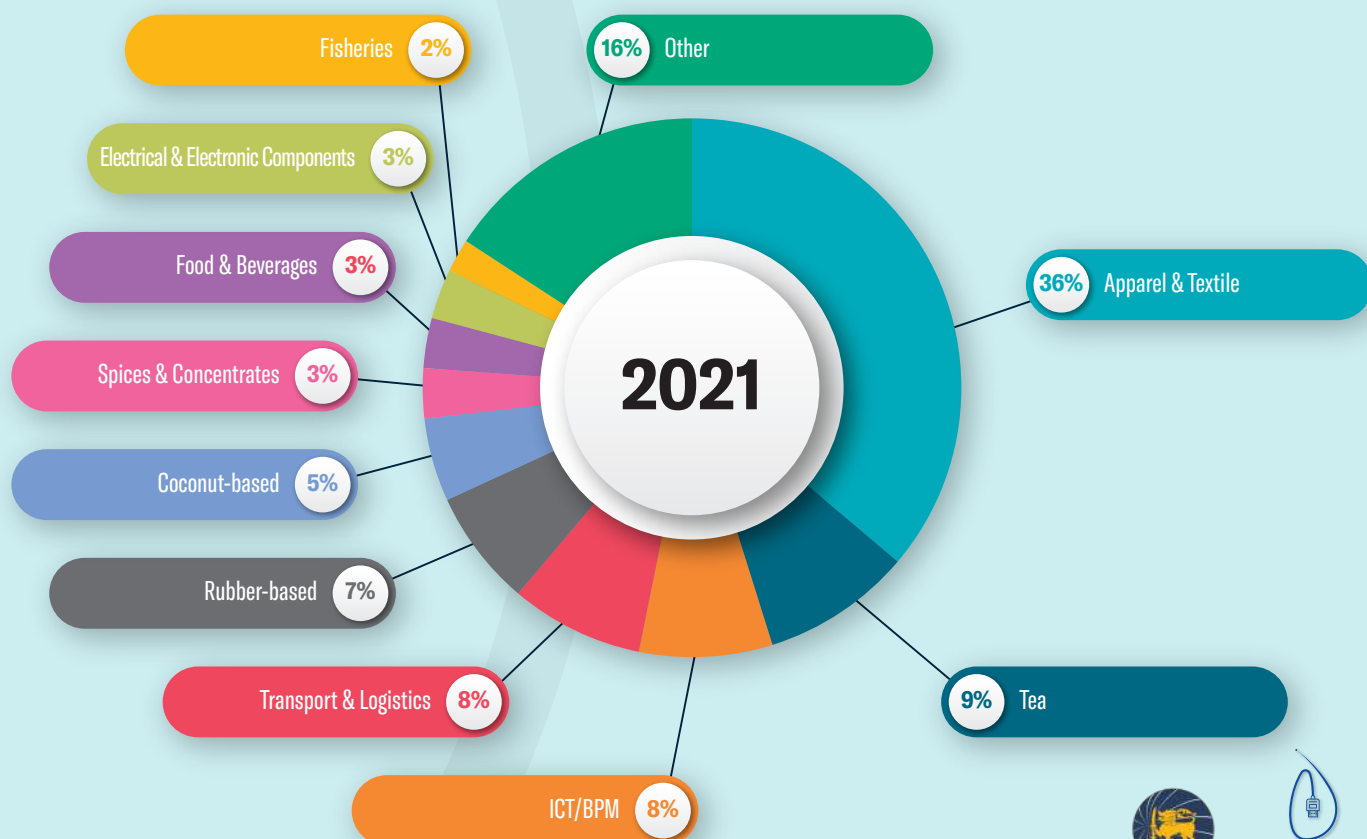
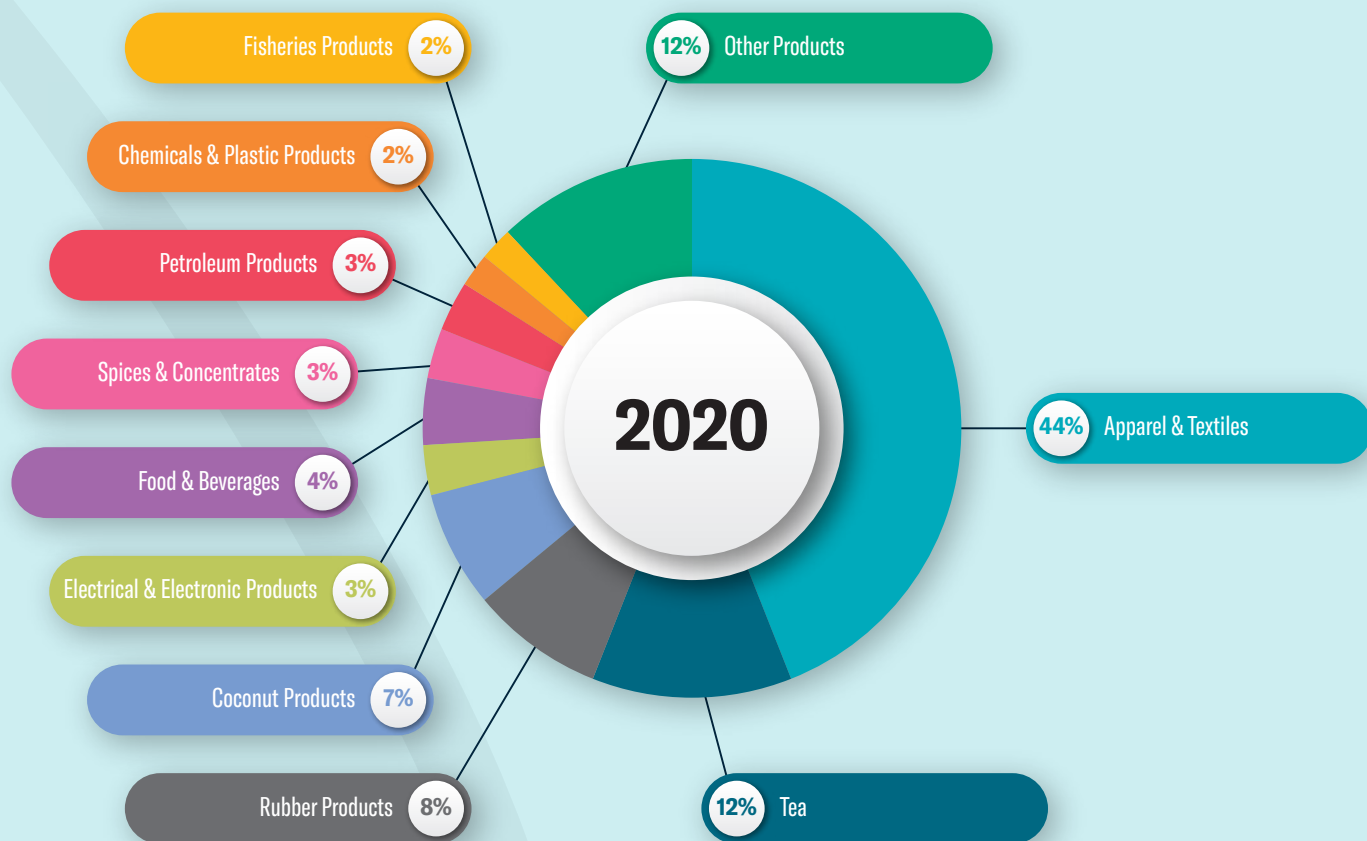


Additional Information **Worldwide, 2020**

Source **ZVEI © Statista 2021**



# SRI LANKA EXPORT STATISTICS 2020 AND 2021

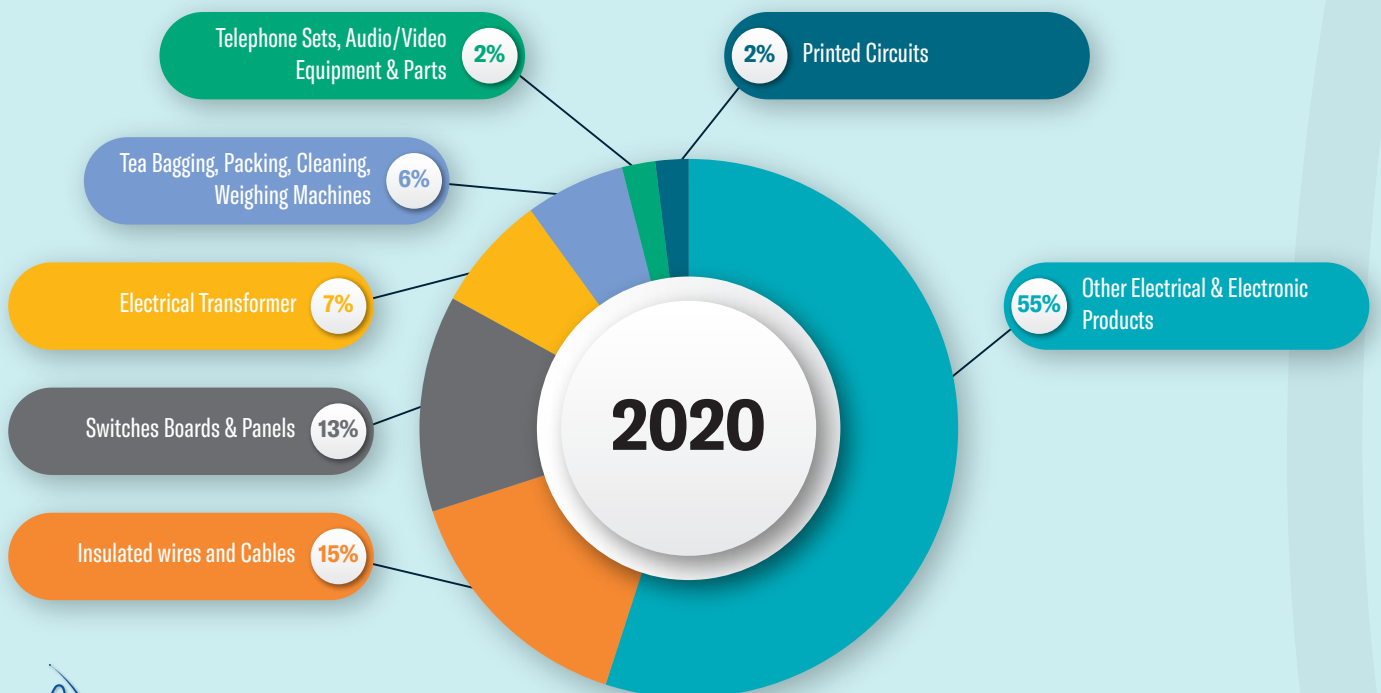
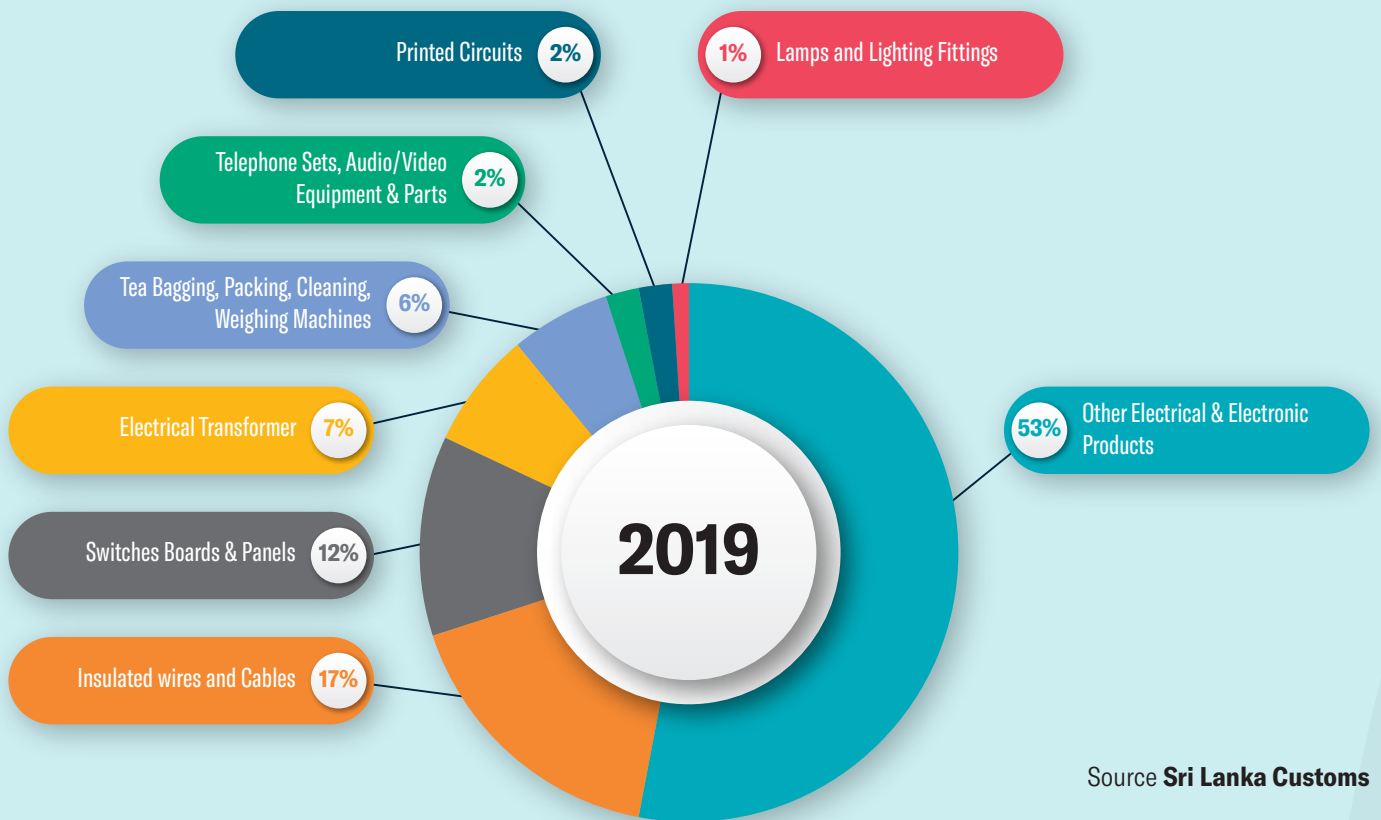


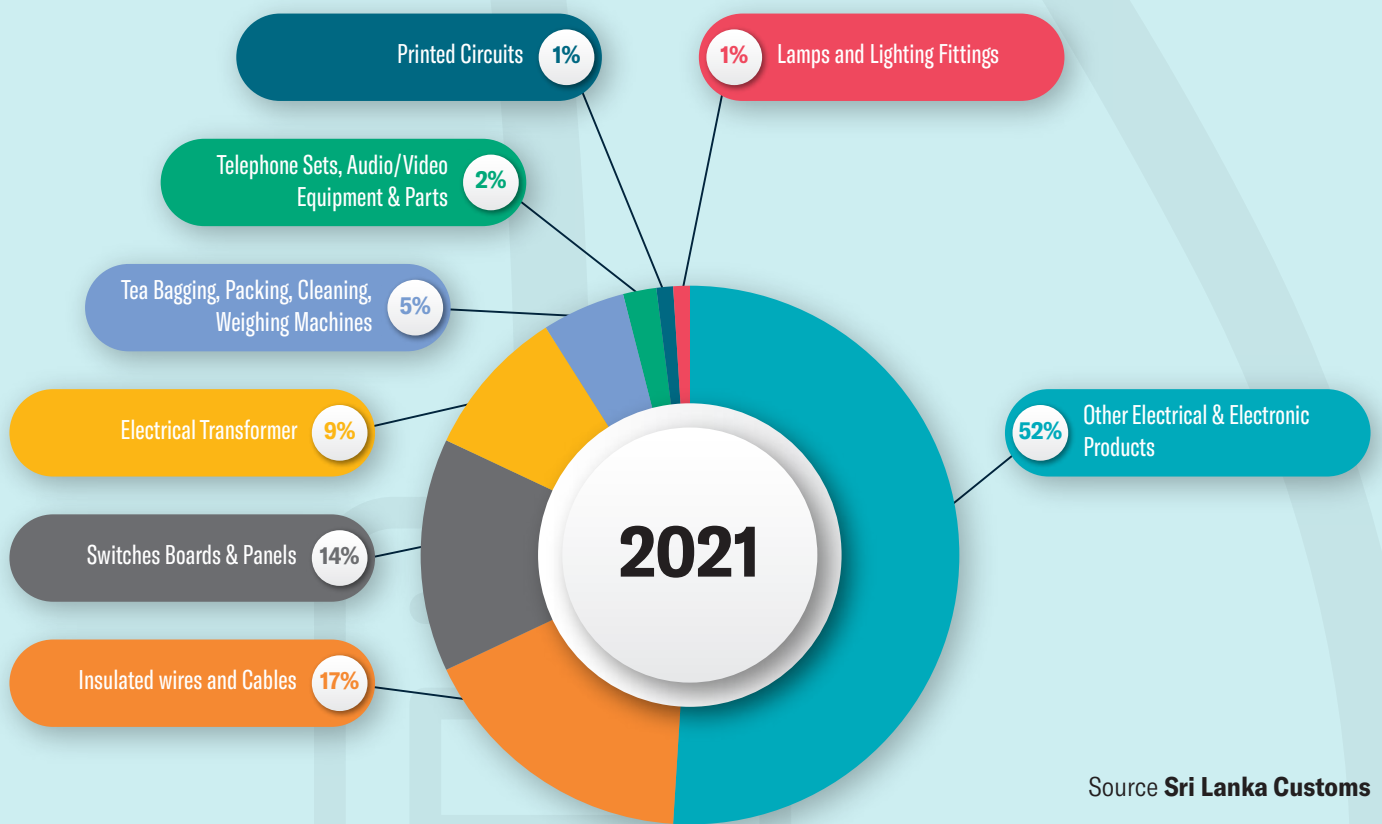
Services Exports available up to September 2021 @ the CBSL  
 Services Exports for October - December 2021 are estimated based on the revised forecast  
 Source **Sri Lanka Customs, CBSL, EDB**



SURELY THE BEST IS MADE IN SRI LANKA

# COMPOSITION OF ELECTRICAL AND ELECTRONICS SECTOR SUBSECTORS IN THE YEARS 2019, 2020, 2021





Source **Sri Lanka Customs**

# MAKING A MARK IN A GLOBAL INDUSTRY DURING A RAGING PANDEMIC

IN CONVERSATION WITH **DR. AJITH PASQUAL** PRESIDENT SLEEMEA





## Dr. Ajith Pasqual

### President SLEEMEA

The Electrical and Electronic sector has much potential to grow to be one of the most lucrative export industries for the Sri Lankan economy. I believe that the last two years are testament to the resilience, innovation, determination, and the business prowess of the stakeholders of this industry. While the pandemic presented us with a range of challenges of unprecedented scale, it also provided exporters and manufacturers in export destinations like Sri Lanka with a set of unique opportunities to strengthen and grow their business.

When the world transitioned into remote working, the sale of electrical and electronic items increased worldwide. However, despite the increase in demand, the industry also experienced a myriad of disruptions including in the supply chain. A single electronic device will contain components manufactured by different companies around the world. When the pandemic hit, the manufacturing processes around the globe were disrupted due to various reasons, and despite the availability of stocks, by 2020 the supply chains were severely disrupted. The output from China was reduced because of the pandemic as well as disruptions in energy supply.

Equipment required for EE manufacturing was in short supply. The industry was at a point where EE component manufacturers had to request buyers to reserve stock very well in advance. However, the global EE industry going into limbo and the manufacturing giants struggling to mitigate the situation presented countries like ours an opportunity to step up.

The demand in the electrical and electronics sector increased in the last two years. Remote healthcare that has always been on the rise grew significantly during the last two years and with that the demand for electronics and components related to it. As a result of the pandemic there was an exponential growth in consumer electronics, especially laptops and computers. With that, the demand for ICs increased. The purchase of ICs for consumer electronics has outweighed the other sectors. While consumer electronics are the present, autonomous vehicles represent the future. The automobile industry, especially in the case of autonomous vehicles has also created a high demand for ICs.

One of the objectives outlined in the National Export Strategy was for Sri Lanka to get into the supply chain and become a model manufacturer, creating a continued opportunity at business and a permanent place for Sri Lanka in the process. SL already possesses a robust eco system for component manufacturing, a sector that all industries including medical, communication and automobile rely on.



Speaking about the Sri Lankan context, the manufacturers, especially those involved in EMS were heavily impacted by the pandemic. In this industry, if a manufacturer fails to supply on time the buyer will procure from elsewhere. Therefore, for those who supply to the global markets, failing to deliver on time or missing an order can be extremely critical. While being faced with the same challenges as the other manufacturers around the globe, Sri Lanka

experienced further restrictions as the country went into lockdown from March to May in 2020 and this resulted in major companies struggling to continue their operations. The businesses were at a risk of losing key customers than losing orders, which going by this year's export figures are quite low. The 2021 export performance of the EE sector indicates a 422 million USD figure. By August 2019, the figure was at 241 million USD. Despite all the challenges we faced, the year-on-year growth is very high. Unlike other countries, the Sri Lankan EMS and subassembly manufacturers had been importing to a limited number of buyers with whom the manufacturers had developed and maintained long-term relationships with. This certainly helped in retaining business. This is also one of the reasons for the higher demand that we experienced towards the end.

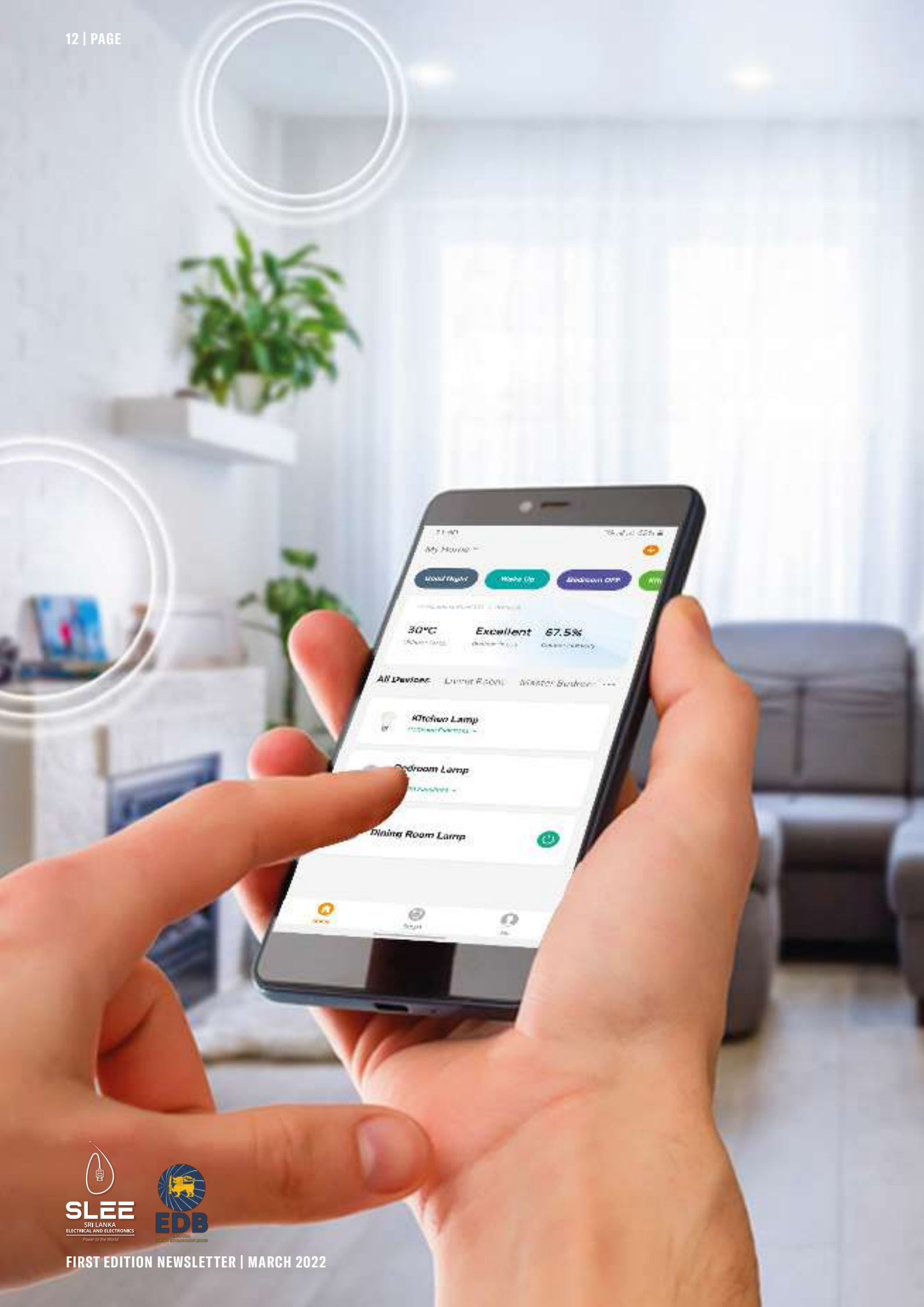
As a country, Sri Lanka certainly experienced setbacks in the last two years. We did not possess the procedures to work in a situation like a potential pandemic. When the country shut down, EDB worked hard to support businesses resume their operations and with their intervention many were able to. However, the lack of coordination among different state agencies and the procedural delays slowed the process which could have been much smoother.

There is less appreciation for what the industry does for the country, on the part of the state and the bureaucracy. Industries are the live wire of our economy. Only very few people understand the importance of our industries and over the years, this attitude has trickled down from people in authority to the officials.

Going by the recent stats, the 1 billion USD export objective seems highly possible. However, we need to acknowledge that certain expansions that were planned were halted or delayed due to the lag in approval processes and lack of coordination among state sector organisations. Therefore, if we are to reach the 1 billion USD figure, it is important that we prioritise establishing a "a single window" and streamline the communication process between the industry and state agencies.







# COVID-19 AND THE GLOBAL ELECTRICAL AND ELECTRONIC TRADE

AN OVERVIEW OF THE IMPACT OF THE  
PANDEMIC ON THE GLOBAL ELECTRICAL  
& ELECTRONICS INDUSTRY



## GONE DIGITAL

The pandemic has caused a global increase in the purchasing of electronic products, mainly to accommodate the requirements of working from home and secondly to fulfil a subconscious need to stay firmly connected with the world during the lockdowns. A report published by McKinsey & Company reveals that 'We have covered a "decade in days" when it comes to adoption of digital'. According to the same report the most evolved areas include, telemedicine, online delivery of education, remote working, ecommerce and online entertainment which has fast tracked by years, which also indicated a leap in the use, purchase and the development of technology and the devices.

Although the increase in electronic purchases may suggest that the electrical & electronic industry has thrived during these hard times - the truth is that it has been a very challenging time for many of the companies in the sector. The logistical nightmare presented by travel restrictions, and worker shortages due to lockdowns turned meeting demand with supply nearly impossible.

The prolonged shut down of retail outlets, malls and supermarkets where the end



consumers purchase their electronics resulted in a drop of sales for major brands, especially dealing in equipment that are not viable or available for online purchase.

Apple Inc., Canon Inc., GoPro Inc., Hitachi Ltd., Huawei Technologies Co. Ltd., LG Electronics Inc., Nikon Corp., Panasonic Corp., Samsung Electronics Co., Ltd., Toshiba Corp., and several others have been

listed by a report published by [www.researchandmarkets.com](http://www.researchandmarkets.com) as some of the major brands that were affected by the pandemic. Among the many measures taken by these global brands to minimise the adverse effects since then, include the delayed launch of the iPhone9 and production suspension at Hyundai and Nissan South Korean plant due to the delay of the electronics parts.

## CHINA AND THE DELAYED SUPPLY CHAIN

The pandemic has disrupted the supply chains of nearly all global industries. The electrical and electronics industry has been unable to escape this. China, being the largest supplier of electrical & electronic components in the world and the epi-centre of the virus, the Asian manufacturing giant took the brunt of the effects of the pandemic. Many factories were shut down and the unavailability of workers put the global supply chain in a constant state of delay. Which in turn left the US and European companies unable to assemble and produce their finished goods. This also put manufacturers like India into jeopardy where the manufacturer, being heavily

dependent on Chinese supplies failed to source the necessary components on time. It has been reported that the knowledge of the failing of the Chinese supply chain being temporary in nature, discouraged importers to shift procurement to other countries. Wuhan, where the virus originated is a key manufacturing city in China, and China is the world's biggest supplier of electrical and electronic components. The shutting down of factories and shortages in the workforce has left the nation unable to meet supply demands promptly, effectively delaying the processes of companies in the US and Europe to assemble their finished goods.

Industry giants Apple had to delay the launch of their iPhone 9 in 2020. 90% of Apple's products are manufactured in China, and they aren't the only tech-giant in this predicament. It was predicted that the

consumer electronics industry in particular (due to its heavy reliance on the supply chain) would suffer the heaviest casualties of the pandemic - the impact has however been less than first assumed. The rolling out of 5G has been delayed - mainly due to interruptions in manufacturing and the reduced demand delaying the production of affordable 5G capable smartphones. This is not to say that all was grim for the industry or all sectors. The production disruptions experienced by larger manufacturers such as China also present smaller manufacturers like Sri Lanka with the opportunity of expanding their electrical and electronics exports industry. And when taking 2020 and 2021 they have done just that. With a record-breaking revenue of \$422 million last year the island nation is already making plans to sustain this growth and build the industry into a billion-dollar one by 2025.

## A PERSONAL CRISIS

The separation and isolation caused by the pandemic have had a heavy impact on the psychology of people around the world. In a sense it has united people in our common humanity and in a way shown us how vulnerable we are – teaching us the importance of family, friends and relationships; many things we had taken for granted. Thus, furthering the need for being 'connected' at all times. The lockdowns and constant fear and uncertainty caused by the pandemic have resulted in an unprecedented surge of mental illness. Many people have turned to binge buying as a result. Electronics and smart devices are the most bought. The tech requirements for working from home have increased spending on

electronic products as well. This has resulted in an increase of first time buyers along with a situation of procuring multiple devices for a single household / unit.

The EE requirements of the medical industry has also risen exponentially and this has been especially beneficial for countries such as Vietnam, who have been supplying this market for years. Based on a report published by Fitch Solutions, "the global vaccine rollout and stronger external demand for important export industries" has enabled the consumer electronics industry in Vietnam.

## A BLESSING IN DISGUISE OR AN OPPORTUNITY IN VAIN?

Sri Lanka has been able to stand as an anomaly compared to the rest of the world as the country's electrical and electronic industry has recorded an all-time high in exports since the pandemic. This success can be attributed to the country's promise of being a 'design to delivery destination' with a minimum reliance on a supply chain outside Sri Lanka.

The industry leaders of the country are eager to back their skilled workforce, extremely fast delivery timelines and high-quality products to ensure that Sri Lanka's success in the industry can be sustained post the pandemic.

Certain sectors of the EE industry related to ICT such as consumer electronics, aviation and automotive, experienced serious

employee layoffs. Despite this, the sectors have also experienced higher demand for certain components such as semiconductors and communication systems and data related devices. It is predicted that the pandemic has enabled the evolution of certain technologies by great lengths and it is likely to accelerate technologies such as AI and robotics and there by progression of Industry 4.0. Manufacturers, employees and other personnel involved in the healthcare, logistics, education, communication and business related EE sectors, both globally and locally have been experiencing a significant increase in service and product demand.

Janaka Wijesiri in his report 'COVID-19 and Impact on Export Sector in Sri Lanka'

published in the 'Crisis and Fragility: Economic Impact of COVID-19 and Policy Responses' by Korea Institute of International Economic Policy, writes 'Developments like Colombo Port City, the export processing zone near Hambantota in the South, and the proposed dedicated textile industrial park in Eravur in the East of Sri Lanka provide further opportunities to pitch Sri Lanka as an ideal location for relocation of major manufacturing facilities from China. To take advantage of these supply shifts, Sri Lanka will have to articulate industry specific strategies, identify areas to improve in the country for investor consideration, and sell Sri Lanka as a destination to specific companies seeking to diversify their supply chains (Deloitte, 2020).

### SOURCES

Janmenjoy N., Manohar M., Bighnaraj N., Hanumanthu S., Korhan C., Vimal S. (2021). An impact study of COVID-19 on six different

industries: Automobile, energy and power, agriculture, education, travel and tourism and consumer electronics: Wiley Public Health Emergency Collection. 2021 John Wiley & Sons, Ltd. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC8014102/>

Impact of COVID-19 on the Global Electronics Industry. (2020) ResearchAndMarkets.com <https://www.businesswire.com/news/home/20200416005400/en/Impact-of-COVID-19-on-the-Global-Electronics-Industry-2020---ResearchAndMarkets.com>

O'Flaherty B. (2021) Post-pandemic effects on the electronics industry: Electronic Specifier. <https://www.electronicspecifier.com/news/post-pandemic-effects-on-the-electronics-industry>

Wijesiri, J. (2021). COVID-19 and Impact on Export Sector in Sri Lanka; Crisis and Fragility: Economic Impact of COVID-19 and Policy Responses. Korea Institute of International Economic Policy. [https://www.kiep.go.kr/galleryExtraDownload.es?bid=0026&list\\_no=9311&seq=4](https://www.kiep.go.kr/galleryExtraDownload.es?bid=0026&list_no=9311&seq=4)





# SRI LANKA'S WAY FORWARD

SURGING TOWARDS  
\$1BILLION POST-PANDEMIC





# ECONOMIC IMPACT OF COVID – A LOOK BACK

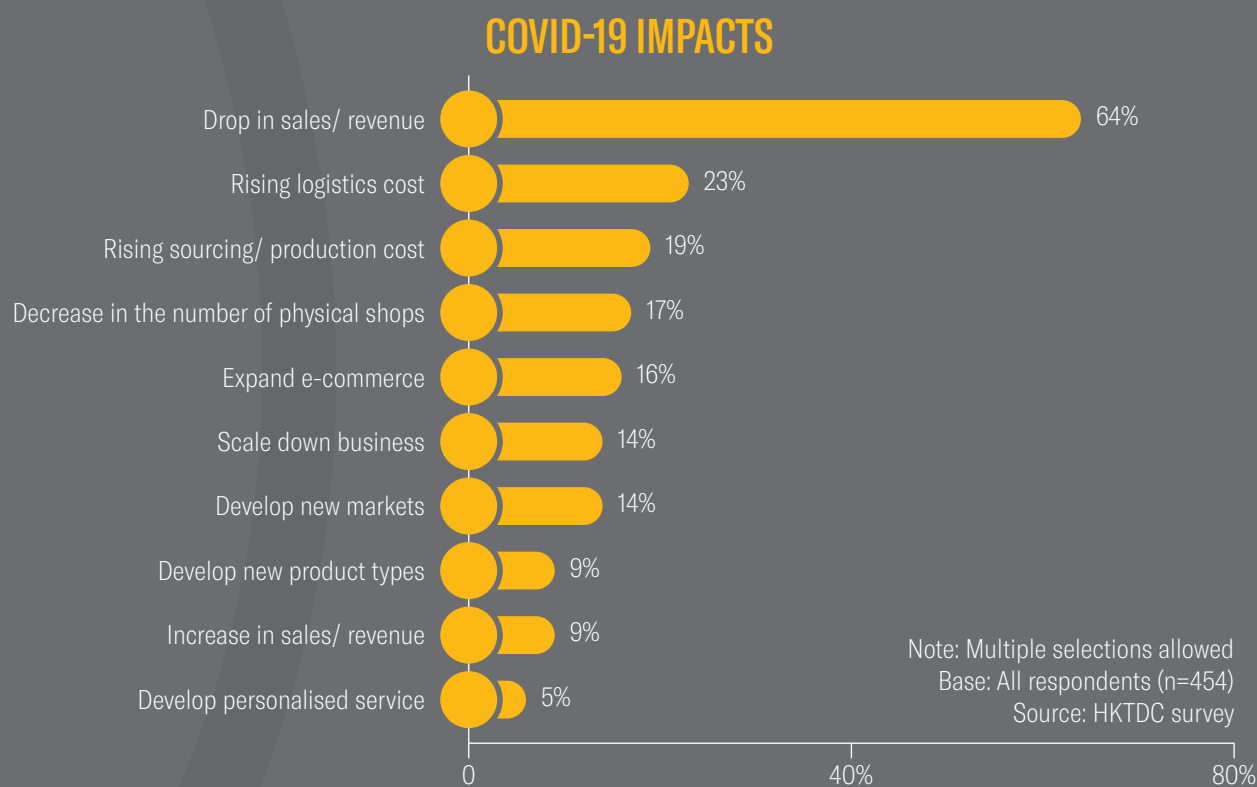
Given the restrictive nature of containing the virus, the globalisation of the supply chain suddenly became a curse. Such new challenges helped prompt innovations across many industries, with new technologies emerging to improve and adapt products to incorporate hygiene and enhanced safety measures. Had it not been for cutting-edge solutions from the tech industry such as IOT devices, robotic delivery systems, contactless payment systems, remote working, distance learning, Telehealth, 3D Printing, and online entertainment, the world would have come to a halt. While such technology is software based, they all require an electronic device to operate them. The demand for electrical and electronic products spreads across innumerable industries from consumer appliances to industrial electronics to aerospace, defence and medical

equipment. Dependence on such products has meant that this is an industry that can generate a constant demand and steady revenue.

The resultant lockdowns due to Covid-19 further intensified demand as the world sought to overcome physical restrictions by using electronics to stay employed, educated and connected. The International Labour Organisation estimated that the number of employees working from home to increase by 300 million and around 1.3 billion students resorted to studying online (Li and Lalani, 2020). Recreational and entertainment activities were also transferred to digital platforms. Such shifts to online activities resulted in a surge in demand for digital-related electronic equipment, despite the negative growth that

most economies experienced.

However, while this bodes well for disposing of existing stocks of items, the new restrictions jammed the industry's ability to produce new goods. A 2021 survey by the Hong Kong Trade Development Council (HKTDC) of 454 electronic and electrical related companies around the world, found that many electronic goods companies reported a drop in sales. Others were negatively affected by rising logistics costs as well as by increasing sourcing and production costs. There was a strain on global manufacturing as the lockdowns reduced workforce availability leading to disrupted supply chains at every stage of production; from extracting mineral stocks and resources, to acquiring component parts, to transportation, thus impacting production cycles and inventory.



A positive encouragement is the recent announcement which highlighted that despite the challenges experienced in the last two years, Sri Lanka's Electrical and Electronic Export Industry has recorded over US\$ 422 mn in export earnings in 2021. A 30% increase in its export earnings compared to \$328mn recorded last year. Yet this is merely a drop in the ocean of Sri Lanka's prospects in a US\$ trillion global industry. Currently the local industry only accounts for less than 3% of Sri Lanka's total merchandise exports and less than

0.1% share of world exports. With so much opportunity available Sri Lanka aims to drive the industry to reach an ambitious target of US\$1 billion by 2025.

While the pandemic may not simply disappear, one cannot afford to pause the momentum of life. The same can be said of global trade. While sounding ominous, it has to be realised that the economic changes are likely to cause a lasting effect on the demand and prices of Sri Lanka's traditional export categories such as apparel, tea,

spices and rubber(Bell,2020). Time has come to adapt and carve out a lucrative place for Sri Lanka in the global marketplace as a reliable supplier of products lucrative to the current consumer. A sector that has been showing much



promise in that respect is the supply of electrical and electronic exports. In this context, Sri Lanka has been focusing on differentiation, value-addition, branding,

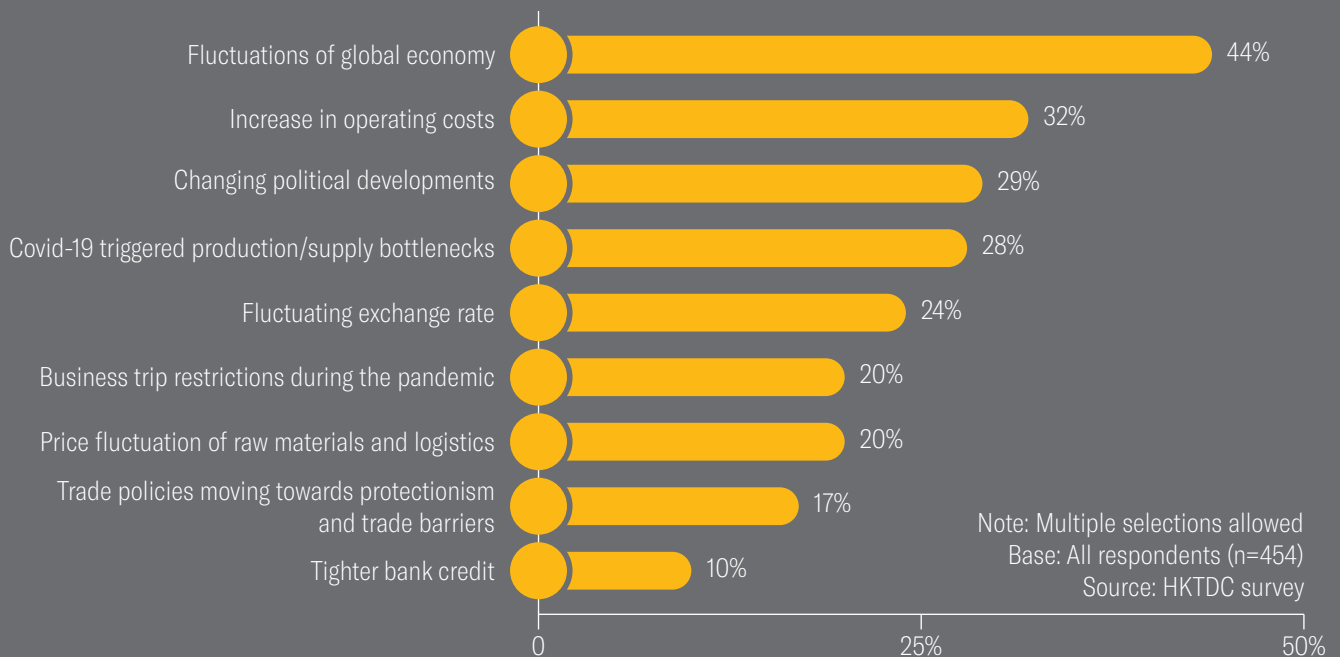
and quality rather than quantity and raw/bulk exports (Wijayasiri, 2021). Another area to highlight is the reputation that has been developed for timely service delivery

and flexibility in accommodating diverse buyer requirements.

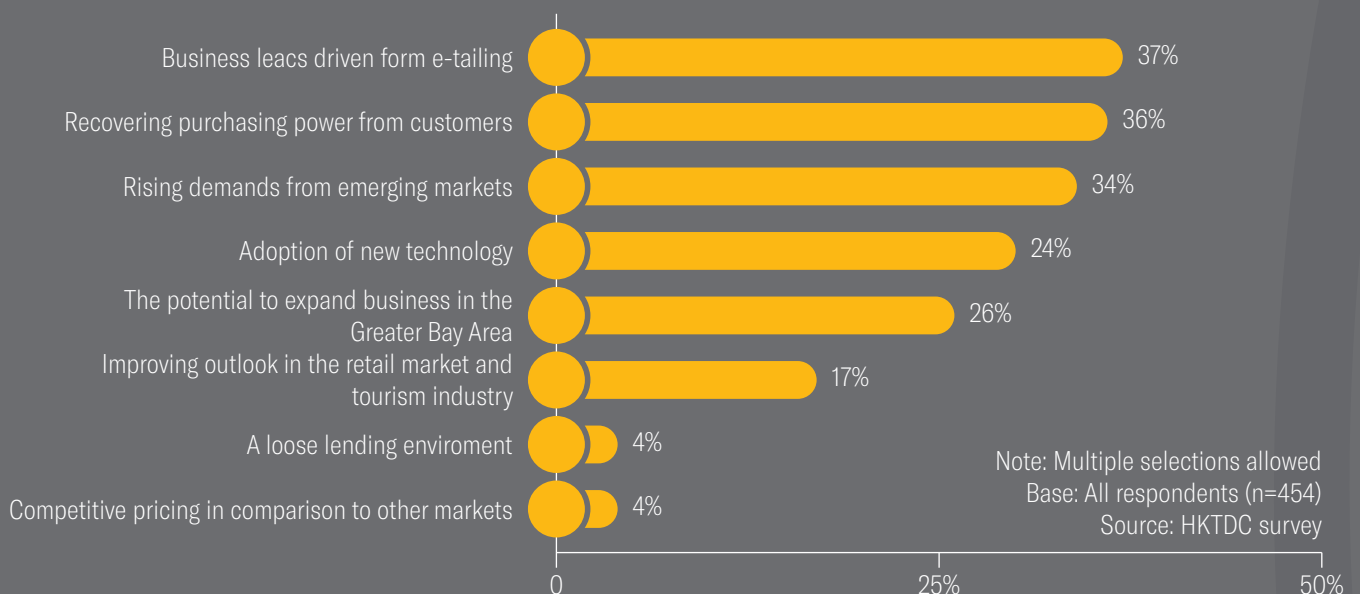
## OVERCOMING THE HURDLES

Moving into 2022, The HKTDC survey highlighted some globally experienced challenges and opportunities that Sri Lanka can learn from and thrive.

### BIGGEST CHALLENGERS IN 2022



### BUSINESS OPPORTUNITIES IN 2022



Many of the surveyed companies expected sales to grow due to three business trends - namely, the rise of e-tailing, recovering purchasing power and increasing demand in emerging economies. The HKTDC has an optimistic outlook for the global electronics sector in 2022, provided companies are willing to overcome the challenges faced and adapt to the new trends that have developed.

# UNTANGLING THE SUPPLY CHAIN



The ripple effect of Covid safety measures touched all stages of production, including creating supply chain issues such as transportation and logistics. This meant there was no way for the industry to meet the demand for its products and services. The latest IHS Markit Global Electronics Purchasing Managers Index (PMI) for August 2021 showed that global electronics manufacturers continue to face delays in receiving ordered inputs from suppliers. These circumstances have made many global companies recognize their over-reliance on supplies from China (Bell, 2020). As such new suppliers and manufacturing locations are being actively sought from outside of China, in order to diversify the supply chains and minimise their vulnerability and risk.

As organisations seek to reimagine and reinvent themselves, they can reduce their reliance on a globalised supply-chain by targeting to move production and sourcing closer together (McKinsey, 2021). There is an opportunity for Sri Lanka to benefit from these changing attitudes and market strengths and uniqueness as an attractive alternate sourcing destination. Given the country's access to high quality raw

materials and minerals and the growing number of component manufacturing facilities already building a reputation globally for quality and reliability, businesses can afford to venture into Sri Lanka for end-to-end production. Much of the international transportation and logistical problems experienced by Covid-19 could be reduced by establishing the entire production process including product assembly and distribution with us. This helps to reduce supply chain delays and costs. This presents potential for a shift in perspective of large global markets and manufacturers such as China to view Sri Lanka as a reliable source for the production of their electrical and electronic needs.

Sri Lanka provides an ideal logistical location, being at the crossroads of the main east-west trade route. The growing infrastructure as well as developments such as the Colombo Port City and the export processing zone near Hambantota in the South, will easily allow electrical and electronic companies to send out their finished products via easily accessible sea and air routes.

Sri Lanka is building a gradual reputation as a software development hub which becomes an added benefit to companies who are seeking to develop a digitised and autonomous supply chain in order to increase efficiency and effectiveness and pre-empt future delays. Sri Lanka's skilled workforce can utilise technologies like IoT devices or sensors to create access to valuable real-time data and remote monitoring of where goods are in the chain and their condition. They can also use Artificial Intelligence to help create robots in warehouses and stores, driverless forklifts and trucks, delivery drones and fully automated planning processes. Domestically, to further enhance the country's own industry's resilience to facing future supply chain issues, local companies can learn from major industrial nations and prioritise domestic electronics production, especially for critical electronics components, thus reducing reliance on external suppliers.





# POWER OF SRI LANKA'S EE WORKFORCE



Limited employee attendance due to lockdowns meant that operations could not proceed at full capacity. Efforts should be made to limit this disruption of steady production by investing in a more automated production process so minimal manpower is needed. A cost advantage of Sri Lanka is that labour costs are lower compared to developed countries. Currently, the industry employs over 40,000 workers in its activities. Despite switching to automated production, employment generation can be further increased by product variation and expansion. For example, manufacturing high volume but low value products such as LEDs, miniature circuit breakers and electrical switches and component parts which are labour intensive.

Employment can also be redirected to adapt to changing trends. Sri Lanka's highly educated, skilled and trainable workforce can easily be redirected to focus on quality control and research and development into emerging markets for electronics. These include Internet of Things (IoT), Robotics, Bio-medical, Analytics and 5G (industry 3.0 & industry 4.0). Entrepreneurs are encouraged to develop the next-generation of products. Companies can then commercialise innovative designs and products that have been invented, specifically low-cost, high-tech products such as robotics, three-dimensional (3D) manufacturing, e-surveillance security devices and IoT devices. This will ensure companies thrive as they gain competitive advantage by developing a sustainable and evolving product portfolio.

This will also allow Sri Lanka to get ahead of the curve and build a competitive advantage as a niche source of innovative and quality products.

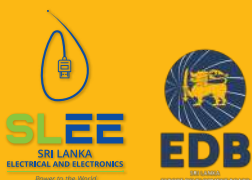
## PORTFOLIO OF PRODUCTS

Sri Lanka has recorded a strong performance in the export of insulated wires and cables, switches, boards and panels and electronic transformers. The Electrical and Electronics industry mainly caters to automobile, telecommunication, consumer electronics, medical and industrial automation industries. According to the IHS survey, it is the global consumer electronics industry that currently shows strong expansion in world markets. Recent demands have also been seen in industries such as security, healthcare, transportation, defence, agriculture and lighting. Understanding these changing market trends and demands is crucial for the industry to adapt and prosper.

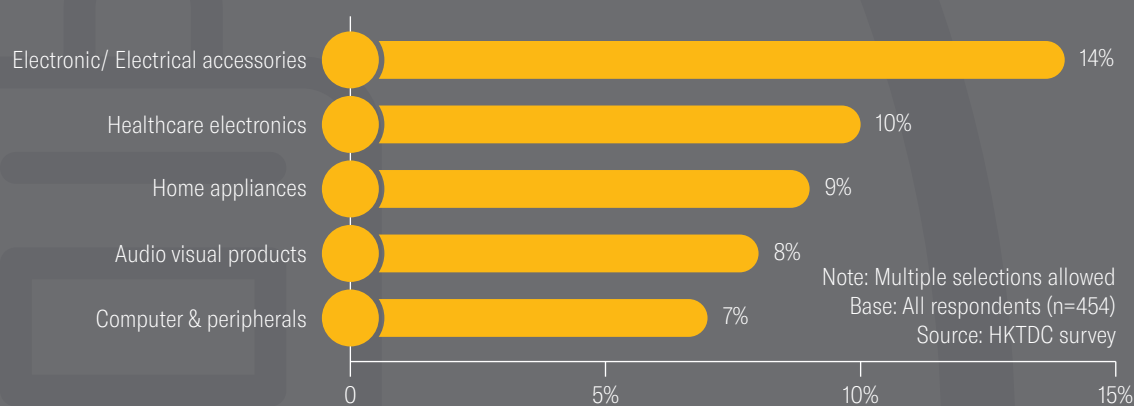


In terms of product categories, the HKTDC survey found that electronic and electrical accessories was seen as the leading demand. This was followed by healthcare electronics due to the increasing adoption of IoT-based smart medical devices and

portable medical devices to carry out virtual or remote monitoring, treatment and diagnosis. Other electronics products anticipated to be demanded are home appliances and audio-visual products.



## POPULAR PRODUCT CATEGORY IN 2022 - ELECTRONICS



Looking forward, based on consumer trends, global management consultants, McKinsey, foresees an increase in demand for component parts such as semiconductors that enable contactless solutions, automated-delivery solutions, servers, connectivity, and cloud usage, as online dependence grows. There will also be a growth in wired communication since remote work and home-schooling may continue as a trend. There also lies the possibility of the home-office electronics market declining, given the surge of the purchases that took place during the early stages of the pandemic and the gradual return of pre-pandemic work culture. As such it becomes even more important to

anticipate trends and diversify the product portfolio to meet the changing demands in order to get ahead of the curve.

Unlike other Sri Lankan exports such as tea and textiles which are often susceptible to consumer tastes, most people and businesses around the world are dependent on electronic items to go about their daily lives. To meet the increasing demand, Sri Lanka can firstly ramp up production capabilities and increase the volume of existing products. Identifying and addressing the gaps in the market and diversifying the electrical and electronic manufacturing portfolio to cater to the global needs. Manufacturing high value,

low volume products such as smart panels, smart energy metres and energy efficient products and small medical equipment presents a greater opportunity of increasing export earnings.

Producers should also be aware of their consumers' expectations. With increasing environmentally and socially conscious buyers, the industry must build itself as a responsible industry that proactively helps the planet by consciously managing e-waste. This will help secure consumer loyalty as well as ensure sustainability of goods.

## EXPANSION

The Electrical and Electronic Industry is relatively young in Sri Lanka, having only a 40-year history. Given the rising global demand, combined with Sri Lanka's abundant skilled, trainable workforce and esteemed academia in the sector, as well as the availability of raw materials, efforts are being made to expand the sector's capability. There are currently under 100 companies in the industry, which seems a measly number compared to the potential market and the capabilities to service them. New companies are encouraged to establish themselves with a flexible manufacturing capacity which can be reconfigured and redeployed as needs evolve.

Sri Lanka encourages investments by:

- providing tax incentives and tax holidays
- organising and participating in global Trade Fairs
- giving exporters preferential market access
- establishing infrastructure such as export processing zones, industrial parks, industrial estates, and special economic zones.

(For a full list of incentives available <https://investsrilanka.com/investment-incentives/>) since this is an e-newsletter, maybe can provide this link

Such measures are aimed to encourage new businesses to join the industry and to help market the local industry to the world. For example, we encourage the building of strategic partnerships in order to integrate with global value chains. Companies can shift from a 'just in time' supply chain model, and instead use the infrastructure to increase their inventories of critical products, components, and materials.





## EXPLORING MARKETS



Traditionally, the Sri Lankan Electrical and Electronics Industry has exported their products to high-volume markets in the global arena such as Switzerland, USA and India. The pandemic revealed that especially in this industry there is no limit to the global demand. Therefore, the opportunity arises to be a frontrunner in entering and establishing themselves in emerging markets, even if the volume of exports is low, because larger markets may be saturated.

## VALUABLE NATURAL RESOURCES

The IHS survey also showed evidence of sharp increases in the electronics industry's input prices as well as output prices, mainly due to shortages of essential raw materials. Here Sri Lanka has the unique advantage of possessing high-quality minerals such as kaolin, feldspar, silica sand, quartz, ilmenite and graphene, which are used as base materials for electronic products. In fact, according to the Industry Technology Institute, Sri Lanka is the only country where vein graphite with purity above 99% carbon exists, thus enabling production of high-quality graphene supplies.

Sri Lanka exports graphite mainly as a raw material. However, the opportunity exists for companies to utilise the exclusive access to such natural resources and develop value-added products, making Sri Lanka an indispensable part of the global electronics manufacturing market.

Looking to the future, the steadily rising demand and the rapid turnover of outdated electronic equipment presents an opportunity of infinite scales for repurposed material suppliers and EE manufacturers that the natural resources which grow scarce do not. Hence the opportunity also

exists for companies to invest in Sri Lanka as a location for Research & Development into the recovery and recycling of essential technology metals as an economic resource, especially since the quality of recycled metals does not deteriorate (Yu et al., 2020). In fact, the United Nations recently reported that only about 17 percent of the annual 53 million tons of the electrical and electronic equipment global waste was collected and recycled. Yet its total recovery was valued at USD 57 billion in 2019 alone (Forti et al., 2020).



**SLEE**  
SRI LANKA  
ELECTRICAL AND ELECTRONICS  
Power to the World

**EDB**  
EXPORT DEVELOPMENT BOARD  
Sri Lanka

# ADDING VALUE



Currently Sri Lanka is largely valued and sourced as a component manufacturer to the global creators of consumer products. The opportunity exists to inject value-addition, thus increasing its value and revenue. Given the numerous advantages at the disposal of Sri Lankan exporters, such as availability of high quality raw materials as well as skilled but economical labour; the country is an ideal location for international brands to establish their entire product manufacturing base. This in turn will have the knock-on effect of encouraging investment and confidence from other interested companies, thus helping Sri Lankan producers to move up the value chain and enable the local industry to grow.

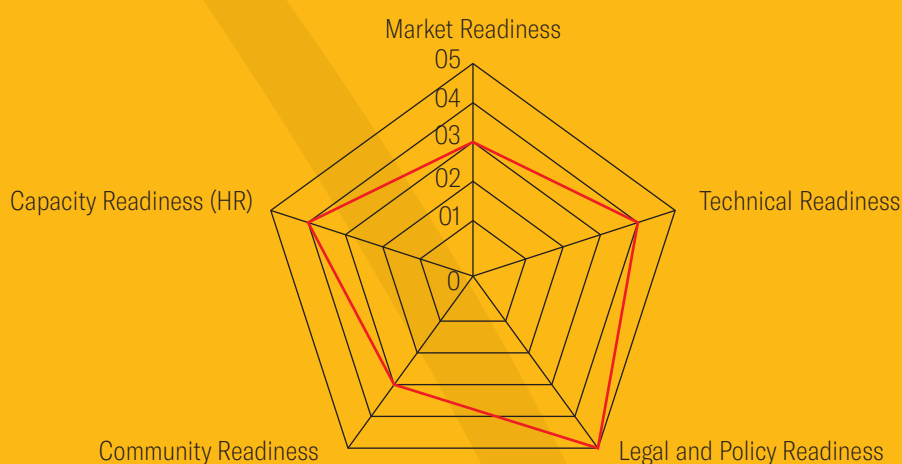
## QUALITY

According to a recent study (Nayak et al, 2021), a negative impact of the pandemic has been the rise in counterfeit products. The study noticed an increasing curve in counterfeits, which affects manufacturers of genuine products, which has created a need for proper inspections in order to ensure authentication of electrical and electronic products. Accreditations and certifications play a significant role here. To maintain the stellar reputation that Sri Lankan quality currently holds in the global market, it becomes important that the industry commits to increase its existing industry standards, conformities, product testing, quality accreditations, and authenticity certification.



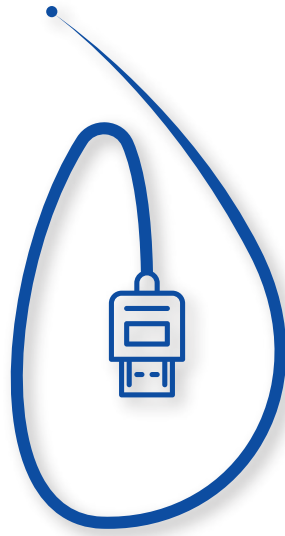
## CONCLUSION

Many economists believe that the pandemic served as an equaliser, resulting in a more level business landscape. The marketplace curve will flatten (Mehta, 2020), thus giving smaller economies, like Sri Lanka, a unique opportunity to rise above. Waiting to see what happens is not a viable option at this juncture. Sri Lanka must plan contingencies and move ahead. The industry has to be quick and flexible in order to adapt and take advantage of these circumstances to create new opportunities to rebuild the economy. The October 2021 United Nations Conference on Trade and Development (UNCTAD), affirms that Sri Lanka has the capability and potential to greatly develop its Electrical and Electronics Industry.



The establishment of a strong Electrical and Electronic Industry would assist in generating significant export revenue and foreign direct investments, as well as largely facilitate the economic development of the country.





# SLEE

**SRI LANKA  
ELECTRICAL AND ELECTRONICS**

*Power to the World*

**SURELY THE BEST IS  
MADE IN SRI LANKA**



**SRI LANKA EXPORT DEVELOPMENT BOARD**

No. 42 Nawam Mawatha, Colombo-02, Sri Lanka.

**Tel:** +94-11-230-0705 / 11 | **Fax:** +94-11-230-0715 | **Email:** edb@edb.gov.lk

[www.srilankabusiness.com](http://www.srilankabusiness.com)