

# 9 **Building Resilience for the Malaysian Education Ecosystem during the Pandemic and Beyond**

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## INTRODUCTION

Malaysia is a young nation, one that seeks to establish itself as an example of a dynamic melting pot of Asian cultures that has grown out of its colonial past and embraced the global economy. As the wealth of the country has increased, there has been a growing awareness since the early 2010s that investment in a vibrant social sector is necessary to address the inequalities that often accompany rapid economic growth. In other words, Malaysia not only needs more social purpose organisations, but also a strong and resilient ecosystem that supports those working in the social sector.

The COVID-19 pandemic taught Malaysians the importance of having a strong education ecosystem. Schools closed for a total of thirty-seven weeks in 2020 and 2021, and the usual way of working through schools to deliver the programmes we at YTL Foundation offered was no longer possible. We therefore turned to partners like Teach For Malaysia, who have played a key role in building the education ecosystem since the early 2010s, and other content partners, then sought the skills of an education technology ('edtech') solutions provider. Finally, we brought in a telecommunications company, and together we provided the devices, connectivity, and online learning resources to keep children learning during lockdown.

In those first dark days of the pandemic, as we worked around the clock to deliver our solution, it was stories of the families that we managed to reach that kept the team engaged and motivated.

## LOCKDOWN

Chinese New Year, one of the major celebrations in Malaysia, was just over, and the country was reeling from the second political upheaval in two years. For the first time in Malaysian history, the Opposition had won the general election in 2018. In a strange twist of events, the 94-year-old prime minister resigned after less than two years into office, making room for a realignment of loyalties and the installation of a new coalition government. Just days later, the country went under a total lockdown to protect its citizens from the new coronavirus that was spreading at an unprecedented speed across the world.

The usual panic buying of food and essential items started, and businesses braced themselves for a new regime of working from home while closing their shops and factories. Most believed that this situation would only last for a few months at most.

Schools across the country closed and parents started worrying about their children's lessons while considering how they would cope with having to tutor them from home. Most schools were not prepared for delivering online classes even though the Ministry of Education had for many years tried to implement edtech solutions, including providing virtual learning environments, and then Google Classrooms for all schools. And even if schools were capable of pivoting to online classes, did families have the devices and data necessary for students to attend these classes? What if the pandemic could not be controlled for a prolonged period and children continued to be locked down at home?

These were questions that absorbed us at YTL Foundation in the first weeks of the pandemic. As an education foundation that has worked with Malaysian public schools for many years, we understood the challenges that the entire community would face during lockdown. We worried about learning loss, especially for the most vulnerable and disadvantaged children.

There was an urgency to do something to address this gap whilst the government worked on its own solution, but we knew

we could not do it alone. The immediate need was to make available devices, data, and learning resources, and we had to find partners to help us provide these. Racing against time, we mobilised YTL Communications, edtech solution provider FrogAsia, and volunteer teachers from Teach For Malaysia. Two weeks after lockdown began, we launched the Learn From Home initiative in late March 2020.

Over the course of 2020, we gave out over 100,000 smartphones to low-income families, 18 million gigabytes of free data, 450,000 data SIM cards, and created over 1,200 digital lessons mapped to the Malaysian school curriculum in the subjects of English, Mathematics, Science, and Malay, and launched a gamified quiz app with over 13,500 quizzes. In 2021, through subsidies provided by the government, we gave out another 750,000 smartphones, onboarded new partners, and continued to work on expanding the lessons to other core subjects.

We started this journey to address a need we saw during the early months of COVID-19, but we have learnt that the need extends far beyond the pandemic. We must ensure that the Malaysian education ecosystem is both flexible and resilient enough to face new challenges by investing in technology, and supporting learners, parents, and educators to make the best use of the solutions available to them.

In this chapter, we will discuss the challenges faced in rolling out the Learn From Home initiative nationwide during lockdown, the partners we brought in that enabled us to do this, and how engaging the government and continuing to forge new community partnerships is vitally important to scale up and build a resilient education ecosystem for the long term.

#### THE MALAYSIAN CONTEXT

While the pandemic was the spur for action, it was the context in which the Learn From Home initiative operates that informed the need for urgency in our response. Malaysia's education system is in crisis and despite many attempts at addressing the issues, progress has been slow.

In the 2012 Programme for International Student Assessment (PISA),<sup>1</sup> Malaysia came out in the bottom third out of the sixty-five participating countries, and among the Asian countries that participated, it only outperformed Indonesia and lagged behind even lower-income countries such as Vietnam.

A year later, Malaysia launched the Malaysian Education Blueprint 2013–2025 (known as the Blueprint),<sup>2</sup> a comprehensive plan for a rapid and sustainable transformation of the education system through to 2025. There was a general recognition in the Blueprint that whilst access to education had improved significantly, the quality of the student outcomes had deteriorated. Poor teacher quality and weak school leadership resulting from the rapid expansion of schools in the country, the use of rote learning techniques against teaching higher-order thinking skills, poor language skills, and the lack of autonomy of schools are some of the factors that contributed to the decline.

In 2018, Malaysia showed a slight improvement in the PISA scores but was still below the Organisation for Economic Co-operation and Development (OECD) average.<sup>3</sup> Whilst PISA scores alone may not reveal the true state of the quality of a country's education system, they provide some indicators and track whether improvements have been made over time.

There is also a trust deficit felt by parents towards the national education system in Malaysia, as reflected in the significant increase in student enrolment in private education at primary, secondary, and tertiary levels since the early 2010s. For example, in the five years from 2013 to 2017, enrolments in private schools grew from 172,684 to 209,966, an increase of approximately 21.5 per cent.<sup>4</sup> This flight to private education has meant that it is the bottom 40 per cent of the population, particularly in rural areas, who suffer most from the gaps

<sup>1</sup> OECD Programme for International Student Assessment (PISA) Results from PISA 2012.

<sup>2</sup> Malaysia Education Blueprint 2013–2025 (Preschool to Post-Secondary Education).

<sup>3</sup> OECD Programme for International Student Assessment (PISA) Results from PISA 2018.

<sup>4</sup> Malaysian Ministry of Education: Quick Facts 2013 and 2017, Malaysian Education Statistics.

in the public education system and there is less urgency to address these gaps because the economically better-off populations do not experience them.

Malaysia also has a large number of refugees who have fled to the country as a transit point for resettlement to other countries like the United States or Australia – this includes both refugees from regional neighbours like Myanmar as well as a significant number of refugees from other countries. As of October 2021, there were some 179,830 refugees and asylum-seekers registered with UNHCR (United Nations Higher Commission for Refugees) in Malaysia.<sup>5</sup> This includes 45,870 children below the age of 18. However, refugee children in Malaysia are denied access to the formal education system and must resort to obtaining their education via an informal parallel system of community-based schools run by their own communities, non-governmental organisations (NGOs), and faith-based organisations. While these organisations provide much-needed services, the quality of education offered is understood to lag behind the education offered in mainstream schools.

The country has a relatively good internet infrastructure, with the World Bank reporting internet penetration at 90 per cent in 2020.<sup>6</sup> YTL Foundation's programmes have therefore been aimed at helping schools improve teaching and learning using the many innovative tools and solutions that technology provides in education. It has also supported NGOs that work with refugee children, and the two learning centres it operates provide additional support for these children as well as those from low-income families, classified as B40.

Such was the state of the education system when the pandemic brought everything to a standstill.

Soon after the country went into lockdown, many stories were carried in the media of teachers doing their best to continue

<sup>5</sup> UNHCR Malaysia, 'Figures at a Glance in Malaysia', [www.unhcr.org/en-my/figures-at-a-glance-in-malaysia.html](http://www.unhcr.org/en-my/figures-at-a-glance-in-malaysia.html).

<sup>6</sup> World Bank, 'Individuals Using the Internet (% of Population) – Malaysia', <https://data.worldbank.org/indicator/IT.NET.USER.ZS?locations=MY>.

teaching online but finding that many of their students could not participate due to the lack of devices or data. A survey conducted by the Ministry of Education in April 2020 revealed that nearly 37 per cent or up to 900,000 students affected by school closures due to the COVID-19 outbreak had no access to an electronic device for e-learning purposes.<sup>7</sup> Even if a household had a device, family members would have to share it among themselves for work and/or study. Unsurprisingly, those with the lowest access were students from B40 families, including refugee children.

Teachers were also struggling to cope with having to use unfamiliar online tools whilst caring for their families at home. Some used WhatsApp or Telegram groups to keep in touch with their students and to give out homework but many were at a loss as to how to deal with online classes.

Cheryl Fernando, Country Director for Pemimpin Global School Leaders, who worked with over 200 school leaders across 90 schools to help them cope with the situation during the first months of the pandemic said, 'Many teachers and school leaders are not adequately trained on using tech tools to teach. Many also wait for the directives from the government on what tools to use in their online teaching.'

A paper published by Khazanah Research Institute on 28 April 2020 titled 'COVID-19 and Unequal Learning' concluded, 'In addition to strengthening broadband penetration, more needs to be done to ensure all children have access to the needed devices, including making devices more affordable/accessible. It is especially urgent to develop high quality digital content, perhaps even translating appropriate foreign materials, and to equip teachers with the skills to more effectively use e-learning technologies.'<sup>8</sup>

A few of the large Malaysian telecommunications companies offered an additional one gigabyte of data daily to their customers,

<sup>7</sup> *The Edge Malaysia*, 'Edu Nation: Let's Get Digital Learning Right', [www.theedgemarkets.com/article/edu-nation-lets-get-digital-learning-right](http://www.theedgemarkets.com/article/edu-nation-lets-get-digital-learning-right).

<sup>8</sup> Hamid, H. A., and Khalidi, J. R. 2020. *COVID-19 and Unequal Learning*. Kuala Lumpur: Khazanah Research Institute, p. 43.

but that was not enough: it generally did not help those without any devices or any internet plans.

In this context, there was an urgent need to provide devices, data, and high-quality digital content to students in the country, especially to those from B40 families.

#### THE LEARN FROM HOME INITIATIVE

The YTL Foundation, and YTL Group entities FrogAsia and YTL Communications, came together early in the pandemic and rapidly developed a coordinated emergency response to support learning in Malaysia, particularly for children in low-income families.

Their aim was to address key barriers to educational continuity and advancement during the COVID-19 period through providing devices and data to support access to compelling, curriculum-aligned learning materials.

Under the Learn From Home initiative, they put together a package of free 4G SIM cards, mobile phones with data plans, and digital lessons in English, Malay, Mathematics, and Science (later expanded to include all core subjects by the end of 2022). An app with more than 13,500 revision quizzes was also released for free download in the App Store and Google Play Store.

Each aspect of the Learn From Home response is detailed as follows.

##### *Free SIM Cards with 40 Gigabytes of Data*

YTL Communications provided free 4G SIM cards, each pre-loaded with 40 gigabytes of data.

Whilst YTL Communications is a relatively new telecommunications company, it has the widest mobile footprint across Malaysia when it comes to the provision of 4G services, especially in the rural areas. The company has built its network to cover about 80 per cent of schools in the country, some quite remote. With the exception of those living in the interiors of East Malaysia and along the mountainous regions of Peninsular Malaysia, populations with

school-going children tend to live close to schools and therefore within network coverage.

A major challenge at the time was verifying the identity of the parents receiving the free SIM cards as the country was completely under lockdown. YTL Communications had to find technical solutions to comply with regulatory requirements surrounding the registration and verification of parent identities, which had hitherto only been done through in-person interactions at physical stores. Working around the clock, the engineers managed to develop and deploy online registration systems and optical character-recognition technologies within two weeks of lockdown.

As hundreds of thousands of applications streamed in, teams from other parts of the company had to be redeployed to assist in the processing of the applications. Once the applications were approved, more resources had to be brought in to handle the dispatch and delivery of the SIM cards across the country. Over 750,000 applications were received and processed in 2020 when the country was in total lockdown.

### *Free Mobile Phones with 12 Month Data Plan*

Whilst the free data SIM cards were made available to all students, the more pressing need was to put devices into the hands of students from B40 families. The challenge here was to find a solution that would:

- ensure that the mobile phones would be given to B40 students only and not those from higher-income families; and
- assist B40 families in applying for the mobile phones, as many have low literacy and technical skills.

Standard communication channels like the press and news channels would only reach a limited number of families and probably leave out those most in need. We at the Foundation therefore decided to launch an extensive social media campaign to seek nominations for these families from the public.

The nominator could be a teacher, community leader, religious organisation, an NGO, or even a kind neighbour. The nominator



would attest to the income status of the nominee and provide the basic information required for the nominee to qualify. Once qualified, nominators were asked to assist the nominees to complete the online application process.

The strategy paid off. The free mobile phone campaign went viral and nominations flooded in, with the website briefly crashing from the high initial traffic. At the start of the initiative, YTL Communications had an existing stock of 20,000 mobile phones. It soon became clear that this would not be sufficient to help the many who needed the phones.

We at the Foundation increased our budget, set a target to give out 100,000 mobile phones, and mandated YTL Communications to procure the balance of the phones. With factories closed in most countries and global supply chains disrupted, this proved to be another significant challenge, but we finally managed to secure supplies and by the end of 2020 had reached our target of delivering 100,000 mobile phones to those who needed them most.

### *Digital Learning Resources*

#### *Digital Lessons in English, Malay, Mathematics, and Science*

The Learn From Home initiative's edtech partner, FrogAsia, had worked with Malaysian schools since 2012 to deliver a virtual platform for teaching and learning. FrogAsia therefore had a deep understanding of curriculum delivery in schools as well as the challenges of digital adoption by teachers.

FrogAsia was able to rapidly deploy its team to work on creating new, engaging, and interactive lessons on its platform. An early question from the team was who would be teaching using the lessons, parents or teachers? It was agreed that as children were now learning from home and not in school, the lessons would be framed to address parents. In this new environment, parents would have to play the role of teachers and facilitators for their children's lessons.

We in the partnership also decided to dispense with the requirement for parents and students to register or login to access the digital

lessons. The lessons would be available on the website with just a simple click. Whilst this would mean the loss of some of the features of the platform and some data tracking functionality, it would lower barriers to access and address the immediate need during the crisis.

While the FrogAsia team was able to build the digital lessons on its learning platform, we at the Foundation still faced the problem of sourcing for teachers familiar with the national curriculum to create the necessary lesson plans and content. The teachers we needed required the skills to work online, innovativeness in their approach, and willingness to sacrifice their time for this mission.

Our first thought was to reach out to Teach For Malaysia, as they have been a grantee of YTL Foundation since the start of their Fellowship Programme in 2012; their pool of fellows and teaching alumni would tick all the necessary boxes. Their trustees and CEO immediately embraced the vision and from April through to September 2020, about fifty of their fellows and teaching alumni worked on the digital lessons with FrogAsia.

Later, other partners like MYReaders, a social enterprise working on English literacy, along with final-year and master's students from the linguistics department of Universiti Kebangsaan Malaysia were brought in to work on completing the entire suite of English lessons and start work on the Malay lessons.

By the end of 2021 we had more than 1,200 lessons available on our website covering the entire curriculum for English, Malay, Mathematics, and Science from Year 1 to Year 11. Currently, we are working on adding lessons in all other core subjects with funding provided by CIMB Foundation.

Kindity, a preschool, also joined us in creating lessons for pre-school children.

### *Launchpad Learning App*

To support the Learn From Home Initiative, FrogAsia developed Launchpad (formerly known as 'FrogPlay'), a gamified revision quiz app and fast tracked it through the App Store and Google Play Store.

Pelangi Publishing, a major education publisher in Malaysia, agreed to release its bank of quizzes for public use through the app. Over the course of 2020, FrogAsia continued to create and release additional quizzes, making up over 13,500 quizzes in all core subjects, including Mandarin and Tamil, on Launchpad.

Today all our digital lessons are also available on the app so students can both learn and use the revision quizzes on their mobile phones.

As of the end of 2021, the lessons and quizzes have been accessed more than 1 million times.

#### UNIQUELY ENGAGING PARENTS

Providing data, devices, and digital lessons would allow learning to continue online but if teachers were unable to connect with their students, parents would have to step into the role of teacher.

For this reason, we at YTL Foundation specifically aimed to engage parents. Many parents felt overwhelmed by the sudden, urgent need to play the role of teacher while maintaining a full working schedule during the pandemic. Our lessons were therefore developed with parents in mind and helped parents support their children while learning from home.

The United Nations Children's Fund's (UNICEF's) Research Brief 'Parental Engagement in Children's Learning' of September 2020 concludes:

It is crucial, in these difficult times of school closures, to provide reading material and support for parental engagement and to ensure that the most vulnerable are not left behind. All policy decisions on continuing education remotely should also be cognisant of parents' capability to help their child learn in order to prevent further exacerbating the global learning crisis and amplifying the learning gaps across socio-demographic groups.<sup>9</sup>

<sup>9</sup> UNICEF, 'Parental Engagement in Children's Learning: Insights for Remote Learning Response during COVID-19', September 2020, <https://docs.edtechhub.org/lib/AIRLRUKJ>.

Other solutions that we have seen during the pandemic, and certainly most edtech solutions overall, are primarily aimed at helping teachers. Whilst research clearly shows the need to support parental engagement, there are few initiatives targeted at parents. We at the Foundation tested our approach with education specialists and parents and received positive reviews, giving us the confidence to continue this strategy.

Professor Colin Diamond CBE, Professor of Educational Leadership, University of Birmingham, after reviewing the lessons, said:

I have had a good look around and imagined that I was a dad at home brand new to teaching. And it worked! The approach at the beginning is well-structured and took me into thinking about ‘what is a lesson?’ and how to get things going. You have lots of online materials in the different subject and age level areas with the quizzes to back up learning. I was just looking at the ‘Imagine you are the Prime Minister’ English lesson where you write down all the things that your country will need during the pandemic – really ‘on the money’ contemporary curriculum.<sup>10</sup>

#### LEVERAGING PARTNERSHIPS

When YTL Foundation first conceived the plan for rolling out the initiative in the first weeks of the national lockdown, it drew on the strengths and capabilities of a range of partner entities within the broader YTL Group, one of Malaysia’s leading multinational corporations. This allowed the Foundation to act quickly and mobilise existing resources despite the confusion and uncertainties that pervaded the country at the time.

As the plans developed and we at the Foundation could see beyond the first response to the crisis, we tapped into the strengths of Teach For Malaysia, as well as our network of local NGOs and

<sup>10</sup> University of Birmingham, ‘Becoming the Teacher – Hopes and Fears Taking on the Job at Home’, <https://blog.bham.ac.uk/socialsciencesbirmingham/2020/03/25/becoming-the-teacher-hopes-and-fears-taking-on-the-job-at-home/>.

universities. These partners helped to curate and develop the content for our lessons and learning resources.

We set out with the objective of developing lessons and resources for parents to help their children learn at home during lockdown. However, these resources can equally support anyone who needs material to teach to national curriculum standards. The Teach For Malaysia fellows who helped with the development of the lessons naturally use the lessons for their own classes in school.

We therefore sought out partners who would benefit from using the lessons and resources, and trained them in these online resources. Our partners included teachers' unions, community schools, NGOs, and faith-based volunteer groups that provide after-school tuition to underprivileged students, and corporations like Deloitte who have an internal volunteer programme for teaching English to students in low-cost housing communities.

### *National Union of the Teaching Profession*

The National Union of the Teaching Profession (NUTP) is the largest teachers' union in the country with over 230,000 members. Engaging teachers is important as they are at the front line, tasked with delivering home-based learning during school closure and dealing with the learning loss experienced by students during the lockdown.

A recent World Bank analysis of early evidence from the pandemic reveals that while remote learning has not been equally effective everywhere, hybrid learning is here to stay.<sup>11</sup> The report concludes that for remote learning to deliver on its potential, a key element is having effective teachers with high subject-content knowledge, skills to use technology, and appropriate pedagogical tools and support.

Whilst we at the YTL Foundation had started out with the aim of supporting parents at home to teach their children, we believe that

<sup>11</sup> Muñoz-Najar, A., Gilberto, A., Hasan, A., Cobo, C., Azevedo, J. P., and Akmal, M. 2021. *Remote Learning during COVID-19: Lessons from Today, Principles for Tomorrow*. Washington, DC: World Bank Group.

supporting teachers will become more important as we settle into a hybrid approach to teaching and learning. Teachers can use our lessons as a baseline, since they follow the national curriculum standards and use a range of strategies to keep children engaged. They can also use their own skills to adapt the lessons to suit their students as they become more proficient with using technology.

Working with NUTP, we provided free data to their members as well as trained them in the use of the resources on our platform. It will be teachers who shoulder the task of helping Malaysian students get back on their feet again.

### *Community Schools*

There are some 45,870 children below the age of 18 who are registered with the United Nations High Commission for Refugees (UNHCR) in Malaysia as of October 2021. These refugee children are denied access to the formal education system and obtain basic education via an informal parallel system of community-based learning centres run by their own communities, NGOs, and faith-based organisations. Many of these schools lack a structured curriculum as they depend on volunteers who teach for short periods of time.

These schools were perhaps among the hardest hit during the pandemic. During the first lockdown in March 2020, these schools closed and volunteer teachers were ill-equipped to continue teaching online. Limited access to devices and data, the same problem faced by the B40 students, was a barrier to keeping children learning.

Before the pandemic, YTL Foundation operated two learning centres in Kuala Lumpur for the underprivileged and underserved, including refugee children, providing after-school enrichment classes to them.

When the pandemic struck, we at the Foundation moved our classes online and started using the Learn From Home lesson resources to teach. We provided smartphones with data to some of the children from these community schools and brought them into our online classes. It soon became obvious that our online lesson

resources could be used to provide a much-needed structured curriculum for community schools.

As these schools have started operating again, we are developing a programme to train volunteer teachers to use our resources and adapt them to their particular needs.

#### PARTNERSHIP WITH GOVERNMENT

The need for people to stay connected during lockdown and the affordability of data and devices for the most disadvantaged citizens were concerns that the Malaysian government was aware it needed to address. As a private-sector organisation, the YTL Foundation could act swiftly and started rolling out its Learn From Home Initiative a mere two weeks after lockdown. However, it took the government some time to develop its own programme to provide data and devices to those most affected by the pandemic.

In November 2020, the Minister of Finance, in his 2021 budget speech,<sup>12</sup> announced that a subsidy programme funded by the Malaysian government would allow B40 individuals to claim a RM15 (\$3.71) credit per month for internet data or RM180 (\$44.55) for the purchase of a phone plan from approved telecommunications companies. The Ministry of Finance subsequently increased the phone plan subsidy for families to RM300 (\$74.25) to make it more affordable for them to purchase a device for home-based learning.

We at the YTL Foundation immediately saw this as an opportunity to work with the government to extend the impact of our Learn From Home Initiative. On our own, we were able to set a budget for giving out 100,000 phones and data, but working with the government and utilising the subsidy, we could stretch our dollars much further. We approached the Ministry of Education with an offer to work with them to identify the students who needed a device for home-based learning and to co-fund a phone plan for them using the government subsidy.

<sup>12</sup> Ministry of Finance Budget 2021: Budget Speech by Minister of Finance, 6 November 2020.

Whilst we received support from the highest level in government to do this, the Ministry of Education was preoccupied with having to deal with the closure and reopening of the 10,000 schools in the country, setting standard operating procedures for the safety of the students, supporting their teachers, rescheduling public examinations, and more.

As the Ministry of Finance had its own database of B40 families with school-going children, they encouraged us to work through YTL Communications to provide the subsidised phone plans to these families. YTL Foundation absorbed the balance of the cost of the phone plans not covered by the government subsidy so that these families would each receive the phone plan completely free.

The subsidised government programme ran for five months, from May 2021 through to September 2021, and during that period the Foundation gave out smartphones with data plans to over 750,000 families.

#### IMPACTING THE COMMUNITY

Sifting through the thousands of applications in the first weeks of the launch was just short of chaotic. Applications had to be reviewed for authenticity and postal addresses checked to ensure that the Foundation's delivery partners could in fact locate the applicants, especially as many were from rural areas where their addresses were merely PO boxes in remote villages. Addresses such as 'behind the Mosque' or 'above the Fire Station' confounded the team, but through Google Maps we managed to verify even addresses as strange as these. It gave us an insight into those we were reaching: real people in difficult circumstances who needed help.

As always, there were pranksters who submitted pictures of their pets or cartoons instead of their ID cards, and it was exhausting for the team to scan through the thousands of submissions to eliminate these. Then one morning we awoke to see a blurred picture of a family of three in a fishing village, the children holding up their father's death certificate. The father had recently passed away



and the mother had lost her job as a waitress during the pandemic. The picture saddened us deeply and strengthened our resolve to press on as we knew we were making a difference to the lives of children like these.

We were also encouraged by so many in the community who went the extra mile to help the B40 families apply for the free smart-phones and data. Neighbours were helping neighbours, teachers helping their students, and families helping each other. We had a teacher who painstakingly filled in the applications for 126 of her students.

At the time of lockdown, it was only through stories like these that we were able to gauge our impact on the ground.

While the Learn From Home initiative is a COVID-19-era response meant to meet the extraordinary challenge of the moment, we at the Foundation plan to further expand its features, particularly the learning resources. An independent evaluation to inform development of Phase 2 of the initiative is currently underway.

#### THE NEED FOR BUILDING RESILIENCE INTO THE EDUCATION ECOSYSTEM

We have seen enough in our lifetimes to accept that change is inevitable and yet we often think that we can control the rate at which change happens. Perhaps it is in our DNA that we need to feel in control in order to cope with the uncertainties of life.

If nothing else, the pandemic has taught us that the unexpected can come suddenly and swiftly and affect not just one community or country but the entire world. In an age where cheap global travel had become an accepted norm, borders closed overnight, airlines went out of business, and for almost two years we were locked within our own borders, not by political force but for fear of a virulent microbe.

In Malaysia, we have had floods that prevented children from attending school for several days per year. In recent times, the poor air quality resulting from forest fires has kept children indoors and out of school for several weeks. We have managed to cope with these incidents, but the total lockdown experienced in the two years of

COVID-19 has tested our education system to the limit. Thirty-seven weeks of school closure and inconsistent home-based learning will undoubtedly leave a lasting impact on our children, especially the most disadvantaged in our society. We are not only dealing with the learning gap that has arisen because learning could not continue during this time, but we are also grappling with the issue of potential loss of knowledge or reversals in academic progress.

As we start to build back after the pandemic, we need to think much broader and work on building resilience into our education ecosystem.

When we at the Foundation launched the Learn From Home initiative, our objective was to support continuity of learning during the months of lockdown. This affected the programme design, including the choice to simultaneously remove barriers to digital access at the same time as we increased availability of suitable learning resources. It also affected the approach we took to engaging parents as key stewards of learning for children.

As we have continued to work on these areas, we understand that these same elements of digital access and suitable learning resources are necessary if we are to build resilience into the Malaysian education ecosystem. However, advocating change and transformation in a system with entrenched bureaucracy can be risky; there is an in-built inertia to change. Previous attempts to introduce the use of technology into public schools have met with limited success and it has been too easy to blame the technology rather than the implementation. Moreover, the dependency between digital infrastructure and the digital skills of teachers creates high risk of failure.

A common mistake in many developing economies is the tendency to invest in infrastructure without at the same time investing in the upskilling of teachers and school leadership. We need to do both if we are to give ourselves the best chance of success.

Whilst the private sector can mobilise philanthropic capital at speed to address a crisis, as we have done with our Learn From Home initiative, we need to engage government to set clear policies and to

put in place the long-term investments that create resilience. The pandemic brought to light the gaps in our system and created an environment where stakeholders from both public and private sectors are more open to change and innovation.

To move forward, we must continue to foster strong partnerships between the government, the private sector, and NGOs. Partnerships should not be limited to those working in the education sector, and cross-sector collaboration has been proven to be extremely effective. In the case of the Learn From Home initiative, it was necessary for a telecommunications company as well as suppliers of smartphones to get involved in what was essentially an education-led initiative.

YTL Foundation will continue working on providing digital access and digital learning resources as students in the country start on the journey of recovering the learning loss experienced over during the pandemic. It will also deepen its partnerships with the government, NGOs, and other private-sector companies to build resilience and preparedness for the next disruption. We at the Foundation have learnt that to build a resilient education ecosystem, we need everyone to be involved.