



Task Force 6
**Social Cohesion and the Future
of Welfare Systems**

Policy brief

BEYOND COVID-19: WHAT CAN COUNTRIES DO TO ADDRESS THE LEARNING LOSS CAUSED BY THE PANDEMIC?

SEPTEMBER 2021

Ivana Zacarias SUMMA
Rafael Carrasco SUMMA
Mauricio Farías SUMMA
Devyani Pershad Pratham Education Foundation
David Dingus Al Qasimi Foundation
Natasha Ridge Al Qasimi Foundation
Marvin Erfurth Al Qasimi Foundation

T20 NATIONAL COORDINATOR AND CHAIR

ISPI

T20 CO-CHAIR



T20 SUMMIT CO-CHAIR



**Università
Bocconi**
MILANO





ABSTRACT

Addressing the learning loss caused by the difficulty of education provision during the COVID-19 pandemic will be a key challenge faced by the world for the coming decades. G20 governments and partners must focus their efforts on promoting and strengthening cost- and time-effective pedagogical strategies, leveraging comprehensive access technologies and providing alternatives when necessary, identifying curricular priorities, adapting teacher training programmes, giving special attention to groups of greater vulnerability, leveraging the private sector, generating intersectoral articulation, strengthening cooperation with families and communities and internationally, and using monitoring and evaluation. These measures will contribute to reduce economic and social consequences of educational losses in G20 countries and beyond.



CHALLENGE

In 2020, 1.6 billion children and youths were affected by school closures, and more than 400 million of them were unable to access digital media or other distance learning programmes (UNICEF data hub 2020). Students have missed several months of face-to-face classes worldwide and, consequently, important opportunities for better quality learning (UNESCO Database 2020).

The impacts of the pandemic have not been equally distributed and the educational gaps have increased. Students from low socioeconomic strata and with disabilities have been especially affected. Evidence has shown that the most vulnerable students in the United States (Aucejo et al. 2020; Dorn et al. 2020), Latin America (Neidhöfer et al. 2020; World Bank 2021), and Europe (Engzell et al. 2020; Maldonado and De Witte 2020) will have fewer opportunities. In terms of gender, studies show that girls have been the most affected in some countries of the world, such as in India, Nigeria, Malawi and Rwanda, where they are less likely than boys to own a phone (Girl Effect and Vodafone Foundation 2020). Furthermore, internet access among females tends to be lower in Africa, the Arab countries, and even Europe, especially impacting women in the least developed countries (International Telecommunication Union 2021). However, addressing the adverse effects of COVID-19 on education will require careful attention and consideration of the diversity within local contexts.¹

In addition to these new problems, the pandemic has exacerbated others that already represented huge challenges for education systems. One of the biggest was the low performance of students, even those attending school. According to the World Bank, in low- and middle-income countries, over 50% of children were considered in “learning poverty” (i.e., they do not develop competent reading skills by the age of 10), which is expected to get much worse (Save Our Future 2020; World Bank 2019).

Another historical problem exacerbated by the pandemic is investment in education. Additional funding was already needed prior to the pandemic. UNESCO data shows that low- and middle-income countries² already had a financial gap of US\$ 148 billion to achieve SDG4 before COVID-19, and it is estimated that this figure will increase by US\$ 30 to 45 billion as a consequence of COVID-19, (UNESCO-GEM Report 2020).

The pandemic’s impact on education will have significant global and individual economic costs. A World Bank study early in the pandemic estimates that for four months of school closures, the loss (in present value) in student income ranges from US\$ 252-360 billion in low-income countries, US\$ 4.8-6.8 trillion in middle-income countries, and US\$ 3.4-4.9 in high-income countries. The global impact is US\$ 15.1 trillion in total and US\$ 20,404 at individual level (Psacharopoulos et al. 2020). In turn, it is estimated that the loss of one-third of the school year will result in country level GDP reduction by 1.5% for the rest of the century (Hanushek and Woessmann 2020).



Beyond economic losses, **unschooling may create a serious threat to social cohesion as well, challenging the ability and willingness of individuals to cooperate. In this sense,** the costs for the lack of schooling at societal level are well documented, such as a decrease in life expectancy (Christakis et al. 2020) and health quality in general, the deterioration of mental health (Lee 2020), and an increase in crime and civil disobedience (Lochner 2011; Oreopoulos and Salvanes 2011).

By bringing these concerns to the attention of the next G20 forum, this policy brief proposes a set of recommendations focused on increasing educational funding and targeting financing for programmes for learning levelling, improving pedagogical practices and teacher training, monitoring progress, focusing on vulnerable groups, and fostering cross-sector articulation. The ultimate goal is to enrich the discussions needed to reach essential agreements on important policies to mitigate the negative impact of school closures and learning loss on economies and society for years to come.



PROPOSAL

To face and overcome the crisis, G20 countries need to create the necessary conditions for implementing educational strategies focused on the recovery and acceleration of education and learning, paying particular attention to vulnerable groups. Even though there is an overall loss that may be difficult to recover, it is necessary to make as much progress as possible in this regard so that negative societal impacts are not further exacerbated. **In this scenario, the State should play a larger role, especially in terms of financing reforms, generating favourable conditions and mobilising alliances within and between sectors.** At the same time, the participation of the private sector, civil society, and communities should be encouraged.

Furthermore, it is necessary to introduce transformations with clarity, efficiency and timeliness due to the urgency of this challenge. G20 countries must play a key role as change promoters and fundamentally as condition generators so as to make implementing innovations and transformations possible. For this, they must promote cost- and time-effective pedagogical strategies; strengthen the training of school teams (teachers and principals); recognise, reinforce, and encourage collaboration between public and private actors; lead and promote cross-sectoral work; and ensure the creation of development funds, among other policies.

Moreover, while acknowledging that G20 countries have domestic educational responsibilities in responding to the impacts of COVID-19, they should also have a responsibility to support developing countries and low-income countries (LICs) to recover from the pandemic.

The following set of proposals and strategies aims to accelerate learning processes and reduce the educational gaps that have been widened due to the COVID-19 pandemic.

RECOMMENDATION 1. INCREASE EDUCATIONAL FUNDING AND TARGET FINANCING TO PROGRAMMES FOR LEARNING LEVELLING

To face this crisis, G20 countries must strengthen their fiscal efforts by allocating part of their budgets to learning recovery programmes and encouraging other countries to do so. Even though fiscal measures are expected to be high, the costs of not investing in remedial programmes and improving school conditions would be much higher in the long term (UNESCO-GEM Report 2020) as already negative societal impacts will continue to get worse and become even harder to recover from.

Despite the need for greater investment, Education Finance Watch (2021) found that two-thirds of developing countries reduced their education budgets in 2020, compared to one-third of high- and upper-middle-income countries (GEM Report - World Bank 2021). As an



example of financial efforts, countries, such as the Netherlands, Sweden, and the United Kingdom have established specific educational recovery funds (UNESCO Education Sector 2020). Meanwhile, in the United States, a *Learning Recovery Act* proposal has been presented in Congress, which aims to allocate USD 75 billion over the next two years to identify students who have fallen behind, to provide remedial learning and to support the recovery of students who have dropped out of school (Ujifusa 2021).

Special effort should also be made to improve the efficiency of the additional expenditure. In this sense, using cost-effective strategies, such as those indicated in Recommendation 2, is especially relevant. Furthermore, cost-effective strategies would be further complemented by using various targeted funding mechanisms to ensure that a greater proportion of the funding reaches marginalised populations at different levels of education. For example, using school grants or local community grants with requirements to use local parties as implementors and activating other community members will ensure that a larger proportion of the funding stays in the local community where it is needed instead of large regional players based in different communities.

RECOMMENDATION 2. IMPROVE PEDAGOGICAL PRACTICES AND TEACHER TRAINING

PROMOTE AND STRENGTHEN COST- AND TIME-EFFECTIVE PEDAGOGICAL STRATEGIES

Evidence shows that strengthening specific pedagogical strategies can help students who are several months behind to catch up. The *Education Endowment Foundation* analysed more than 10,000 programmes and initiatives and identified a group of time- and cost-effective pedagogical practices,³ which can accelerate learning in several months a year. Among the highlighted strategies are developing metacognitive reflection inside classrooms, continuous pedagogical feedback, collaboration and dialogue between peers (which also contributes to strengthening the social fabric), and mastery learning (World Bank & Foreign, Commonwealth & Development Office 2020). Therefore, governments and civil society should be encouraged to promote and mobilise these strategies in order to recover a significant part of these learning losses.

Other highly effective, but slightly more expensive strategies have also been identified, such as individualised tutoring (Education Endowment Foundation 2020) or small-group support facilitated by teachers (Education Endowment Foundation 2018), giving need-based scholarships to disadvantaged students or using software that adapts to children's learning levels (World Bank 2019). Although these strategies are more expensive, they can be used in a targeted way in contexts especially affected by the pandemic and for limited periods. Less expensive alternatives can be also used, such as tutoring by university students (Torgerson et al. 2018) or young volunteers, such as happened in Italy during the pandemic (Carlana and La Ferrara 2021).



Some initiatives have successfully translated some of these cost-effective strategies into structured programmes and accelerated school learning.⁴ For example, the *Teaching at the Right Level* programme, pioneered by Pratham Education Foundation, has been implemented and evaluated at scale in India and is now being adapted to various country contexts in Africa, South Asia, and Latin America (Banerjee et al. 2016). This model assesses children using a simple reading and arithmetic tool and then uses this information to group children for instruction by their current learning level rather than by their age or grade. The use of child-centred, engaging activities in the classroom can lead to accelerated improvement in foundational skills for children, with those at the lowest levels often benefiting the most. Similarly, programmes such as *Improve* (Mevarech and Kramarski 2017), focusing on a combination of metacognition, collaboration, feedback, and mastery learning strategies, have also impacted accelerated learning.

Overall, G20 countries must use these or other examples to learn from these programmes' principles and guide their educational policies at national, subnational and local levels. These programmes need monitoring and evaluation (M&E) to better understand how they are delivered, their costs, their impacts and so on (see Recommendation 3).

LEVERAGE COMPREHENSIVE ACCESS TO DIGITAL TECHNOLOGIES AND PROVIDE ALTERNATIVES WHEN NECESSARY

Digital technology is a factor that can facilitate access to learning and determine its pace. Such technology has been crucial for expanding opportunities, particularly in the current context. When available, it can be a facilitator in implementing some of the previously mentioned strategies, such as distance collaboration or mastery learning.

In parallel to programmes that require the significant deployment of infrastructure, digital technology may increase the inclusion of groups that have not had previous access. However, it is not accessible to everyone – even in G20 countries, particularly for the most vulnerable – and even if learners have access to the required technology, they might still face a cost accessing innovative digital learning platforms, software and/or apps. According to the International Telecommunications Union (2021), only 51% of the world's population had internet access at home in 2019, with huge disparities across regions; for example, 88% in urban Europe and 6% in rural Africa. For these last groups, the COVID-19 pandemic exacerbated the pre-existing digital divide in a scenario of growing social inequality (UNCTAD 2020).

Thus, it is essential to improve access to digital solutions and provide alternatives for those who lack access at home, such as mobile broadband, which 93% of the world population already has access to (International Telecommunication Union 2021). Other alternatives include, (a) making low-tech or alternative solutions available, using asynchronous communication, printed materials, telephone messaging (SMS, social networks), TV and radio programmes, among others, and (b) to continue expanding electricity, equipment, and connectivity policies to alleviate the widening digital divide. Examples of the above include strategies to leverage existing devices in rural communities and establishing social networks of community volunteers and parents to help children engage with learning through simple



hands-on activities during school closures and beyond⁵ (Chandrashekar and Baghel 2020).

IDENTIFY CURRICULAR PRIORITIES

Another way to reduce gaps and accelerate learning is prioritising content and critical foundational skills for the future development of students. Pedagogical transformations that prioritise the instructional core (Vegas and Winthrop 2020) or what is known as the teaching of foundational skills (Spivak 2021) are recommended, both in traditional and non-traditional disciplines.

Additionally, it is necessary to consider that some of the skills and knowledge that were relevant before the pandemic may not necessarily be relevant in the future. Similarly, it may be necessary to emphasise content that was previously considered less relevant. For example, placing a new priority on socio-emotional dimensions, such as resilience, caring for others, and the self-management of learning (ECLAC-UNESCO 2020; **Marinelli et al. 2020**; Reimers and Schleicher 2020; **Schleicher 2020**). Caution should also be used to avoid reducing curricula to prioritising their focus on STEM while neglecting other subjects and under-emphasising social-emotional learning and extracurriculars such as the arts, language, music, and sports.

ADAPT TEACHER TRAINING PROGRAMMES

In both remedial and learning acceleration processes, teachers are critical enabling agents. To support teachers in fulfilling this role, G20 countries need to reinforce their training in (a) pedagogical strategies for levelling and prioritising curricula and (b) contingent pandemic strategies that also have a medium and long-term projection, for instance, support for developing socio-emotional skills and hybrid education models (Bárcena and Uribe 2020).

For teacher training to be effective, it must be accompanied by supporting conditions. In this sense, it may be useful to promote learning communities, which effectively improve student outcomes (Education Commission 2019; Lieberman 2000; McLaughlin and Talbert 2006). It is also necessary to take into account teacher health and well-being, ensure that programmes match the capacities of the local school community (Sokal et al. 2020) and that teachers are not unduly over-burdened as COVID-19 restrictions begin to ease.

RECOMMENDATION 3.

MONITOR PROGRESS, FOCUSING ON VULNERABLE GROUPS

PAY SPECIAL ATTENTION TO VULNERABLE GROUPS

The effects of the pandemic have been felt by everyone, especially the most vulnerable populations. It is essential to be mindful of groups that are particularly socially vulnerable, especially those at risk of dropping out or who are behind in education (**Lustig et al. 2020**), such as students with disabilities (**Jackson and Bowdon 2020**), students at the beginning of their educational process (**López Boo 2021**), and students in educational transition – for



example, from elementary to secondary school (**Leaton Gray et al. 2021**). There is a need to pay attention to possible gaps that did not necessarily exist before but may have been widened by the pandemic. Furthermore, countries need to pay attention to groups whose dropout rates may have increased, such as the pre-primary and secondary school students (UNESCO COVID-19 Education Response 2020). In this sense, countries will have to invest in targeted support, campaigns on school reintegration, as well as strengthening alternative educational programmes for those who cannot return to school. These programmes must be context specific as the most vulnerable and at-risk will vary by location.

REGULARLY MONITOR AND EVALUATE PROGRESS

Many countries decided to suspend the implementation of national evaluation mechanisms (UNESCO 2021) due to the interruption of face-to-face classes. In general, these provide valuable input for improvement-oriented and evidence-based decision-making processes (LLECE-OREALC 2020). However, the implementation of adjusted strategies to the challenges posed by the reality of the pandemic and otherwise requires updated evaluations of student-learning programmes and policies, both at the level of education systems and more locally in the classrooms. These evaluations should emphasise uncovering new groups of populations that have been left behind, as stated in the previous paragraph. They can also be important for informing multiple stakeholders (not just governments and education providers) about cost efficiency, particular beneficiaries and non-beneficiaries of programmes, potential enhancements and how a programme fits into a broader and complex system.

In addition, consistent monitoring and evaluation can provide further input for research to design better support mechanisms, understanding underlying driving factors, and how vulnerable groups may be prevented from falling further behind. However, it will require a localised approach to identify the factors and groups within local communities who are vulnerable or marginalised for this to be effective. This information can then be aggregated at regional and national levels to identify key factors and share best practices (see, for example, Courtney 2008; Kusek and Rist 2004; Prennushi et al. 2001, pp. 124-27; Wagner et al. 2014).

RECOMMENDATION 4. FOSTER CROSS-SECTOR ARTICULATION

STRENGTHEN TIES WITH FAMILIES AND COMMUNITIES

The pandemic has highlighted the opportunity for, and the importance of, involving families and community members in the continued learning programmes and activities of children. G20 countries need to structure mechanisms that foster community involvement, especially for benefiting the most affected children (Yoshida et al. 2020). Although it should be accompanied by complementing factors, implementing policies that enact family involvement is a good first step (Epstein and Sheldon 2016).



The challenge is to find ways to allow parents, family members, and community members to support children without providing intensive training or instruction. **There have been interesting initiatives in this sense. In some countries, governments supported parental engagement by developing specific guidelines for supporting continuity in education. For example, in Slovakia, Sweden, Norway and Canada, among others, material for families was developed in multiple languages. In Spain, non-governmental organisations produced videos to support parents during the pandemic. In many cases – such as in Italy and Portugal –, counselling options for parents were also available (OECD 2020).**

LEVERAGE THE PRIVATE SECTOR

The consequences of the COVID-19 pandemic are beyond the scope and capacities of governments; therefore, G20 countries must leverage the private sector and private philanthropy to help address gaps in the education sector. This includes helping to close the funding gap, providing in-kind support, and coordinating and implementing interventions tailored to the local context in which the private sector operates, as they may already understand the local community's resources and needs. Moreover, the private sector can, in certain circumstances, act faster and with greater agility to challenges, offering new solutions that the public sector may not be able to provide or provide within a timeframe the private sector can, especially in areas with limited resources (Abadia and Karr 2020; Janus 2017; Woodcraft and Munir 2021).

Private sector involvement should be closely coordinated with the public sector to ensure that it is sustainable, locally oriented, and open to the public by providing transparency in finances and operations. Despite its complexity, the private sector must also welcome other stakeholders to build on synergies through cooperation and the sharing of best practices (Dingus et al. 2020). When possible, close collaboration between public and private stakeholders could support children's educational needs. In contrast, a lack of cooperation could undermine the possibilities of innovation and capacity to solve the needs of the most vulnerable (Atkins et al. 2021; Nee 2021; Roy et al. 2018) and potentially exacerbate the already negative impacts of COVID-19.

Within the context of the pandemic, development assistance has favoured health systems, social protection, and climate action, while education giving has been losing ground (**OECD Centre on Philanthropy 2021**). However, there are certain areas that have received special attention, such as bridging the access gap to remote learning, hybrid-instruction or socio-emotional learning. Some data indicates that private giving to education will increase in 2021 (OECD Centre on Philanthropy 2021). Although it is too early to know if these contributions have effectively delivered the desired outcomes or if they would have benefited from better public sector coordination, they highlight the potential and key role the private sector is playing and could play in supporting education during and after the pandemic.



PROMOTE CROSS-SECTORAL ARTICULATION AND INTERNATIONAL COOPERATION

There is ample evidence about the relevance of extracurricular factors in learning outcomes (OECD 2013; OREALC/UNESCO Santiago 2016). More than ever, the different government levels of the educational systems must work jointly with their counterparts in the health, social protection, and labour systems to design and implement policies to repair the social fabric. School alone can contribute little to such a damaged system.

In addition to internal efforts, efforts to coordinate strategies with other countries must also be added (Srivastava et al. 2020). The economic consequences of lost learning will transcend national borders. As previously detailed, low- and lower-middle-income countries will not meet commitments without the help of richer, more industrialised countries.



NOTES

¹For instance, while household factors are likely to affect children similarly around the world, such as the number of children and if the mother is working, which are reported to further disadvantage children as working mothers struggle to support their children with distance learning (Erfurth and Ridge 2020), other factors will vary by region. For example, in some places, girls outperform boys in education (OECD 2019); and as such, interventions and programming in education will need to be adapted to the local environment to ensure that everyone is getting the support they need, even though who is in need and what they need will vary according to the context.

²UNESCO uses the new classification (July 2020) introduced by the World Bank, according to which countries whose Gross National Income (GNI) per capita in current US\$ is below 1036 are considered low-income, while those whose GNI per capita in current USD is between 1035 and 4045 are considered low-middle-income (<https://blogs.worldbank.org/opendata/new-world-bank-country-classifications-income-level-2020-2021>).

³<https://educationendowmentfoundation.org.uk/evidence-summaries/teaching-learning-toolkit/>

⁴<https://www.summaedu.org/en/effective-education-practices-platform/>

⁵The activities were shared through SMS or WhatsApp, in 11 languages, reaching children in over 10,000 communities directly. Initiatives with the government included large-scale radio broadcasts or SMS initiatives reaching millions of children across the country, and inspiring initiatives across borders, such as in Botswana, Nigeria, and Nepal.



REFERENCES

- Abadia L., (2020), *Education funding and COVID-19: What does the future hold?*, OECD Development Matters <https://oecd-development-matters.org/2020/12/02/education-funding-and-covid-19-what-does-the-future-hold/>
- Abadia L. and S. Kar, (2020), *Education funding, philanthropy, and COVID-19: What next?*, GPE: Global Partnership for Education <https://www.globalpartnership.org/blog/education-funding-philanthropy-and-covid-19-what-next>
- Atkins R., S. Allred, and D. Hart, (2021), "Philanthropy's rural blind spot", *Stanford Social Innovation Review* https://ssir.org/articles/entry/philanthropys_rural_blind_spot
- Aucejo E.M., J. French, M.P. Ugalde Araya, and B. Zafar, (2020), The impact of COVID-19 on student experiences and expectations: Evidence from a survey, *Journal of Public Economics*, vol. 191, 104271
- Banerjee A. et al., (2016), *Mainstreaming an effective intervention: Evidence from randomized evaluations of "Teaching at the Right Level" in India*, NBER Working Paper no. 22746 <https://doi.org/10.3386/w22746>
- Bárcena A. and C. Uribe, (2020), *La educación en tiempos de la pandemia del COVID-19*, Informe COVID-19 CEPAL-UNESCO, https://repositorio.cepal.org/bitstream/handle/11362/45904/S2000510_es.pdf?sequence=1&isAllowed=y
- Carlana M. and E. La Ferrara, (2021), *Apart but Connected: Online Tutoring and Student Outcomes during the COVID-19 Pandemic*, Annenberg Institute at Brown University, EdWorkingPaper, pp. 21-350 <https://www.edworkingpapers.com/sites/default/files/ai21-350.pdf>
- Chandrashekar A. and N. Baghel, (2020), *Connecting the disconnected* <https://idronline.org/connecting-the-disconnected/>
- Christakis D., W. Cleve, and F. Zimmerman, (2020), "Estimation of US children's educational attainment and years of life lost associated with primary school closures during the coronavirus disease 2019 pandemic", *JAMA Network Open*, vol. 3, no. 11 <https://doi.org/10.1001/jamanetworkopen.2020.28786>
- Dorn E., B. Hancock, J. Sarakatsannis, and E. Viruleg, (2020), *COVID-19 and learning loss - Disparities grow and students need help*, McKinsey & Company
- ECLAC-UNESCO, (2020), *Education in the time of COVID-19*, ECLAC-UNESCO https://repositorio.cepal.org/bitstream/handle/11362/45905/1/S2000509_en.pdf
- Education Commission, (2019), *Transforming the education workforce: Learning teams for a learning generation*, Education Commission <https://educationcommission.org/wp-content/uploads/2019/09/Transforming-the-Education-Workforce-Executive-Summary.pdf>
- Education Endowment Foundation, (2018), *Small group tuition. Teaching & learning toolkit*, Education Endowment Foundation <https://educationendowmentfoundation.org.uk/>



org.uk/pdf/generate/?u=https://educationendowmentfoundation.org.uk/pdf/toolkit/?id=154&t=Teaching%20and%20Learning%20Toolkit&e=154&s=

Education Endowment Foundation, (2020), *The EEF guide to supporting school planning: A tiered approach to 2020-2021*, Education Endowment Foundation https://educationendowmentfoundation.org.uk/public/files/Publications/Covid-19_Resources/The_EEF_guide_to_supporting_school_planning_-_A_tiered_approach_to_2020-21.pdf

Engzell P., A. Frey, and M.D. Verhagen, (2020), *Learning inequality during the Covid-19 pandemic* <https://doi.org/10.31235/osf.io/ve4z7>

Epstein J. and S. Sheldon, (2016), "Necessary but not sufficient: The role of policy for advancing programmes of school, family, and community partnerships", *The Russell Sage Foundation Journal of the Social Sciences September*, vol. 2, no. 5, pp. 202-19 <https://doi.org/10.7758/RSF.2016.2.5.10>

GEM Report - World Bank, (2021), *Education Finance Watch 2021*, UNESCO - GEM Report - World Bank <https://unesdoc.unesco.org/ark:/48223/pf0000375577>

Girl Effect and Vodafone Foundation, (2020), *Real girls, real lives, connected - A global study of girls' access and usage of mobile, told through 3000 voices* <https://www.girleffect.org/stories/real-girls-real-lives-connected/>

Hanushek E. and L. Woessmann, (2020), *The economic impacts of learning losses*, Paris, OECD <https://www.oecd.org/educa->

[tion/The-economic-impacts-of-coronavirus-covid-19-learning-losses.pdf](https://www.oecd.org/educa-tion/The-economic-impacts-of-coronavirus-covid-19-learning-losses.pdf)

International Telecommunication Union, (2021), *Measuring digital development. Facts and figures 2020*, ITU Publications <https://www.itu.int/en/ITU-D/Statistics/Pages/ff2020interactive.aspx>

Jackson D. and J. Bowdon, (2020), *Spotlight on students with disabilities*, American Institute for Research <https://www.air.org/sites/default/files/COVID-Survey-Spotlight-on-Students-with-Disabilities-FINAL-Oct-2020.pdf>

Leaton Gray S., K. Saville, E. Hargreaves, E. Jones, and J. Perryman, (2021), *Moving Up: Secondary school transition processes during the COVID-19 pandemic*, London, UCL Institute of Education https://discovery.ucl.ac.uk/id/eprint/10126990/7/Leaton%20Gray_UCLIOEMoving_Up_Report_FINAL.pdf

Lee J., (2020), "Mental health effects of school closures during COVID-19", *Child & Adolescent Health*, vol. 4, no. 6, p. 421 [https://doi.org/10.1016/S2352-4642\(20\)30109-7](https://doi.org/10.1016/S2352-4642(20)30109-7)

Lieberman A., (2000), "Networks as learning communities: Shaping the future of teacher development", *Journal of Teacher Education*, vol. 51, no. 3, pp. 221-27

LLECE-OREALC, (2020), *Sistemas educativos de América Latina en respuesta a la Covid-19: Continuidad educativa y evaluación*, UNESCO Santiago, <https://unesdoc.unesco.org/ark:/48223/pf0000374018>

Lochner L., (2011), Nonproduction benefits of education: Crime, health and good citizenship, in E.A. Hanushek, S. Machin, and



L. Woessmann (eds), *Handbook of the Economics of Education*, pp. 183-282

Maldonado J. and K. De Witte, (2020), *The effect of school closures on standardised student test outcomes*, KU Lueven Department of Economics Discussion Paper Series DPS20.17

Marinelli H., et al., (2020), *Latin America and the Caribbean's education systems in the face of COVID-19*, Inter-American Development Bank <https://publications.iadb.org/publications/english/document/Education-in-Times-of-Coronavirus-Latin-America-and-the-Caribbeans-Education-Systems-in-the-Face-of-COVID-19.pdf>

McLaughlin M. and J. Talbert, (2006), *Building school-based teacher learning communities. Professional strategies to improve student achievement*, Teachers College Press

Mevarech Z. and B. Kramarski, (2017), *Matemáticas críticas para las sociedades innovadoras. El papel de las pedagogías metacognitivas*, OCDE - IPN

Neidhöfer G., N. Lustig, and M. Tommassi, (2020), *Intergenerational transmission of lockdown consequences: Prognosis of the longer-run persistence of COVID-19 in Latin America*, CEQ Institute Working Paper 99, Tulane University <http://repec.tulane.edu/RePEc/ceq/ceq99.pdf>

OECD, (2006), *Think scenarios, rethink education*, OECD - Centre for Educational Research and Innovation https://www.oecd-ilibrary.org/education/think-scenarios-rethink-education_9789264023642-en

OECD, (2013), *PISA 2012 results: What students know and can do. Student performance in Mathematics, Reading and Science*, OECD Publishing

OECD, (2020), *The impact of COVID-19 on student equity and inclusion: Supporting vulnerable students during school closure-sandschoolre-openings*, OECD https://read.oecd-ilibrary.org/view/?ref=434_434914_59wd7ekj29&title=The-impact-of-COVID-19-on-student-equity-and-inclusion&_ga=2.137019640.974567284.1626355731-993908764.1601398644

OECD Centre on Philanthropy, (2021), *Education giving in the midst of COVID-19. Philanthropy and education*, OECD Publishing

OREALC/ UNESCO Santiago, (2016), *Informe de resultados, TERCE*. OREALC UNESCO Santiago <https://unesdoc.unesco.org/ark:/48223/pf0000243532>

Oreopoulos P. and K. Salvanes, (2011), "Priceless: The nonpecuniary benefits of schooling", *Journal of Economic Perspectives*, vol. 25, no. 1, pp. 159-84

Psacharopoulos G., V. Collis, H. Patrinos, and E. Vegas, (2020), *Lost Wages. The COVID-19 Cost of School Closures*, World Bank, <https://openknowledge.worldbank.org/bitstream/handle/10986/34387/Lost-Wages-The-COVID-19-Cost-of-School-Closures.pdf?sequence=1&isAllowed=y>

Reimers F. and A. Schleicher, (2020), *Schooling disrupted, schooling rethought. How the COVID pandemic is changing education*, OCDE-Harvard Graduate School of Ed-



education https://globaled.gse.harvard.edu/files/geii/files/education_continuity_v3.pdf

Schleicher A., (2020), *The impact of COVID-19 on education. Insights from Education at a Glance 2020*, Paris, OECD <https://www.oecd.org/education/the-impact-of-covid-19-on-education-insights-education-at-a-glance-2020.pdf>

Sokal L., L. Eblie Trudel, and J. Babb, (2020), "Supporting teachers in times of change: The job demands- resources model and teacher burnout during the COVID-19 Pandemic", *International Journal of Contemporary Education*, vol. 3, no. 2, pp. 67-74

Spivak M., (2021), *To mitigate the effects of COVID-19 on education outcomes, systems should prioritise foundational skills and adapt instruction to children's learning Levels*, RISE Programme - Issue Brief <https://riseprogramme.org/publications/mitigate-effects-covid-19-education-outcomes-systems-should-prioritise-foundational>

Srivastava P. et al., (2020), *Covid-19 and the global education emergency: Planning systems for recovery and resilience*, Policy brief, Task Force 11 - Covid-19: Multidisciplinary approaches to complex problems, T20 - Saudi Arabia 2020 https://inee.org/system/files/resources/T20_TF11_PB6.pdf

Torgerson C. et al., (2018), *Tutor trust: Affordable primary tuition. Evaluation report and executive summary*, School of Education, Education Endowment Foundation https://educationendowmentfoundation.org.uk/public/files/Projects/Evaluation_Reports/Tutor_Trust.pdf

Ujifusa A., (2021), "Lawmakers push \$75 billion for learning recovery among trio of COVID-19 Bills", *EdWeek* <https://www.edweek.org/policy-politics/lawmakers-push-75-billion-for-learning-recovery-among-trio-of-covid-19-bills/2021/01>

UNCTAD, (2020), *The COVID-19 crisis: Accentuating the need to bridge digital divides*, UNCTAD https://unctad.org/system/files/official-document/dtlinf2020d1_en.pdf

UNESCO, (2021), *Exams and assessments in COVID-19 crisis: Fairness at the centre*, UNESCO <https://en.unesco.org/news/exams-and-assessments-covid-19-crisis-fairness-centre>

UNESCO Database, (2020), *COVID-19 educational disruption and response*, UNESCO <https://en.unesco.org/covid19/educationresponse>

UNESCO COVID-19 Education Response, (2020), *How many students are at risk of not returning to school?*, UNESCO <https://unesdoc.unesco.org/ark:/48223/pf0000373992>

UNESCO Education Sector, (2020), *Fiscal responses to education and training in the context of COVID-19*, UNESCO

UNESCO-GEM Report, (2020), *Act now: Reduce the impact of COVID-19 on the cost of achieving SDG 4*, Policy Paper 42, UNESCO

UNICEF data hub, (2020), *COVID-19 and children*, UNICEF <https://data.unicef.org/covid-19-and-children/>



Vegas E. and R. Winthrop, (2020), *Beyond reopening schools: How education can emerge stronger than before COVID-19*, Brookings <https://www.brookings.edu/research/beyond-reopening-schools-how-education-can-emerge-stronger-than-before-covid-19/>

World Bank, (2021), *Acting now to protect the human capital of our children: The costs of and response to COVID-19 pandemic's impact on the education sector in Latin America and the Caribbean*, World Bank <https://openknowledge.worldbank.org/handle/10986/35276>

World Bank & Foreign, Commonwealth & Development Office, (2020), *Cost-effective approaches to improve global learning*, World Bank & Foreign, Commonwealth & Development Office <http://documents1.worldbank.org/curated/en/719211603835247448/pdf/Cost-Effective-Approaches-to-Improve-Global-Learning-What-Does-Recent-Evidence-Tell-Us-Are-Smart-Buys-for-Improving-Learning-in-Low-and-Middle-Income-Countries.pdf>

Yoshida K., Y. Kitamura, P. Razquin, and S. Tanaka, (2020), *Educating girls and the marginalized in the digital and transformative innovation age: To make «leaving no one behind» a reality*, Policy brief, Task Force 6 - Economy, employment, and education in the digital age, T20 - Saudi Arabia 2020 https://t20saudiArabia.org.sa/en/briefs/Documents/T20_TF6_PB3.pdf



ABOUT THE AUTHORS



Ivana Zacarias SUMMA, Santiago (Chile)

Assistant Professor at Universidad de San Isidro (Buenos Aires). For eight years, she worked as Professor and researcher at the National University of San Martín. At the Argentinean State, she worked in the creation and implementation of the BEC.AR program (2011-14) and she was Director of Learning Assessment at the National Ministry of Education (2016-18), leading the first teacher training assessment in the country. She authored and co-authored three books and has many other publications. She holds a master's degree in International Educational Policy from Harvard University, a specialization in Education Administration & Leadership from Vanderbilt University (Humphrey Fellowship) and is PhD Candidate in Education & Society from Universitat de Barcelona.



Rafael Carrasco SUMMA, Santiago (Chile)

Deputy Director of SUMMA (Education Research and Innovation Laboratory for Latin America and the Caribbean). He is currently also a member of the Board of the National Agency for the Quality of Education of Chile. He is a Civil industrial engineer with a master's degree in Economics from the Universidad de Chile. Master's degree in International Comparative Education and Ph.D. in Education from Stanford University. He worked for eight years in the Ministry of Education in various positions, such as Head of Development of the National System for Measuring the Quality of Education and then as Head of the Technical Team of the Minister and Deputy Minister. Dr Carrasco was one of the leaders for the design and development of various educational policies, most prominently the law on additional financing for the most vulnerable students in the country. He has been a lecturer at Stanford University and other universities. He was part of the National Commission 2014 for the reform of the National Accountability System. He was also a co-founder of the NGO San Pablo, which provides free preschool education to low-income children.



Mauricio Farías SUMMA, Santiago (Chile)

Is Director of School Transformation at SUMMA (Education Research and Innovation Laboratory for Latin America and the Caribbean). He is a Civil Industrial Engineer and master's in economics from the University of Chile. He has a Ph.D. in Comparative International Education at Stanford University. He has worked in Chile at the Ministry of Education, the National Board of Early Childhood Education, the Agency for the Quality of Education, the Superintendency of Education and the National Training and Employment Service. He has been consultant at the InterAmerican Development Bank and is president of the I-Tek Foundation.



Devyani Pershad Pratham Education Foundation, New Delhi (India)

Head of Pratham's International Collaborations unit supporting partners to adapt and apply Pratham's innovations to contexts outside India. As part of the TaRL Africa initiative focused on sub-saharan Africa, she leads technical strategy and approach, and manages partner relationships across several TaRL Africa countries. She also supports donor relationships and grant management. She further provides strategic oversight for TaRL in Côte d'Ivoire, Kenya & Zambia. In addition to this role, Dr Pershad leads Communications for Pratham. She joined Pratham in 2013 and was working in advisory services prior to joining the organization. She has an MBA from IESE Business School, Barcelona and a bachelors in Economics.



David Dingus Sheikh Saud bin Saqr Al Qasimi Foundation for Policy Research, Ras Al Khaimah (United Arab Emirates)

Research Associate at the Sheikh Saud bin Saqr Al Qasimi Foundation for Policy Research where his work focuses on education in the areas of at-risk youth, parental involvement, and the role of private philanthropy. He received his Master's degree in Development Economics at the Georgia-Augusta University of Goettingen in Germany and a dual bachelor's degree in Economics and German at Texas A&M University.



Natasha Ridge Sheikh Saud bin Saqr Al Qasimi Foundation for Policy Research, Ras Al Khaimah (United Arab Emirates)

Executive Director of the Sheikh Saud bin Saqr Al Qasimi Foundation for Policy Research. Prior to this appointment, she was the Acting Director of Research at the Dubai School of Government. Dr Ridge has over 20 years of experience working in the international education sector and holds a Doctorate of Education in International Education Policy from Columbia University. Her latest research focuses on philanthropy and education in the MENA region.



Marvin Erfurth Sheikh Saud bin Saqr Al Qasimi Foundation for Policy Research, Ras Al Khaimah (United Arab Emirates)

Head of Research at the Sheikh Saud bin Saqr Al Qasimi Foundation for Policy Research. Previously, he was a Research Associate at University of Münster's Institute of Education in Germany, where he recently completed his Ph.D., and also was a Visiting Scholar at University of Oslo's Department of Education, Norway. His work primarily focuses on education policy and the economics of education, including the increasingly prominent role of education philanthropy globally.