

Supplementary Table 1: Characteristics of included studies														
First author and year	Questions posed by review	Study type	Study period	Geographical areas covered	Search strategy	Number of included studies	Quality appraisal tool used	Authors' assessment on quality of included studies	Study conclusions	Did the SR perform GRADE assessments?	Conflicts of interest and study funders	Our AMSTAR 2 quality appraisal rating	Journal	Answers which of our posed questions? Effect of closures on transmission (1) or on pupils (2). Effect of mitigations on transmission (3) or pupils (4).
Zhang <i>et al.</i> , 2021	• What have been the impacts of COVID-19 school closures on mental health of Chinese students?	• Systematic review and meta-analysis	• Start of COVID-19 pandemic – November 2020	China	• Web of Science, PubMed, Medline, Embase, PsycInfo, Google Scholar, Wanfang, China National Knowledge Infrastructure, China Science and Technology Journal.  • Searches of included articles' reference lists.	• 31 (11 relevant for our study)	• The Agency for Healthcare research and Quality (AHRQ) tool for cross-sectional studies	>7 points/11 considered high-quality  Of the studies relevant to us:  • 10/11: 1 study • 9/11: 3 studies • 8/11: 2 studies • 7/11: 2 studies • 6/11: 2 studies • 5/11: 1 study	• Anxiety increased among students during COVID-19.  • Average prevalence of anxiety among students during COVID-19 was 24% (95% CI [20-29%]).  • Prevalence of anxiety was 25% (95% CI [17-34%]) during the outbreak phase of COVID-19 transmission.  • During diffusion attenuation, prevalence of anxiety was 42% (95% CI [35-50%]).	No	• No conflict of interest declared.  • Funding: Fundamental Research Funds for Central Universities.	• Critically Low	• <i>Frontiers in Public Health</i>	• 2
NCCMT, 2021	• What is the contribution of schools to COVID-19 transmission?	• Living rapid systematic review	• Start of pandemic – July 22, 2021.	Europe, North America	• 27 databases and sources were searched, including LitCovid and MedRxiv.	• 49 (17 relevant for our study)	• For systematic reviews: Assessment of multiple systematic reviews (AMSTAR 1)  • For other study types: Joanna Briggs Institute (JBI) critical appraisal tool.  • Grading of Recommendations, Assessment, Development and Evaluations (GRADE) approach.	Quality ratings of the studies relevant to us:  • High: 4 • Moderate: 9 • Low: 4	• Mitigation measures applied in schools, including mask-wearing, social distancing, and symptom screening, were effective in reducing transmission.  • Re-opening schools did not appear to increase community transmission, especially with other mitigation measures in place.	Yes  Low certainty	• No conflicts of interest to declare.  • Funding: nib Health.	• Critically low	• <i>National Collaborating Centre for Methods and Tools</i>	• 1 • 3
Walsh <i>et al.</i> , 2021	• Do school closures or re-openings affect community COVID-19 transmission, morbidity, or mortality?	• Systematic review	• Start of pandemic – 7 January 2021	North America, Europe, South America, Asia, Worldwide	• PubMed, Web of Science, Scopus, CINAHL, WHO Global COVID-19 Research Database, ERIC, British Education Index and Australian Education Index, Google.  • Experts asked.	• 40 (40 relevant for our study)	• Cochrane Risk of Bias in Non-randomised Studies of Interventions tool (ROBINS-I)	Risk of bias:  • Low: 0 studies • Moderate, serious or critical in all studies	• Half of the lower-bias studies showed no effect of school closures on transmission, while the other half showed reduced transmission.  • Most of the lower-bias studies showed no increase in transmission upon re-opening schools.  • Studies reporting reduced transmission upon school closure were at higher risk of bias than studies reporting no change.  • Studies reporting increased transmission upon school re-opening were more prone to bias than studies reporting no effect.	No	• No conflict of interest declared.  • Funding: nothing from public, commercial, or not-for-profit sectors.	• Low	• <i>BMJ Open</i>	• 1
Kourti <i>et al.</i> , 2021	• What has been the impact of COVID-19 school closures on incidences and reporting of domestic violence?	• Systematic review	• Start of pandemic – July 2020	South America, Europe, North America, Africa, Australia, Worldwide	• DOAJ, ERIC, Google Scholar, ProQuest, PubMed, PsycNet, Scopus.  • References of included studies searched.	• 32 (5 relevant for our study)	• Newcastle-Ottawa Scale (NOS) for cross-sectional and cohort studies.	For the studies relevant for us:  Cross-sectional studies  • 8/10 (high quality): 1 study • 6/10 (intermediate quality): 1 study • 4/10 (intermediate quality): 2 studies  Cohort studies  • Good quality: 1 study	• COVID-19 NPIs lead to reduced reports of violence towards children.  • Despite this, cases of child abuse may have increased.	No	• No conflict of interest declared.  • No funding.	• Critically low	• <i>Trauma, Violence &amp; Abuse</i>	• 2
Ayouni <i>et al.</i> , 2021	• Which public health NPIs have been effective in reducing	• Systematic review	• Start of pandemic – 16 March, 2021.	Asia, Europe, North	• PubMed, Science Direct, MedRxiv.	• 18 (4 relevant for our study)	• Effective Public Health Practice Project (EPHPP) quality assessment tool.	Quality ratings  • Quality ratings	• Multiple NPIs, including school closures, appeared to reduce transmission of COVID-19.	Yes  Mostly	• No conflict of interest declared.	• Low	• <i>BMC Public Health</i>	• 1

	the transmission of COVID-19?			America, Worldwide				For the studies that are relevant for us: • Strong: 0 studies • Moderate: 3 studies • Weak: 1 study		moderate level of evidence but low level of recommendation	• Funding: none.			
<b>Talic et al., 2021</b>	• How effective are public health measures, including school closures, in reducing the transmission of COVID-19?	• Systematic review and meta-analysis	• Start of pandemic – 7 June 2021.	Europe, Asia, North America, Africa, South America	• Medline, Embase, CINAHL, Global Health, Biosis, Joanna Briggs, WHO COVID-19 database.	• 72 (35 for individual interventions, 37 for multiple interventions) (5 relevant for our study)	• ROBINS-1 and Cochrane tool for assessing Risk Of Bias in randomised trials (ROB-2).	For the studies that are relevant for us:  • Risk of bias low in: 0 • Moderate in: 5 • High in: 0	• Studies were not in complete agreement, although mostly agree that school closures reduced COVID-19 transmission.	No	• Conflicting interests declared.  • No dedicated funding for the research.	• Low	• <i>The BMJ</i>	• 1
<b>Hammerstein et al., 2021</b>	• What has been the impact of COVID-19 school closures on student achievement?	• Systematic review	• March 1 2020 – April 30 2021.	Asia, Europe, Australia, North America	• Web of Science, PsycArXiv, EdArXiv, SocArXiv.  • Included articles' reference lists searched.	• 11 (11 relevant for our study)	• ROBINS-1	Risk of bias:  • 5 serious • 5 moderate • 1 low	• COVID-19 school closures reduced student achievement, including in Maths, Reading, and Science.  • Younger students were affected more.  • Students from lower socio-economic backgrounds were also affected more.	No	• Conflicting interests: none declared.  • Funding: no information.	• Critically low	• <i>Frontiers in Psychology</i>	• 2
<b>Muhammad, 2020</b>	• What are the effects of school closures on transmission of COVID-19?	• Rapid systematic review	• 2019 – May 2020	Asia, North America, Europe	• PubMed, WHO Global Research Database on COVID-19, Medline, BMJ, Cochrane, Social Care online.	• 8 (8 relevant for our study)	• None performed.	• None performed.	• Although studies did not universally agree, most showed that school closures reduced COVID-19 transmission.  • Earlier interventions appeared more effective.  • It is difficult to measure the specific effect of school closures, since multiple NPIs were often introduced simultaneously.	No	• Conflicting interests: no information.  • Funding: no information.	• Critically low	• <i>Kurdistan Journal of Applied Research</i>	• 1
<b>Bond et al., 2021</b>	• Which remote learning tools were employed during COVID-19 school closures, and what were their effects on children?	• Systematic review	• Start of pandemic – 5 May 2021	Asia, Europe, South America, North America, Australia, Africa	• Scopus, Web of Science, ERIC, Microsoft Academic Graph.  • Manual searching.	• 81 (81 relevant for our study)	• Evidence for Policy and Practice Information (EPPI) Centre method.	Quality appraisal involved two questions:  1) Does the study answer posed questions?  2) Is the evidence trustworthy?  All included studies answered research questions, and most were considered trustworthy.	• Some students' motivation to learn increased during remote learning, potentially due to increased independence.  • Attendance at virtual sessions was lower than pre-pandemic sessions in person.  • Poor engagement with online teaching, probably caused by social isolation.  • Some students had less access to technology required for remote learning.  • Some students' parents could not help with technological aspects.	No	• No conflict of interests declared.  • Funding from ERSC.	• Low	• <i>The International Public Policy Observatory</i>	• 2
<b>Sharma et al., 2021</b>	• What effects do COVID-19 school closures have on school children's sleep?	• Systematic review and meta-analysis	• Start of pandemic – October 13, 2020.	Asia, Europe, North America	• Medline, Embase, Web of Science.  • References of included studies also searched.	• 14 (9 relevant for our study)	• Joanna Briggs Institute (JBI) critical appraisal tool	Quality assessment:  For the studies that are relevant for us:  • 7/8: 5 studies • 6/8: 1 study • 5/8: 2 studies • 4/8: 1 study	• Some pupils slept better than before the pandemic, but three-times this many slept worse.  • 54% (95% CI [50-57%]) of children experienced sleep difficulties during COVID-19.  • 49% (95% CI [39-58%]) of children did not achieve recommended sleep amounts.	No	• No conflict of interest disclosed.  • No funding.	• Critically Low	• <i>Sleep medicine</i>	• 2
<b>Krishnarathne et al., 2022</b>	• What were the effects of COVID-19 in-school mitigations on transmission, morbidity, and mortality?	• Rapid systematic review	• Medline, Embase, Cochrane central register of controlled trials, ERIC, Cochrane COVID-19 study register, WHO	North America, Asia, Europe	• Start of pandemic – August 2021.	• 38 (38 relevant for our study)	• ROBINS-1 for quasi-experimental/observational studies  • Quality Assessment of Diagnostic Accuracy Studies (QUADAS-2) for observational screening studies	Mostly moderate or severe risk of bias	• Measures implemented in schools – including reducing class size, alternating attendance, mask-wearing, and case isolation - were effective in reducing community transmission and hospitalisation, but reduced the time spent in school.	Yes  Very low certainty	• Conflicts of interest declared.  • Funding: Ministry of Education and Research, Germany.	• High	• <i>Cochrane Database of Systematic Reviews</i>	• 3

	• What were the effects of in-school mitigations on social and mental health of school pupils?		COVID-19 global literature, Google.				• Bespoke tool for modelling studies • GRADE		• Little data was available on the impact of these measures on children (such as on pupils' mental health).					
<b>Elharake et al., 2022</b>	• What has been the mental health impact of COVID-19 school closures on pupils?	• Systematic review	• PubMed, Collabovid,	China	• January 2020 – July 2021	• 5 (5 relevant for out study)	• None performed.	• None performed.	• Anxiety, depression, and fatigue increased in school pupils during COVID-19 school closures.  • This was worse for pupils from low socioeconomic backgrounds, and for those with healthcare workers as family members.	No	• No conflicts of interest disclosed.  • Funding: Yale Institute for Global Health.	• Critically low	• <i>Child Psychiatry and Human Development</i>	• 2
<b>Meherali et al., 2021</b>	• What has been the mental health impact of COVID-19 and associated school closures on children and adolescents?	• Rapid systematic review	• MedLine, Embase, Web of Science Index Medicus, CINAHL, Lilacs, CENTRAL (Cochrane Library), eLINA (WHO), WHO COVID-19 databases, Google Scholar, MedRxiv, ChinaXiv.  • References of included studies and published systematic reviews searched.	Africa, Australia, North America, Europe, Asia	• Start of the pandemic – unclear	• 18 (13 relevant for our study)	• Mixed- Method Appraisal Tool (MMAT)	• Overall assessment unclear	• Mental health and wellbeing concerns increased among school pupils during COVID-19 NPIs.  • This included increased anxiety, depression, changes in sleep and appetite, and reduced social engagement.  • Risk factors included female students and those who spent more time on social media.	No	• No conflict of interest disclosed.  • Funding: Canadian Institutes of Health Research.	• Low	• <i>International Journal of environmental research and public health</i>	• 2
<b>Nussbaumer-Streit et al., 2020</b>	• How effective is quarantine of individuals who have had a COVID-19 contact – with and without other interventions such as school closures – against COVID-19 transmission?	• Rapid systematic review	• Cochrane COVID-19 Study Register, PubMed, Medline, WHO Global Index Medicus, Embase, CINAHL.  • Reference lists of published systematic reviews searched.	North America, Asia, Europe	• Start of pandemic – 23 June 2020	• 51 (6 relevant for our study)	• For non-randomised studies of interventions: ROBINS-I  • For non-randomised, non-controlled studies: Cochrane Childhood Cancer tool  • For modelling studies: International Society for Pharmacoeconomics and Outcomes Research (ISPOR) tool	Of the studies relevant to us:  • Observational studies with serious risk of bias: 1 study  • Modelling studies with no-minor concerns: 3 studies  • Modelling studies with moderate concerns: 1 study  • Modelling studies with major concerns: 1 study	• The combination of school closures with mandatory quarantine was effective in reducing COVID-19 transmission, more-so than mandatory quarantine on its own.	Yes  Mainly low certainty	• Conflict of interest declared.  Funding: • Liverpool School of Tropical Medicine • University for Continuing Education Krems  • Foreign, Commonwealth and Development Office	• Low	• <i>Cochrane Database of Systematic Reviews</i>	• 1
<b>Samji et al., 2021</b>	• What have been the mental health impacts of COVID-19 school closures on pupils?	• Systematic review	• Medline, PsycINFO, Scopus, PubMed, Embase, Web of Science, medRxiv, PsyArxiv, Cumulative index of Nursing and Allied Health Literature (CINAHL).	Europe, Asia, Africa, Australia, North America, South America	• January 1, 2020 – February 22, 2021.	• 116 (116 relevant for our study)	• Oxford Centre for Evidence-based Medicine tool.	A higher score indicates better quality evidence.  • 1 rating: 0 articles • 2 rating: 4 articles • 3 rating: 24 articles • 4 rating: 88 articles • 5 rating: 0 articles	• COVID-19 school closures were associated with reduced mental health in pupils.  • This was mitigated if pupils did more exercise or had better social support.  • Risk factors for poorer mental health included increased age, female pupils, pupils with neurodiversity, and pupils with long-term health concerns.	No	• No conflicts of interest declared.  • Funding: none.	• Low	• <i>The Association for Child and Adolescent Mental Health</i>	• 2
<b>Viner et al., 2020</b>	• What have been the effects of COVID-19 school closures on transmission, morbidity, and mortality?	• Rapid systematic review	• PubMed, WHO Global Research Database on COVID-19, MedRxiv.	Asia, UK	• Start of pandemic until March 19, 2020.	• 16 (6 relevant for our study)	• None performed.	• None performed.	• Although this study was from early in the pandemic (up to March 19, 2020), modelling studies revealed a small effect of school closures when compared to other NPIs.  • Predictions that school closures would reduce COVID-19 mortality by 2-4%.	No	• No conflicting interests declared.  • Funding: no information.	• Critically low	• <i>The Lancet Child and Adolescent Health</i>	• 1
<b>Viner et al., 2022</b>	• What is the effect of COVID-19 school closures on pupils' mental health and well-being?	• Systematic review	• PubMed, Psycinfo, Web of Science Social Citation Index, Australian	North America, Asia, Europe,	• Start of pandemic – September 1, 2020.	• 36 (36 relevant for our study)	• NOS-Cohort studies for cohort studies  • Modified NOS for cross-sectional studies	Quality  • High: 13 • Medium: 17 • Low: 6	• School closures were associated with negatively impacted mental health and well-being.	No	• No conflicting interests declared.  • Funding: no information.	• Low	• <i>JAMA Pediatrics</i>	• 2

			Education Index, British Education Index, Education Resources Information Centre, WHO Global Research Database on COVID-19, MedRxiv, PsyArXiv, Research Square, COVID-19 Living Evidence.  • Reference lists of included studies also searched.  • Experts in field consulted.	South America			• National Heart, Lung and Blood Institute (NHLBI) tool for pre-post studies		• School closures associated with reduced exercise, increased unhealthy eating, and increased obesity.  • School closures led to no change in suicide rates.  • Reduced reports of child abuse during school closures.  • Increase in sleep difficulties during school closures.					
<b>Lehmann et al., 2022</b>	• What are the impacts of COVID-19 school closures on psychosocial outcomes in pupils?	• Systematic review	• Academic Search Ultimate, Bibliography of Asian Studies, CINAHL, ERIC, Medline, APA PsycArticles, APA PsycInfo, PSYINDEX, SocINDEX, Teacher Reference Center, PubMed, Web of Science, ProQuest, Google Scholar, The Lancet Psychiatry, BMC Public Health, Science Direct.  • Experts consulted for additional papers.  • Included papers' reference lists searched.	Europe, North America, Asia	• Start of pandemic – July 29 <sup>th</sup> 2021.	• 10 (10 relevant for our study)	• Downs and Black checklist	Quality  • Good: 7 studies • Fair: 2 studies • Poor: 1 study	• COVID-19 school closures were associated with multiple psychosocial impacts on children, including anxiety, depression, hyperactivity, poor behaviour, and emotional issues.  • Parental stress was a risk factor for poorer child mental health.  • School closures often introduced alongside other measures, so difficult to identify specific effect of closures.	No	• Conflict of interests: no information.  • Funding: no information.	• Critically Low	• <i>International Journal of Developmental Science</i>	• 2
<b>Panagouli et al., 2021</b>	• What is the effect of COVID-19 school closures on academic performance of school children?	• Systematic review	• PubMed, Google Scholar, ERIC, SCOPUS, DOAJ, PsycNet  • Included papers' reference lists searched.	Asia, Europe, North America, Africa, Australia	• Start of pandemic – 18 July 2021	• 42 (42 relevant for our study)	• NOS for cross-sectional studies.  • NOS for cohort studies.	Cross-sectional studies  • All between 4 and 8 points (/10). Higher scores indicate better quality.  Cohort studies  • Mostly good quality.	• Some students had learning loss as a result of school closures.  • Others preferred online classes from home.  • Younger students and SEN students had worse learning loss.	No	• No conflicts of interest declared.  • No funding received for the study.	• Critically Low	• <i>Children</i>	• 2
<b>Mendez-Brito et al., 2021</b>	• What is the effectiveness of NPIs, including school closures, against COVID-19?	• Systematic review	• Embase, Medline, MedRxiv	Europe, North America, Australia, Asia, Worldwide	• January 2020 – March 9, 2021	• 34 (25 relevant for our study)	• Risk of bias tool	Quality assessment: Of the studies relevant for us: • 17/18: 1 study • 16/18: 4 studies • 15/18: 5 studies • 14/18: 6 studies • 13/18: 7 studies • 12/18: 1 study • 11/18: 1 study	• School closures were the most effective measured (including workplace closing, business closing, and public event bans) at reducing COVID-19 transmission.  • Introducing NPIs sooner increased effectiveness.	No	• No conflicts of interest declared.  • No funding received for the study.	• Critically Low	• <i>Journal of Infection</i>	• 1
<b>Chaabane et al., 2021</b>	• What is the effect of COVID-19 school closures on pupils' health?	• Rapid systematic review	• PubMed, Embase, Google Scholar	North America, Europe, Asia	• 1 January – 2 September 2020	• 10 (10 relevant for our study)	• GRADE	• All studies observational and therefore low-level evidence.	• School closures reduced hospital admissions – including of children.	Yes  Low certainty	• No conflicts of interest declared.	• Low	• <i>Children</i>	• 1  • 2

			<ul style="list-style-type: none"> <li>Included articles' reference lists also searched.</li> </ul>						<ul style="list-style-type: none"> <li>School closures prevented pupils from accessing food and disabled services in schools.</li> <li>School closures led to increased anxiety, loneliness, stress, hyperactivity, and reduced exercise.</li> <li>Sleep timing (not quality) was affected by school closures.</li> <li>School closures associated with increased children's BMI and obesity.</li> <li>Online learning was worse for students from lower socio-economic backgrounds.</li> </ul>		<ul style="list-style-type: none"> <li>No funding received for the study.</li> </ul>			
<b>Chai et al., 2021</b>	<ul style="list-style-type: none"> <li>What is the effect of COVID-19 and associated school closures on mental health of school pupils?</li> </ul>	<ul style="list-style-type: none"> <li>Systematic review and meta-analysis</li> </ul>	<ul style="list-style-type: none"> <li>PubMed, Web of Science, PsycINFO, Google Scholar, China National Knowledge Infrastructure (CNKI).</li> <li>References of included studies also searched.</li> </ul>	China	<ul style="list-style-type: none"> <li>November 1 2019 – March 1 2021.</li> </ul>	<ul style="list-style-type: none"> <li>12 (12 relevant for our study)</li> </ul>	<ul style="list-style-type: none"> <li>JBIC Critical Appraisal Checklist</li> </ul>	Quality assessment: <ul style="list-style-type: none"> <li>8/9: 7 studies</li> <li>9/9: 4 studies</li> </ul>	<ul style="list-style-type: none"> <li>Mental health problems among pupils increased during COVID-19 school closures.</li> <li>Prevalence of mental health problems among school pupils was 28% (95% CI [22-34%]) during COVID-19.</li> </ul>	No	<ul style="list-style-type: none"> <li>No conflicts of interest declared.</li> <li>Funding: National Natural Science Foundation of China.</li> </ul>	<ul style="list-style-type: none"> <li>Low</li> </ul>	<ul style="list-style-type: none"> <li>Frontiers in Pediatrics</li> </ul>	<ul style="list-style-type: none"> <li>2</li> </ul>
<b>Suk et al., 2020</b>	<ul style="list-style-type: none"> <li>What is the effect of school closures on COVID-19 transmission?</li> </ul>	<ul style="list-style-type: none"> <li>Systematic review</li> </ul>	<ul style="list-style-type: none"> <li>Medline, Embase.</li> <li>Reference lists of included articles were also searched.</li> </ul>	Europe, North America, Asia, Australia	<ul style="list-style-type: none"> <li>December 2019 – August 31, 2020.</li> </ul>	<ul style="list-style-type: none"> <li>22 (8 relevant for our study)</li> </ul>	<ul style="list-style-type: none"> <li>None performed.</li> </ul>	<ul style="list-style-type: none"> <li>None performed.</li> </ul>	<ul style="list-style-type: none"> <li>School closures probably reduced COVID-19 transmission.</li> <li>School closures were more effective when introduced in a period of low community transmission.</li> </ul>	No	<ul style="list-style-type: none"> <li>Conflicts of interest: no information.</li> <li>Funding: ECDC.</li> </ul>	<ul style="list-style-type: none"> <li>Critically low</li> </ul>	<ul style="list-style-type: none"> <li>medRxiv</li> </ul>	<ul style="list-style-type: none"> <li>1</li> </ul>
<b>Vardavas et al., 2021</b>	<ul style="list-style-type: none"> <li>What have been the effects of mitigations in schools on COVID-19 transmission, morbidity, and mortality?</li> </ul>	<ul style="list-style-type: none"> <li>Systematic review</li> </ul>	<ul style="list-style-type: none"> <li>Medline, Embase</li> <li>Reference lists of included articles were also searched.</li> </ul>	North America, Asia, Europe, Australia	<ul style="list-style-type: none"> <li>December 2019 – April 1 2021.</li> </ul>	<ul style="list-style-type: none"> <li>15 (14 relevant for our study)</li> </ul>	<ul style="list-style-type: none"> <li>None performed.</li> </ul>	<ul style="list-style-type: none"> <li>None performed.</li> </ul>	<ul style="list-style-type: none"> <li>NPIs implemented in schools reduced COVID-19 transmission.</li> <li>Little COVID-19 transmission occurred in schools when mitigations were also in place.</li> </ul>	No	<ul style="list-style-type: none"> <li>Conflicts of interest: none declared.</li> <li>Funding: ECDC.</li> </ul>	<ul style="list-style-type: none"> <li>Critically low</li> </ul>	<ul style="list-style-type: none"> <li>medRxiv</li> </ul>	<ul style="list-style-type: none"> <li>3</li> </ul>
<b>Chang et al., 2021</b>	<ul style="list-style-type: none"> <li>What are the effects of COVID-19 school closures on BMI and obesity of pupils?</li> </ul>	<ul style="list-style-type: none"> <li>Systematic review and meta-analysis</li> </ul>	<ul style="list-style-type: none"> <li>Embase, Medline, Cochrane library, CINAHL.</li> <li>Manual searches in Google Scholar.</li> </ul>	Asia, Europe, North America, Africa	<ul style="list-style-type: none"> <li>Start of pandemic – 9 October 2021.</li> </ul>	<ul style="list-style-type: none"> <li>12 (12 relevant for our study)</li> </ul>	<ul style="list-style-type: none"> <li>NOS</li> </ul>	Quality assessment: <ul style="list-style-type: none"> <li>8/8: 4 studies</li> <li>7/8: 7 studies</li> <li>6/8: 1 study</li> </ul>	<ul style="list-style-type: none"> <li>COVID-19 school closures were associated with an increase in pupils' bodyweight by 2.67 kg (95% CI [2.12-3.23], p&lt;0.00001) on average.</li> <li>Pupils' BMI increased by 0.77 units (95% CI [0.33-1.20], p=0.0006) on average.</li> <li>Prevalence of obesity increased by 1.23-fold (95% CI [1.10-1.37], p=0.0002) on average.</li> </ul>	No	<ul style="list-style-type: none"> <li>Conflicts of interest: none declared.</li> <li>Funding: Chi Mei Medical Center.</li> </ul>	<ul style="list-style-type: none"> <li>Critically Low</li> </ul>	<ul style="list-style-type: none"> <li>Nutrients</li> </ul>	<ul style="list-style-type: none"> <li>2</li> </ul>
<b>Caini et al., 2022</b>	<ul style="list-style-type: none"> <li>How much COVID-19 transmission occurs in schools?</li> </ul>	<ul style="list-style-type: none"> <li>Systematic review and meta-analysis</li> </ul>	<ul style="list-style-type: none"> <li>PubMed, Medline, Web of Science, SCI Expanded, Living Evidence on COVID database.</li> </ul>	Europe, Asia, North America	<ul style="list-style-type: none"> <li>Start of pandemic – 15 May 2021.</li> </ul>	<ul style="list-style-type: none"> <li>43 (43 relevant for us)</li> </ul>	<ul style="list-style-type: none"> <li>JBIC Critical Appraisal Tool</li> </ul>	<ul style="list-style-type: none"> <li>Most high quality.</li> </ul>	<ul style="list-style-type: none"> <li>Children were less likely to transmit COVID-19 than adults, and less likely to be infected themselves.</li> <li>Limited COVID-19 transmission occurred in schools.</li> </ul>	No	<ul style="list-style-type: none"> <li>Conflicts of interest: none declared.</li> <li>Funding: EuCARE Project, Fondazione Invernizzi and Fondazione CARIPLO, Chance Project.</li> </ul>	<ul style="list-style-type: none"> <li>Critically Low</li> </ul>	<ul style="list-style-type: none"> <li>International Journal of Environmental Research and Public Health</li> </ul>	<ul style="list-style-type: none"> <li>1</li> </ul>

**Supplementary Table 1:** Characteristics of included studies. We have only listed the questions and study conclusions that are relevant for our study.