Adolescence in the Time of COVID-19
Evidence from Bangladesh

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*Photo credit: Nathalie Bertrams/GAGE
COVID-19 and Adolescents

- Covid-19 has rapidly disrupted the lives of individuals across the globe.
  - Direct health effects = largely among elderly
  - BUT Virus will have multi-dimensional effects on young people

- Particular concern around impact of school closures and negative economic shocks.

- Our sample in Bangladesh:
  - ALL in school when COVID-19 lockdown.
  - 50% of households report losing employment permanently or temporarily due to COVID-19
  - 83% of households reporting some income loss

- Concern that impacts may be particularly acute for adolescent girls in LMICs
COVID-19 and Adolescents

- Preliminary global evidence suggests that adolescents who were enrolled in school when the pandemic hit may now:
  - engage in paid work to supplement family income;
  - take on larger roles in the household, become pregnant, or face pressure to marry
  - all factors that will constrain school return when the schools reopen
- The expected gendered impact of school closures echoes previous evidence from crises (i) increased burden of care-work for women (ii) disruptions in access to sexual and reproductive health services (iii) and increases in domestic violence for women and girls
- COVID-19 pandemic threatens to undermine many of the recent gains in girl’s education and to stunt further progress.
Gender and Adolescence: Global Evidence (GAGE): A longitudinal research programme (2015-2024)  
https://www.gage.odi.org/

By finding out ‘what works,’ for whom, where and why, we can better support adolescent girls and boys to maximise their capabilities now and in the future.

We are following 20,000 adolescent girls and boys - the largest cohort of adolescents in the Global South.
COVID-19 in Bangladesh

- March 8: Initial cases led the government to implement restrictions on mobility and social gatherings to control the spread of the virus.
- March 17: when the country had eight confirmed cases, the government declared a school closure.
- COVID-19 Survey start: Bangladesh had identified approximately 12,000 cases of COVID-19.
- During the survey administration period, this number jumped to 137,787 cases.
- As of October 8, 2020, Bangladesh had reported 374,592 cases and 5,460 deaths from COVID-19.
- In response, the government has repeatedly extended school closures, and they remain closed.
Summary

- 2,095 in-school adolescents aged 10–18
- Food insecurity, anxiety, and mental health issues
- Decreased access to learning, increased time spent on chores, and affected job aspirations
- Innovative remote learning methods, re-enrollment campaigns, nutrition and counseling programs, training for teachers
- Data collected before and after COVID-19
- Identified multidimensional impacts on families
- With serious adverse effects on adolescents due to school closures
- Necessitating targeted policies and interventions
Sample

- **2,220** school adolescents from Chittagong and Shylet in Bangladesh
- 12.8 years old on average, Grades 7 and 8
- 54% female
- Two rounds:
  - **Round One:** February and March 2020 through face-to-face interviews
  - **Round Two:** May and June 2020 through computer-assisted telephone interviewing
- Reached 2,156 of the Round One sample, a 97% recontact rate.
Methods

• Impact of COVID-19 on:
  i. Household level earnings and food security
  ii. Adolescent education
  iii. Adolescent future job aspirations
  iv. Adolescent mental health and anxiety

• Regression analysis controlling for pre-COVID-19 measure of outcome

• Explore heterogeneity according to household vulnerability status and gender.

• Household vulnerability follows Acharya and Parwal (2020): socioeconomic, demographic, housing and hygiene conditions, availability of health care, and epidemiological.
Findings: Economic

- 50% of the sampled households report losing employment permanently or temporarily due to COVID-19,
- 83% percent of households reporting some income loss
- 65% of households worrying that they will not be able to meet basic household needs
- only 58% of households being able to buy essential food items
Findings: Food Security

- 34% of households report cutting back food to adolescents in the household, compared to 13% at baseline.
- 59% of adolescents report that their meals are less likely to contain protein.
- There is a strong reported reduction in dietary diversity, with most households (75 percent) reporting reductions in consumption of meat.

“[My father] couldn’t bring rice because of the [earning loss during] lockdown. I would eat lentils. He would try to bring this and that, but [some days he couldn’t bring anything at all]. When he couldn’t bring it, we wouldn’t eat. When he would bring it, we’d eat then.”

~13-year-old girl, Chittagong rural district
Findings by Vulnerable and Gender

Share of adolescents less likely to get protein
- Vulnerable: 60%
- Non-vulnerable: 34%

Share of households cut back food for Adolescents
- Vulnerable: 35%
- Non-vulnerable: 13%

Share of adolescents less likely to get protein
- Female: 58%
- Male: 62%

Share of households cut back food for Adolescents
- Female: 35%
- Male: 31%
Findings: Education

All adolescents report doing something to continue learning while schools are closed

- 85% spending time studying with own books
- 22% been in contact with a school-teacher
- 9% report using any media to support learning
  (12% girls vs. 4% boys)

“We have a television in our home but not in my room. Can you always go to someone else’s room to watch television? That’s why I didn’t watch those TV classes. Besides... we lose electricity connection every time it is cloudy outside!”

~14 year old girl
Findings: Education

50% spending less time on education than before the lockdown

94% reporting increased time on household chores or childcare

no sig. dif. between boys and girls

girls were already spending twice as much time on chores than boys before
Findings: Education

I will be able to return to school
Girls: 91%
Boys: 86%

I will not be able to return to school
Girls: 0.8%
Boys: 3.6%
Mothers: 25% (child will not be able to …)

“I'm wasting my time in this period just doing nothing …. by [helping my uncle in his grocery shop] I can learn about this work.”

- 13 year old boy from Sylhet
Findings: Mental Health

- 80% of adolescents report that household stress increased since the onset of COVID-19
- 75% of adolescents reporting either that they are at least moderately scared about COVID-19 or worried about it

However:
- Rates of moderate/severe depression are extremely low at about 1% both pre- and post-COVID-19

“Boys go out, they always go out. But girls don't go out much.”
- 14-year-old girl from urban Sylhet
4 Insights:

1. Financial incentives / support is key

2. Printed material (+ engaging TV & phone content) are our best bet to minimize learning losses

3. Getting children back to school won’t be easy:
   a) Worry about boys too, customized approaches may be needed
   b) Convince parents

4. Mental health and nutrition support could make a difference
Please feel free to contact either of us:
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Shwetlena Sabarwal: ssabarwal@worldbank.org

THANK YOU!

Policy Brief:
# Vulnerability Index

<table>
<thead>
<tr>
<th>Table A1: Vulnerability Index Components</th>
<th>mean</th>
<th>sd</th>
</tr>
</thead>
<tbody>
<tr>
<td>Vulnerability Index Score (higher more vulnerable)</td>
<td>2.707</td>
<td>1.387</td>
</tr>
<tr>
<td>=1 if household head has Senior School Certificate (SSC) or higher</td>
<td>0.216</td>
<td>0.411</td>
</tr>
<tr>
<td>=1 if household has at least one high value asset</td>
<td>0.783</td>
<td>0.413</td>
</tr>
<tr>
<td>Urban location</td>
<td>0.149</td>
<td>0.356</td>
</tr>
<tr>
<td>=1 if household members over 60 years old</td>
<td>0.296</td>
<td>0.457</td>
</tr>
<tr>
<td># of rooms in house</td>
<td>3.112</td>
<td>1.436</td>
</tr>
<tr>
<td>=1 if household has own toilet</td>
<td>0.853</td>
<td>0.354</td>
</tr>
<tr>
<td>=1 if adolescent has soap and water</td>
<td>0.948</td>
<td>0.221</td>
</tr>
<tr>
<td>=1 if distance from healthcare facility is a big problem</td>
<td>0.190</td>
<td>0.393</td>
</tr>
<tr>
<td>=1 if lack of money for health advice/treatment is a big problem</td>
<td>0.225</td>
<td>0.417</td>
</tr>
<tr>
<td>=1 if any household member has a chronic condition</td>
<td>0.224</td>
<td>0.417</td>
</tr>
<tr>
<td>=1 if household has at least one high value asset</td>
<td>0.037</td>
<td>0.189</td>
</tr>
</tbody>
</table>
COVID-19 impact on school age girls and adolescents in Punjab Pakistan

First insights from the SMS GIRL Impact Evaluation

**Team:** Koen Geven, Tazeen Fasih, Amer Hasan, Javaeria Qureshi (UIC), Kevin Macdonald, Rabea Malik (LUMS), Ayesha Tahir, Najaf Zahra, Naveed Hussain

SMS GIRL is supported by SIEF and SAR GIL
Structure

1. **Background** on Punjab and PESP-3
2. **Pandemic impact and response** in Punjab
3. Baseline **Survey Findings**
4. How is our **thinking evolving** and what is the **intervention** doing?
Background on Punjab and PESP-3
Context of adolescent enrolment in Punjab and Pakistan

* Data from household surveys 1990-2019, Education Data Depot
Girls and boys school enrolment in Punjab (age 10-16)

- % Secondary school enrolment


- DPC
- PESP

- Punjab - Boys
- Punjab - Girls
### Governance
- Establish a **Delivery Chain** with accountability at different levels from province to districts to schools
- Increase **volume and efficiency of public financing** and empowering districts and schools to spend
- Use of an **independent monitoring system**, which provided additional accountability

### Access
- Make **education free for all** at the point of access (no tuition, free textbooks)
- **Scale up supply**: public-private partnerships and missing facilities in public sector
- **Strengthen girls’ enrolment** through conditional cash transfers

### Learning
- Build a **teaching profession** through merit-based recruitment, teacher mentoring and professional development
- Use **student assessments** to diagnose learning difficulties and introduce accountability
Pandemic Impact in Punjab
The Pandemic Timeline

- **March 1**: Start of school year
- **March 15**: School closures
- **April 01**: Total Lockdown ended
- **April 02**: Launch of remote learning
- **May 09**: Country-wide lockdown ended
- **September 15**: School opening
- **November 26**: School closures
- **26th October**: SMS GIRL
- **January 11**: Projected Schools re-opening date
Projections of learning loss are substantial

- **Dropouts are expected to increase by 930,000 children.**
- **Reduction in LAYS from 4.8 to 4.5 in intermediate scenario**

Learning Poverty projected to increase from 65% to 70% in Punjab.

Source: Geven & Hasan, 2020
How do we expect the pandemic to impact adolescents?

Household shocks may affect boys and girls in different ways:

Potential impacts on Adolescent Girls:
- Intra-household allocations
- Shifting household roles
- Safety Perceptions

Potential effect on adolescent boys:
- Generating income for the family

Source: Aslam & Kingdon, 2008
Jacob & Mansuri, 2011
Sample

- 5,362 Girls in Grade 6 (age 10-14)
- 2,774 of these girls and families participated in SABER Service Delivery (SD) conducted in Punjab from March 2018 – December 2018.
- Additional sample of 2,588 girls enrolled in public school pre-pandemic in the same age group
- Additional sample of 536 Boys who participated in SABER SD
- Baseline interviews happened from 19 August – 27 October

What we know about the SABER kids pre-pandemic (2018):

<table>
<thead>
<tr>
<th></th>
<th>Girls</th>
<th>Boys</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>School Type</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Public</td>
<td>83%</td>
<td>49%</td>
</tr>
<tr>
<td>Private</td>
<td>6%</td>
<td>18%</td>
</tr>
<tr>
<td>PPP</td>
<td>11%</td>
<td>32%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>5362</td>
<td>536</td>
</tr>
</tbody>
</table>

Learning Data (Math, English, Urdu)

School Type (Public, Private, PEF)

School Environment

Teacher Quality

Family Background
Intervention: SMS GIRL is using informational nudges to:

- Encourage parents to engage their daughters in distance learning
- Encouraging parents to re-enroll girls in schools
- Provide information to parents about girls’ stipend program
SMS GIRL Baseline Key Findings
What is the pandemic like in Pakistan?

Household shocks faced during COVID-19:

- **33.7%** lost a substantial share of income
- **0.7%** got sick from COVID-19
- **0.2%** someone has died from COVID-19

What did other research find about the pandemic?

- Pakistan had 403,311 COVID cases reported (Dawn dashboard)

CERP Economic Vulnerability Analysis:

- Income/employment emerges as the main concern of households
- Health was cited as the top concern by 15% of respondents
- 54% of households have suffered income losses between February 2020 and May 2020
Most students in our sample have access to TV-based & online remote learning program in principle

**Households own a TV or Internet**
- Girl: 68%
- Boy: 63%

**Households own a TV**
- Girl: 63%
- Boy: 55%

**Households own a cell phone**
- Girl: 87%
- Boy: 84%

**Households own a smart phone**
- Girl: 29%
- Boy: 36%

**Households has internet of cellphone**
- Girl: 17%
- Boy: 19%

**Households has internet on cable**
- Girl: 6%
- Boy: 5%

**Households own WIFI**
- Girl: 3%
- Boy: 4%
Time use during the lockdowns is somewhat gendered

Time Use of Girls and Boys while they are at home:

<table>
<thead>
<tr>
<th>Activity</th>
<th>Girls*</th>
<th>% any</th>
<th>Boys*</th>
<th>% any</th>
</tr>
</thead>
<tbody>
<tr>
<td>Remote Learning</td>
<td>0</td>
<td>12%</td>
<td>0</td>
<td>14%</td>
</tr>
<tr>
<td>Other Learning</td>
<td>3</td>
<td>88%</td>
<td>3</td>
<td>86%</td>
</tr>
<tr>
<td>Household tasks</td>
<td>2</td>
<td>86%</td>
<td>1.5</td>
<td>81%</td>
</tr>
<tr>
<td>Income generation</td>
<td>0</td>
<td>17%</td>
<td>0</td>
<td>42%</td>
</tr>
<tr>
<td>Play and entertainment</td>
<td>1</td>
<td>75%</td>
<td>2</td>
<td>83%</td>
</tr>
<tr>
<td>Religious activities</td>
<td>1</td>
<td>90%</td>
<td>2</td>
<td>94%</td>
</tr>
<tr>
<td>Sleep</td>
<td>9</td>
<td>95%</td>
<td>9</td>
<td>97%</td>
</tr>
</tbody>
</table>

*Reports median time use

Key Differences:

- **Girls** and boys spend equal amounts of time on learning
- **Girls** are less often engaged in income generation
- **Girls** get an hour less for play and entertainment
- **Girls** spent an hour less at prayer/mosque
The pandemic had drastically affected expectations about the future:

25.6% of girls’ parents and 40.5% of boy’s parents have reduced expectations for the highest grade completed.

...Reasons for reduction in parental expectations:

- Child will not catch up with learning
  - Girl: 76%
  - Boy: 72%
- Decrease in household income
  - Girl: 19%
  - Boy: 17%
- Child will generate income for the family
  - Girl: 2%
  - Boy: 5%
- Fewer income opportunities for the child
  - Girl: 7%
  - Boy: 7%
- Child helps at home
  - Girl: 2%
  - Boy: 1%
Parents are not concerned about school reopening overall, although there are slightly gendered concerns about safety.

...Issues parents are concerned about with regard to school-reopening:

- No concern
  - Girl: 89%
  - Boy: 89%

- Concerns about price of education
  - Girl: 3%
  - Boy: 4%

- Concerned about health of child or family
  - Girl: 2%
  - Boy: 0%

- Child falling behind in learning
  - Girl: 2%
  - Boy: 2%

- Concerns about Government SOPs
  - Girl: 5%
  - Boy: 4%
We are losing a substantial share of students from the education system, particularly in adolescence.

2.5% of girls in our sample who were enrolled in schools pre-COVID will not return to school after schools reopen.

But that goes up to >10% for adolescents.

*Predicted margins from a logistic regression where the outcome is parental intention to withdraw from school*
Knowledge about government initiatives is surprisingly low

- 16% of parents are aware of TV Learning Opportunities
- 14% of parents are aware of other Learning Opportunities
- 4.5% eligible parents are aware of stipends for enrolment
Take up of remote learning program is even lower, but heavily driven by knowledge of these programs.

9% of all girls (8% of boys) in the sample participate in remote learning.

32% of girls (28% of boys) whose parents are aware of opportunities participate in remote learning.
How is our thinking evolving and what is our intervention doing?
Official Use

Research Question:
Are text messaging campaigns an effective tool to keep girls learning during school closures, and to get them to re-enroll to school after schools re-open?

Target population:
Girls in Grade 6 (age 10-14)

- T1: Received gendered messages focused explicitly on girls
- T2: Received messages focused on both boys and girls
- T3: Informational nudges to increase parental information about Government's stipend program

How is Our Thinking Evolving?

This pandemic is primarily an economic and a schooling shock

...We should be concerned about:

- Target potential dropouts among age 10-14, but also older adolescent girls AND boys
- Target gendered time use, particularly through highlighting the importance of (remote) learning, social connections and entertainment
- Use text messages to increase household knowledge of government initiatives
- Improve cash disbursement and options for remote learning more programmatically
Research Question: Are text messaging campaigns effective to keep girls learning during school closures, and help them to return to school after re-opening?

Target population: Girls in Grade 6 (age 10-14)

Treatment
- T1: Messages focused explicitly on girls
- T2: Messages neutrally framed for any children
- T3: Informational nudges to increase parental information about Government’s stipend program
Parents receive several messages per week, which can be:

- **FACT** texts, parents are informed about how girls learn, the returns to schooling, etc.
- **ACTION** texts provide suggestions to parents about what they can do at home (learning, support)
- **TALKING POINTS** texts provide parents with suggestions on how to talk to their daughters about learning.
- **VOICE MESSAGES** spoken by someone who the parents know drive these points home in conversation.

Timeline & Next Steps

- Midline 1 (completed), Midline 2 (December) + Endline (January/February) – Promising Findings
- Continuing text messages and voice messages
- Qualitative work to understand household dynamics
- Phone-based assessment
Thank you

Questions/suggestions welcome!