State of Mind and Human Capital Formation: Evidence from Indian Schools*

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September 10, 2026

Abstract

Around 83% of U.S. K-12 schools have implemented a social-emotional learning (SEL) curriculum, yet we have little evidence on their efficacy. We study the effects of India's "Happiness Curriculum," the world's largest SEL curriculum, reaching millions of students in grades 1–8. The Happiness Curriculum replaces the first 30 minutes of each school day with guided mindfulness meditation followed by stories and activities designed to help students understand their thoughts, emotions, and relationships. We conduct a randomized control trial in partnership with the state of Tripura following over 4,000 students for 2 years. We randomly assign grades to receive either the Happiness Curriculum, daily mindfulness practice, or teaching-as-usual. Students' math scores in SEL and mindfulness grades increase by 0.12 SD after 6 months and 0.29 SD after 2 years, equivalent to an additional year of learning. Math gains are driven by daily mindfulness practice and likely operate through improved reasoning and problem-solving. We observe little effect on measures of anxiety or depression. Our results reveal that programs targeting state of mind can be cost-effective ways to improve academic achievement.

*Our research has been supported by J-PAL's Post-Primary Education and Learning for All initiatives, the Weiss Fund, the Fund for Innovation in Development, Development Innovation Ventures, Harvard's Mind Brain Behaviour initiative, and the Harvard Stone Program in Inequality and Wealth Concentration. We are grateful for advice and support from Gautam Rao. We also thank Maya Barr, Christina Brown, Guthrie Gray-Lobe, Micah Kaats, Michael Kremer, Pierre-Luc Vautrey, Martin West, and seminar participants at the University of Michigan and Harvard University for helpful comments. We are grateful to Aman Haider, Parker Howell, Max Klarman, Srinish Muthukrishnan, and especially Trishna Saikia for outstanding research assistance.

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1 Introduction

By 2023, 83% of U.S. K-12 schools implemented a social-emotional learning (SEL) curriculum (Skoog-Hoffman et al., 2024). Prominent examples include large school districts like New York City and Los Angeles, which instituted mindful breathing and free therapy programs (Closson, 2023). Despite the marked expansion of SEL and mindfulness in schools, we have little causal evidence on their efficacy. The primary focus of SEL and mindfulness programs are to improve students' mental well-being. However, debate centers on their impact on learning. Critics argue that any mental health benefits are not worth the learning cost of time away from traditional subjects. Some governments have banned SEL in schools (Anderson, 2022). By contrast, proponents argue that SEL and mindfulness can have learning benefits by increasing focus and attention throughout the day.

SEL and mindfulness programs exist in diverse contexts around the world. One of the earliest and largest examples comes from India. In 2018, the Delhi government introduced a "Happiness Curriculum" in its 1,500+ primary schools, reaching millions of students across grades 1–8. The program modifies each school day to replace the first 30 minutes of standard subjects with a short, guided mindfulness meditation, followed by stories and activities designed to help students understand their thoughts, emotions, and relationships. Since its inception in Delhi, states across India and international governments have introduced the Happiness Curriculum in their schools.

We partnered with the latest government to adopt the Happiness Curriculum, the Indian state of Tripura, to embed a randomized control trial (RCT) into the statewide roll-out of the program. The experiment tracked over 4,000 students in grades 1-8 across 100 randomly selected schools during the first 2 years of the program's implementation in Tripura. We measure outcome data on mental health and academic performance before the program's implementation (baseline), at the 6-month mark (midline), and at the end of the second academic year (endline).

We randomized grades within schools to receive either the Happiness Curriculum or

teaching as usual during the first 30 minutes of each day. The curriculum is incorporated by shortening other subjects by 5 minutes and is taught by students' regular teachers. To disentangle the effects of daily mindfulness meditation from SEL exercises, we introduced a second treatment arm that exposed students to only the mindfulness portion of the curriculum. Mindfulness is the fastest growing health trend in the U.S. (Tlalka, 2018). It has documented benefits for anxiety, depression, and self-control in clinical settings (Davis and Hayes, 2011; Duckworth et al., 2018).

Our experiment reveals that daily mindfulness and SEL practice leads to large learning gains. Students in treated grades performed 0.12 standard deviations better on objective math tests compared to students in control grades after the first 6 months of the curriculum. Effects increased to 0.29 standard deviations by the end of the second academic year. The increase is equivalent to around a year's worth of learning on average in control grades. We find no evidence of reading gains, consistent with evidence that educational interventions tend to be more effective at increasing math achievement than reading (Fryer Jr., 2017).

Math gains appear to be driven by the mindfulness meditation component of the curriculum. Point estimates of the mindfulness only intervention are consistently larger than the full curriculum, though we cannot reject equality of treatment effects between the two arms. Consistent with the effects operating through improved reasoning and problem-solving, we find a similar increase in students' performance on Raven's matrices, which are puzzles designed to measure fluid intelligence.

Despite the Happiness Curriculum's striking impact on learning, we find limited effects on students' mental well-being. Students in our setting face serious mental health challenges. Around one third report either mild depression or anxiety at baseline as measured using common screening tools. We find that mindfulness alleviates some of these challenges in the short run, with decreases in anxiety levels of 0.10 standard deviations for students in mindfulness grades after 6 months. However, effects dissipate by the end of the second year. We observe no significant effects of the full Happiness Curriculum on student well-being.

Our results reveal that state of mind is an important input into human capital formation, and suggest that programs targeting state of mind can lead to large learning gains. We find that the marginal minutes of schooling are better spent on mindfulness than on standard teaching in our context. A cost-effectiveness analysis indicates that a 0.1 standard deviation increase in math scores costs around $0.73 per student, putting our program in the upper tail of education programs evaluated to-date. However, solving the acute mental health crisis in schools around the world may require additional intervention.

Our study contributes to a growing literature in economics on programs targeting SEL or non-cognitive skills. The effects of these programs are mixed. Educational interventions targeting grit, cognitive endurance, negotiation, and life skills find improvements in math and dropout rates (Alan et al., 2019; Ashraf et al., 2020; Brown et al., 2025; Edmonds et al., 2023). By contrast, interventions targeting growth mindset and curiosity find limited effects on learning outcomes (Alan and Mumcu, 2024; Ganimian, 2020; Huillery et al., 2025). Most evidence on the effects of mindfulness comes from high-income countries and non-school settings (Shreekumar and Vautrey, 2022). Studies on mindfulness programs in schools find mixed results (Cassar et al., 2022; Kuyken et al., 2022).

Our study is distinct in several ways. Whereas most studies of SEL and mindfulness programs are implemented by external research teams for a short time period, students in our setting receive a daily 30-minute Happiness class taught by their regular school teachers. As a result, we are able to study the effects of the most intensive SEL program to date delivered at scale, and track its effects in the short and medium term. In other words, we are able to assess how an SEL program impacts learning outcomes if it were introduced *as part of a primary school curriculum.* Our results inform the many governments and school districts in India and beyond who are considering SEL programs.

More generally, we contribute to research on the inputs in human capital formation. Growing evidence indicates that non-cognitive and soft skills formed during childhood impact labor market outcomes (Chetty et al., 2011; Deming, 2017). Factors that may influence state

of mind such as sleep, peer effects, and exposure to violence or disasters have also been shown to influence individuals' schooling decisions (Ang, 2021; Bursztyn and Jensen, 2015; Jagnani, 2022; Moorthy and Tanaka, 2026; Rao, 2019). Our results provide new evidence on the direct role of students' state of mind in learning.

The remainder of the paper is as follows. Section 2 provides background on the Happiness Curriculum and state of Tripura, where our study takes place. Section 3 describes our data and research design. Section 4 describes our experimental results. Section 5 concludes.

2 Background

We provide background on the Happiness Curriculum, the world's largest SEL program. We then describe our study's setting, the state of Tripura in northeast India, and provide new evidence on the mental well-being of our student population.

2.1 The Happiness Curriculum

The Happiness Curriculum is a SEL program developed by the Labhya Foundation based on techniques of mindfulness, the practice of focusing one's attention on experiencing the present moment (Kabat-Zinn, 2003). The Delhi government first adopted the curriculum in all of their 1,535 primary schools in 2018, reaching over 1.2 million students in grades 1–8. Since its initial adoption in Delhi, state governments in Uttarakhand, Punjab, and Tripura (the setting of our study) have introduced the Happiness Curriculum. Government officials from the UAE and Afghanistan have attended Happiness classes (Anand, 2018). Other notable attendees include the Dalai Lama, who inaugurated the first Happiness class, Melania Trump, and Selena Gomez.

The Happiness Curriculum consists of a 30-minute class taking places 5 days a week, made room for by shortening other subjects by 5 minutes. Classes involve two main components. Each class begins and ends with 2–3 minutes of guided mindfulness meditation surrounding

20–25 minutes of age-adapted SEL learning activities, games, and stories. Activities in early grades focus on students' feelings and emotions. For instance, a sensory awareness exercise for grade 1–2 students involves identifying classroom objects by touch with eyes closed, and a class discussion about shape and feel. Later grades focus on students' relationships with others and themes of friendship, trust, teamwork, and cooperation. One day a week is spent on activities related to mindfulness.[1]

A distinct feature of the Happiness Curriculum is that the daily classes are led by students' regular school teachers. A teacher-led model lowers implementation and scaling costs, while increasing student familiarity. It could also lead to heterogeneous impacts based on teacher buy-in or other attributes. Heads of schools nominate teachers for each grade. The Labhya Foundation provides teacher training, manuals, and support.

Interest in happiness as a metric has spread in other formats. A Yale course on Happiness was one of the most popular courses offered in the university's history (Oswaks, 2021). The Happier Lives Institute and World Happiness Report measure impact in terms of well-being (Helliwell et al., 2025; HLI, 2025). Bhutan uses a measure of gross national happiness as a primary development indicator (Alkire et al., 2012). Despite growing interest in mindfulness and SEL as part of a primary school curriculum, we have little causal evidence on how these programs impact student learning and wellbeing.

2.2 Setting

To examine the effects of the Happiness Curriculum, we partnered with the most recent government to introduce the curriculum at the time of the study, the state of Tripura in north-east India. Tripura is a relatively under-developed state located to the east of Bangladesh, with 30% of the population from historically disadvantaged Scheduled Tribes (Figure A.1). Around 63% of the state speaks Bengali, concentrated in the main city Agartala. Another

[1]Mindfulness activities include the game "Simon Says," intended to increase students' alertness and focus. Teachers ask students to follow physical commands (e.g., touch their toes) only when instructions begin with the phrase "Simon Says." The curriculum follows the Clover Model of Youth Development.

26% speak Kokborok and other tribal languages, mostly in rural areas. Tripura is one of the most literate states in India with a 94% literacy rate that is well above the national average of 81% (Gupta, 2025).[2] Tripura has 4,000 state-managed schools serving 465,549 students across grades 1–12.

In the 2023–2024 school year, the government of Tripura introduced the "Saharsh" (Bengali for Happiness) Curriculum in grades 1–8 across all government schools. We embedded an RCT into the curriculum's statewide roll-out. The experiment took place over the course of two consecutive academic years between 2023 and 2025. We randomly selected 100 primary schools from across the West Tripura district, which contains Agartala, to participate in the experiment (Figure A.1).[3] We surveyed around 5 randomly selected students per grade in each school. Our total sample was 4,032 students.

Our sample includes a mix of urban, peri-urban, and rural schools. It includes both Bengali and Kokborok medium schools. Table 1 describes the student characteristics using data from our baseline survey. Consistent with Tripura's high literacy rate, 68% of our sample of grade 1–8 students are able to read a short story. Around 31% are able to solve long division problems. Because our West Tripura sample contains Agartala, most students speak Bengali at home (87%) compared to Kokborok (9%). Our sample is 54% female and 40% come from low socioeconomic status (SES) families.[4]

Figure A.2 provide new evidence on the mental well-being of our student population. Around 26% of students in our sample display some form of anxiety, which is in line with existing research on adolescent mental health in India (Madasu et al., 2019; Pal et al., 2022). Around 23% display signs of depression, consistent with research from similar samples. Figure A.3 shows that the burden of anxiety and depression becomes more pronounced for girls than boys at older ages, in line with existing evidence that girls in India are disproportion-

[2]Literacy is measured for all individuals age 7+.

[3]One school refused to participate midway through the study, yielding a midline and endline sample of 99 schools.

[4]We use several family characteristics to proxy for SES. Our preferred measure asks children whether their family has a motorbike at home.

ately impacted by poor mental health. These results suggest that an intervention targeting student well-being could have heterogeneous effects across gender. By contrast, we observe no pronounced gender differences in student learning or in measures of non-cognitive skills like grit and impulsivity.

3 Experimental Design

We describe our grade-level randomization, data collection process, and outcome measures. Then, we provide evidence of balance across treatment and control arms and describe our empirical strategy.

3.1 Randomization

We randomized access to the Happiness Curriculum at the grade level within schools. To separate the effects of SEL activities from the better-studied mindfulness component of the curriculum, we introduced a second treatment arm where students started each day with a guided meditation and completed the mindfulness activities of the full curriculum, but did not take part in the other activities.

Treated grades received one of the two interventions during the first 30 minutes of each school day. Control grades received teaching-as-usual during the same block, which is the relevant comparison because the curriculum was introduced within the existing school day by shortening other subjects. Grade-level randomization increases the statistical power of the experiment by increasing the number of clusters, while minimizing the scope for spillovers by ensuring that all students within a grade in a particular school share the same treatment status.[5] Our sample has 800 school-grade clusters.

We stratified the randomization by school and grade using the following procedure, described in Panel A of Figure 1. First, we paired consecutive grades in a school (e.g., grades

[5]School-level randomization was not feasible as the government required the curriculum to be present in every school.

1–2 form a pair, grades 3–4, ...) and randomized one grade of each pair to treatment and the other to control. Then, we grouped pairs into grade-groups (grouping grades 1–4 and grades 5–8), randomly selecting one of the treated grades in a group to receive the full curriculum, and the other to receive the mindfulness only curriculum.

The randomization procedure accomplishes two goals. First, it creates a 2:1:1 ratio between the control (50% of grades), full curriculum (25%), and mindfulness only condition (25%). We randomized in these proportions to maximize power for our main pairwise comparisons between the control and each of the two treatments. Second, the process ensures that randomization is balanced across ages, even within a school. In each school, one lower grade and one upper grade is assigned to each of the two treatments, with the remaining grades assigned to the control. Grade-group randomization increases our precision and improves our ability to measure heterogeneous treatment effects by school characteristics. Figure A.4 shows a sample schedule, detailing the randomization and associated activities.

Merged Grades

Some schools in remote areas did not have enough teachers to cover all grades, and merged grades on a long-term basis. Schools with merged grades typically had few students per grade. Most merging occurred at low grade levels, combining grades 1–2 or 1–3 in a single room with a single teacher. Our field team identified merged grades prior to randomization.

After randomizing following our stated procedure, we dealt with merged grades by randomly selecting one of the originally assigned treatments and assigning it to the entire classroom. Treating merged grades as a single cluster preserves the validity of the randomization while avoiding situations where the classroom would need to be separated during the treatment period but interacted during the rest of the day.

Occasionally, schools temporarily merged grades due to a lack of teachers or classrooms.[6] In cases of unforeseen merges, we instructed teachers to separate treated and control grades

[6]For instance, attendance is often lower during the rainy season and holidays. Teachers were also sometimes called for government responsibilities such as overseeing elections.

for the period when Happiness or mindfulness classes are taught. Our year two process monitoring visits documented 57 instances of temporary merges. In all cases, grades were seated according to treatment status during the Happiness and mindfulness period. Because we report intention-to-treat effects, the presence of temporary merges should make our estimates a lower-bound.[7]

Year Two Randomization

Following state policy, all students moved up one grade between years one and two of our study. Students in grades 1–7 during the first year moved up to grades 2–8 in the second year. The randomization moved up with them, so that all grade 1–7 students were either in the full curriculum, mindfulness only, or the control group for the duration of the experiment. Teachers were retrained according to the year two randomization. Year one handbooks and materials were removed before the second year.[8]

Students in grade 8 during the first year graduated from primary school and were no longer part of the intervention during the second year. However, we continued to follow them in high school by collecting endline data at the end of the second year, one year after the treated grade 8 students stopped receiving the treatment. We added new grade 1 students to our sample during the second year of the experiment. Grade 1 students received the treatment status previously assigned to grade 8 students in their school during the first year. Doing so maintains treatment assignment balance within each school.[9]

[7] Estimates would be a lower bound if the effects of the Happiness and mindfulness programs spilled over to students assigned to control grades.

[8] If treated teachers from the first year continued to implement the curriculum as control teachers in the second year, we would expect our estimates to be a lower bound. However, process monitoring indicates that year two teachers followed the correct assignment.

[9] In cases where the new grade 1 students were in merged classrooms, they were assigned the treatment status of the merged classroom in the previous year. Because treatment status was randomly assigned for merged grades, the approach maintains the validity of the randomization.

3.2 Data

Panel B of Figure 1 describes the timeline of the study. We conducted baseline surveys for 4,032 students at the beginning of the 2023–2024 school year. Around 42% of baseline surveys took place in May-June 2023. The remaining 58% took place in August following the summer break. The intervention started in September. We conducted midline surveys in February-March 2024 at the end of the 2023–2024 school year, after 6 months of the intervention. We were able to survey 3,850 or 96% of students at midline. High completion rates attenuate concerns about selective attrition from our sample. We also include specifications with generalized Lee bounds to account for the possibility of selective attrition (Semenova, 2025).

We surveyed 478 new first grade students in June 2024 who entered the study at the start of the 2024–2025 school year. Endline surveys were from December 2024 to February 2025 at the end of the 2024–2025 school year. We surveyed 4,383 students or 97% of the full sample at endline, including students who matriculated to grade 9 and were no longer part of the study. Endline surveys were primarily conducted in schools, but 9% were conducted through home visits, which helped us reach a high completion rate.

We additionally surveyed 663 teachers across our treatment and control arms at baseline, midline, and endline. Our enumerators conducted at least one round of classroom observation in each year for treated and control class periods, providing insight into how the programs were delivered and whether they influenced teacher and student behaviour. For treated grades, we observed both Happiness and mindfulness classes and subsequent classes. For control grades, we observed the first class period of the day when the program would be held, and subsequent classes.

3.3 Outcomes

Our student surveys comprise our primary measures of learning and well-being, and secondary measures of cognitive and non-cognitive skills. To measure literacy and numeracy, we use the Annual Status of Education Report (ASER) toolkit developed by Pratham, a

leading Indian education NGO. Since 2005, Pratham has conducted an annual nationwide ASER survey reaching around 700,000 children aged 5–16 each year.[10]

Figure A.5 shows a sample ASER toolkit. Students completed it in either Bengali or English. The arithmetic test includes single digit (1–9) and double digit (11–99) number recognition, subtraction, and division. The reading test asks students to read letters, words, a paragraph, and a short story. Students are scored from 1 to 4 based on the highest level they are able to complete correctly. A key advantage of ASER is that students in grades 1–8 can complete the same test, which improves comparability across ages. We complement ASER questions with grade-specific math and reading questions from the government of Tripura's State Council of Educational Research and Training workbooks and administrative data on student grades and standardized test scores by subject.[11]

To measure anxiety and depression, we use the Generalized Anxiety Disorder-7 (GAD-7) and Moods and Feelings Questionnaire (MFQ) screeners. They are standardized measures that have been validated among adolescents in India and globally (Jeelani et al., 2022; Lewis et al., 2017; Park et al., 2023). We adapt the scales slightly to fit the local context following piloting conducted in March 2023. In our baseline surveys, we collected the full GAD-7 and MFQ for a subsample of students. The rest completed the shorter GAD-2—the first 2 questions of the 7-point scale—as a proxy for well-being. Figure A.6 shows that the shorter measure is highly predictive of scores on the complete measures, which is consistent with studies establishing its psychometric validity (Sapra et al., 2020). Students completed the full GAD-7 and MFQ at midline and endline.

We include questions on a range of secondary outcomes. Students completed 9 Raven's matrix puzzles, which are commonly used to measure fluid intelligence. Figure A.8 shows a sample puzzle. We measure students' performance in terms of the number of puzzles correctly

[10]Pratham's survey is twice the size of the National Sample Survey, which is the primary government survey of poverty and labour market indicators, and remains the only regular source of data in India on children's foundational learning outcomes (Pratham, 2022).

[11]Despite its lack of granularity, we prefer the ASER toolkit over administrative data, which can be manipulated by teachers. Nonetheless, results using administrative data are consistent with our main findings.

solved. To measure impulsivity and grit, we adapt the Domain-Specific Impulsivity Scale for Children (DSIS-C) and 10-point Grit scale developed by Tsukayama et al. (2013) and Duckworth et al. (2007). As an additional measure of grit, we gave students the choice between an easy and difficult math question, following Alan et al. (2019).

Students participated in dictator games with real rewards to measure altruism and completed scales and questions measuring empathy, loneliness, motivation, and relationships with peers and parents.[12] To measure subjective well-being, we asked students to report how happy they felt yesterday on a 3-point Likert "face" scale representing happy, neutral, or sad (Figure A.7).[13] We also assess students' familiarity with mindfulness at baseline and following the intervention.

3.4 Empirical Strategy

We use our baseline measures to assess the sample's balance across treatment status. Table 1 shows balance tests for students in grades assigned to our two treatment arms compared to students assigned to control grades. Our randomization appears balanced across demographics and key outcomes measures. For the most part, we observe no statistically significant differences between control grades, grades assigned to the Happiness Curriculum, and mindfulness only grades. The only exception are Raven's matrices, where we observe a marginally significant difference in scores between Happiness and control grades. The difference is insignificant if we correct for multiple hypothesis testing.

Process monitoring surveys indicate 95% and 99% compliance rates with the assigned treatment for grades assigned to the Happiness Curriculum and mindfulness program. To estimate the impact of the Happiness Curriculum and mindfulness program on student learn-

[12]To measure altruism, students were given 10 small stationary items and asked how many they would like to keep or give away to an anonymous peer. We asked students how often they fought with a classmate in the last week or talked to parents about their feelings. We also asked how many hours they studied before their most recent exam. We used the UCLA-3 Loneliness scale and adapted questions from the Basic Empathy Scale (Jolliffe and Farrington, 2006).

[13]Faces are commonly used to capture subjective well-being in the mental health and child development literature (Davies et al., 2024; Hall et al., 2016; Read and Horton, 2025; Thompson et al., 2025).

ing and well-being, we report intention-to-treat (ITT) effects:

$$y_{i,s,g,gr,t} = \beta_0 + \beta_1 Happiness_{s,g} + \beta_2 Mindfulness_{s,g} + \beta_3 y_{i,0} + \Delta_s + \Gamma_g + + \rho_{gr} + \Theta_e + \epsilon_i \quad (1)$$

where $y_{i,s,g,gr,t}$ represents outcomes for individual i in school s, grade g, and grade-group gr at time t. We standardize outcome measures and report results in standard deviations relative to the mean. Our key predictors are $Happiness_{s,g}$ and $Mindfulness_{s,g}$, indicators for whether individual i was in a school-grade that received the full Happiness Curriculum or the mindfulness component. The omitted group are control grades. We include school, grade, grade-group, and enumerator fixed effects. We additionally control for $y_{i,0}$, the standardized value of the outcome variable at baseline.[14] We cluster standard errors at the school-grade level, which is the level of treatment.

The coefficients β_1 and β_2 represent the treatment effects of the Happiness and mindfulness programs. We report treatment effects at midline after 6 months of the intervention and at endline after 2 years of the intervention. Figure A.9 shows that students in grades assigned to the full Happiness Curriculum and the mindfulness component were significantly more likely to report familiarity with mindfulness following the intervention, providing evidence that the programs were delivered as intended.

4 Results

We describe our main treatment effects on learning and well-being. We additionally describe effects on secondary outcomes measuring cognitive and non-cognitive skills, and examine heterogeneous effects.

[14]For measures of anxiety and depression, we use the GAD-2 as a proxy for baseline mental health. We also include the full GAD-7 and MFQ for the subsample of students where we collected the information. We code missing baseline values as 0 and include an indicator variable for whether a baseline value is missing to account for any baseline non-response bias following Zhao and Ding (2024).

4.1 Effects on Learning

We first estimate the effects of the Happiness Curriculum and mindfulness program on learning. The direction of the effect is ex-ante ambiguous, as SEL and mindfulness practice could lead to learning gains or displace time spent on traditional subjects. Figure 2 plots estimated treatment effects for math and reading. We find that daily SEL and mindfulness leads to striking math gains. After just 6 months of the intervention, students in Happiness and mindfulness grades performed 0.08 and 0.12 standard deviations better compared to students in control grades. Effects grew over time, increasing to 0.27 and 0.29 standard deviations by the end of the second academic year. At both midline and endline, the effect size is larger in mindfulness grades compared to the full program. However, the difference is not statistically distinguishable. We observe no effect of either program on tests of reading.

Table A.1a shows that the effects on math are stable across a range of specifications. Our preferred specification, shown in Column (1), controls for baseline math scores and includes school, grade, grade-group, and enumerator fixed effects. However, results do not differ meaningfully if we exclude baseline controls (Column 2) or all fixed effects (Column 3). Column (4) tests for the presence of spillovers across grades by excluding students with siblings in treated grades. Column (5) excludes grades that were flagged during process monitoring as temporarily merging. Again, results do not differ meaningfully.[15] Column (6) shows that results are robust to using generalized Lee bounds to account for the possibility of selective attrition (Semenova, 2025). Table A.1b shows that null effects for reading are similarly stable across specifications.[16]

Figure 3 shows that the Happiness and mindfulness programs led to math gains for students across the board, with statistically significant effects across all of our pre-registered subgroups. We observe suggestively larger increases for boys, higher SES students, and

[15] As a direct test of spillovers, we estimate treatment effects for students in control grades who had treated siblings compared to control students who did not. Figure A.10 finds no evidence of spillovers.

[16] Figure A.11 shows that we find similar results on math and reading using grade-specific questions from state workbooks.

students located in rural schools. We find similarly strong effects across grades (Figure A.12). Null effects on reading are consistent across subgroups (Figure A.13).

To interpret the magnitude of the effects of daily SEL and mindfulness practice on math achievement, we benchmark our treatment effects to the year-over-year learning gains in control grades. Back of the envelope calculations indicate that the treatment effect after 2 years of the program is equivalent to an additional year of learning on average.[17] Put differently, about half of students in treated grades are able to solve long division problems at the end of the study compared to a third of students in control grades.

Large educational returns coupled with low implementation costs make the Happiness Curriculum and mindfulness only program highly cost-effective. Classes are taught by existing teachers. The primary costs are teacher training and handbooks, which are less than 1% of the government's annual spending on education. Combining our treatment effects with costing data, we estimate that a 0.1 standard deviation increase in math cost around $5.28 per student for the Happiness Curriculum and $4.74 for the mindfulness arm. If we exclude costs from the RCT and forecast the programs' delivery under full government provision, we estimate the costs to be $0.81 and $0.73 per student. These estimates put Happiness and mindfulness classes among the most cost-effective educational interventions studied to date.[18]

A standalone mindfulness program could have even an even higher cost-benefit ratio. Our results suggest that the math gains are driven by the mindfulness component of the Happiness Curriculum. Moreover, daily mindfulness practice in schools is potentially less intrusive than a SEL curriculum and likely cheaper to implement. In our setting, Happiness and mindfulness classes were the same duration.[19] However, it is possible that the learning gains from mindfulness can be achieved in a shorter time period, which would make a mindfulness

[17] Our effects are roughly equivalent to 16 learning-adjusted months of schooling, incorporating the LAYS measure developed by Filmer et al. (2020), which combines quantity and quality of schooling.

[18] Table A.2 summarizes the literature on SEL and non-cognitive skills interventions in schools. Figure A.14 summarizes cost-effectiveness estimates from the broader education economics literature.

[19] Process monitoring reveals that the average class lasted 26 minutes.

program even more cost-effective.

Effects on math appear to operate through improved reasoning and problem-solving. We find a statistically significant improvement in treated students' performance on Raven's matrices, a measure of fluid intelligence. Figure 4 shows that students in Happiness and mindfulness grades performed 0.04 and 0.06 standard deviations better after 6 months, and 0.10 and 0.13 standard deviations better after 2 years. The endline effects are statistically significant at a 1% level. Again, effect sizes are suggestively larger in mindfulness only grades. Figure A.15 and Table A.3 show that they are consistent across subgroups and specifications.

Together, our results reveal that short daily mindfulness practice and SEL activities can lead to large learning gains. We find that students in grades randomly assigned to mindfulness practice or the Happiness Curriculum experienced large improvements in math that grew over time, likely driven by increased fluid intelligence. In the next section, we examine whether Happiness and mindfulness curricula impact student well-being.

4.2 Effects on Well-Being

We estimate the effects of the Happiness Curriculum and mindfulness program on student well-being. Our primary measures are the GAD-7 and MFQ screeners for anxiety and depression. Figure 5 plots the estimated treatment effects. We find that daily mindfulness practice led to modest reductions in anxiety after 6 months of the program. Students in mindfulness grades had anxiety levels that were 0.10 standard deviations lower than students in control grades. However, the effect fades out by the end of the second year. The point estimate decreases to 0.06 standard deviations and is no longer statistically significant at conventional levels. We observe no effects of the Happiness Curriculum on anxiety after 6 months or 2 years, and observe no effect of either treatment on our measure of depression. Table A.4 shows that the null effects after 2 years are stable across specifications.

While the overall effect on anxiety is modest, Figure A.16 shows that the short-term improvement appears to be driven by the most vulnerable students. After 6 months of

mindfulness, we observe a 0.20 to 0.21 standard deviation reduction in anxiety for girls and low SES students, who are more likely to be burdened by poor mental health. We also observe larger effects for elementary school students. A larger effect for younger students suggests that the modest overall effects are unlikely to be explained by students' inability to comprehend the scales. The effect for girls decreases in magnitude but remains statistically significant at a 10% level after 2 years. However, effects for the other subgroups fade out. Null effects on depression are consistent across subgroups (Figure A.17).

Next, we examine effects on measures of non-cognitive skills. Figure 6 plots the estimated treatment effects for measures of grit and impulsivity. The importance of non-cognitive and social skills for labour market outcomes is well-documented (Alan et al., 2019; Deming, 2017). But we have less on evidence on whether mindfulness and SEL practice can cultivate these skills. We do not find strong evidence that they do.[20] We also find no effects of either program on subjective well-being or measures of loneliness, altruism, motivation, and relationships with peers and parents, though we observe increased empathy among students in full curriculum grades (Figure A.20).

While the effects on mental health largely fade out by the end of the study, they point to meaningful short-term improvements in well-being. Our results suggest that daily mindfulness practice can cost-effectively improve well-being among a primary school student population compared to costlier and more targeted approaches such as cognitive behavioural therapy. However, it is not a silver bullet for the global mental health crisis. Moreover, modest effect sizes and fade-out indicate that reduced anxiety is unlikely to be a mechanism for the program's impact on learning.

[20]Null effects on non-cognitive skills do not appear to be masking subgroup heterogeneity (Figure A.18; A.19). Table A.5 shows that effects on grit are mostly insignificant across specifications, including our preferred one. However, we observe increased grit among students in mindfulness grades when we exclude individuals with treated siblings, drop merged grades, or use Lee Bounds to adjust for attrition. Effects on impulsivity are insignificant across specifications.

5 Conclusion

We study the effects of the Happiness Curriculum, the world's largest SEL and mindfulness program, on student learning and well-being. We randomly assign grades to receive either a daily 30-minute Happiness class—comprising a short mindfulness practice and activities designed to help students understand their emotions, feelings, and relationships—just mindfulness practice, or teaching-as-usual. Despite taking time away from traditional learning, we find that students assigned to daily SEL and mindfulness practice experienced striking math gains. The largest gains were for students in mindfulness grades, who performed 0.12 standard deviations better than control grades after 6 months and 0.29 standard deviations better after 2 years. However, we find limited effects of SEL and mindfulness on reading or on scales measuring anxiety, depression, and non-cognitive skills.

Our study provides some of the first comprehensive evidence on how SEL and mindfulness impact student outcomes as part of a primary school curriculum. We find that a short mindfulness class delivered by regular class teachers at the start of the school day can lead to large educational returns. Math gains are roughly equivalent to a year of learning, with a cost-effectiveness in the upper tail of educational programs evaluated to date. They appear to be driven by improved reasoning and problem-solving, and increase with time. Future work will want to examine whether these effects continue to grow as students progress through grades 1–8, and whether they persist as students matriculate into further schooling and the workforce.

Large returns coupled with low input costs suggest that interventions targeting students' state of mind can be an important path to improve student achievement. Future work might want to examine how programs targeting state of mind complement traditional education interventions such as remedial or computer-assisted learning (Banerjee et al., 2007). Additionally, future work might examine how these effects translate to other settings. Students across the world are more stressed than past generations (Twenge, 2011). Given the growing challenges and stresses facing youth worldwide, perhaps all students could benefit from

focusing on experiencing the present moment.

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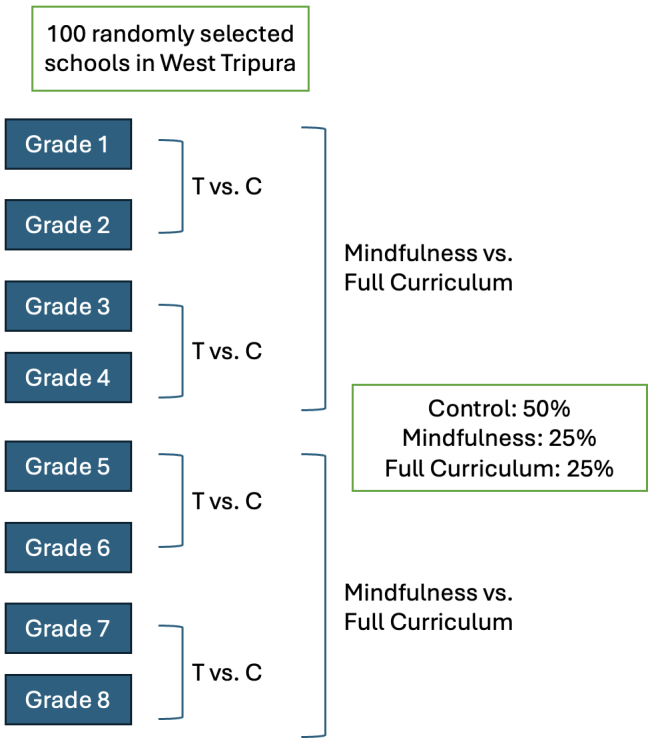
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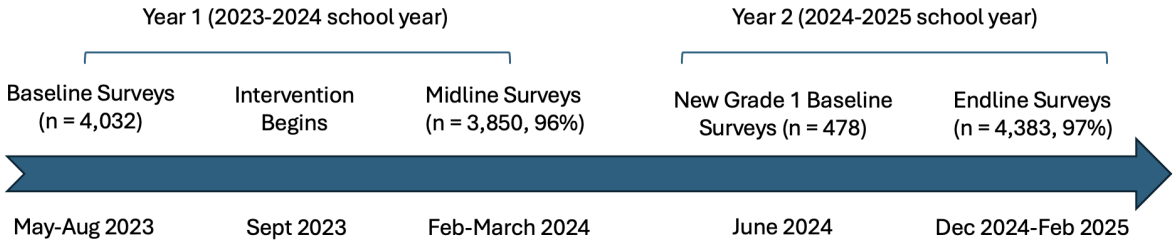
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Figure 1: Study Design

(a) Design

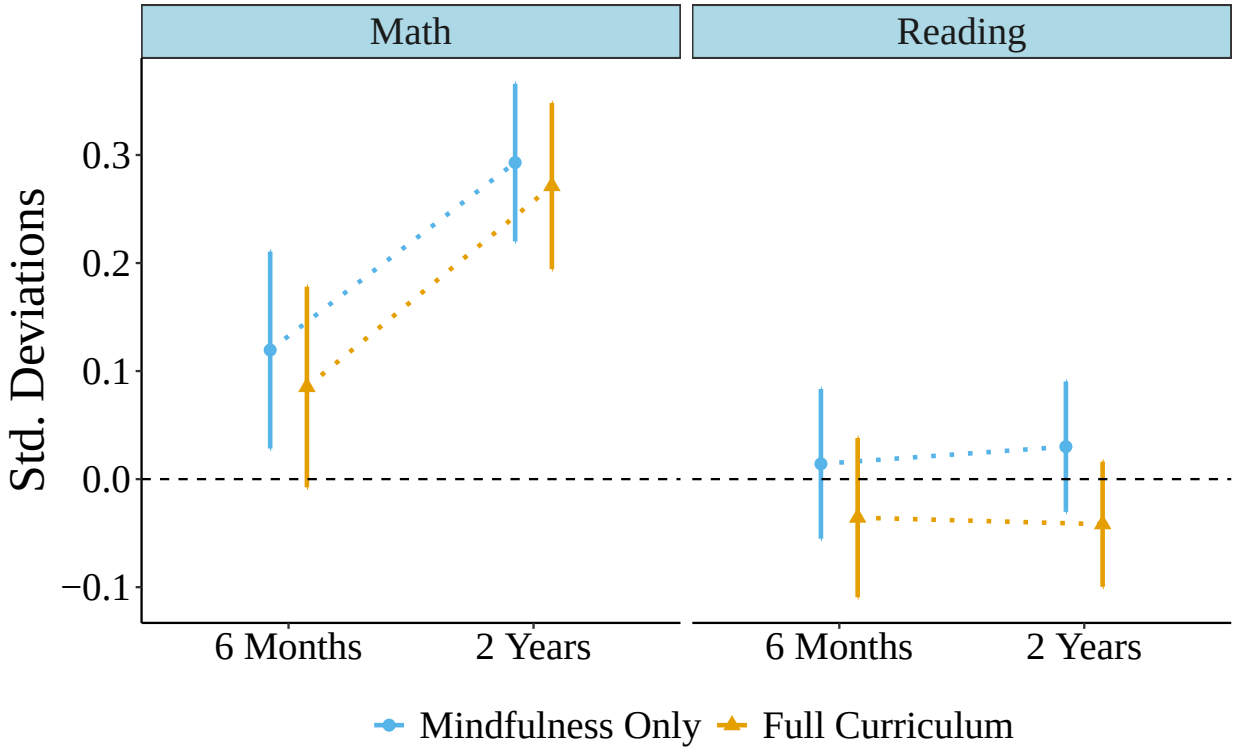


(b) Timeline



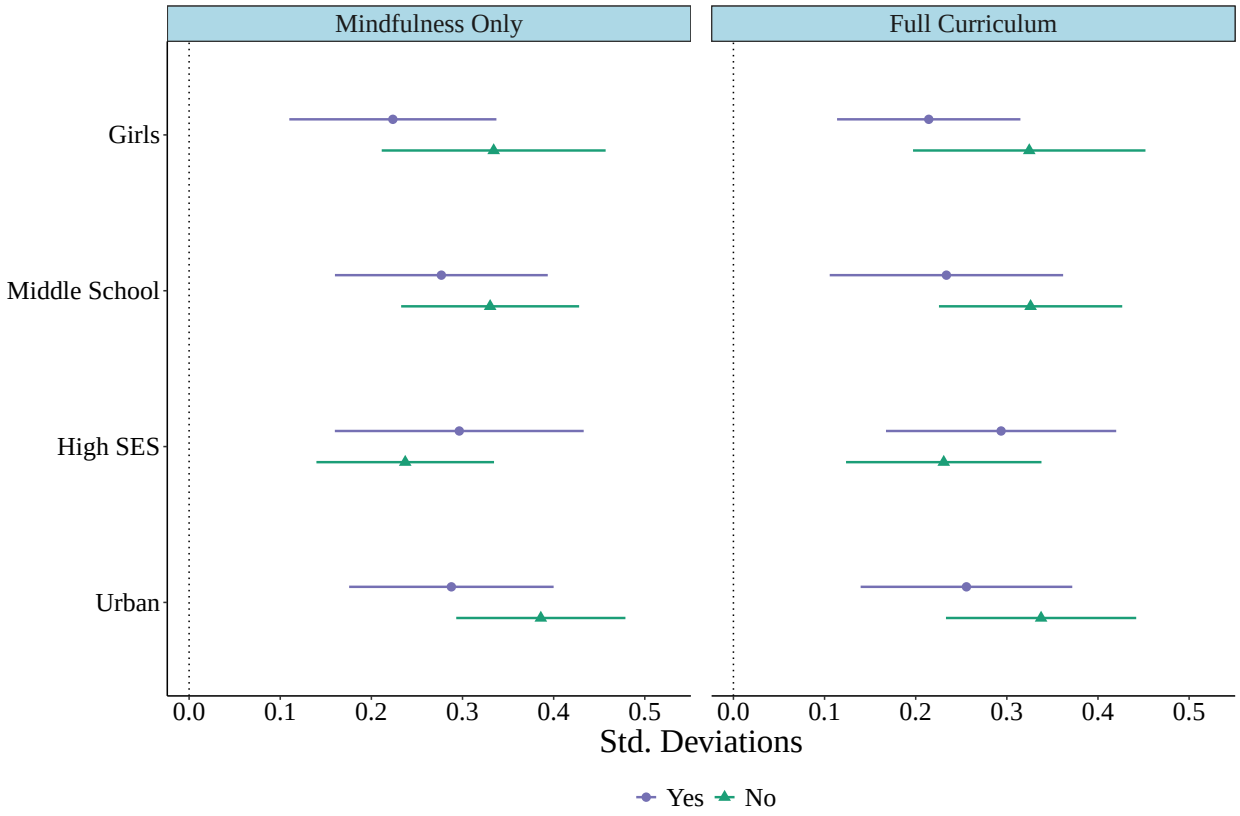
Note: Panel (a) describes the grade-level randomization. The West Tripura district has 295 state-managed schools serving grades 1–8. We randomly sample 100 schools from the 172 that are co-educational and enroll at least 5 students in each grade. Panel (b) describes the study timeline. For survey rounds, we report the sample size and completion rate.

Figure 2: Effect of Happiness Curriculum and Mindfulness Program on Learning



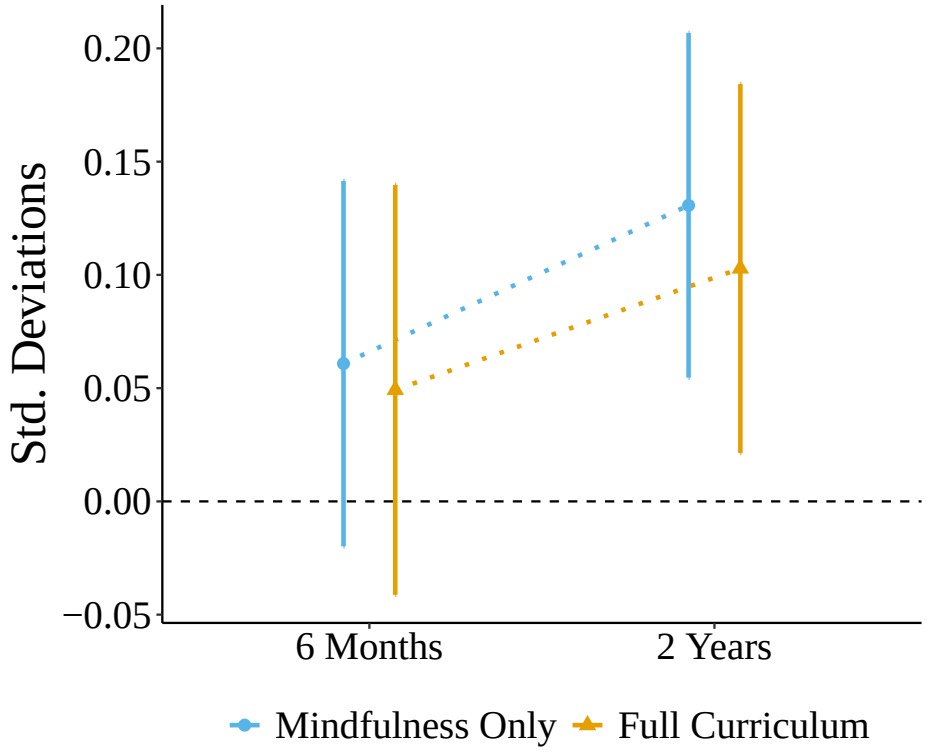
Note: Effects of the Happiness Curriculum and mindfulness program on math and reading after 6 months and 2 years. Learning measures are from the ASER toolkit. Effect sizes are reported in standard deviations. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level.

Figure 3: Heterogeneous Effects on Math



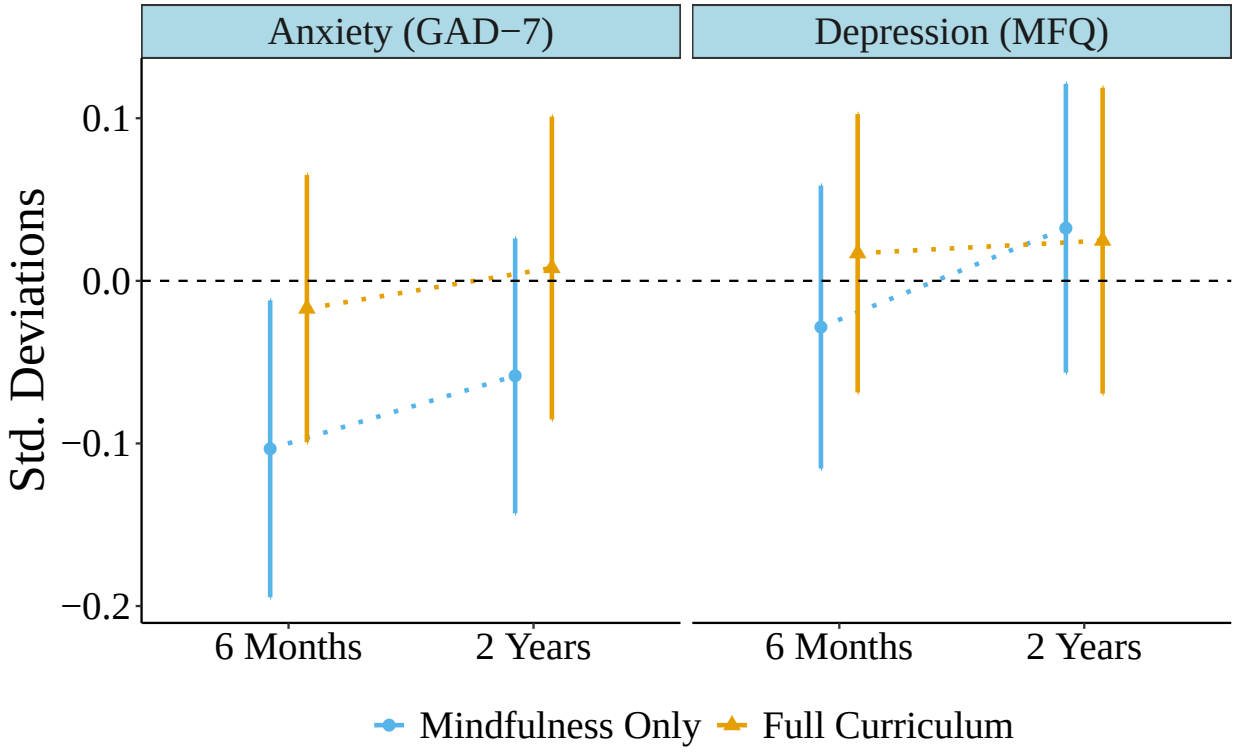
Note: Effects of the Happiness Curriculum and mindfulness program on math after 2 years, splitting the sample by individual characteristics. Math measures are from the ASER toolkit. Effect sizes are reported in standard deviations. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level. We define middle school as baseline grades 6–7. Baseline grade 8 students are excluded because they graduated from the program by the second year. We use motorbike ownership as a proxy for family SES.

Figure 4: Effect of Happiness Curriculum and Mindfulness Program on Fluid Intelligence



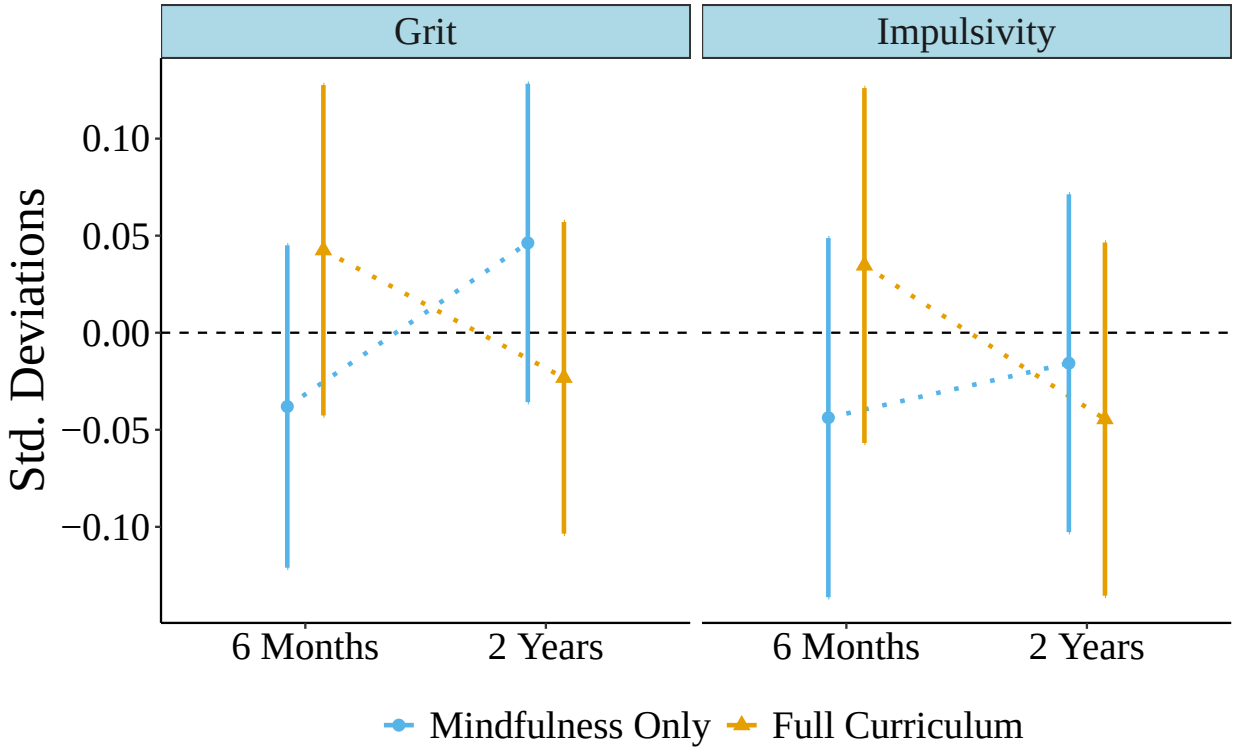
Note: Effects of the Happiness Curriculum and mindfulness program on students' performance on Raven's matrices, a measure of fluid intelligence, after 6 months and 2 years. Outcome is the number of Raven's matrices solved correctly (out of 9). Effect sizes are reported in standard deviations. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level.

Figure 5: Effect of Happiness Curriculum and Mindfulness Program on Well-Being



Note: Effects of the Happiness Curriculum and mindfulness program on anxiety and depression, measured using the Generalized Anxiety Disorder-7 (GAD-7) and Moods and Feelings Questionnaire (MFQ) screeners, after 6 months and 2 years. Outcomes are reported in standard deviations. Regressions include school, grade, enumerator, and grade-group fixed effects. We control for baseline GAD-7 and MFQ for the subset of students who filled it out. For the rest, we control for the shorter GAD-2. We cluster standard errors at the school-grade level.

Figure 6: Effect on Non-Cognitive Skills



Note: Effects of the Happiness Curriculum and mindfulness program on grit and impulsivity, measured using the 10-point Grit Scale and Domain-Specific Impulsivity Scale for Children (DSIS-C). Outcomes are reported in standard deviations. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level.

Table 1: Treatment Balance

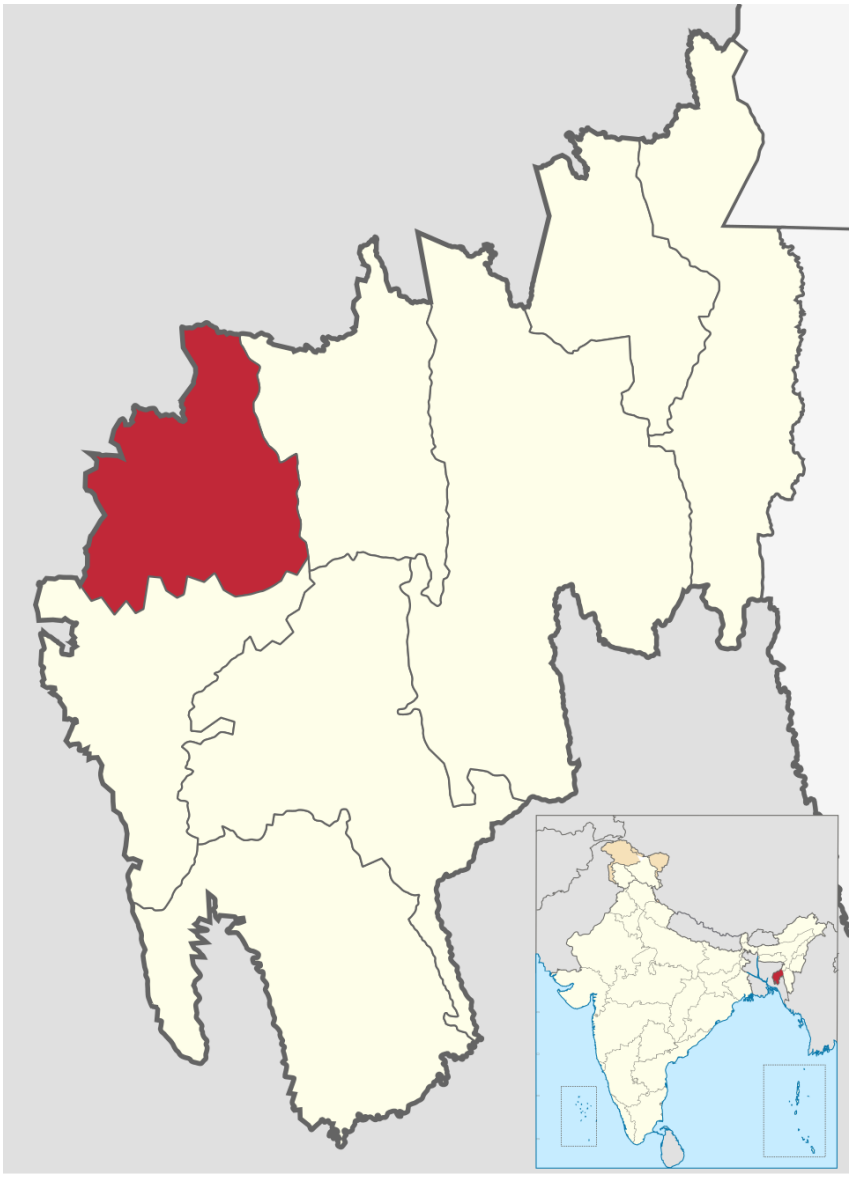
Variable	(1) Full curriculum Mean/SE	(2) Mindfulness only Mean/SE	(3) Control Mean/SE	P-value (1)-(2)	P-value (1)-(3)	P-value (2)-(3)
Age	10.26	10.12	10.13	0.64	0.48	0.83
	(0.16)	(0.18)	(0.13)			
Grade	4.62	4.53	4.50	0.82	0.50	0.68
	(0.15)	(0.17)	(0.12)			
Female	0.52	0.52	0.55	0.93	0.16	0.42
	(0.02)	(0.02)	(0.01)			
Speaks Bengali	0.87	0.85	0.87	0.40	0.68	0.26
	(0.02)	(0.02)	(0.01)			
High SES	0.39	0.40	0.40	0.49	0.91	0.63
	(0.02)	(0.02)	(0.01)			
GAD-2	0.78	0.81	0.76	0.16	0.39	0.15
	(0.03)	(0.04)	(0.03)			
Grit	2.43	2.41	2.43	0.51	0.87	0.24
	(0.02)	(0.02)	(0.01)			
Impulsivity	1.73	1.72	1.71	0.67	0.13	0.34
	(0.02)	(0.02)	(0.02)			
Raven's Correct	3.54	3.42	3.34	0.54	0.05*	0.15
	(0.09)	(0.09)	(0.07)			
Read Stories	0.69	0.70	0.67	0.99	0.64	0.16
	(0.02)	(0.02)	(0.02)			
Math: Recall 1-9	0.97	0.97	0.97	0.55	0.48	0.24
	(0.01)	(0.01)	(0.00)			
Math: Recall 10-99	0.79	0.81	0.79	0.66	0.82	0.12
	(0.02)	(0.02)	(0.01)			
Math: Subtract	0.52	0.48	0.46	0.42	0.12	0.39
	(0.03)	(0.03)	(0.02)			
Math: Divide	0.34	0.31	0.29	0.56	0.23	0.50
	(0.02)	(0.02)	(0.02)			
Observations	1,024	999	2,009	1,530	2,320	2,236

*** p<0.01, ** p<0.05, * p<0.1

Note: Columns (1)–(3) report means and standard errors for pre-treatment variables in grades assigned to the Happiness Curriculum, mindfulness program, and the control. P-values are from pairwise regressions. We include school fixed effects and cluster standard errors at the school-grade level. Age, Grade, GAD-2, Grit, Impulsivity, and Raven's Correct (out of 7) are averages. The other outcomes are shares.

A Additional Figures

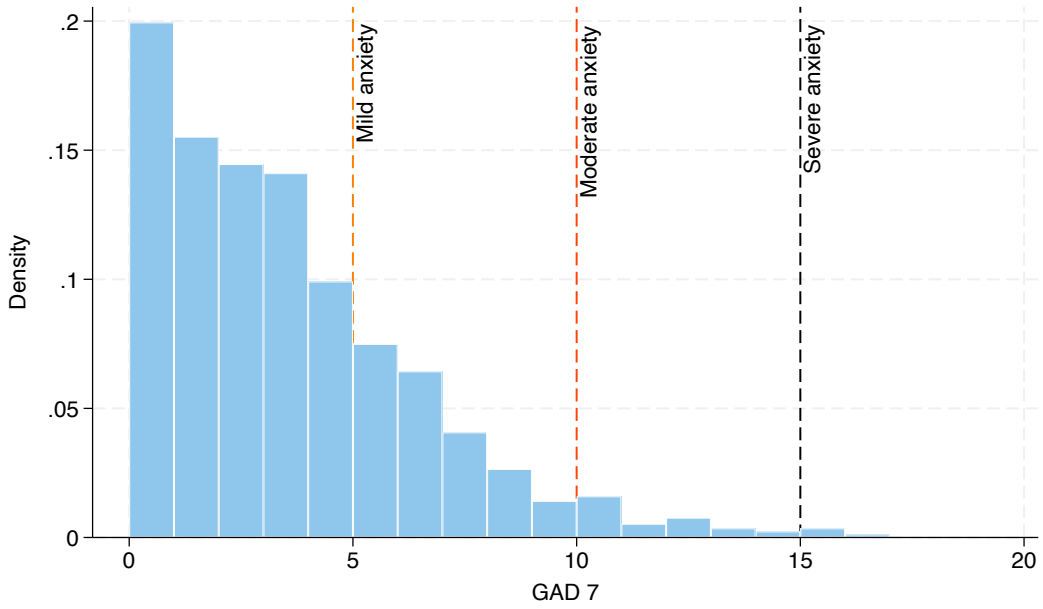
Figure A.1: Map of West Tripura District



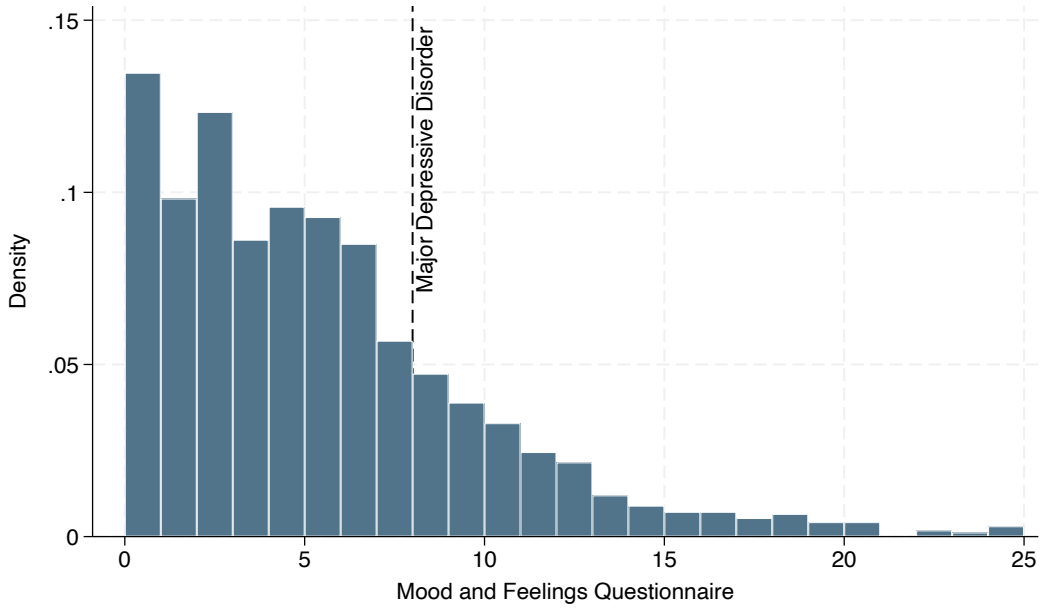
Note: Map of West Tripura district and the state of Tripura within India.

Figure A.2: Baseline Mental Health

(a) Anxiety (GAD-7)



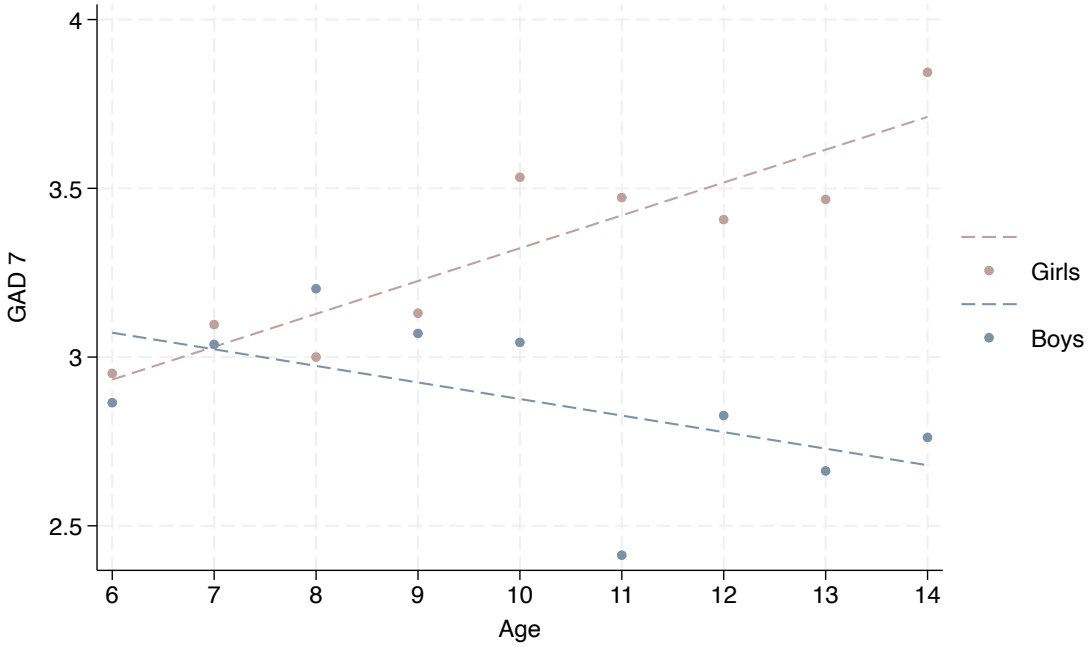
(b) Depression (MFQ)



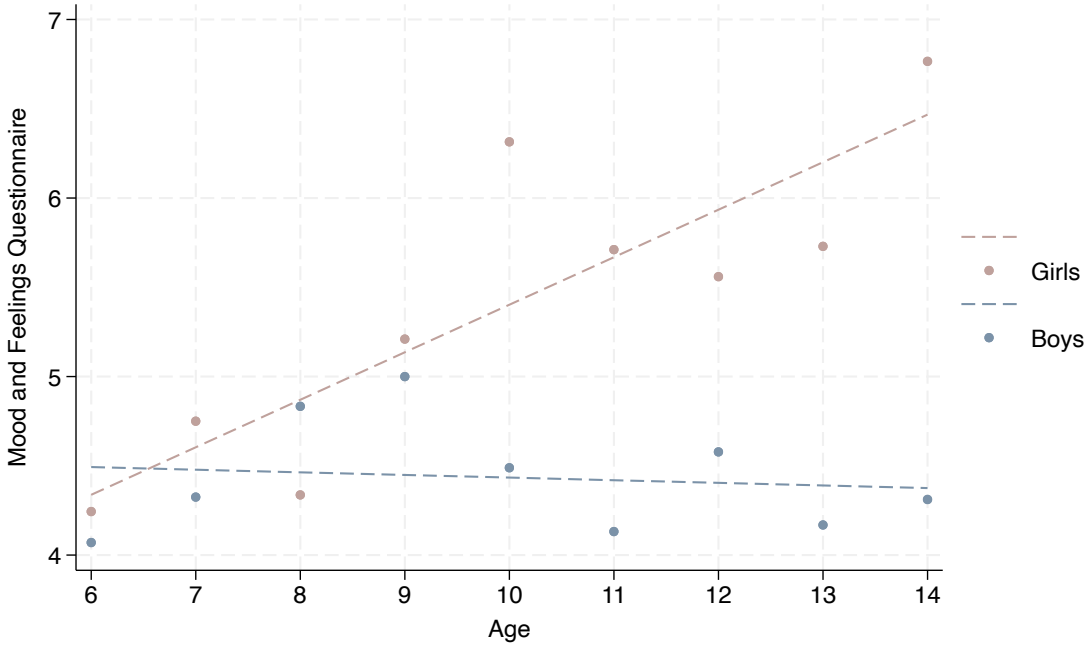
Note: Panel (a) plots the distribution of scores on the Generalized Anxiety Disorder-7 screener. Dashed lines represent cutoffs for mild to severe anxiety. Panel (b) plots the distribution of scores on the Moods and Feelings Questionnaire screener for depression. Dashed line represents the unofficial cutoff for further screening for major depressive disorder.

Figure A.3: Baseline Mental Health By Gender and Age

(a) Anxiety (GAD-7)

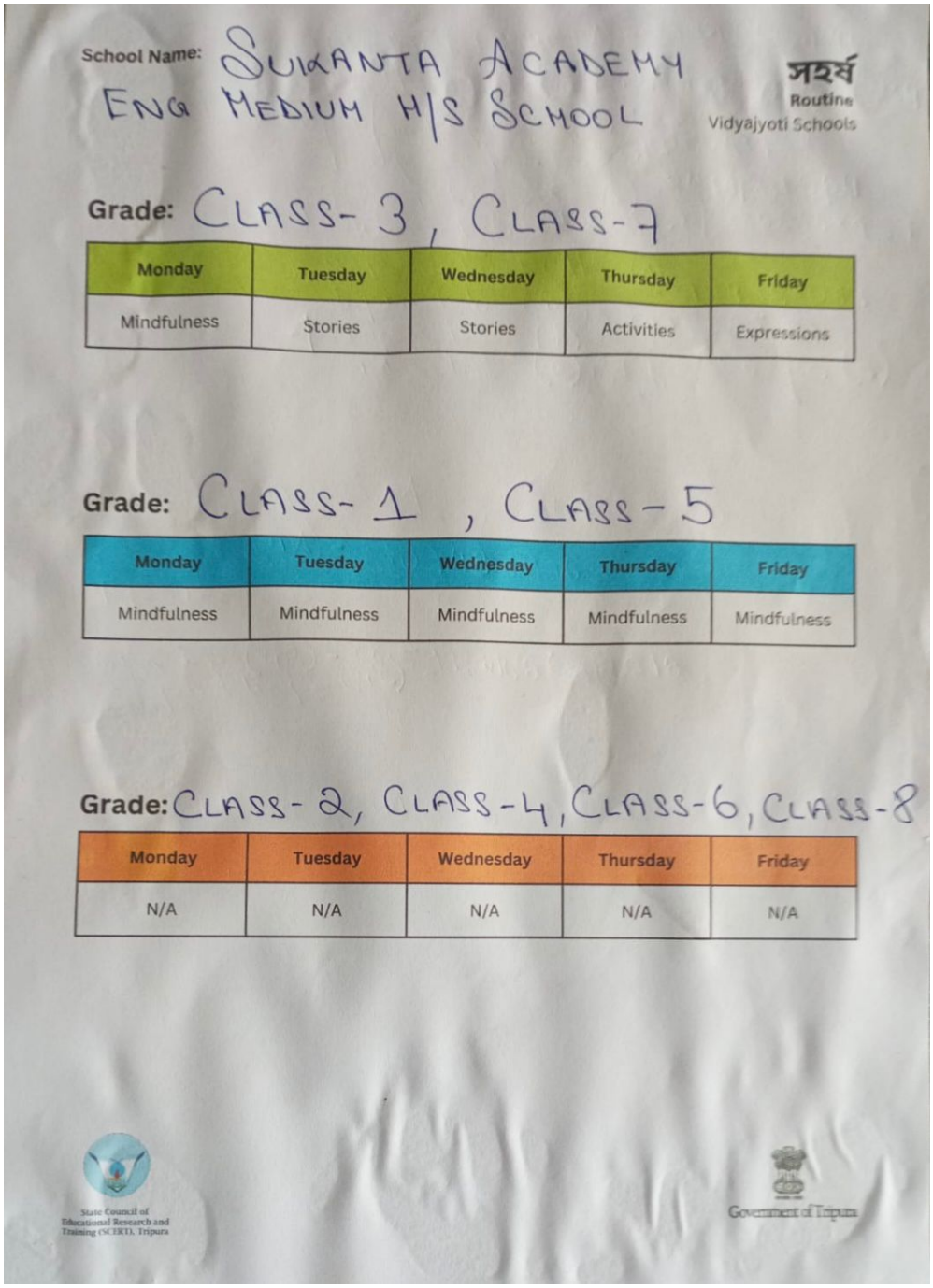


(b) Depression (MFQ)



Note: Binned scatter plots of the relationship between age and baseline scores on the Generalized Anxiety Disorder-7 screener and Moods and Feelings Questionnaire depression screener separately for girls and boys.

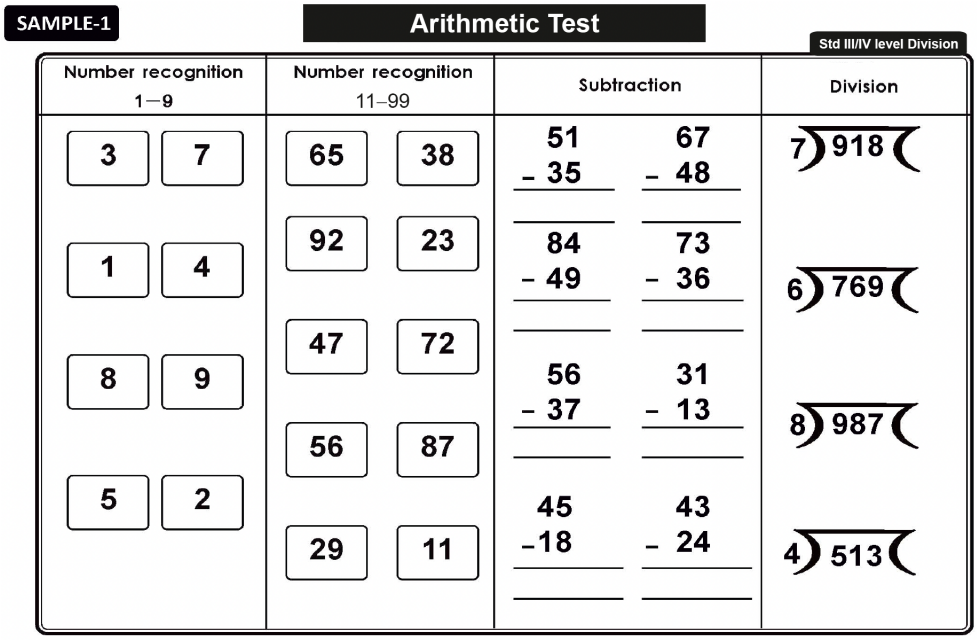
Figure A.4: Sample Weekly Schedule



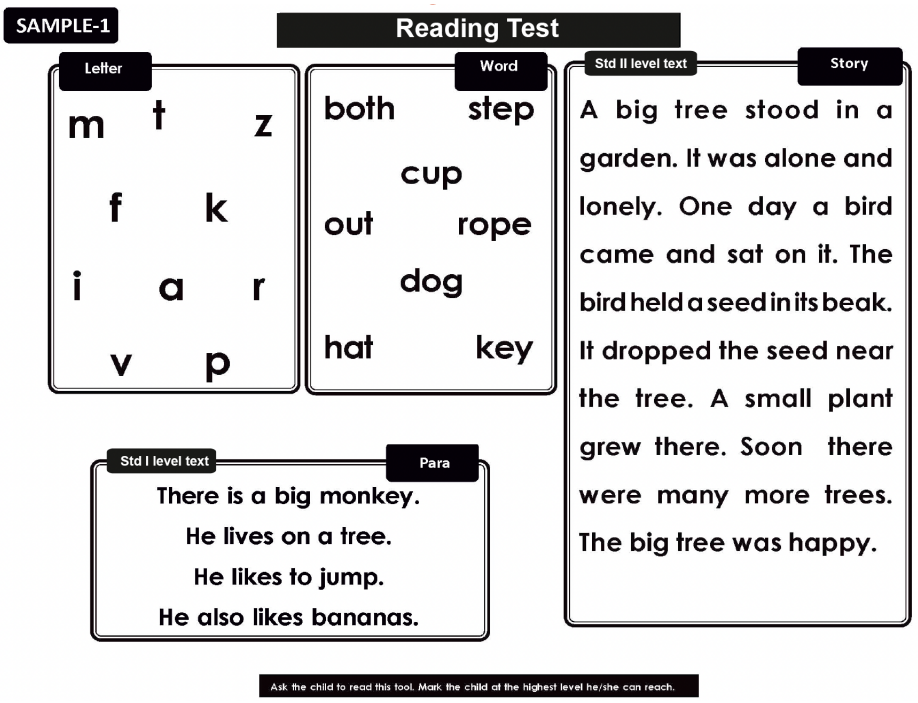
Note: Sample schedule detailing the randomization and daily Happiness and mindfulness activities. The Labhya Foundation posted schedules in teachers' common area.

Figure A.5: Sample ASER Test

(a) Math

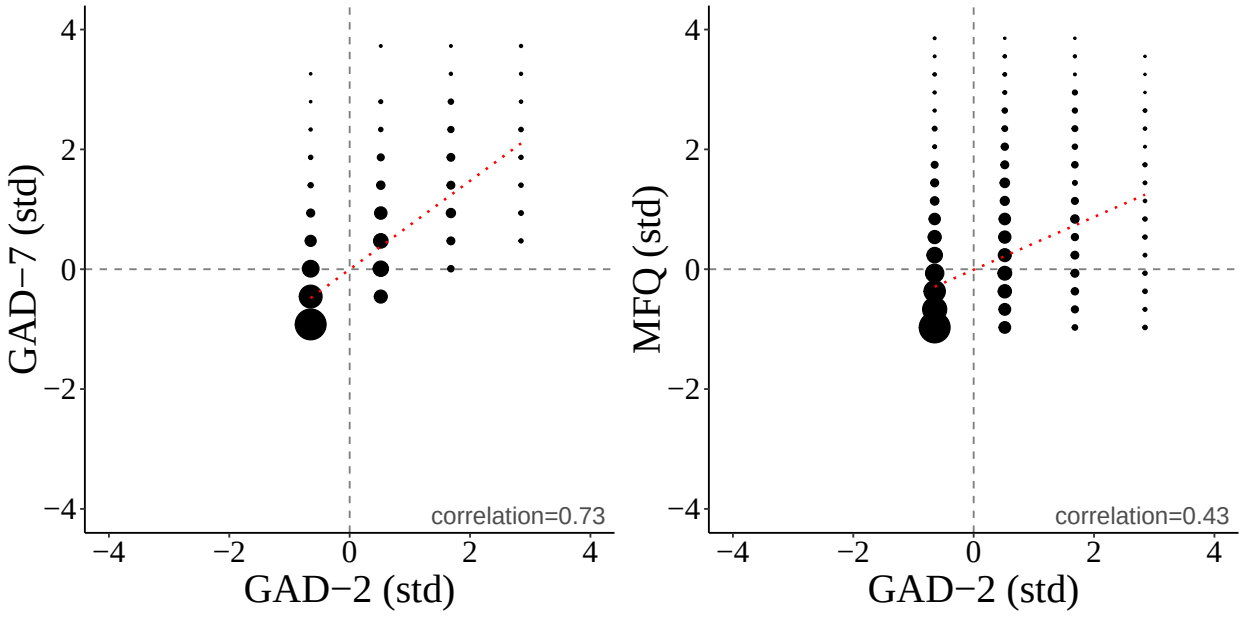


(b) Reading



Note: Sample of Pratham's ASER math and reading tests.

Figure A.6: Correlation Between Well-Being Measures



Note: Binned scatter plots of the relationship between the GAD-7 anxiety screener (left), MFQ depression screener (right), and the shorter GAD-2.

Figure A.7: Subjective Well-Being Measure

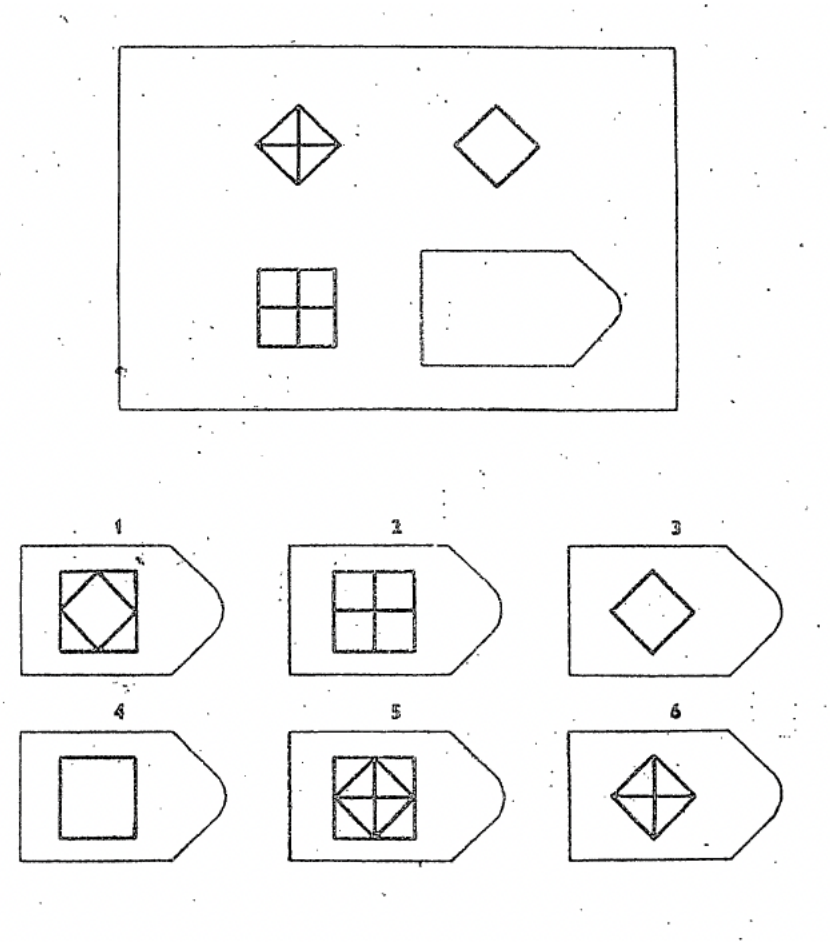
Overall, how happy did you feel yesterday?

সামগ্রিকভাবে, গতকাল আপনি কত খুশি অনুভব করেছিলেন?



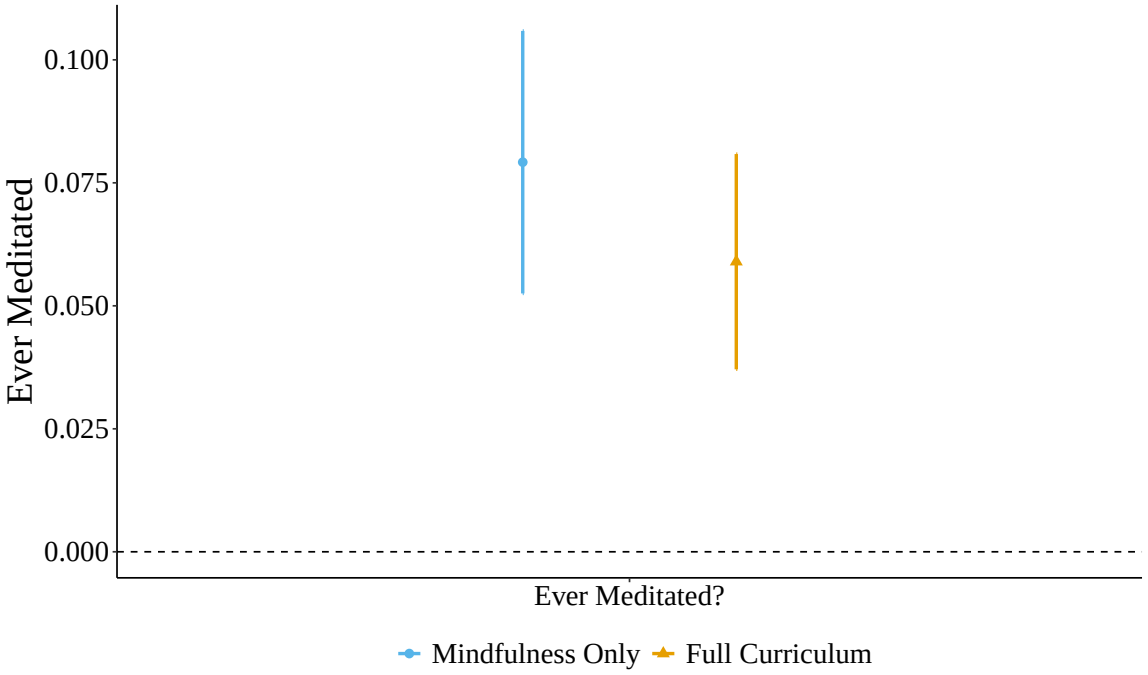
Note: Likert scale measure of subjective well-being.

Figure A.8: Sample Raven's Matrix Puzzle



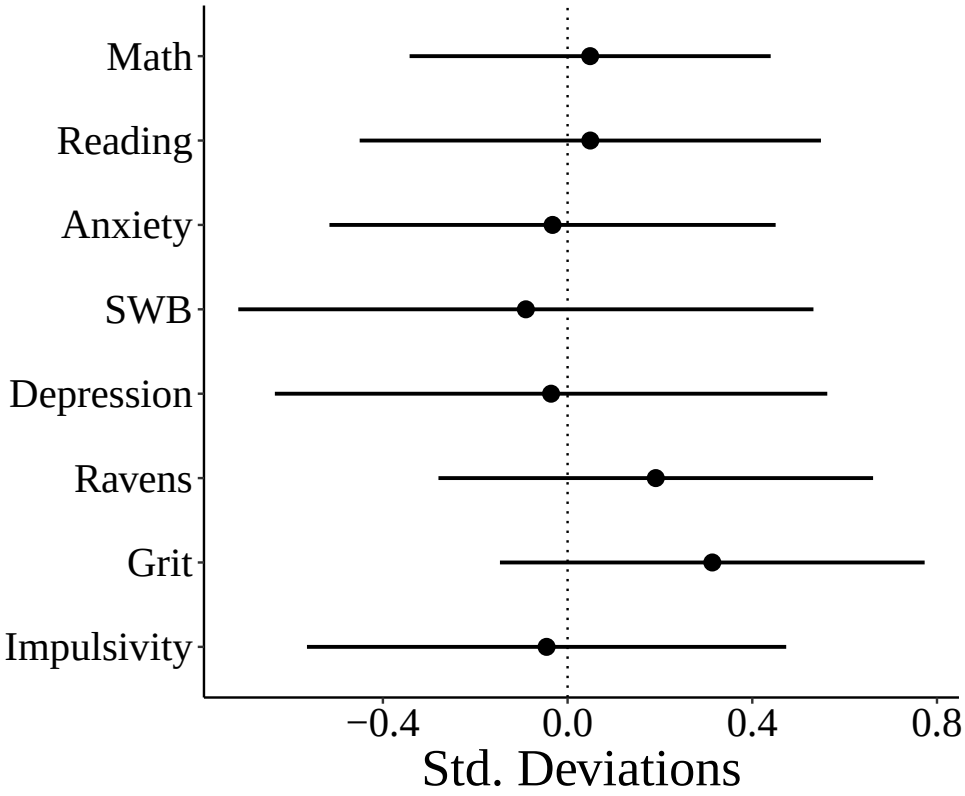
Note: Sample Raven's matrix puzzle.

Figure A.9: Effect on Familiarity with Mindfulness



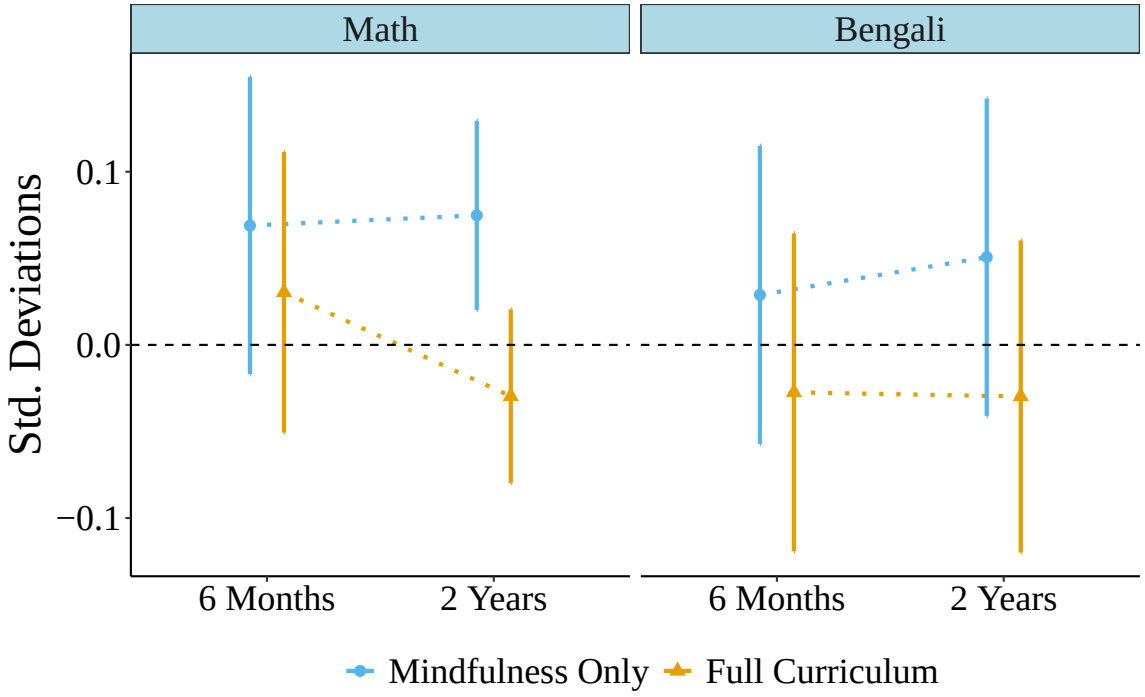
Note: Effects of the Happiness Curriculum and mindfulness program on whether a student reported ever practicing mindfulness meditation after 2 years. Effect sizes are reported in percentage points. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level.

Figure A.10: Sibling Spillovers



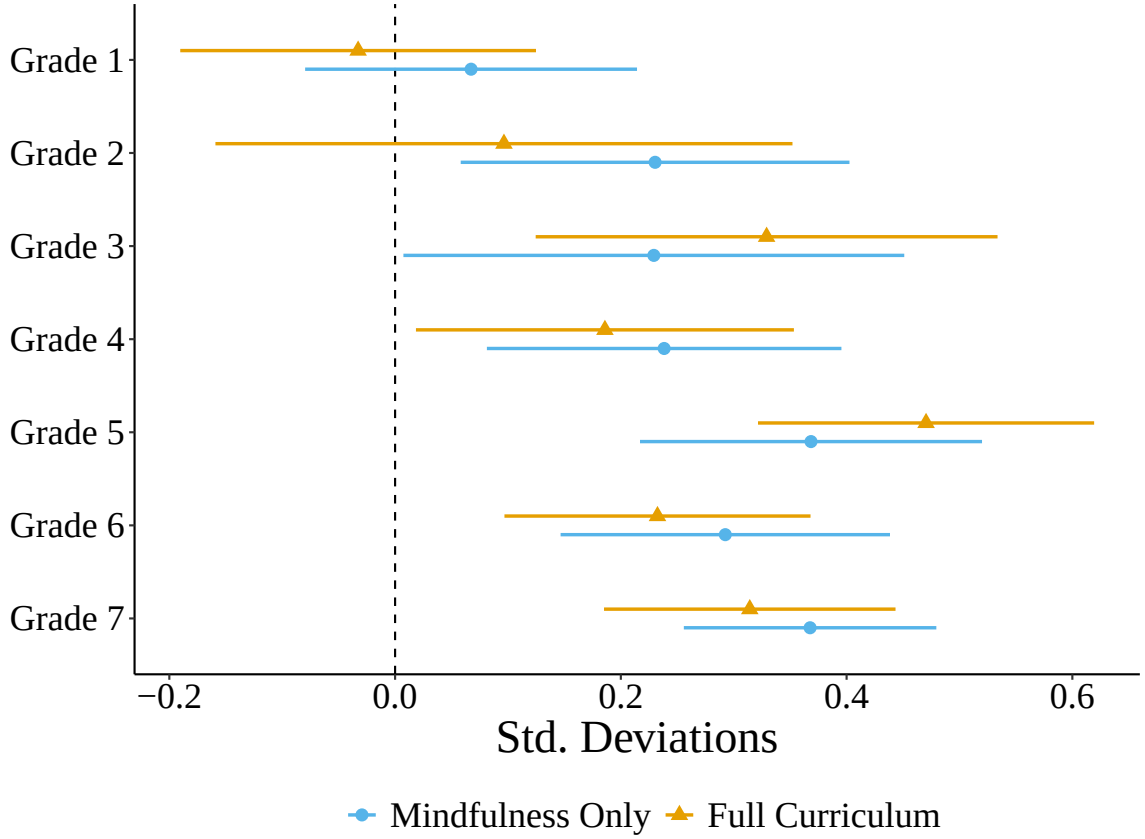
Note: Effects for control students of having a sibling assigned to either the Happiness Curriculum or mindfulness program after 2 years. Each row represents an outcome. Effect sizes are reported in standard deviations. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We additionally include fixed effects for number of siblings. We cluster standard errors at the school-grade level.

Figure A.11: Effects on Learning, State Workbooks



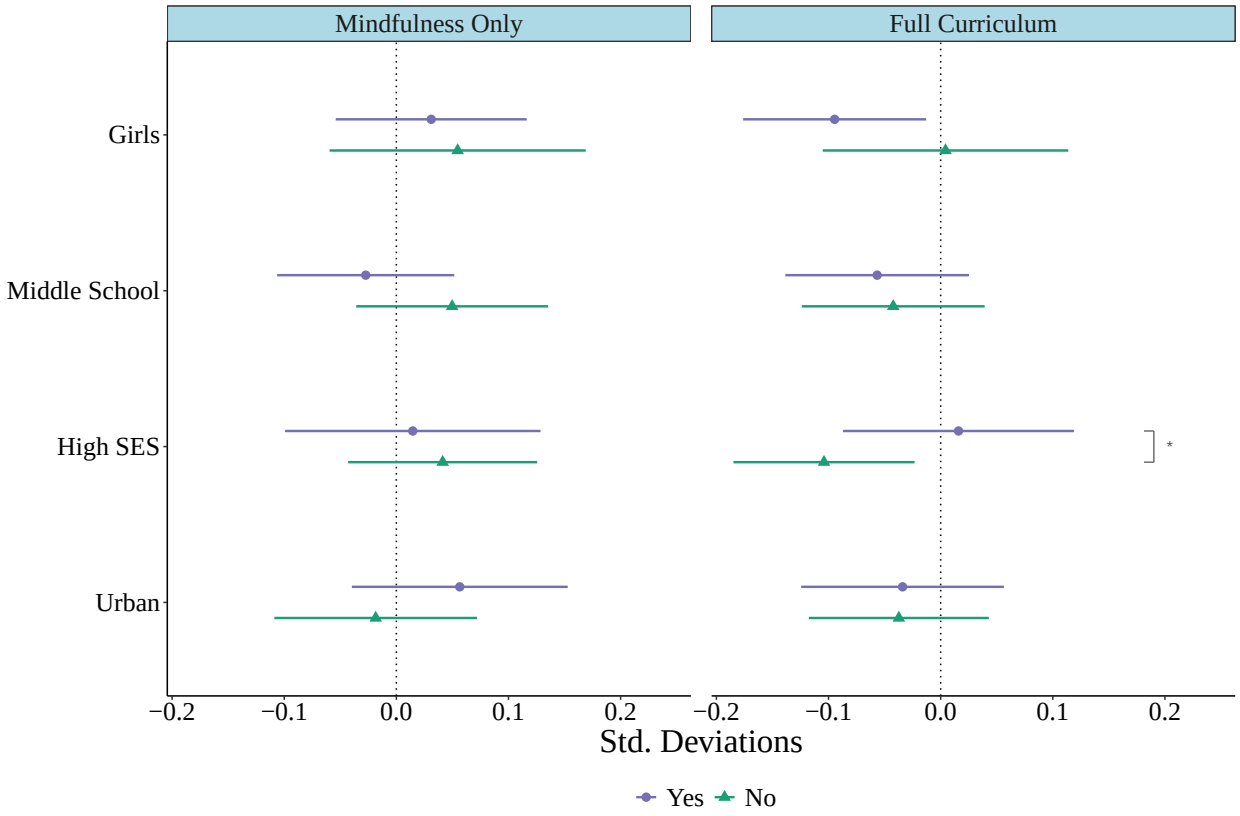
Note: Effects of the Happiness Curriculum and mindfulness program on grade-specific math and reading questions from State Council of Educational Research and Training workbooks after 6 months and 2 years. Effect sizes are reported in standard deviations. Regressions include school, grade, enumerator, and grade-group fixed effects. Students did not complete workbook questions at baseline, so as a proxy we control for baseline ASER scores. We cluster standard errors at the school-grade level.

Figure A.12: Effects on Math by Grade



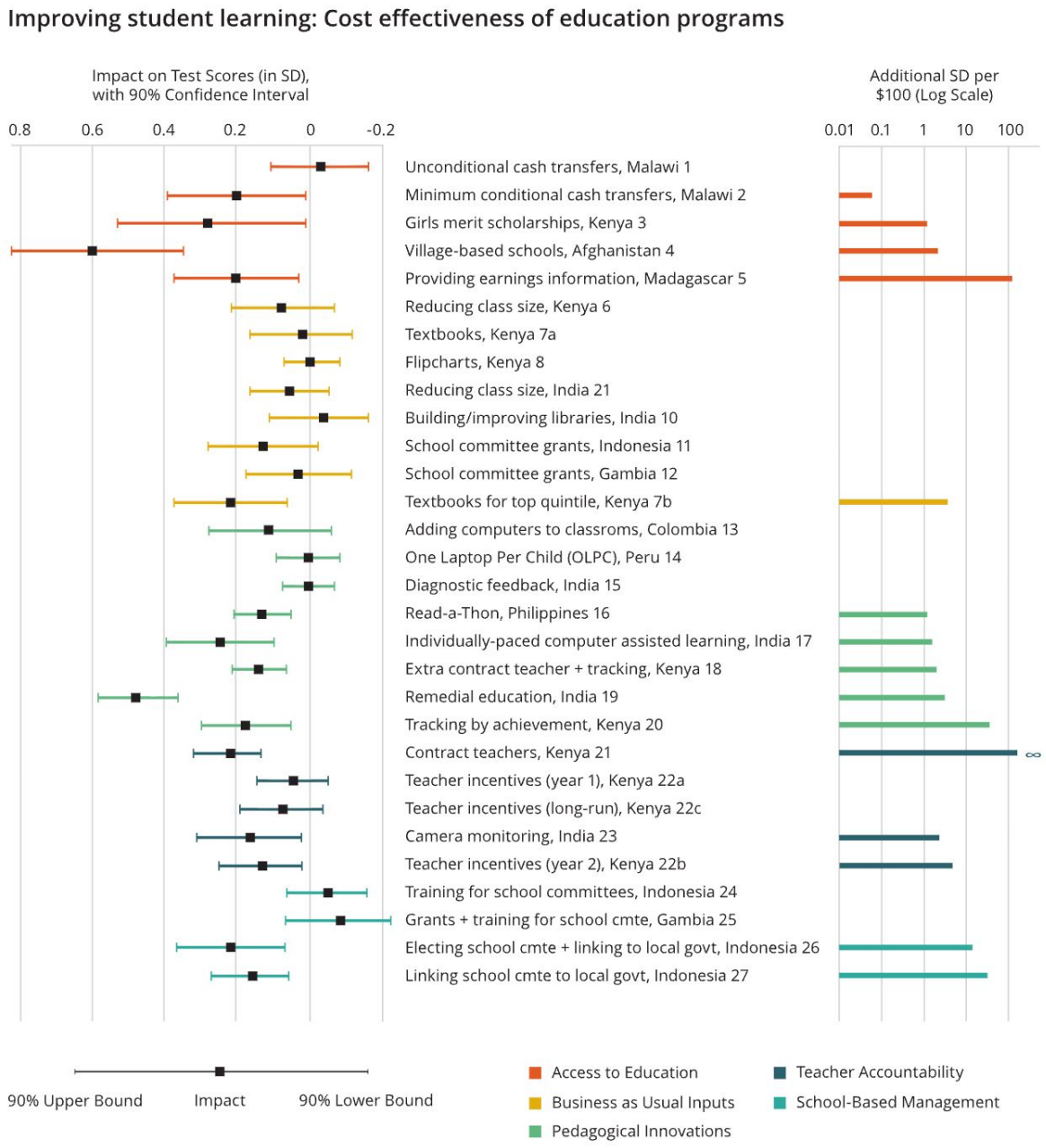
Note: Effects of the Happiness Curriculum and mindfulness program on math after 2 years, splitting the sample by grade at baseline. Math measures are from the ASER toolkit. Effect sizes are reported in standard deviations. Regressions control for the outcome at baseline and include enumerator fixed effects. We cluster standard errors at the school-grade level. Baseline grade 8 students are excluded because they graduated from the program by the second year.

Figure A.13: Heterogeneous Effects on Reading



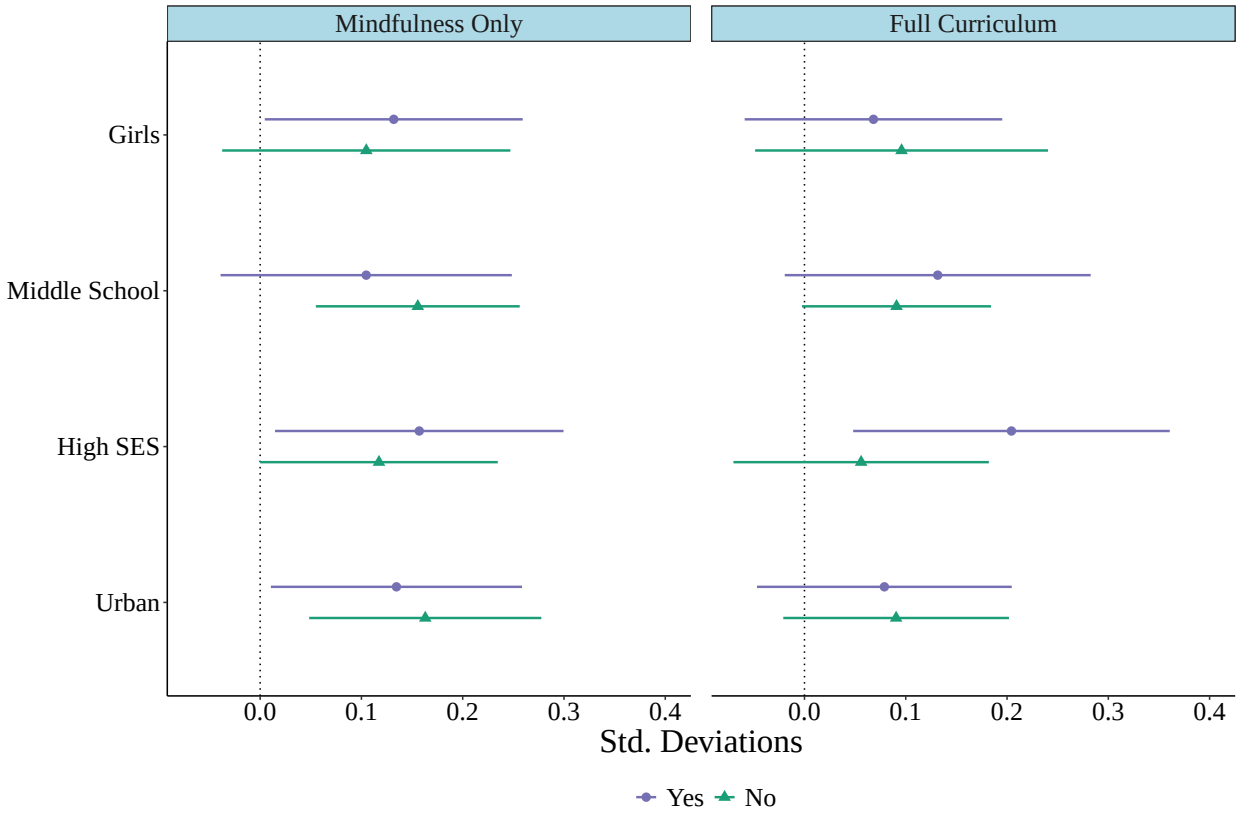
Note: Effects of the Happiness Curriculum and mindfulness program on reading after 2 years, splitting the sample by individual characteristics. Reading measures are from the ASER toolkit. Effect sizes are reported in standard deviations. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level. We define middle school as grades 6–7. Baseline grade 8 students are excluded because they graduated from the program by the second year. We use motorbike ownership as a proxy for family SES.

Figure A.14: Benchmarking Effects on Learning



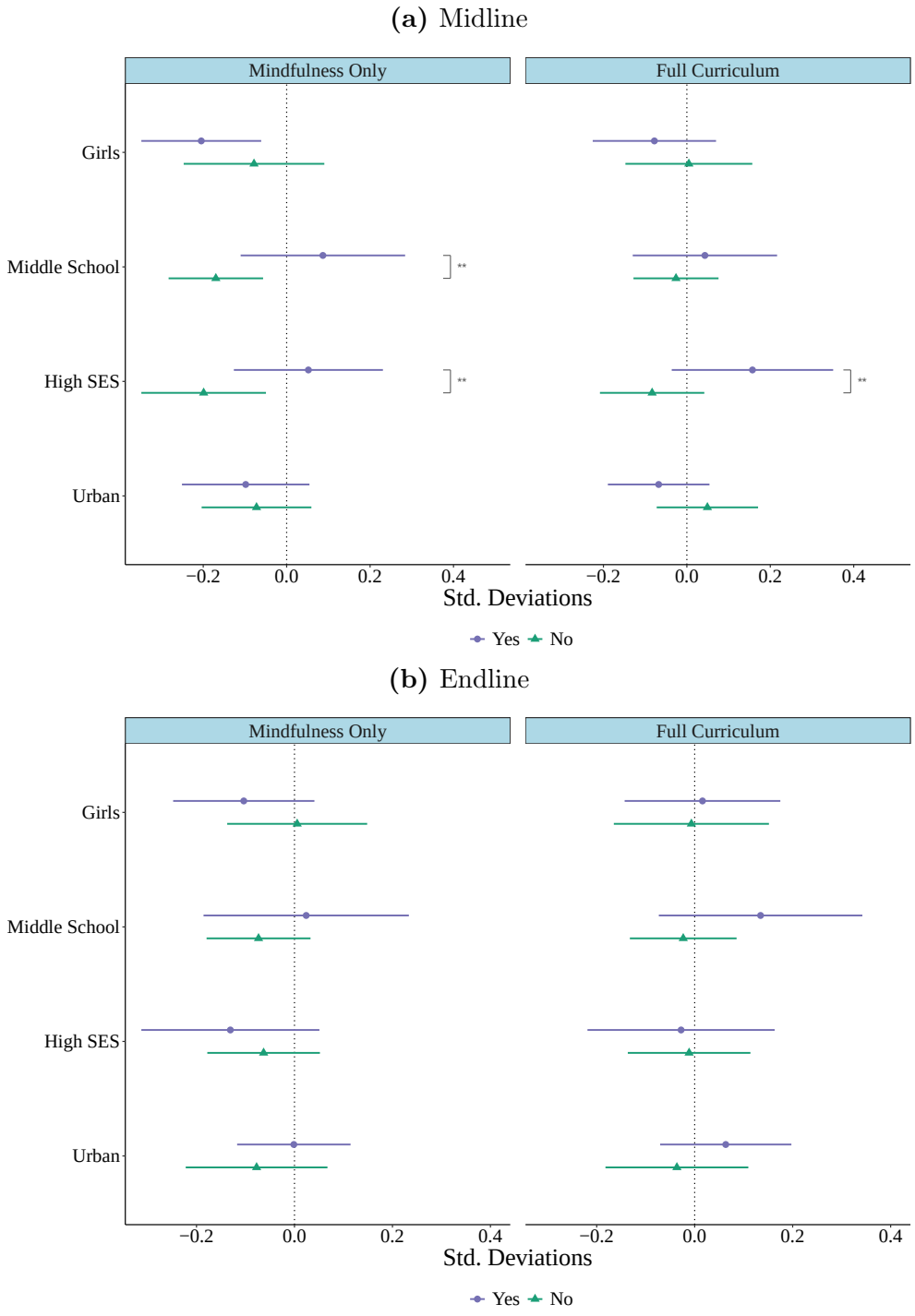
Note: Source: J-PAL 2020 Cost-Effectiveness Analysis calculations.

Figure A.15: Heterogeneous Effects on Fluid Intelligence



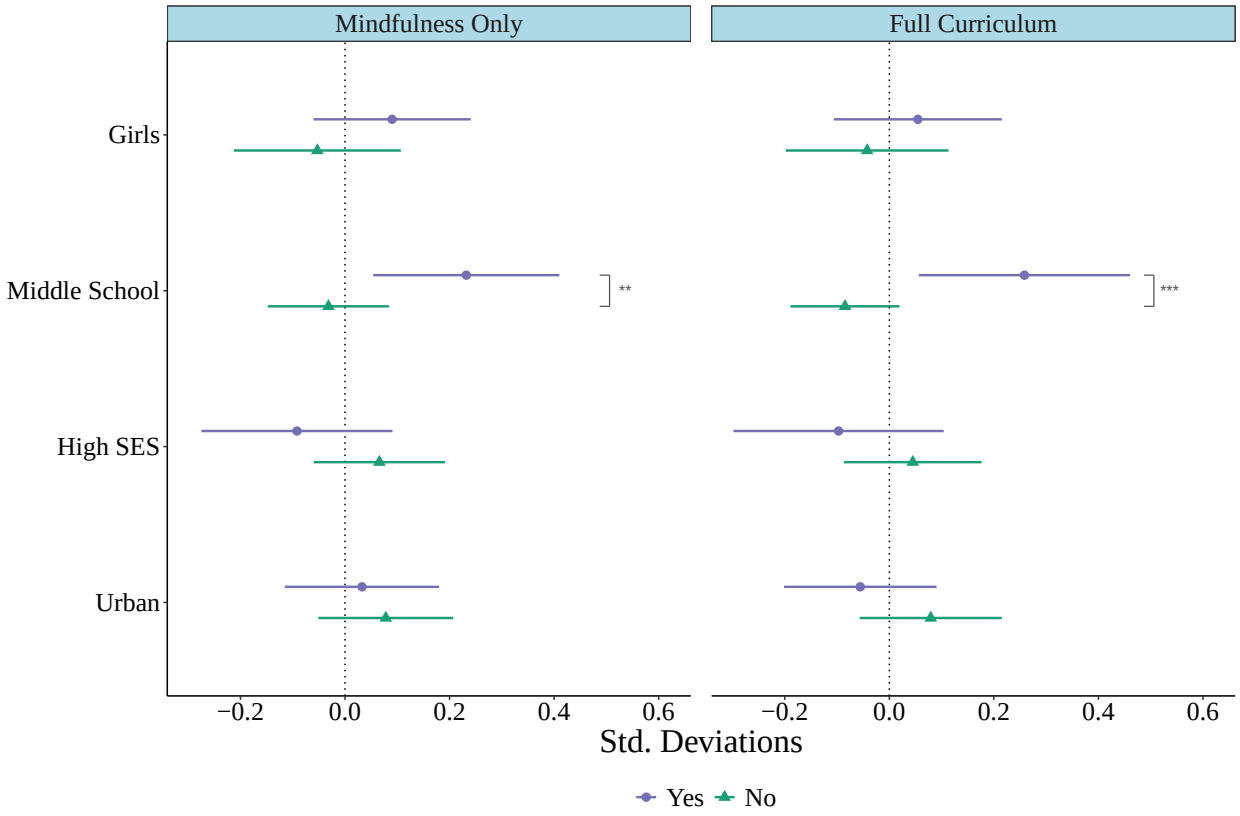
Note: Effects of the Happiness Curriculum and mindfulness program on performance on Raven's matrix puzzles, a measure of fluid intelligence, after 2 years splitting the sample by individual characteristics. Outcome is the number of Raven's matrices solved correctly (out of 9). Effect sizes are reported in standard deviations. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level. We define middle school as grades 6–7. Baseline grade 8 students are excluded because they graduated from the program by the second year. We use motorbike ownership as a proxy for family SES.

Figure A.16: Heterogeneous Effects on Anxiety (GAD-7)



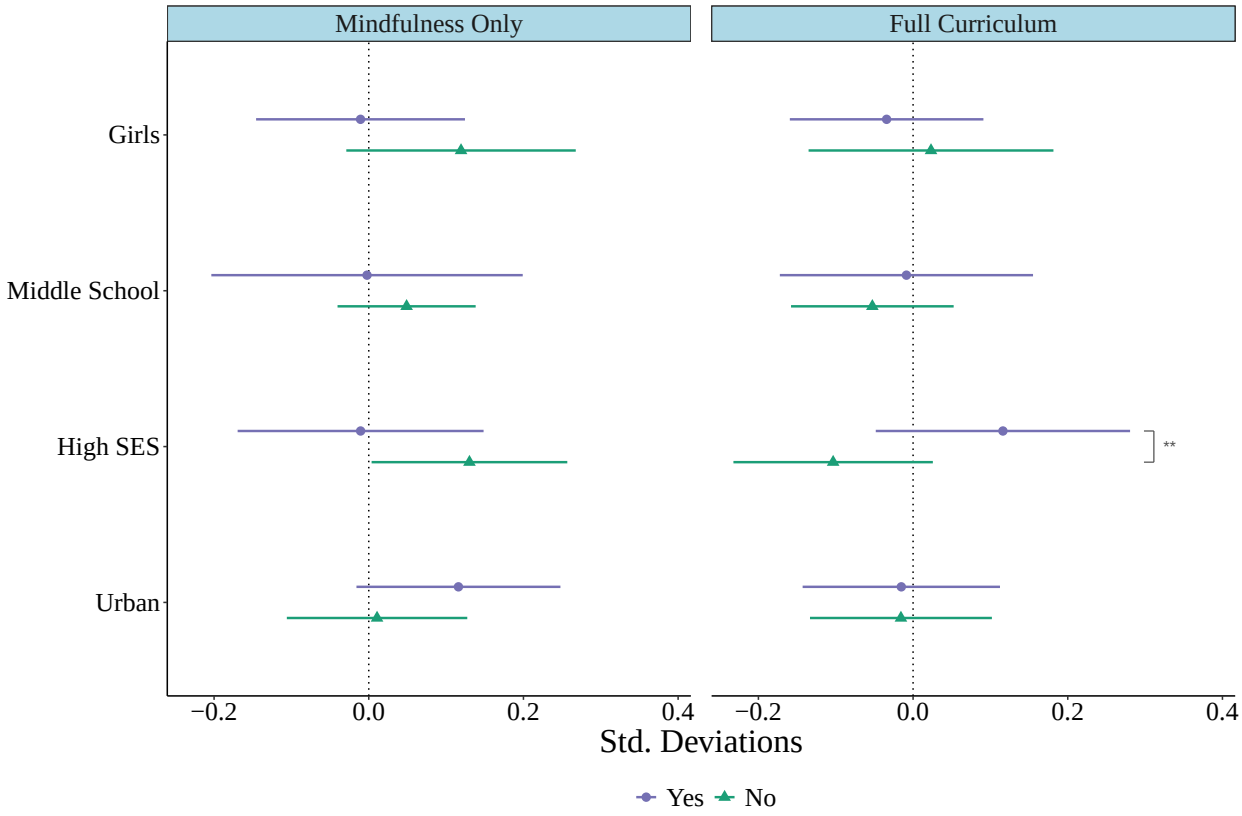
Note: Effects of the Happiness Curriculum and mindfulness program on anxiety after 6 months and 2 years, splitting the sample by individual characteristics. Anxiety is measured using the GAD-7. Effect sizes are reported in standard deviations. Regressions include school, grade, enumerator, and grade-group fixed effects. We control for baseline GAD-7 for the subset of students who filled it out. For the rest, we control for the shorter GAD-2. We cluster standard errors at the school-grade level. We define middle school as grades 6–8. Baseline grade 8 students are excluded from the endline regression because they graduated from the program by the second year. We use motorbike ownership as a proxy for family SES.

Figure A.17: Heterogeneous Effects on Depression (MFQ)



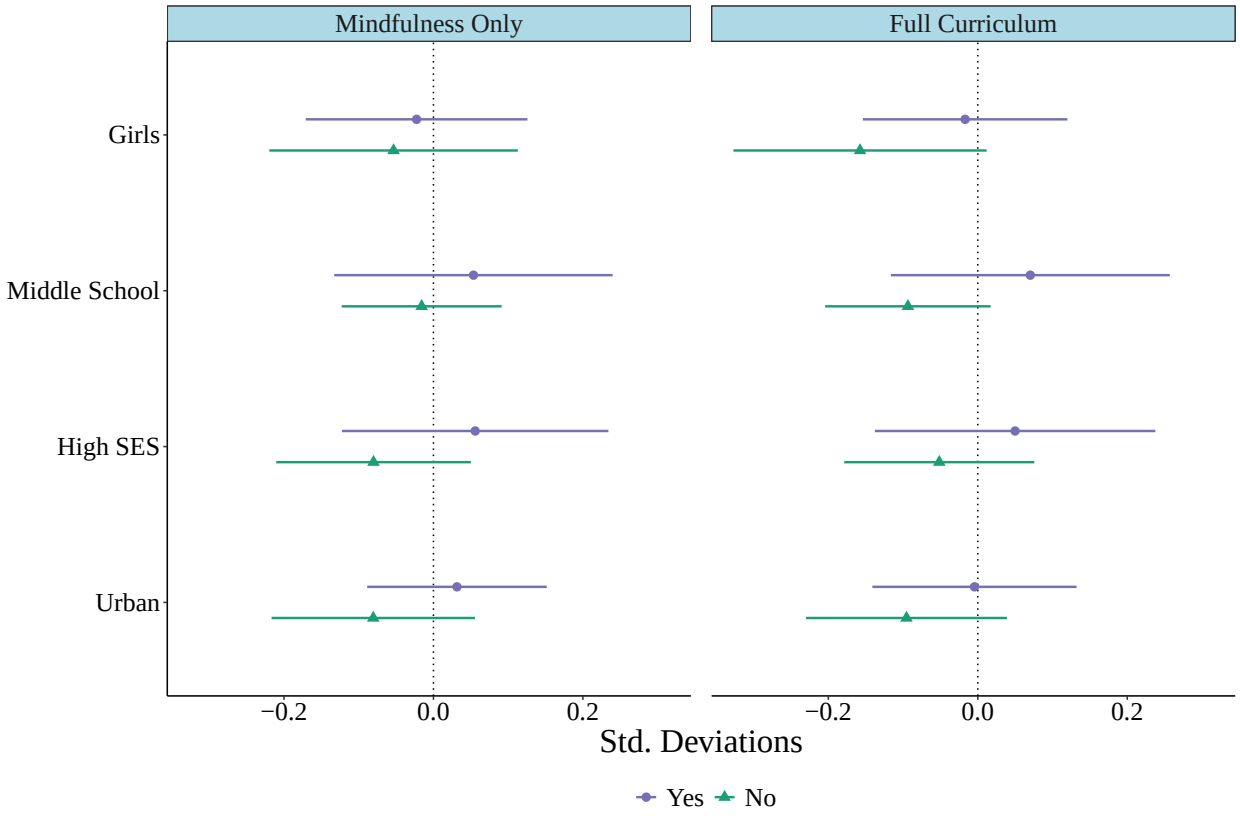
Note: Effects of the Happiness Curriculum and mindfulness program on depression after 2 years, splitting the sample by individual characteristics. Depression is measured using the MFQ. Effect sizes are reported in standard deviations. Regressions include school, grade, enumerator, and grade-group fixed effects. We control for baseline MFQ for the subset of students who filled it out. For the rest, we control for the shorter GAD-2. We cluster standard errors at the school-grade level. We define middle school as grades 6–7. Baseline grade 8 students are excluded because they graduated from the program by the second year. We use motorbike ownership as a proxy for family SES.

Figure A.18: Heterogeneous Effects on Grit



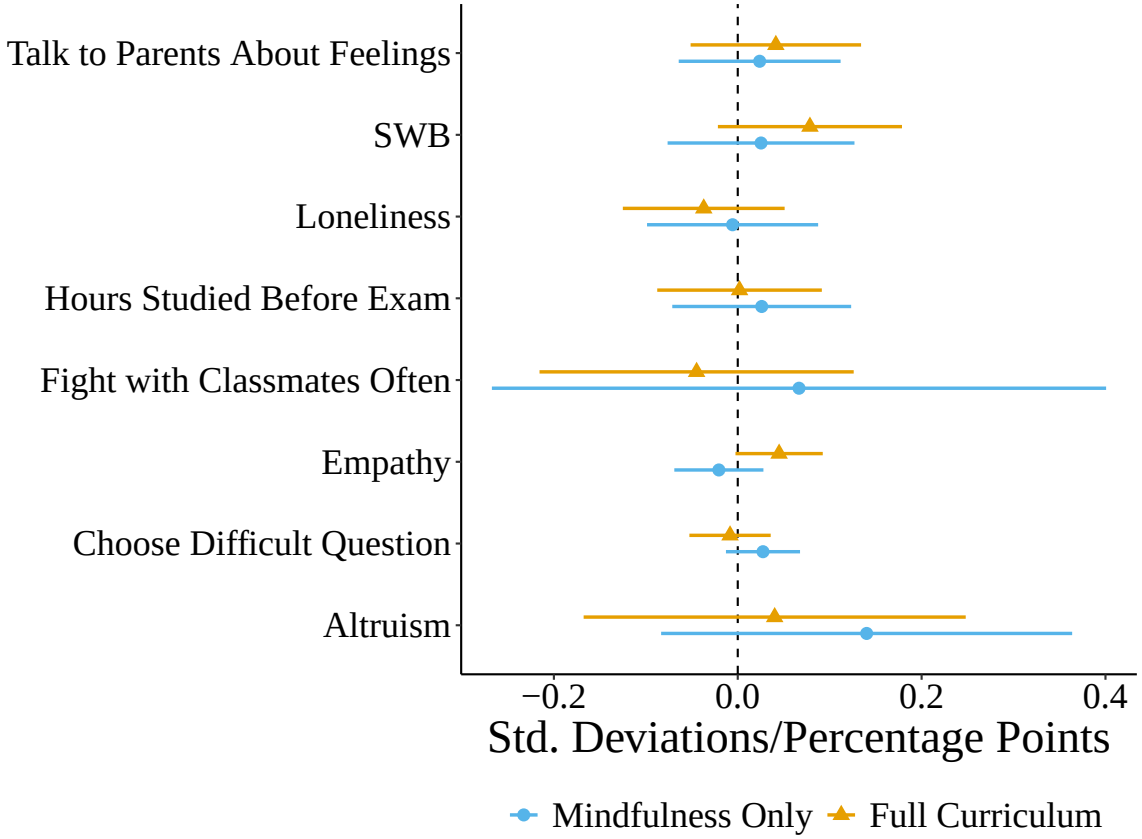
Note: Effects of the Happiness Curriculum and mindfulness program on grit after 2 years, splitting the sample by individual characteristics. Grit is measured using the 10-point Grit scale. Effect sizes are reported in standard deviations. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level. We define middle school as grades 6–7. Baseline grade 8 students are excluded because they graduated from the program by the second year. We use motorbike ownership as a proxy for family SES.

Figure A.19: Heterogeneous Effects on Impulsivity



Note: Effects of the Happiness Curriculum and mindfulness program on impulsivity after 2 years, splitting the sample by individual characteristics. Impulsivity is measured using the DSIS-C scale. Effect sizes are reported in standard deviations. Regressions control for the outcome at baseline and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level. We define middle school as grades 6–7. Baseline grade 8 students are excluded because they graduated from the program by the second year. We use motorbike ownership as a proxy for family SES.

Figure A.20: Effects on Relationships, Well-Being, Motivation, and Altruism



Note: Effects of the Happiness Curriculum and mindfulness program on well-being outcomes. To measure grit, students were asked to choose between completing an easy or hard math question. To measure altruism, students participated in dictator games where they were given 10 stationary items and asked how many they would like to keep or give away to an anonymous peer. Using Likert scales, we asked students how often they fought with a classmate in the last week or talked to parents about their feelings. To measure motivation, we asked students how many hours they studied before their most recent exam. We used the UCLA-3 Loneliness scale and adapted the Basic Empathy scale. To measure subjective well-being, we asked students to report how happy they felt yesterday on a Likert "face" scale representing happy, neutral, or sad. Effect sizes are reported in standard deviations except for empathy and the difficult question choice, which are reported in percentage points. Regressions control for the outcome at baseline when available and include school, grade, enumerator, and grade-group fixed effects. We cluster standard errors at the school-grade level.

Table A.1: Robustness of Learning Effects

	Preferred	FEs Only	No Controls	No Treated Siblings	No Collapsed Grades	Lee Bounds
Panel A: Math						
Mindfulness Only	0.29***	0.35***	0.29***	0.30***	0.32***	[0.26, 0.28]
	(0.04)	(0.04)	(0.06)	(0.04)	(0.04)	
Full Curriculum	0.27***	0.29***	0.34***	0.26***	0.27***	[0.31, 0.35]
	(0.04)	(0.04)	(0.06)	(0.04)	(0.05)	
Observations	3,408	3,408	3,414	2,972	2,503	2,318–2,390
Panel B: Reading						
Mindfulness Only	0.03	0.06	0.08	0.04	0.04	[0.00, 0.01]
	(0.03)	(0.04)	(0.06)	(0.03)	(0.03)	
Full Curriculum	−0.04	−0.06*	0.01	−0.04	−0.07**	[–0.04, 0.01]
	(0.03)	(0.04)	(0.06)	(0.03)	(0.03)	
Observations	3,377	3,377	3,383	2,942	2,490	2,453–2,491
School FE	✓	✓		✓	✓	✓
Grade FE	✓	✓		✓	✓	✓
Enumerator FE	✓	✓		✓	✓	✓
Grade-Group FE	✓	✓		✓	✓	✓
Baseline Control	✓			✓	✓	✓

*** p<0.01, ** p<0.05, * p<0.1

Notes: Effects of the Happiness Curriculum and mindfulness program on math and reading measures from the ASER toolkit after 2 years. Effect sizes are reported in standard deviations. Column (1) presents our preferred specification controlling for the outcome at baseline and including school, grade, enumerator, and grade-group fixed effects. Column (2) drops baseline control. Column (3) also drops all fixed effects. Column (4) excludes students with a sibling in a treated grade. Column (5) excludes students in grades where multiple grades were observed together. Column (6) estimates Lee Bounds via pairwise arm-vs-control comparisons. We cluster standard errors at the school-grade level.

Table A.2: Benchmarking Effects of SEL and Non-Cognitive Skill Programs on Learning

Study	**Setting**	**Intervention**	**Main Effects**
Cassar et al. (2022)	Germany: 224 university students	2 month mindfulness-based stress reduction course (60min per week)	*End:* GPA –0.26 SD (*) *6mo:* GPA 0.39 SD (**)
Brown et al. (2025)	India: 6 primary schools	6 month cognitive endurance program (20min, 1–3x per week)	*End:* Hindi 0.1 SD (**), Math 0.08 SD (**)
Alan et al. (2019)	Turkey: 52 elementary schools	3 month grit curriculum (2hrs per week)	*End:* Math 0.31 SD (***), Verbal 0.13 SD (*) *2.5yrs:* Math 0.19 SD (***), Verbal 0.04 SD
Huillery et al. (2025)	France: 97 middle schools	4 year growth mindset intervention (1hr, 3x per year)	*End:* GPA 0.05 SD (**), Nat'l Exam 0.01 SD
Ashraf et al. (2020)	Zambia: grade 8 girls in 41 schools	2 week negotiation skills training (2hrs, 6 classes)	*3–4mo:* Math 0.09 SD(*), English 0.07 SD
Alan and Mumcu (2024)	Turkey: 134 primary schools	Curiosity pedagogy training program for teachers	*End:* Math 0.01 SD, Verbal 0.03 SD *3yrs:* Math –0.02 SD, Verbal –0.01 SD
Edmonds et al. (2023)	India: grade 6–7 girls in 119 schools	2 years of life skills classes (1hr, 2x per month)	*2yrs:* Math –0.01 SD, Hindi 0.02 SD

*** p<0.01, ** p<0.05, * p<0.1

Notes: Selected studies studying the effects of school-based SEL and non-cognitive skills programs. Effects are reported in standard deviations.

Table A.3: Robustness of Fluid Intelligence Effects

	Preferred	FEs Only	No Controls	No Treated Siblings	No Collapsed Grades	Lee Bounds
Mindfulness Only	0.13***	0.16***	0.19***	0.12***	0.15***	[0.06, 0.09]
	(0.04)	(0.05)	(0.06)	(0.04)	(0.05)	
Full Curriculum	0.10**	0.11**	0.18***	0.06	0.12**	[0.11, 0.19]
	(0.04)	(0.04)	(0.06)	(0.04)	(0.05)	
Observations	3,408	3,408	3,414	2,972	2,503	2,477–2,533
School FE	✓	✓		✓	✓	✓
Grade FE	✓	✓		✓	✓	✓
Enumerator FE	✓	✓		✓	✓	✓
Grade-Group FE	✓	✓		✓	✓	✓
Baseline Control	✓			✓	✓	✓

*** p<0.01, ** p<0.05, * p<0.1

Notes: Effects of the Happiness Curriculum and mindfulness program on performance on Raven's matrices, a measure of fluid intelligence, after 2 years. Outcome is the number of Raven's matrices solved correctly (out of 9). Effect sizes are reported in standard deviations. Column (1) presents our preferred specification controlling for the outcome at baseline and including school, grade, enumerator, and grade-group fixed effects. Column (2) drops baseline control. Column (3) also drops all fixed effects. Column (4) excludes students with a sibling in a treated grade. Column (5) excludes students in grades where multiple grades were observed together. Column (6) estimates Lee Bounds via pairwise arm-vs-control comparisons. We cluster standard errors at the school-grade level.

Table A.4: Robustness of Well-Being Effects

	Preferred	FEs Only	No Controls	No Treated Siblings	No Collapsed Grades	Lee Bounds
Panel A: Anxiety						
Mindfulness Only	−0.06	−0.04	−0.01	−0.07	−0.06	[–0.01, 0.12]
	(0.04)	(0.04)	(0.04)	(0.05)	(0.05)	
Full Curriculum	0.01	0.01	0.04	0.03	0.03	[0.01, 0.10]
	(0.05)	(0.05)	(0.04)	(0.05)	(0.06)	
Observations	3,402	3,402	3,408	2,967	2,501	1,006–1,036
Panel B: Depression						
Mindfulness Only	0.03	0.04	−0.02	0.04	0.03	[0.09, 0.24]
	(0.05)	(0.05)	(0.04)	(0.05)	(0.05)	
Full Curriculum	0.03	0.02	0.01	0.07	0.00	[–0.11, –0.07]
	(0.05)	(0.05)	(0.04)	(0.06)	(0.06)	
Observations	3,405	3,405	3,411	2,969	2,500	998–1,035
School FE	✓	✓		✓	✓	✓
Grade FE	✓	✓		✓	✓	✓
Enumerator FE	✓	✓		✓	✓	✓
Grade-Group FE	✓	✓		✓	✓	✓
Baseline Control	✓			✓	✓	✓

*** p<0.01, ** p<0.05, * p<0.1

Notes: Effects of the Happiness Curriculum and mindfulness program on the GAD-7 anxiety and MFQ depression screener after 2 years. Effect sizes are reported in standard deviations. Column (1) presents our preferred specification including school, grade, enumerator, and grade-group fixed effects. We control for baseline GAD-7 and MFQ for the subset of students who filled it out. For the rest, we control for the shorter GAD-2. Column (2) drops baseline control. Column (3) also drops all fixed effects. Column (4) excludes students with a sibling in a treated grade. Column (5) excludes students in grades where multiple grades were observed together. Column (6) estimates Lee Bounds via pairwise arm-vs-control comparisons. We cluster standard errors at the school-grade level.

Table A.5: Robustness of Non-Cognitive Skills Effects

	Preferred	FEs Only	No Controls	No Treated Siblings	No Collapsed Grades	Lee Bounds
Panel A: Grit						
Mindfulness Only	0.05	0.04	−0.02	0.08*	0.10**	[0.03, 0.07]
	(0.04)	(0.04)	(0.04)	(0.04)	(0.05)	
Full Curriculum	−0.02	−0.03	−0.07	−0.01	0.02	[–0.10, 0.04]
	(0.04)	(0.04)	(0.05)	(0.04)	(0.05)	
Observations	3,400	3,400	3,406	2,965	2,497	2,421–2,477
Panel B: Impulsivity						
Mindfulness Only	−0.02	0.01	0.02	0.00	−0.06	[0.01, 0.04]
	(0.04)	(0.05)	(0.05)	(0.05)	(0.05)	
Full Curriculum	−0.05	−0.05	0.04	0.02	−0.07	[–0.15, –0.08]
	(0.05)	(0.05)	(0.05)	(0.05)	(0.06)	
Observations	3,391	3,391	3,397	2,956	2,489	2,455–2,497
School FE	✓	✓		✓	✓	✓
Grade FE	✓	✓		✓	✓	✓
Enumerator FE	✓	✓		✓	✓	✓
Grade-Group FE	✓	✓		✓	✓	✓
Baseline Control	✓			✓	✓	✓

*** p<0.01, ** p<0.05, * p<0.1

Notes: Effects of the Happiness Curriculum and mindfulness program on the 10-point Grit scale and DSIS-C impulsivity scale after 2 years. Effect sizes are reported in standard deviations. Column (1) presents our preferred specification controlling for the outcome at baseline and including school, grade, enumerator, and grade-group fixed effects. Column (2) drops baseline control. Column (3) also drops all fixed effects. Column (4) excludes students with a sibling in a treated grade. Column (5) excludes students in grades where multiple grades were observed together. Column (6) estimates Lee Bounds via pairwise arm-vs-control comparisons. We cluster standard errors at the school-grade level.