

Report on “Issues in Education and Health: Policy Insights from Evidence Based Research” – a seminar organized by the International Growth Centre

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The research seminar titled “Issues in Education and Health: Policy Insights from Evidence Based Research” was organized by the International Growth Center on July 14, 2013 at Hotel Rupasi Bangla, Dhaka, Bangladesh. The seminar centered around some of the research work done by Prof. Ahmed Mushfiq Mobarak from Yale University and Dr. Rachel Glennerster, who serves as the Executive Director of Abdul Latif Jameel Poverty Action Lab (J-PAL), MIT.

The opening remarks for the seminar were made by Prof. Wahiduddin Mahmud, Dr. Sultan Hafeez Ahmed and Mr. M. Musharraf Hossain Bhuiyan, where the importance of a partnership between policy makers and researchers were strongly highlighted. Besides touching base on the factors that led to the formation of the International Growth Centre, they also discussed the evolving nature of the economic and socio-political challenges, particularly, among developing countries and the necessity of the formulation of well thought out and evidence-based policies.

The structure of the seminar meant that the invited policy makers/government officials and researchers had to carry out an interactive discourse. The government officials were provided with policy briefs beforehand that highlighted the design of the presented studies as well as their major findings. As such, a sustained interest in the research topic, as well as an informed discussion, was ensured.

Based on their respective research projects, Dr. Glennerster made one presentation while Prof. Mobarak made two, as described below.

1. Empowering Adolescent Girls in Bangladesh -The Kishoree Kontha Program

Background and Research Question

The first presentation was made by Dr. Rachel Glennerster which highlighted her initial findings from the Kishoree Kontha (KK) adolescent girls’ empowerment program. KK is a collaborative venture between Save the Children in Bangladesh and the Abdul Latif Jameel Poverty Action Lab (J-PAL).

Dr. Glennerster, at first, discussed the conditions which motivated this research project. Using findings from Bangladesh Demographic and Health Survey in 2011, Dr. Glennerster, highlighted the lack of mobility, access to health services and education, and overall, a bleak condition of female empowerment in Bangladesh. She made the observation that these are highly correlated with each other, as well as with other factors, such as early marriage and that it is difficult to establish the separate causal role of each in determining the poor outcomes observed for adolescent girls. As such, an RCT intervention was conceived that could attempt to separate some of the causal links (as highlighted in the following questions) to best identify what a suitable policy design could be to delay early marriage among teenage girls:

- Is educating girls enough on its own?
- Is delaying marriage the key?

- Would an incentive to delay marriage work? Is it necessary to work on several barriers at once (for example staying in school and marriage) or can progress be made by addressing each issue separately?

Intervention Design

Dr. Glennerster discussed the different intervention arms in detail:

- 1) KK Basic - Girls' clubs with peer led education aimed to enhance basic literacy, numeracy, life skills, and nutritional and reproductive knowledge. The program began with advocacy with community leaders to identify safe spaces (in house or school) where the program was to be run. The safe spaces met 3-5 days a week for 2 hours for 6 months. Literacy and numeracy classes for girls not going to schools as well as study support for school-going girls were included. Social competency and leadership skills such as communicating as well as community organizing skills were also covered
- 2) KK Basic and Livelihood - Some clubs additionally included training on basic financial skills, identifying income generating opportunities, alongside
- 3) Incentive - A conditional in-kind transfer as an incentive to delay marriage for girls below the legal age of marriage (18 years). Four 4 liters of cooking oil were delivered every 4 months (worth the equivalent of \$15 a year). This amount was equal to the increase in dowry by age. The stipend was conditional on girl staying unmarried.
- 4) Full – A combination of both the KK Basic and Livelihood and incentive programs.

Results

Dr. Rachel Glennerster made it clear that it is early to comment on the final effect of the program as the project is ongoing. Reporting on the midline results, she mentioned that that while treatments that included the incentive affect several key outcomes, the KK program without the incentive has limited impact. Impact is measured by comparing average outcomes in treatment and comparison communities. She found that:

- marriage rates are lower by 5.5% in the incentive treatment arm.
- not all the eligible girls took up the oil incentive program, and if it is assumed that the entire effect on marriage came from those who did take it up then the effect on these girls would be 12% fewer marriages among those aged 19-22.

Girls in the treatment arm that combined the incentive and the KK program are found to display increased education outcomes, and these effects are driven by:

- Increase in highest class passed (0.3 of a grade)
- Higher test scores, both math and literacy (0.12 on a 5 point scale)
- More expenditure on education by girls (49 taka or 60 cents per month)

However, Dr. Glennerster acknowledged that it is not possible to rule out that the effect of the incentive on its own on education is the same as the combined effect of the incentive and the KK program. She also provided details on the evidence that combining the incentive and the KK treatments together had positive effects on a wider range of outcomes including:

- Physical Health – height and weight
- Knowledge – knowledge of contraception and risk of early pregnancy
- Negotiation – girls say they will negotiate (early) marriage and refuse proposals using age as reason
- Activities – organized events , went to events alone
- Marriage – early marriage negotiations, will register marriage

Dr. Glennerster could not rule out the possibility that all the effects are being driven by the incentive alone and the midline results provide evidence that an appropriately designed in-kind transfer program can be effective in delaying marriage and improving education outcomes for adolescents.

Points made by Discussants/Participants

1. Dr. Simeen Mahmud thanked Dr. Glennerster for being humble regarding the limitations of an RCT-based evaluation. Her main concern seemed to be about the age which is a self-reported and respondents, potentially, could report their daughters' age wrongly, so as to be able to qualify for obtaining the oil subsidy. Dr. Glennerster mitigated this concern by saying that only baseline age and year of birth were used for both evaluation and subsidy provision. The respondents did not know about the purpose of the study at the time of the baseline survey and could not have reported wrong age deliberately.
2. Dr. Niaz Asadullah talked about a BRAC project that also targeted adolescent girls, potentially in the same area in which the study was taking place. He expressed concern about the intervention effects getting contaminated because of other cross-cutting programs. Dr. Rachel said that their survey instruments asked about other programs, i.e., whether the respondent had been a benefactor of such. She said that no evidence of such program was found yet.
3. Several other points were made by the discussants and attendees. Some of these were methodological, i.e. whether there was any problem with the balance/randomization because of attritions that happened due to rumors among some villages about a 'proselytizing campaign by Christian missionaries' for which survey activities had to be suspended in parts of the study area.
4. Dr. Nasser, Secretary, Ministry of Education, highlighted several government programs that have been running throughout Bangladesh to promote female education and empowerment. He lauded these as the factors that have resulted in higher number of primary and secondary female students than their male counterparts in recent years. Some of these programs do provide pecuniary and non-pecuniary incentives. He also talked about free-distribution of books among students, particularly, female students that have resulted in solid gains.
5. One participant made the observation that marriages in rural Bangladesh usually result in limitations of female movement. As such, in terms of empowerment and mobility, social institutions and cultural norms have to be targeted. Another participant made the point that to bring about a change in the norm of early marriages in rural Bangladesh, targeting only teenage girls may be a futile idea. Rather, a comprehensive plan of targeting the girls' parents, who usually play the most important role in their marriage outcomes, may help reach the desired outcome.

2. Strategies to Improve Adoption of Welfare-Improving Products in Bangladesh

Background and Research Question

This is the first of the two presentations that Prof. Ahmed Mushfiq Mobarak made at the seminar. Prof. Mobarak started by talking about the ‘last mile problem’ that drives his as well as some other development economists’ research agenda – i.e., why cheap technologies, spanning health, agriculture and finance are not adopted by most poor households despite proving to be welfare-improving. He underscored the importance of finding rigorous evidence by randomized trials for different marketing strategies to understand what works best. Moreover, detailed evidence can be found to identify what factors inhibit the adoption to begin with. Prof. Mobarak went on to describe one such experiment using which he tried to understand why poor households chose not to migrate during pre-harvest lean seasons in rural Bangladesh despite potentially high gains from doing so.

This presentation was based on the paper “Escaping Famine through Seasonal Migration”. Prof. Mobarak chronicled the seasonality in agricultural crop cycles and the adverse conditions poor households faced during the pre-harvest lean season (locally known as “monga”) with limited job opportunities, low wages and high prices. With this background and the facts that (a) there is greater inter-regional variation in incomes than inter-seasonal, and (b) seasonal out-migration from this region is low relative to the rest of the country, this particular research project attempted to explain this apparent contradiction by looking at two key questions. First, if migration is, in fact, a useful strategy, and second, if so, why it is not employed more often.

Intervention Design and Results

To answer these aforementioned questions, in 2008, a project was developed to provide small grants and loan incentives (of approximately US \$8.50), contingent on seasonal migration out in search of employment. In 2011, Prof. Mobarak and his team repeated this treatment but also added two new treatments: (1) unconditional credit of the same amount not tied to any migration requirement, and (2) a migration insurance program that attempts to explicitly cover losses associated with failure to find employment at the migration destination. The random assignment of incentives allowed the researchers to generate among the first experimental estimates of the effects of internal migration.

Large returns were found: migration induced by this intervention increased food and non-food expenditures by migrants’ family members remaining at the location of origin by 30-35%, and improved their caloric intake by 550-700 calories per person per day. On an initial investment of about \$6-\$8 (the average round-trip cost to a destination city), migrants earned \$110 on average during the lean season and saved about half of that, suggesting a very high rate of return on investment.

Prof. Mobarak went on to posit the question of why more people don’t migrate on their own despite the existence of such high returns. To answer this, he proposed a model in which experimenting with migration is risky, and rational households choose not to migrate in the face of uncertainty about their prospects at the destination. The household does not know what their likelihood of realizing positive returns is, and the costs associated with failure (i.e. paying the costs of moving but failing to find employment during a period in which their family is already under the threat of famine) are prohibitively high. The grants and loans induced experimentation with migration by reducing the costs of this experimentation and insuring against a possible negative outcome. These results show that inducing an initial migration episode can lead to long-run benefits,

as migrants reduce their uncertainty regarding the benefits to migration and improve their future prospects by allowing employers to learn about them. Strikingly, households in the treatment areas continue to migrate at a significantly higher rate than those in control areas even after the incentive is removed. The migration rate is 10 percentage points higher in treatment areas a year later, and this figure drops only slightly to 8 percentage points 3 years later.

3. Does Development Aid Undermine Political Accountability? Voter and Politician Responses to a Large-Scale Sanitation Intervention

Background and Research Question

In the last presentation, Prof. Mushfiq Mobarak started with the controversial question: “How useful is development aid?” He referred to the ongoing debate between prominent voices (e.g. Jeffrey Sachs, Gates Foundation) who have argued for providing a lot of aid in the form of development programs, while their critics who have argued that aid money is wasteful (William Easterly, *Dead Aid* by Dambisa Moyo).

He posited the concern that politicians in developing countries may leverage goodwill from a development program into increased voter support when there is uncertainty about their role in procuring the program – even when they had no role or influence. Prof. Mobarak then went on to explain how he and his fellow researchers made use of an ongoing large scale RCT project that aims to increase adoption of sanitary practices to investigate the topic of politician behavior in the face of an aid program.

Funded by Bill and Melinda Gates foundation, this project - titled “Bolstering Demand for Sanitation” - consists of a randomized evaluation in four unions of Tanore, Rajshahi and tests competing theories about why poor sanitation conditions prevail in rural areas. Due to the program’s coverage of an entire sub-district, politician behavior could be potentially affected. Using extensive household perception data, voter and politician responses to random provision of subsidies can be evaluated.

Research question

The study addressed two inter-related questions:

- Does development aid potentially worsen outcomes in the long run by reducing politicians’ accountability and allowing bad leaders to persist in office?
- Second, are voters systematically fooled by randomness, attributing the effects of random shocks (such as new aid programs) to politicians?

Intervention Design

Professor Mobarak attempted to answer these above questions based on a large-scale randomized controlled trial (RCT) evaluating the effects of the provision of sanitation information, and subsidies to low income communities in rural Bangladesh.

Villages were randomly allocated into three groups. One group received information about the importance of sanitation; another group received both information and a public lottery in which households could win subsidies for latrine construction; the third group received no intervention or information. This intervention had three key features:

- it was conducted at a large scale (118 villages, 372 neighborhoods and 18,000 households);
- the randomization occurred at two levels, one public and one non-public;

- data on political leaders' actions and residents' attitudes towards these leaders collected

Results

Prof. Mobarak explained that to households, their local leader's involvement in the existence of the subsidy program or its allocation to their village may have been unclear. In contrast, the actual lottery outcome for a specific household, leading to the subsidized provision of a latrine, was clearly and transparently a public, randomized process completely outside the politician's control.

The results from this study indicate that politicians were significantly more likely to visit villages that received the subsidy program, taking advantage of the lack of transparency to attempt to associate themselves with the program. In the face of uncertainty about the leader's role in bringing the lottery program to the village, and observing this extra effort, constituents were more likely to report satisfaction with their leader's performance in providing sanitation services. However, there was no added satisfaction with politician performance associated with having won the subsidy, as it was obvious that he had no role in the outcome.

These interactions generate two positive outcomes.

- As politicians visit subsidy villages more often, residents get a chance to discuss their needs with their leader. In response, the leader compensates households that did not win the lottery.
- The intensive sanitation information campaign created greater political accountability as constituents became more informed about their sanitation needs and the responsibilities of community leaders.

Prof. Mobarak referred to some scholars have argued that development aid can undermine local political accountability, and prevent systematic institutional failures from getting addressed. These results support a more nuanced conclusion: if development aid is accompanied by transparency in allocation, it is not easy for local leaders to take advantage and generate political support, and political accountability may even increase if information campaigns make voters more sophisticated about their needs or their leaders' responsibilities.

Points made by Discussants/Participants

1. Dr. Ashish Bajracharya of Population Council discussed the paper and posited a few questions: a. how generalizable are the findings of this research, e.g., can this be applied to a different political economy such as a semi-democracy or a dictatorship b. how might the results vary for a different kind of aid program, e.g. that provide more 'controversial' programs such as menstrual health products.

Prof. Mobarak, in his brief reply, contended that many of these results are fairly generalizable. For example, some dictatorships are nervous about maintaining power and local politician behavior might reflect that, i.e. a desire to capture the benefits of an aid program.

2. One participant raised a concern about the subjective nature of the independent variables, i.e. voter responses in a survey to evaluate politician performance. While it is instructive to understand the perception of the voters, it would be interesting to get some objective criteria of the performance of the politicians as well.
3. Another participant asked about what was being done to disseminate the results of these research projects among grass-root level development practitioners.