Policy brief
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When women eat last

Discrimination at home and women's mental health

In brief

- In Bihar, Jharkhand, and Maharashtra, India, it is common for women to eat after men in their households.
- Eating last is negatively associated with women's mental health, even after accounting for differences in socioeconomic status across households.
- Additionally, eating last may be associated with worse mental health because it leads to worse physical health for women and/or signifies less autonomy for women.
- Collecting more data on a wider range of measures of women's autonomy and social status, along with measures of physical and mental health, will contribute to more nuanced understanding of gender discrimination and mental health.

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Background

Women and mental health in India

Women and girls in India face many forms of discrimination throughout the life course, which has important consequences for women themselves, and for their families and communities. The link between gender inequality and mental health, however, has been understudied.

An important form of gender discrimination in India occurs in the ways in which food is distributed within households. In India, women are often expected to eat last, despite doing almost all of the cooking. Recent studies have shown that women who eat last have worse physical health. In particular, women who experience this specific kind of gender discrimination are more likely to be underweight than those women who do not experience it. This is true for women of all adult ages and at all levels of household expenditure.[1]

"A strong association between eating last and being underweight suggests that eating last has an impact on physical health, which in turn, may have an impact on mental health."

A strong association between eating last and being underweight suggests that eating last has an impact on physical health, which in turn, may have an impact on mental health. The potential adverse effect of eating last on mental health is reinforced by the findings in medical literature which shows that being underweight can impact concentration, decision-making, and mood.

Another line of prior research has examined the role of patriarchy in putting women at greater risk for mental health disorders.[2] Gender disadvantage in decision-making power has been shown to be strongly associated with the prevalence of common mental disorders (CMDs) like anxiety and depression.[3] Poor mental health among women impacts them as individuals and can also impact the well-being of their children.

Despite its importance, the relationship between such forms of gender discrimination and how they affect women's mental health in India have not previously been explored because no dataset combined questions on gender discrimination with measures of mental health.

This study draws on data from Social Attitudes Research, India (SARI) and the India Human Development Survey (IHDS) to understand how poor mental health correlates with discrimination against women. Further, it explores the mechanisms for how and why gender discrimination may influence mental health.

1. See Coffey et al (2018)
2. Das et al (2012) find that some of the difference in levels of poor mental health between men and women can be explained by women's greater sensitivity to adverse reproductive outcomes, because this may represent a loss of a woman's expected role as a mother in society.
3. Patel et al (2006) find that gender disadvantage, including low autonomy in decision-making, lack of social integration, and physical and sexual violence within marriage, is strongly associated with the prevalence of CMDs.

Key findings

SARI uses an adapted version of Self-Reported Questionnaire (SRQ) to measure mental health. The SRQ was developed by the World Health Organization (WHO) to measure mental health in low- and middle-income countries. SRQ questions focus on symptoms for poor mental health that are easy to understand. Prior research finds that the SRQ detects CMDs with reasonable accuracy.[4]

Respondents were asked about poor appetite, trouble with sleeping, trouble in thinking clearly, difficulty in making decisions, feelings of tiredness and thought of ending life. Following the World Health Organisation (WHO) recommendations, respondents were asked if they faced these physical symptoms in the last 30 days. Based on the responses to each of these six questions, individuals received a total SRQ score from 0 to 6, where a higher total SRQ score indicates worse mental health outcomes.

Women who eat last have worse mental health

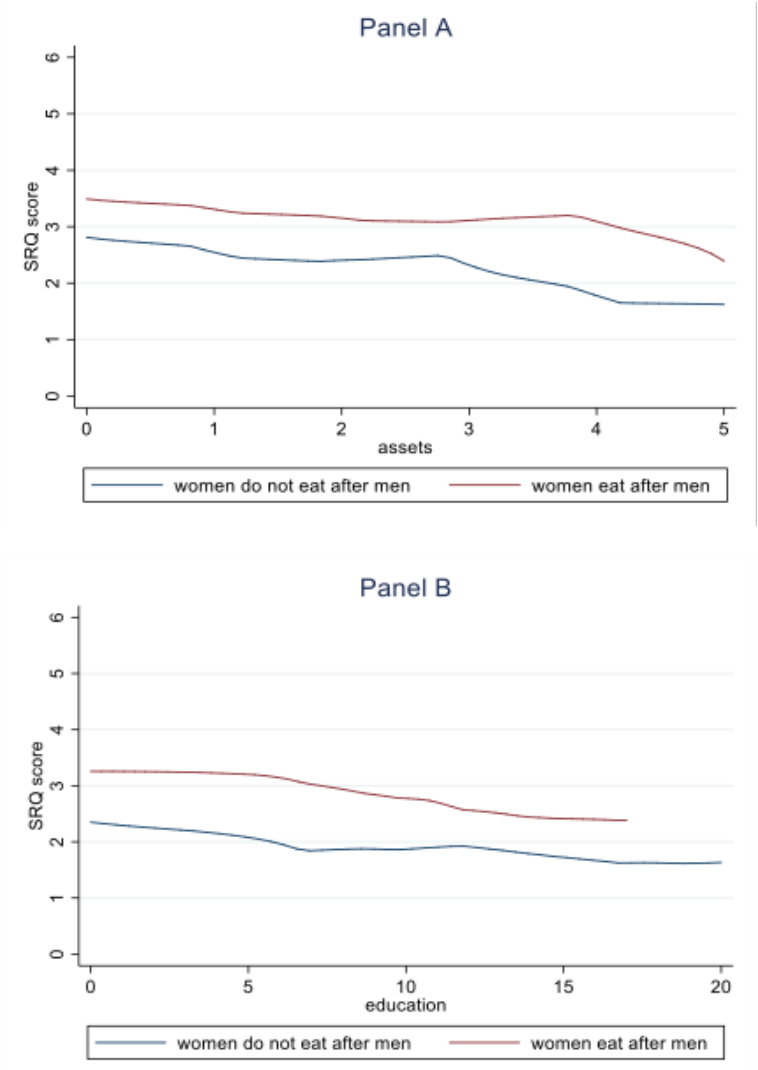
Our study finds that women living in households where they eat after the men consistently have worse mental health outcomes than women living in households where that is not the case.

The gap in mental health between these two groups of women persists across all levels of socioeconomic status. We consider two indicators of this status, education and asset wealth. There are many reasons why economic status and education may be related to poor mental health. For instance, the poor are more likely to experience adverse events in their lives that lead to greater insecurity and hopelessness. Likewise, low educational attainment could be an indication of childhood adversity, or a proxy for social position, or lack of opportunity more broadly.

As can be seen in Figure 1 Panel A, women who eat after men have worse mental health compared to those who do not, at all levels of household asset wealth. The same pattern in mental health can observed for women across all levels of education (see Panel B).[5]

4. See Beusenberg & Orley's 1994 'A User's guide to the self reporting questionnaire (SRQ)'
5. Note that the line for women who eat after men stops slightly earlier because no women who eat after men in our sample had levels of education past completing a master's degree.

Figure 1: Mental health among women at all levels of asset wealth (Panel A) and education (Panel B)



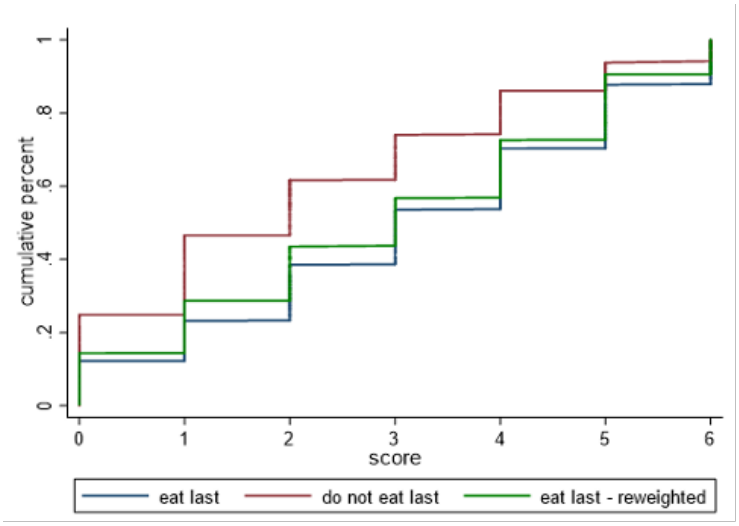
Socioeconomic status and mental health

We next consider the extent to which gaps in mental health between women who eat last and those who do not can be explained by differences in socioeconomic status between the two groups. We do this by using two empirical strategies.

In our first strategy, we ask the question: What would the total SRQ score of women who eat last look like if they had the same distribution of asset wealth and educational attainment as women who do not eat last? To do this, we create a counterfactual world where women who eat last have the same distribution of asset wealth and education as those who don't by reweighting. For example, if women who eat last have less education, on average, than women who do not eat last, the reweighting function that we use puts more weight on more educated women who eat last and less weight on the less

educated who eat last. In so doing, our goal is to see if the gap in the mental health of both groups of women can be explained by differences in these two socioeconomic factors. Figure 3, which graphs the reweighted distribution in green, tells us that education and wealth differences between the two groups of women cannot completely explain the difference in mental health outcomes between them.

Figure 2: Mental health among women at all levels of asset wealth (Panel A) and education (Panel B)



In a second strategy, we additionally account for a greater number of characteristics that might close the gap in mental health scores between women who eat last and those who do not: the respondent's age, educational attainment, asset wealth, being Muslim, her caste group, her state of residence. Even accounting for all of these characteristics, eating last is able to predict mental health outcomes in this population. These results are not shown here but can be seen in the full paper.

Eating last, women's autonomy and mental health

Some see the practice of women eating last as an appropriate way for them to show respect for their husbands and in-laws. However, does this actually reflect women's low autonomy in the household? One possible pathway through which eating last might be associated with poor mental health is through a lack of autonomy and the subsequent psychological stress resulting from it. In order to test whether eating last is associated with poor mental health because of lack of autonomy and power within the household, we consider two measures of autonomy.

The first measure is a woman's ability to leave the house without permission from her husband or family. SARI asked women "When you want to go outside alone somewhere near your home, such as to visit a neighbor, do you need to ask your husband or family, or do you just tell them and go?" We

find that the relationship between eating last and poor mental health is not mediated by this particular measure of autonomy. While this suggests that autonomy may not be an important pathway through which eating last is associated with mental health, this is not definitive evidence, because it is possible that other indicators of autonomy do mediate the relationship.

The second measure of autonomy that we consider is women's decision-making power in the household. The IHDS asks women about household and personal decision making in eight scenarios. These questions pertain to decisions about what to cook, buying expensive items, the number of children to have, what to do if the respondent herself gets sick, buying land or property, how much money to spend for a social function, what to do if a child gets sick (for women who have children), and how to arrange children's marriages.

". . . the correlation between women's decision-making power and eating last indicates that autonomy as measured by women's decision-making power may, in fact, be a mediator."

As IHDS doesn't ask explicitly about mental health, our analysis can only assess whether women's decision-making power is correlated with eating last. We show that the higher the number of scenarios in which woman have decision making power, the lower the likelihood of them eating last. This correlation doesn't change even after controlling for age, education, asset wealth, being Muslim, caste category and state of residence. Although we cannot check directly, this result is suggestive of what might happen if we could directly test whether decision-making power mediates the relationship between eating last and poor mental health. Specifically, the correlation between women's decision-making power and eating last indicates that autonomy as measured by women's decision-making power may, in fact, be a mediator.

Our analysis of two measures of autonomy suggest that while autonomy may mediate the relationship between gender discrimination and mental health, some measures of autonomy may be better able to capture this. Thus, decision making may simply be a more accurate measure of women's status while asking for permission may simply be a courtesy that women offer other family members that does not necessarily restrict women's autonomy.

Policy Implications

The way forward

This research provides evidence that eating last is damaging to mental health, which reinforces findings from prior research that shows that it is also damaging to physical health. What can health practitioners, policy makers, and researchers do to address this particular form of discrimination against women?

Civil society and government should focus efforts on calling attention to and discouraging the practice of eating last. Organized media campaigns should make people aware of widespread nature of the practice of women eating last, and also highlight its negative health impacts. Health workers should be

trained in how to identify when eating practices may be impacting women's wellbeing, and be prepared to advise women and families about how this can be changed.

To better understand women's mental health, researchers should collect more data on a wide range of measures of women's autonomy and social status, in conjunction with measures of physical and mental health. This will move us towards a more nuanced understanding of how gender discrimination and autonomy in patriarchal societies impact women's mental wellbeing.

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