

# CHALLENGES FACED BY WOMEN POST-CYCLONE FANI WITH AN EMPHASIS ON MENSTRUAL HEALTH AND HYGIENE

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## ABSTRACT

Women and girls comprise over the half of the 200 million people affected every year by natural disasters. Existing gender inequalities mean that natural hazards pose a greater risk for women and girls compared to their male counterparts, especially in poverty-stricken areas. On May 3, 2019, a powerful cyclone slammed into the capital city of Bhubaneswar in the state of Odisha, and its surrounding towns in the East Coast of India. It was one of the most severe storms of recent years. This project investigated the immediate impact of the cyclone on women and girls, with respect to drinking water and sanitation. The lack of awareness about menstrual health and hygiene emerged as a pressing challenge. As part of the project, the results from the research were used to create a theatrical presentation for the participants of the survey to raise awareness about menstrual health and hygiene and encourage open discussions around the topic.

## INTRODUCTION

There is evidence that natural disasters do not affect people equally; importantly, they pose a greater risk for women than men (Enarson and Morrow 1998; Ariyabandu and Foenseka 2006; Gokhale 2008, Milet 1999). According to a study about recent natural disasters around the world, there are twice as many female victims (Enarson and Meyreles 2004) as there are male victims in disasters, and women and children are 14 times more likely to die in a disaster than other groups (Hamidazada et. al. 2019). Such calamities exacerbate existing gender-based inequalities, leaving women more vulnerable than men.

Vulnerability is “the characteristics of a person or group such as gender, age, ethnicity, disability, and socioeconomic status, and their situation that influence their capacity to cope with, and recover from the impact of a hazard” (Wisner et al. 2004). Vulnerabilities are not a consequence of the natural disaster but of the gender inequalities that already exist in society (Horton, 2012). Women are more vulnerable because people in power constrain access to resources and the unequal power relations that undermine their capacity to respond effectively to the posed danger (Bradshaw and Fordham 2014; Smyth 2009).

Patriarchal family structure, a gendered-burden of care-giving responsibilities, high illiteracy rates, informal employment status, inadequate access to health services, unequal power relations contribute to the vulnerability of women during natural disasters (Ikeda 1995; Ariyabandu and Foenseka 2006; Gokhale 2008; Ariyabandu 2009; Saad; 2009; Enarson 2010; Isik et al. 2015). The post-disaster situation is worsened as women spend more time looking for clean water and food and their care-giving responsibilities towards their families increase (UN Report). Their health needs are suppressed and neglected, particularly regarding menstrual health and hygiene which is sometimes regarded as taboo. These factors make women more susceptible than men to climate and disaster-related health risks (Morioka, 2016).

On 3 May 2019, a powerful cyclone, Cyclone Fani, slammed into the Eastern Coast of India. It was one of the most severe storms in recent memory. The cyclone made a landfall in the

town of Puri in the state of Odisha, causing extensive damage in Puri and the neighbouring capital city, Bhubaneswar. Of all affected areas the state of Odisha in India has been the most severely damaged. More than one million people were evacuated from Odisha alone, and eight people were killed in India.

## OBJECTIVES

This study was conducted a few weeks after the cyclone in two of the worst-hit villages surrounding the town Puri, where the cyclone made its landfall. The existing deep-rooted gender disparities and Odisha's susceptibility to frequent cyclones make it an insightful case study of the impact of natural disasters on women.

The principal objective of this study was to assess the immediate impact of the cyclone on women, with regards to drinking water and sanitation (specifically defecation, menstruation, and hygiene). This study was conducted in two villages of the Brahmagiri district in Puri, Odisha, India, which were few of the worst-hit areas by Cyclone Fani in 2019. In addition to conducting and analysing findings from focus groups, a play was created and performed in the villages where the study was conducted, using the research findings (with a focus on menstrual hygiene).

## METHODOLOGY

The study covered two villages in the district of Brahmagiri in Puri, Odisha. The district of Brahmagiri was chosen intentionally as it was one of the worst-hit areas by Cyclone Fani. Two villages - Moto and Chandipur - were selected at random.

The data were collected through three focus group discussions (FGDs) in the two villages: one FGD in the village Moto and two FGDs in Chandipur. Two FGDs were conducted in Chandipur because there were two different communities living in the village, possibly due to two separate predominant occupations. The discussions were conducted with adolescents and women aged 15-55. Both FGDs had the same set of

questions, with similar follow-up questions leading naturally from the answers.

The discussion covered the following topics:

- General information about the area (e.g., approximate number of households with proper toilet facilities, major source of drinking water, and nearest healthcare facilities, and condition of houses before and after the cyclone to gauge the extent of damage)
- Participants' general level of awareness and preparedness for the impending disaster
- Under the specific topics of Hygiene, Defecation, Menstruation and Drinking Water, the following were asked:
  - Participant awareness level and preparation
  - Challenges faced during the cyclone
  - Challenges faced post- cyclone
  - How they dealt with the challenges
- General questions about how worked as a community with regards to awareness, preparation, dealing with the cyclone and post- cyclone situation.

The question about how they dealt with their challenges, opened the discussion to the attitudes of the men in the community about certain women- centric issues such as difficulties in maintaining menstrual health and hygiene during the cyclone.

The findings from the project have been used to inform the writing of a theatrical piece, known as Social Theatre. The

theatrical piece was used to create awareness among the respondents about how gender disparities often silence the challenges faced by women in times of natural disasters, as well as the importance of public discourse around women- centric issues. In parallel with alternative and post- development theories, Social Theatre, 'where social development is given more importance than aesthetics' (Dutta, 2015), developed in the 1960s. This slowly evolved into 'a strategy for community empowerment' (Dutta, 2015). Thus, as part of my study on the challenges faced by women during and after natural disasters, I explored how Social Theatre can be used to promote social change.

## KEY FINDINGS

Focus group participation and responses are summarised in Table 1.

### Awareness Level and Preparation for Incoming Cyclone

All the respondents were aware of the approaching cyclone but underestimated the severity of it. Although they were given clear and urgent warnings, about 80% had not prepared well for the aftermath of the disaster. Most of the population received the information through the television via news channels. Approximately 90% of the respondents had predicted challenges in areas of food and water; however, the women interviewed did not report considering the daily challenges of menstruation, defecation, hygiene.

Only one village out of the three had some people who had prepared for the cyclone. They had reported storing food items, valuables, and emergency lights, but found that more would be needed.

**Table 1: Baseline information about the respondents of the Focus Group Discussion and information about the area they lived in**

	Village names		
	Moto	Chandipur	Chandipur
<b>Overview of women interviewed</b>			
Number of women interviewed (age 20-55)	19	14	15
Number of women interviewed (age 15-20)	7	5	8
<b>Overview of area</b>			
No. of households with a Toilet	6/10	12/15	8/10
Major Source of Drinking Water	Tube well	Tube well	Tube well
Nearest Healthcare Facilities	Community Healthcare Centre	Community Healthcare Centre	Community Healthcare Centre
Distance from Village to Nearest Healthcare Centre	10 km away	3-4 km away	3-4 km away
<b>Description of house building before/after Cyclone Fani</b>			
Floor and Walls	Kachcha*	Kachcha*	Kachcha*
Roof	Asbestos	Thatched	Thatched
Electricity Connection	10/10	15/15	10/10
Water Connection	0/10	0/15	0/10
House Condition after Fani	All houses suffered damage	All houses suffered damage	All houses suffered damage

\*Kachcha is used to describe houses with floor and walls of mud and mud bricks

## Defecation

Most of the women had toilets outside their houses but within their backyards. All reported using toilets that were broken and where the asbestos roofs that sheltered them were destroyed.

This did appear to not pose as much of an obstacle for older women, who were used to open defecation, as it did for between the ages of 15-35. As a result, some women had to reduce their consumption of food and water to reduce the number of times they had to go to the fields. They also reported needing to travel in a group early when travelling in the morning or late for their safety as they described fear of sexual harassment and rape. As many did not have soap, they had to use soil to clean their hands, which was not new for some of the women who were used to using soil/ashes as opposed to soap.

## Menstruation

The FDGs revealed that no one had prepared for the cyclone in terms of menstrual hygiene, such as buying necessary stock of menstrual hygiene products in advance. Nearly a month after the cyclone, 70% of women reported receiving free sanitary napkins from their local accredited social health activist (ASHA) worker, a community health worker instituted by the Indian government's Ministry of Health and Family Welfare. Under normal circumstances, most older women used cloth or hay while most younger women and girls used sanitary napkins. This may be explained by the fact that in recent years, girls in government schools are introduced to disposable sanitary napkins and educated about using more hygienic methods of managing menstrual flow, as opposed to traditional methods such as cloth and hay as the women and adolescent girls elaborated in the discussions. However, the women had lost most of their belongings in the cyclone and had to reuse the same piece of cloth several times during the cyclone to manage their flow. Many of them mentioned that their cloths did not dry quickly enough, forcing the women to use them while still moist. In addition, they did not have proper soap to wash the cloth in a hygienic manner, leading to infections and rashes. Some also mentioned that it was difficult to clean up because they had to travel far to find a tube well that was both in working condition and in an isolated area. Some had to resort to hay to manage their menstrual flow which was uncomfortable and caused challenges.

## Hygiene

Since the tube wells were broken due to the cyclone, most women had to use ponds which were polluted by debris. Several older women were used to bathing in these ponds, while younger women and girls were not comfortable in doing so as they were used to using water from the tube wells to wash themselves. They did receive some chlorine tablets to help clean the water but used it mainly for drinking water and water used in cooking. As a result of bathing in unsanitary water, many were affected by severe skin infections which remained for months. Moreover, they did not receive proper medical treatment for these.

## Drinking Water

Seawater had contaminated the freshwater aquifers. Although the government did provide water trucks, those did not reach everyone in the village due to poor communication. Those who did not receive water had to get their drinking water from the broken tube wells and pond water. Even those who received water said that it was not enough for daily use; this often meant that women had to sacrifice their intake of water for their families. They received chlorine tablets and bleaching powder to clean the water before consumption; however, they were

unable to drink the water after adding the cleaning agents due to the strong taste.

## THEATRICAL REPRESENTATION

A play was written using the outcomes of the research and observation of the society and culture of the places where the study was conducted. This play is an example of Social Theatre, with the aims of promoting a social change. From the FGD report and analyses, a key issue that emerged was the hesitation of women to talk about women-centric issues, especially critical issues such as menstrual health and hygiene, which posed to be one of the bigger challenges faced by women during and after Cyclone Fani.

This play was performed at Nabakrushna Choudhary Centre for Development Studies (NCDS). It depicted a fictional story based on observations in the field and shared experiences of the respondents. The story is based on the response by the communities to the announcement of the cyclone, the aftermath of the cyclone and the challenges faced by the women during the cyclone as detailed by the women during the FGDs.

Menstrual hygiene was the focus of the play as based on the FDGs, women were the most reluctant to talk about menstrual health and hygiene related challenges. When asked if they were prepared for menstrual hygiene related challenges, around 30% of women dismissed it as a problem. It was also revealed that while they faced the consequences of the lack of hygienic sanitary products and access to medical facilities which resulted in rashes, infections etc., they were unaware of the serious consequences of these health issues if left unattended as around 60% of women did not find it necessary to seek medical help as soon as possible. The younger women and girls were more comfortable with sanitary napkins, the more hygienic option to manage menstrual flow, as opposed to hay and cloth by the older women due to access to better education about such issues in government schools in recent years. However, in the face of disaster, even they were more likely to dismiss or suppress this issue due to the social stigma surrounding it as revealed in discussions.

This play is set against the backdrop of Cyclone Fani in the village of Brahamagiri, Puri and aims to raise awareness about the importance of menstrual hygiene - especially during natural disasters. The story follows a teenage girl who does not want to sacrifice the piece of cloth her aunt gifted to her for Raja, a festival in Odisha which ironically is a celebration of menstruating women and their womanhood, when her mother gets her period during the cyclone. This play highlights the importance of openly discussing challenges that women face, especially access to and education about menstrual hygiene, which is still a taboo in villages, and put them higher up the list of priorities. This play also touches on the theme of love and sacrifice as the girl finally relents and lets her mother use her gifted piece of cloth for her periods. It also has several scenes which display the acts of sacrifice women make to care for their family, as the women interviewed had detailed about sacrificing their own portion of food, water etc, for their family.

While highlighting how women contribute to the family's welfare, the play brings to attention how the sufferings of women are silenced due to the patriarchal structure of society and unequal gender relations. It reiterates how pervasive gender inequalities cause women to become more vulnerable (Morioka, 2016) and constrain them further in their capabilities to cope with disasters. This play uses the context of natural disaster to accentuate the gender disparities which discourages women from voicing out serious issues such as the lack of access to facilities that can help them maintain proper menstrual health and hygiene. It also attempts to debunk some

misconceptions and cultural taboos around the subject of menstruation to help it become a more accessible and openly discussed topic, both by women and men.

## CONCLUSION

While women faced challenges across all topics covered by the FGDs, both sanitation (defecation, hygiene and menstruation) and drinking water, the most pressing and least discussed issue was difficulties faced in maintaining proper health and hygiene due to the social stigmas and cultural taboos around openly talking about this topic. The underlying issue here is not just in the lack of awareness, but an absence of open discussions about the importance of menstrual hygiene; women are not able to express the serious challenges they face due to the lack of facilities for good menstrual hygiene.

In countries such as Scotland, menstrual hygiene products are distributed free of cost in schools, universities, and public bathrooms. This performs two functions: making these products more accessible and helping women speak about the challenges regarding menstrual hygiene management. Women in the villages were vocal about the skin infections they experienced from using polluted water but were reluctant to speak much

about the rashes and serious infections they got due to poor menstrual health and hygiene.

This is where Social Theatre comes in. Theatre can be used as a medium to both spread awareness about remaining prepared for future cyclones and create conversation about taboo topics such as menstruation. In this way, theatre can help ensure that people suffer minimally during and after natural disasters. Also, influential figures can weave this message into advertisements and campaign to increase awareness of the need to be prepared. Changes in policies of disaster management are crucial and should take gender implications into account, however, it is also important to empower women to vocalise their challenges and communicate the importance of issues in their health, especially taboo topics such as menstrual health.

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## REFERENCES

- Ariyabandu, M. 2009. Sex, gender and gender relations in disasters. In *Women, gender, and disaster: Global issues and initiatives*, ed. E. Enarson, and P.G.D. Chakrabarti, 5–17. Thousand Oaks, CA: Sage.
- Ariyabandu, M., and D. Foenseka. 2006. Do disasters discriminate? In *South Asia network for disaster mitigation: Tackling the tides and tremors*, ed. D. Nivaran, 23–40. South Asia disaster report, 2005, Islamabad.
- Bradshaw S, Fordham M (2014) Double disaster: disaster through a gender lens. Hazards, risks and disasters in society. *Hazards and disasters series*. Elsevier, London, pp 233–251
- Dutta, M., 2015. Women's Empowerment through Social Theatre: A Case Study. *Journal of Creative Communications*, 10(1), pp.56-70.
- Enarson, E., and B.H. Morrow. 1998. Why gender? Why women? An introduction to women and disaster. In *The gender terrain of natural disasters: Through women's eyes*, ed.
- E. Enarson, and B.H. Morrow, 1–8. Westport, CT: Praeger Publishers
- Enarson, E., and L. Meyreles. 2004. International perspectives on gender and disaster: Differences and possibilities. *International Journal of Sociology and Social Policy* 24(10/11): 49–93.
- Enarson, E., A. Fothergill, and L. Peek. 2007. Gender and disaster: Foundations and new directions for research and practice. In *Handbook of disaster research*, ed. H. Rodri'guez, W. Donner, and J.E. Trainor, 205–223. New York: Springer.
- Enarson, E. 2010. A gendered human rights approach to rebuilding after disaster. In *Rebuilding sustainable communities for children and their families after disasters: A global survey*, 13–28. Cambridge Scholars Publishing in association with GSE Research.
- Gokhale, V. 2008. Role of women in disaster management: An analytical study with reference to Indian society. In *Proceedings of the 14th world conference on earthquake engineering*, 12–17 October 2008, Beijing, China.
- Hamidazada, M., Cruz, A.M. & Yokomatsu, M. Vulnerability Factors of Afghan Rural Women to Disasters. *Int J Disaster Risk Sci* 10, 573–590 (2019). <https://doi.org/10.1007/s13753-019-00227-z>
- Horton L (2012) After the earthquake: gender inequality and transformation in post-disaster Haiti. *Gend Dev* 20:295–308
- Ikeda, K. 1995. Gender differences in human loss and vulnerability in natural disasters: A case study from Bangladesh. *Indian Journal of Gender Studies*. [https://doi.org/10.1177/0971521595002\\_00202](https://doi.org/10.1177/0971521595002_00202).
- Isik, O., N. Ozer, and F. Ozcep. 2015. Are women in Turkey both risks and resources in disaster management? *International Journal of Environmental Research and Public Health* 12(6): 5758–5774.
- Morioka, K., 2016. *Time To Act On Gender, Climate Change And Disaster Risk Reduction*. [online] [Www2.unwomen.org](http://www2.unwomen.org).
- Smyth I (2009) Gender in climate change and disaster risk reduction, Manila, October 2008. *Dev Pract* 19:799–802
- Saad, S.G. 2009. Environmental management and disaster mitigation: Middle Eastern gender perspective. In *Women, gender and disaster: Global issues and initiatives*, ed. E. Enarson, and P.G.D. Chakrabarti, 89–98. Thousand Oaks, CA: Sage.
- Wisner B, Blaikie PM, Cannon T, Davis I (2004) At risk: natural hazards, people's vulnerability, and disasters. Taylor & Francis Ltd, London