

Research Article

Relationship Between Gender and Community Resilience

Yuniarti*, R Januarita, S N Irasanti, T Respati

Universitas Islam Bandung, Indonesia

ORCIDYuniarti: <https://orcid.org/0000-0002-6689-2916/>**Abstract.**

Gender dynamics play a significant role in how individuals of both sexes are impacted by disasters and their ability to cope and recover from them. Resilience is viewed as both an inherent personal characteristic and a quality that can be developed through interactions with environmental factors. The purpose of this study is to investigate the relationship between gender and community resilience in Indonesia and Malaysia, conducted from March 2022 to April 2022. The research design utilized a quantitative-based cross-sectional approach, and convenience sampling was employed with a total of 707 respondents. An online questionnaire, available in Bahasa Indonesia, Malay, and English, was used to collect data. The questionnaire consisted of five domains: (1) Connection and Caring; (2) Resources; (3) Transformative Potential; (4) Disaster Management; and (5) Information and Communication. On average, respondents required approximately 15-20 minutes to complete the questionnaire. The results indicate a relationship between gender and resilience specifically within the domain of Disaster Management (domain 4). However, no significant relationship was found between gender and overall community resilience or resilience in the other domains. In conclusion, both genders have an equal opportunity to enhance resilience by developing aspects such as self-efficacy, persistence, low anxiety, control, and planning.

Keywords: gender, community resilience, disasterCorresponding Author: Yuniarti;
email: candytone26@gmail.com**Published** 30 October 2023Publishing services provided by
Knowledge E

© Yuniarti et al. This article is distributed under the terms of the [Creative Commons Attribution License](#), which permits unrestricted use and redistribution provided that the original author and source are credited.

Selection and Peer-review under the responsibility of the 5th Sores Conference Committee.

1. INTRODUCTION

Natural hazards are gender neutral, but the impacts are not. Men and women, boys and girls, face different levels of exposure and vulnerability to natural hazards, driven by gender relations and discrimination in society. In several outcomes, women are disproportionately affected by disasters, including life expectancy, unemployment, labor force re-entry, and relative asset losses. Gender-based violence manifests systematic inequality between men and women and is exacerbated in times of emergency.[1]

OPEN ACCESS

Gender dynamics play a role in various factors associated with resilience, from preparedness levels to access to coping mechanisms supporting recovery.¹ Resilience is the ability to successfully return to normal life activities after experiencing damaging and severe threats. Resilience is perceived as a personal characteristic in some studies. Still, in some others, it is considered a quality to be learned afterward and a process established by interacting with environmental factors. The more accepted view is that resilience is not a personal and innate characteristic. Still, it is a process revealed as a result of the interaction of several factors in case of one's experiences in difficulty.^[2]

Resilience can be found at different levels, such as individual, family, community, city, or national. Because most disasters impact a community, and most of the disaster responses and preparations are local, enhancing the resilience of a community is critical. In line with Sumaryanti et al that **urgency in the bigger scope of intervention, which is the community intervention approach**; thus, community resilience is widely proposed and adopted by disaster researchers for disaster and emergency management.^[3] Community resilience, defined broadly as the ability of a community to cope with the impacts, return to normal functioning, learn and adapt, could be regarded as collective resilient behaviors of individuals and involves complex interrelationships between community members within a local social context.^[4]

This study aimed to determine the relationship between gender and community resilience.

2. METHOD

This study was conducted across states in Indonesia and Malaysia from March 2022 to April 2022 after the ethical approval was approved. It is a quantitative-based cross-sectional study with a convenience sampling method. The inclusion criteria for this study will be residents aged 18 years and above in Indonesian and Malaysian. The study sample size was calculated using the single population proportion formula, giving rise to the final sample size, $n = 707$.

The data collection used Communities Advancing Resilience (CART) Toolkit Survey, which contained 21 core community resilience items to address four interrelated CART domains that reflect and contribute to community resilience. The domains which are described in the current online CART instruments manual and early publications about CART are: (1) Connection and Caring (including relatedness, participation, shared values, support and nurturance, equity, justice, hope, and diversity within the community); (2) Resources (including the community's natural, physical, information, human, social, and

financial resources); (3) Transformative Potential (deriving from the ability of communities to frame collective experiences, collect and analyze relevant data, assess community performance, and build skills); (4) Disaster Management (addressing the community’s prevention and mitigation, preparedness, response, and recovery activities).; (5) Information and Communication. The time taken for each respondent to complete the questionnaire is about 15-20 minutes.

3. RESULT and DISCUSSION

Gender is the cultural and social definition of behavior appropriate to the sexes at a given time. Gender has also been defined as the structure of social relations that centers on the reproductive arena and the practices that bring reproductive distinctions between bodies into social processes.[5] Relationship between gender and resilience showed in table 1.

TABLE 1: Relationship between gender and resilience.

Characteristic	Low	Resilience Average	High	P-Value
Total				
Female	6 (1.2%)	192 (39.7%)	286 (59.1%)	0.500
Male	4 (1.8%)	97 (43.3%)	122 (54.7%)	
Domain 1				
Female	4 (0.8%)	122 (25.6%)	356 (73.6%)	0.921
Male	2 (0.9%)	54 (24.2%)	167 (74.9%)	
Domain 2				
Female	6 (1.2%)	95 (19.6%)	383 (79.1%)	0.301
Male	4 (1.8)	54 (24.1%)	165 (74.0%)	
Domain 3				
Female	5 (1.0%)	90 (18.6%)	389 (80.4%)	0.18
Male	4 (1.8%)	30 (13.5%)	189 (84.8%)	
Domain 4				
Female	6 (1.2%)	97 (20%)	381 (78.7%)	0.016
Male	6(2.7%)	63 (28.3%)	535 (69.0%)	
Domain 5				
Female	14 (2.9%)	140 (28.9%)	330 (68.2%)	0.674
Male	5 (2.2%)	71 (31.8%)	147 (65.9%)	

Based on the results of statistical tests in table 1, the P-value of total resilience (0.500) > (0.05) means that there is no significant relationship between gender and community resilience in dealing with disasters. Gender has, however, been termed as an

inconsistent and non-reliable predictor of resilience. A study by Campbell-Sills, Cohan, Chavira, and Stein on the relationship of resilience to personality, coping, and psychiatric symptoms in young adults showed no significant difference in resilience among males and females.[6] Resilience is formed from various factors related to gender differences and the context of events, time, age, and cultural influences.[7] Several studies have identified other psychological factors that promote resilience, including positivity and optimism. Both solid and large social networks made significant contributions (both in the statistical and non-statistical senses) to resilience.[8]The lack of theoretical analyses of gender in disaster literature is an additional challenge for gender-responsive policies. Although the word "gender" features frequently, interpretations are simplistic, with "gender" referring to women and not the complex power relations in societies. Social and environmental changes and cultural and patriarchal power systems have meant that disasters engender disproportionate impacts on women. Gender norms influence how well households adapt to change, including changing climate. However, countries are yet to fully integrate gender issues in an integrated and systematic manner into their climate change and disaster risk reduction (DRR) interventions.[9]

Resilience domain 1 (Connection and Care) had a p-value (0.921) > (0.05) means that there is no significant relationship between gender and community resilience in dealing with disasters in the realm of connection and care. Care is a crucial dimension of well-being. People need care throughout their lives to survive. Care has long been considered to be women's 'natural' responsibility. As a result, the costs of providing care fall disproportionately on women. These costs of delivering care are shared unequally between women and men, within households, households, and society. The unequal gender distribution of these costs results in the limited opportunities and long hours of total work that women often face when they enter the labor market.[10]

The domain 2 (Resources), p-value (0.301) > (0.05) means that there is no significant relationship between gender and community resilience in dealing with disasters for the resource domain. The gender paradox of social cohesion shows the unequal distribution of the benefits of growth. A social cohesion policy or program considers the objective of "acting to change the social reality and promoting higher human development indices for the population as a whole, as well as promoting more equality in the access to and enjoyment of socio-economic rights and assets"²³. Success in achieving social cohesion is conditioned by the existence of the same opportunities and ensuring non-discrimination against people due to their gender. Acting to promote growth that contributes a sense of well-being to a population and whose members, both women and men, develop a feeling of trust and belonging within a community will be achieved

only to the extent that public policies act for the benefit of all people equally and allow their social integration.[11] Based on the results of statistical tests in table 1, for resilience domain 3 (Transformative Potential), a p-value (0.180) > (0.05) means that there is no significant relationship between gender and community resilience in dealing with disasters for the potential transformative domain. Same socialization forces that are believed to be responsible for sex role prescriptions and commonly observed gender differences may operate to produce gender differences in both the content of future goals and in the extent to which individuals are oriented toward the future.[12]

Based on the results of statistical tests in table 1, for resilience domain 4 (disaster management), the p-value (0.016) < (0.05) means that there is a significant relationship between gender and community resilience in dealing with disasters in the realm of disaster management. Gendered experiences give women a distinctive starting point for critiquing familiar assumptions from the position of the oppressed. Male-dominated management and universalized experiences of disasters have stimulated most gender research to focus on women rather than on affected people. It includes men and women because of their relative invisibility in disaster management. Gender-based prejudices and cultural divisions mainly affect women. Existing socio-structural biases mean women are always more vulnerable in the aftermath of a disaster in terms of security and safety.[13]

Resilience domain 5 (information and communication) had a p-value (0.674) > (0.05) means that there is no significant relationship between gender and community resilience in dealing with disasters for the realm of information and communication. The rapid emergence of modern information and communication technologies (ICT) has substantially changed the skills needed to participate, communicate, and work in modern society successfully. Therefore, national strategies have been developed in many countries to foster digital competencies in school and the workplace.[14], [15]

4. CONCLUSION

In general, there is no relationship between gender and community resilience. However, both genders have the same opportunity to increase resilience by developing aspects of self-efficacy, persistence, low anxiety, control, and planning.

Acknowledgement

The study funded by The Research and Community Services Institute Universitas Islam Bandung with contract number: 144/B.04/LPPM/III/2022

References

- [1] Erman A, De Vries Robbe SA, Thies SF, Kabir K, Maruo M. Gender dimensions of disaster risk and resilience. *Gender Dimensions of Disaster Risk Resilience*; 2021. <https://doi.org/10.1596/35202>
- [2] Erdogan E, Ozdogan O, Erdogan M. University Students' Resilience Level: The Effect of Gender and Faculty. *Procedia - Social and Behavioral Sciences*. 2015;186:1262–1267.
- [3] Wei J, Han Z, Han Y, Gong Z. What do you mean by community resilience? More assets or better prepared? *Disaster Medicine and Public Health Preparedness*. 2021 Mar. <https://doi.org/10.1017/dmp.2020.466>
- [4] Soetanto R, Mullins A, Achour N. The perceptions of social responsibility for community resilience to flooding: The impact of past experience, age, gender and ethnicity. *Nat Hazards*. 2017;86(3):1105–1126.
- [5] Sharefair R, Gender ON. “Convening report on ‘strengthening resilience by empowering women ’ Table of Contents” November 2016, 2017. <https://doi.org/10.13140/RG.2.2.25172.91522>
- [6] Sambu LJ, Mhongo S. Age and gender in relation to resilience after the experience of trauma among internally displaced persons (IDPS) in Kiambaa Village, Eldoret East Sub-County, Kenya. *Journal of Psychology and Behavioral Science*. 2019;7(1): <https://doi.org/10.15640/jpbs.v7n1a4>
- [7] Latif S, Amirullah M. “Students’ Academic Resilience Profiles based on Gender and Cohort.” *Jurnal Kajian Bimbingan dan Konseling*. 2020;5(4):175–182. <https://doi.org/10.17977/um001v5i42020p175>
- [8] Bennett KM. Emotional and personal resilience through life. 2015. p. 43. [Online], Available https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/456126/gs-15-19-future-ageing-emotional-personal-resilience-er04.pdf
- [9] Moreno J, Shaw D. Women’s empowerment following disaster: A longitudinal study of social change. *Natural Hazards*. 2018;92(1):205–224.
- [10] Esquivel V. “Care in the Households and Communities.” October 2013.

- [11] Fuente P. “Social cohesion with a gender perspective, key to reducing inequalities in the EUROsociAL + Programme,” pp. 1–7, 2020.
- [12] Greene BA, DeBacker TK. Gender and orientations toward the future: links to motivation. *Educational Psychology Review*. 2004;16(2):91–120.
- [13] Gnambs T. “The development of gender differences in information and communication technology (ICT) literacy in middle adolescence,” *Computers in Human Behavior*. 2021;114:106533. <https://doi.org/10.1016/j.chb.2020.106533>
- [14] Ashraf MA, Azad MA. Gender issues in disaster: Understanding the relationships of vulnerability, preparedness and capacity. *Environment and Ecology Research*. 2015;3(5):136–142.
- [15] Sumaryanti IU, Putera VS, Permana RH, Suhana S. “Community based intervention to promote prevention towards children sexual abuse,” *Proceedings of the 4th Social and Humanities Research Symposium (SoRes 2021)*. 2022;658:189–191.