

# CAPACITY BUILDING FOR FEMALE VOLUNTEERS: SRIKANDI OF EAST JAVA IN DISASTER PREPAREDNESS EFFORTS, CARDIAC ARREST FIRST AID WITH CPR

*By Dini et al*

## CAPACITY BUILDING FOR FEMALE VOLUNTEERS: SRIKANDI OF EAST JAVA IN DISASTER PREPAREDNESS EFFORTS, CARDIAC ARREST FIRST AID WITH CPR

Dini Prastyo Wijayanti<sup>1\*</sup>, Nisa Dewanti<sup>1</sup>, Tamara Nur Budiarti<sup>2</sup>, Kiki Widyasari<sup>3</sup>,  
Nurul Kusuma<sup>4</sup>

<sup>1</sup>Diploma Degree of Nursing Program Study, Health Polytechnic of Kerta Cendekia, Sidoarjo, East Java Province, Indonesia

<sup>2</sup>Applied Bachelor of Occupational Health and Safety Program Study, Health Polytechnic of Kerta Cendekia, Sidoarjo, East Java Province, Indonesia

<sup>3</sup>Laboratorium Staff of Nursing Program Study, Health Polytechnic of Kerta Cendekia, Sidoarjo, East Java Province, Indonesia

<sup>4</sup>Student Diploma Degree of Nursing Program Study, Health Polytechnic of Kerta Cendekia, Sidoarjo, East Java Province, Indonesia

\*Correspondence

Dini Prastyo Wijayanti

Diploma Degree of Nursing Program Study, Health Polytechnic of Kerta Cendekia, Sidoarjo  
Lingkar Timur Road, Rangkah Kidul Village, Sidoarjo Sub-District, Sidoarjo Regency, East Java Province,  
Indonesia-61234

Email: [dinipw@gmail.com](mailto:dinipw@gmail.com)

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### ABSTRACT

The importance and influence of female volunteerism Srikandi East Java in disaster relief is widely recognized to respond disaster preparedness. Cardiopulmonary resuscitation (CPR) performed by bystanders is an essential treatment for sudden cardiac arrest. Cardiopulmonary Resuscitation is an emergency lifesaving procedure performed when the heart stops beating. The aim of community service is to improve knowledge and skills of CPR to female volunteers Srikandi East Java confidence to help their families, communities and people in need during disasters and emergencies. The method used in this community service activity is to provide training CPR and counselling cardiac arrest. This activity was carried out in May 2023 which was attended by 80 female volunteer's members of Srikandi East Java. The results show that the activity has achieved success according to the success indicators that have been set, namely as many as 80 female volunteer's member of Srikandi East Java attendance is 100%, participants participate in activities enthusiastically, knowledge of CPR after training and counseling increases significantly. CPR drills should be done regularly so that many female bystanders are trained.

**Keywords:** *Female volunteer, Disaster preparedness, CPR*

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## INTRODUCTION

Disaster preparedness is gaining increasing attention from all communities, whether natural or man-made disasters. A person at the scene who volunteers to help others, can perform cardiopulmonary resuscitation on a victim in cardiac arrest to save lives and prevent further injury.

Disasters affected about two billion people between 2006 and 2020, killed about 750,000 people, and cost the world economy about USD 1.5 trillion (WHO, 2019). Data on disaster events in Indonesia in 2019 there were 1,922 natural disasters with 417 dead and missing, 1,427 injured and 867,984 displaced and affected. Non-natural disasters such as fires, transportation accidents and industrial accidents have occurred 6 events with 16 casualties affected and displaced (Gaffar, 2022).

WHO emphasizes that prevention and preparedness measures are equally or even more important, although the supply of needs in emergencies is also important (Lokkas, Cornell, & Steenkamp, 2014). Capacity development for female volunteer at country and local levels should take full advantage of, build on, and contribute to, existing programmes and frameworks, the SDGs government program standard of health and well-being of all communities at risk of emergencies and disasters, stronger community and country resilience, health security (WHO, 2019).

Improving the disaster management skill of the general public has become a key component of disaster prevention and reduction. Key component of disaster prevention and reduction (Tan et al., 2016).

The importance and influence of volunteerism in disaster relief is widely recognized. In fact, volunteers are often the first to respond to a tragedy. Given that the initial response to a disaster has a significant impact on the extent of damage

and loss of life, volunteers can have a significant impact (Chaghari, 2017).

Women should have the chance to participate more in disaster preparedness and response in a nation that is thought to be most prone to natural disasters in the world, women and children are at 14x greater risk of dying than adult men during a disaster (Rampai, 2022). Learning in Indonesia, 60-70% of disaster victims are women, children and the elderly. Other evidence shows that in the 1991 Cyclone disaster in Bangladesh, the total number of victims was 14,000 (90% women). In Hurricane Katrina in the US, most of the victims were Afro-American mothers and their children (Tsao, 2022).

Female Volunteers: Srikandi of East Java is an excellent target population for CPR training due to their characteristics of being motivated, learners and able to maintain skills well. In addition, cardiac arrest can occur anywhere in the family or community. Cardiac arrest training should be taught to the lay community to achieve appropriate chest compressions as recommended by the American Heart Association.

Cardiopulmonary resuscitation training trains and improves bystander confidence and willingness to perform resuscitation actions. This activity is an effort to strengthen the preparedness capacity of women to become disaster preparedness teachers for their families. So that each family recognizes the threat of risk in its environment, is able to develop a family preparedness plan, and knows how to rescue early disasters so as to reduce victims and losses arising from disasters.

CPR or Cardiopulmonary Resuscitation is an emergency lifesaving procedure performed when the heart stops beating. Immediate CPR can double or triple chances of survival after cardiac arrest (Aha, 2020).

Srikandi of East Java is a community for female volunteers part from SRPB of East Java. Srikandi of East Java provides trainings to increase the capacity and skills of female volunteers in the pre-disaster, disaster response and post-disaster phases. During the pre-disaster phase, one of the skills provided is CPR. CPR training in disaster volunteers contributes to increasing the number of bystanders in the community (Diana et al., 2011). Therefore, capacity building of volunteers needs to be done in disaster preparedness efforts in providing first aid for cardiac arrest.

Based on the findings of the situation, the Poltekkes Kerta Cendekia collaboration with Srikandi of East Java contribute to an effort to increase the knowledge and skills of female volunteer to training CPR Royal Mall, Surabaya City. The output target of this activity is female volunteer Srikandi East Java to increase knowledge and skill about CPR. Preparedness drills conducted by mothers or woman are expected to increase family awareness and vigilance against disasters and in turn contribute to the safety of all people living in Indonesia.

## OBJECTIVES

### *General Purpose*

The purpose of this community service activity is expected to increase the knowledge and skill about CPR (Cardio Pulmonal Resuscitation). The implementation of this community service has received approval from Poltekkes Kerta Cendekia with an assignment letter number: 120/SPPD/D/V/2023.

### *Special Purpose*

After carrying out community service activities, it is expected that health cadres will be able to:

1. Increase understanding of knowledge about cardiac arrest
2. Understand and practice of CPR

## PLAN OF ACTION

### *Strategy Plan*

The method used in implementing community service is a participatory approach which will be held in 9 April 2023 with solutions that have been agreed upon by the service team and partners in overcoming problems according to the results of the situation analysis by carrying out counseling and training activities in increasing the knowledge and skills of CPR. The stages of the dedication method are as follows:

1. Counseling: Counseling about Cardiac arrest
2. Training: theory, demonstration, and simulation about CPR
3. Post Test

At the end of program, we were asked to review stages and they were also asked to answer questions from the material that had been given. It aims to evaluate the increase in knowledge and skill about CPR

### *Implementation*

The implementation of Community life-saving programme is a collaboration between SRPB East Java and Poltekkes Kerta Cendekia which aims to enhance the community's level of preparedness and responsiveness in emergencies. First implementation is to coordinate the implementation of activities, prepare the infrastructure needed to carry out activities and carry out activities according to the planned time. The implementation of this community service has received approval from Poltekkes Kerta Cendekia with letter of assignment number: 120/SPPD/D/V/2023.

### *Setting*

This community service activity will be held on May, 8 2023 at Royal Mall Plaza Surabaya, East Java, Indonesia. SRPB have collaboration that place with facilities and infrastructure to support the activity and the location was easily accessible.



### Target

The target of this community service activity is 100 women volunteers as member Srikandi of East Java.

## RESULTS AND DISCUSSION

The service was held in May 2023 at the Royal Mall Plaza Surabaya, the number of participants who attended was 80 people. The service begins with delivering cardiac arrest material and continuing CPR joint practice. A total of 80 women participants from various organizations throughout East Java participated in this activity organized by Srikandi East Java at Royall Mall Plaza, Surabaya.

In the next stage, a simulation is carried out on how to recognize and find out if the victim is unconscious and perform basic life support. At this stage, all participants tried one by one the simulation using pillows and examples. The simulation was carried out on a phantom.

In the final stage of the service, a question-and-answer session was held with participants related to knowledge in providing emergency CPR measures.

Training directly using materials and practices has direct and indirect impacts on participants and the community. The direct impact is increased knowledge and ability. Indirect impact, being able to provide help and apply it to people who experience cardiac arrest (Rismawan, 2017; Wijayanti, (2020)). Chest compressions and decompressions are combined with ventilations, which are usually spread out throughout CPR. In recent years, CPR training programs have been adopted all over the world in accordance with American Heart Association (AHA) guidelines.

In the implementation activities, the attendance of the training participants was 100%, and the maximum attendance target was reached there was an increase in the knowledge of female volunteer Srikandi East Java. This success was inseparable from the support of good training management and professional resource

persons. This is under the statement (Chaghari et al., 2017) which states that the success of training is primarily determined by training management (Wijayanti, 2023)

**Table 1.** Characteristics of female volunteer SriKandi Jatim. East Java

Variable	Respondent n (65)	
	f	%
<b>Age</b>		
Teenager (17-21 years)	10	12.5
Adult (22-44 years)	50	62.5
Elderly (>45 years)	20	25
<b>Level of education</b>		
Senior High School	25	31.25
Bachelor degree	48	60
Magister degree	7	8.75
<b>Status Pekerjaan</b>		
Working	50	62.5
Not working	30	37.5

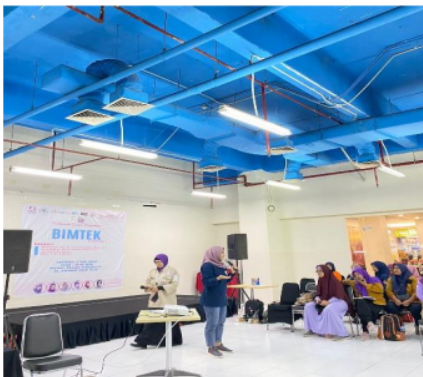
Source: Primary Data, 2023

Based on table 1. it can be seen that the majority of the training participants who took part in community service activities (62.5%) were aged 22-44 years with an educational background Most (60%) were with senior high school level and almost all were 62.5% go to work.

During the training, the volunteer were very enthusiastic about the activities carried out, the provision of material was felt to be very supportive of abilities that later could be applied during a number of published studies on the maintenance of psychomotor CPR skills suggest that early training can contribute to subsequent higher skills (Diana, 2011). However, these studies differed in terms of scale and results. Moving to the final step in the multi-step decision-making process that leads to effective direct action (such as giving CPR) requires specific knowledge of "what to do." This training also facilitates an even earlier and more important step in the process: the initial interpretation of the situation by a bystander (Kragholm, 2017).



**Figure 1.** Woman volunteer of Srikandi, East Java Training Activities



**Figure 2.** Counselling of cardiac arrest



**Figure 3.** Training of CPR for baby



**Figure 4.** Training of CPR for adult

Training is one of the activities efforts that can increase knowledge and skills, Female volunteer of Srikandi need upgrade of capacity with skill and training. Basic life support education for women when a disaster occurs is very important, because women are a vulnerable group during a disaster due to the lack of access to disaster response knowledge provided to women. Disaster response organizations, which distort gender equality against women, appear as possible factors of harm for women.

While the construction of values in society expects women to be able to save their family members first when a disaster occurs. Disaster preparedness education for women can reduce potential loss of property and loss of life. In addition, women can use special attributes such as motherhood, which is socio-culturally defined and taught as an advantage, for the common good of society. Moreover, special elements, such as the image of the 'superwoman' in relation to the responsibilities imposed on women. Basic life support and CPR training carried out during this service activity is expected to increase the knowledge and skills of women who are still equipped to deal with emergencies during disasters (Ekşi et al., 2022).

## CONCLUSION

Based on the implementation of community service, it was found that the knowledge and skills of volunteers in providing emergency first aid for cardiac arrest as an effort to increase abilities and skills. CPR drills should be done regularly so that many female bystanders are trained.

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