



# Socialization on the use of medicinal plants to raise public awareness of herbal medicine

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## ARTICLE INFO:

Received: 2024-11-18  
Revised: 2024-12-20  
Accepted: 2025-01-26  
Published: 2025-02-28

## Keywords:

Knowledge, Medicinal plants, Public awareness

## ABSTRACT

Over time, advancements in the medical field have led to a decline in public trust in herbal medicine due to the fast-acting effects of chemical drugs. However, herbal medicines generally have fewer side effects. Public awareness of health remains low, particularly in Kamanisan Village, largely due to limited knowledge. A comprehensive strategy is needed to enhance public awareness and understanding of medicinal plants. This program aims to increase public knowledge and awareness of the use of medicinal plants. The activity took place in RT.07/RW.13 Kamanisan, Curug District, involving 30 participants. It included a pre-test questionnaire, material presentation, Q&A session, and post-test. The results showed an increase in participant knowledge from 86.76 percent to 90 percent. The number of participants who strongly agreed with the use of medicinal plants (in Indonesia: TOGA) rose from 12 to 22 people. The Chi-Square test indicated a significant impact on knowledge and attitudes before and after the session. Additionally, the paired sample t-test confirmed differences in pre- and post-knowledge, pre- and post-attitude, and knowledge-to-attitude shifts. The success of this activity strengthens public awareness of TOGA as a complementary and alternative treatment for various diseases.

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**How to cite:** Kelutur, F. J., Adini, S., Amoretti, R. S., Rohmah, S. L., Hasana, I. A. N., Harpan, A., & Hadi, A. O. (2025). Socialization on the use of medicinal plants to raise public awareness of herbal medicine. *Abdimas: Jurnal Pengabdian Masyarakat Universitas Merdeka Malang*, 10(1), 116-124. <https://doi.org/10.26905/abdimas.v10i1.14805>

## 1. INTRODUCTION

Indonesia has around 40,000 types of plants, of which around 1,300 are very important medicinal plants used as raw materials in traditional medicine (Prapitasari et al., 2020; Siregar et al., 2020). Traditional medicine using herbal plants has been widely practiced by people from generation to generation (Natasya et al., 2024). The processing of traditional medicinal plants can be said to be very simple. However, the type of medicinal plant used must be right. Each plant has a very diverse pharmacological effect. The wrong use of medicinal plants can have fatal consequences (Muhlisah, 2015). Before scientists discovered various drugs containing chemical substances, people already knew the healing effects of several plants as medicine (Safutri et al., 2023).

These medicinal plants can be planted around the house or as living pharmacies (Sari et al., 2019; Utami & Akbar, 2021). Medicinal plants planted in the yard or pots and on the land around the house and used by the family are called family medicinal plants (TOGA). Based on the Regulation of the

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Minister of Health of the Republic of Indonesia explains that TOGA is a collection of plants with medicinal properties for family health that are arranged into a plant and have aesthetic value, which are usually found in the yard or garden of the house which is one of the local wisdom that needs to be preserved (Menteri Kesehatan Republik Indonesia, 2016).

Medicinal plants are selected based on first aid or mild medication, such as for fever and cough, using leaves, stems, and rhizomes (Sari & Andjasmara, 2023; Siregar et al., 2020). The existence of TOGA is very important, especially for families who have difficulty accessing medical health services, such as clinics, health centers, or hospitals. Understanding the benefits and properties of certain types of medicinal plants becomes a family's choice in choosing safe, natural medicines (Savitri, 2016).

Over time and with developments in medicine today, public trust in the effectiveness of herbal medicine in healing has decreased. The existence of chemical drugs that have a fast healing effect has a place in the hearts of the public. Herbal medicines provide fewer side effects than chemical drugs (Lau et al., 2019). In addition, awareness of maintaining health and knowledge about medicines in the yard is still lacking. According to survey data via a questionnaire conducted by Sari et al. (2019), only 5 percent of residents use TOGA as an alternative to dealing with health problems in the Village of Tangkerang Labuai, Bukit Raya District, Pekanbaru.

In Kamanisan Village, Curug District, Serang City, Banten Province, there are quite good health facilities and infrastructure, namely seven polyclinic units, one health center unit, and six pharmacy units based on data from the Serang City Central Statistics Agency in 2024. However, public awareness of the importance of health is still very low. It is based on several factors, including knowledge, based on the 2020 Serang City Government Agency Performance Report, the average level of education of the school-age population (7 years and above or more) in Serang City can only complete school up to grade 2 of junior high school. Therefore, it is necessary to provide understanding and knowledge through the use of the yard as a living pharmacy for initial action to maintain health.

This is in accordance with the results of community service activities that have been carried out in Banten Province by Sahetapy (2018) in Sasak Village, Tangerang, as well as Utami and Akbar (2021) in Cimandiri Village, Lebak, shows that the community has not utilized the surrounding land properly as a living pharmacy and has not utilized medicinal plants as medicine, so it is necessary to increase understanding and knowledge to return to using nature (back to nature) (Lau et al., 2019).

If this is allowed, public knowledge about the management of natural resources of medicinal plants will decrease. Therefore, community service is conducted through counseling in other villages in Banten Province, namely Kamanisan Village, Curug District, Serang City, targeting local mothers and the village government. It is because mothers can do other activities besides being housewives by making a living pharmacy in the yard and socializing more often with each other in the environment, so every knowledge can be accepted more easily (Fadhil et al., 2022). Meanwhile, village officials implement policies that encourage people to maintain health through TOGA.

This activity aims to improve knowledge and skills in managing TOGA to the community, especially mothers of local residents and the village government in Kedayon Village, RT.07/RW.13 Kamanisan Village, Curug District, Serang City, Banten Province, and to disseminate oral information about plants with medicinal properties. The action of developing TOGA becomes a socio-cultural asset for the community that must be proud of and preserved.

## 2. METHODS

The method used in this community service activity is counseling, which consists of delivering materials and question-and-answer discussions related to TOGA. This activity was carried out at the

Kedayon Village office, RT.07/RW.13 Kamanisan, Curug District, Serang City, Banten Province, held on November 7, 2023, at 13.00-15.00 WIB. The target of this community service activity regarding education on the introduction and planting of TOGA is the Kedayon Village community, RT.07/RW.13 Kamanisan Village, especially the surrounding mothers and the village government (RT head, RW head, Village Head). The number of people involved in this activity was 30 people. In this community service activity, a questionnaire (pre-test and post-test) was used to measure the knowledge and attitudes of the community regarding TOGA. Meanwhile, the materials used were flyers and leaflets on the benefits and how to process medicinal plants. Participants were given questions about their knowledge category (10 numbers), including definition and meaning, efficacy and benefits, and how to process TOGA. Meanwhile, for the attitude category, participants were given 5 question numbers with the answers strongly agree (SS), agree (S), undecided or neutral (CS), disagree (TS), and strongly disagree (STS) regarding ensuring that the yard can be used as a living pharmacy, cultivating TOGA which is easily obtained and widely needed, informing other people when finding different types of TOGA, initial treatment actions with TOGA, and realizing the maximization of the use of TOGA as Indonesia's biodiversity.

### **Counseling**

Counseling is carried out through lectures, which is an important thing in community service and is greatly influenced by the approach that underlies these activities (Latief et al., 2022; Sahetapy, 2018). Counseling is seen as a science and practical action. As a science, the scientific basis of counseling is behavioral science, which is studied through human thought patterns, actions, and attitudes. The counseling stages focus a lot on the types and benefits of plants that can be used as complementary medicines by the community because they are often found in the yards or gardens of the Kamanisan Village community. Question and answer is a two-way action process between the questioner and the answerer so that something that is not understood can find a solution. Question and answer are interactively done so that it is not dull, and a prize is given to the questioner as an appreciation of curiosity for each question. In addition, leaflets containing the benefits and instructions on how to process medicinal plants were also distributed, while flyers were given to the village office to be displayed and used as knowledge information. The activity ended with a group photo session.

### **Success Indicators**

The number of participants reached the target of 30 people, and there was an increase in knowledge and attitudes about TOGA of up to 90 percent, as measured by comparing the pre-test and post-test percentages. Then, there was a relationship between knowledge and attitudes before and after counseling, which were interrelated with statistical testing.

### **Evaluation**

After counseling and asking questions and answers about TOGA, a questionnaire was given to determine the community's level of knowledge and attitudes. This questionnaire was given before and after counseling to measure the differences in knowledge and attitudes of the community (Sahetapy, 2018; Sopandi & Mansur, 2023). The assessment method is based on a comparison of the relationship between knowledge before the material and attitudes before the material, knowledge before the material and knowledge after the material, knowledge after the material and attitudes after the material, and attitudes before the material and attitudes after the material using statistical analysis tests, namely the Chi-Square test. For the difference test between the comparisons of the relationship, the Paired Sample t-test is carried out.

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### 3. RESULTS AND DISCUSSION

The socialization activity was held on Tuesday, November 7, 2023, at the Kedayon Village office, RT.07/RW.13 Kamanisan, Curug District, Serang City. The number of participants who attended this activity was 30, including the village head, RT head, RW head, and local mothers.

#### TOGA Socialization to the Surrounding Community

The activity began by observing the environment in Kedayon Village RT.07/RW.13 Kamanisan Village, Curug District, as the location for TOGA socialization. This is because the village has a large land area in the residents' yards to be used as a living pharmacy. The socialization process began by filling out a questionnaire containing information in the form of partner identities distributed by the community service team about gender, age, education, and occupation, such as Figure 1.

Then, a pre-test was conducted, the socialization material was delivered as a flyer (Figure 2), and a post-test was performed to measure differences in participants' knowledge and attitudes.



Figure 1. Questionnaire completion



Figure 2. Flyer of TOGA material

Table 1 shows that the participants of the Kamanisan Village community are dominated by the female gender, with as many as 29 people, a percentage of 97 percent. At the same time, the male is only one person (3 percent). At the age level, participants between 19 and 30 numbered 14 people, a percentage of 47 percent. While those aged 31-40 were five people (17 percent), 41-50 were seven people (23 percent), and >50 were four people (13 percent).

The participant's education level varies greatly, which affects the participant's knowledge. Participants who did not attend school numbered four people, a percentage of 13 percent. While elementary, junior high, and high school education were 19, 3, and 4 people, respectively, with a percentage of 64, 10, and 13 percent. Based on research conducted by Sahetapy (2018) in Sasak Village, Tangerang Regency, Banten, shows that the level of education is an important factor that is highlighted. Because it is closely related to knowledge, it affects the awareness of the community. The village's illiteracy percentage is 20 percent, and 60 percent of the community only completed junior high school. In this activity, participants were obtained with the last level of education at Elementary School (SD), a percentage of 64 percent. While, the Table 4 shows three participants (10 percent) who work as laborers or farmers, while almost all participants, around 90 percent, namely 27 people, work as housewives.

**Table 1.** Participant characteristics

Characteristics Category	Number of participants (people)	Percentage (%)
<b>Gender</b>		
Female	29	97
Male	1	3
<b>Age</b>		
19 – 30	14	47
31 – 40	5	17
41 – 50	7	23
> 50	4	13
<b>Education</b>		
No school	4	13
Elementary School	19	64
Junior High School	3	10
Senior High School	4	13
<b>Occupation</b>		
Student	0	0
Civil servant	0	0
Laborer / Farmer	3	10
Private sector employee	0	0
Self-employed	0	0
Housewife	27	90

### Level of Knowledge and Attitude

Community knowledge and attitudes were measured based on data from the results of filling out questionnaires conducted twice, namely before and after the counseling, where there were differences between the knowledge and attitudes. This was due to the low knowledge of medicinal plants' types and pharmacological effects and the response to attitude toward utilizing the surrounding land (Yumita et al., 2023).

**Table 2.** Participants knowledge before and after counseling

Knowledge	Number of participants (people)	Percentage (%)	Number of participants (people)	Percentage (%)
	Before Counseling		After Counseling	
Good	26	86.76	27	90
Quite good	3	10	3	10
Not good	1	3.33	0	0

Participants' knowledge before and after counseling differed, as seen in Table 2. Participants who had good knowledge before TOGA counseling were 26 people, with a percentage of 86.76 percent. After the counseling, there were 27 people, amounting to 90 percent. This difference in results shows

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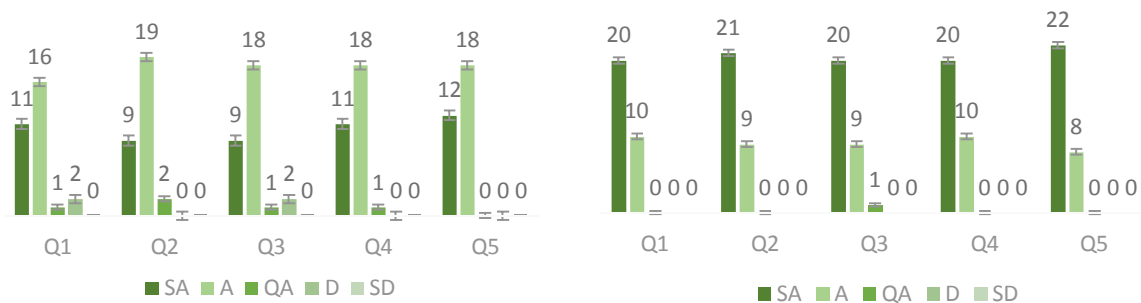
the importance of counseling to the community. Not good knowledge before counseling was only one person with a percentage of 3.33 percent. After the counseling, they became aware of medicinal plants using the surrounding yard, resulting in 0 percent.

Participants' attitudes are based on several criteria, namely SA, A, QA, D, and SD. It was done to determine the response of the Kamanisan Village community, which was used as participant's to TOGA. The Tables 3 shows participants' attitudes toward using TOGA before and after counseling. The SA attitude before counseling regarding TOGA was a form of maximizing Indonesia's biodiversity of as many as 12 people, and the A attitude was 18 people. After the counseling, there was a significant change in 22 people with the SA attitude and only eight with the A attitude. This means that the community strongly agrees that medicinal plants provide benefits when consumed as a source of health, so it is necessary to maximize the yard around the house as a living pharmacy.

**Table 3.** Participant's attitudes before and after TOGA counseling

Attitudes	Number of Participants (People)				
	Q1	Q2	Q3	Q4	Q5
<b>Before Counseling</b>					
SA	11	9	9	11	12
A	16	19	18	18	18
QA	1	2	1	1	0
D	2	0	2	0	0
SD	0	0	0	0	0
<b>After Counseling</b>					
SA	20	21	20	20	22
A	10	9	9	10	8
QA	0	0	1	0	0
D	0	0	0	0	0
SD	0	0	0	0	0

Q1–Q5 assess participants' attitudes toward TOGA (medicinal plants). The questions cover aspects such as ensuring the yard is utilized before planting (Q1), prioritizing easily accessible and essential TOGA (Q2), sharing information about new TOGA varieties with the community (Q3), using natural materials as an initial treatment (Q4), and recognizing TOGA as a way to maximize Indonesia's biodiversity (Q5).



**Figure 3.** Graph of participants' attitude before and after TOGA counseling

Before the TOGA counseling, the number of participants with an "Agree" (A) attitude for Q1–Q4 was 16, 19, 18, and 18, while those with a "Strongly Agree" (SA) attitude were 11, 9, 9, and 11, respectively. After the counseling, there was a significant shift, with 20, 21, 20, and 20 participants having an SA attitude and only 10, 9, 9, and 10 remaining in the A category. The changes in participants' attitudes toward TOGA before and after the counseling session are illustrated in the following graph (Figure 4).

## Discussion

The results of the TOGA counseling evaluation in Kamanisan Village showed an increase in participant knowledge from 86.76 percent to 90 percent. Meanwhile, the attitude of the community who strongly agreed with the use of TOGA increased from 12 to 22 people. This means that the community responded very well by enthusiastically listening and actively asking questions during the counseling to obtain information related to the activity. In addition, the community is aware that medicinal plants provide health benefits. Therefore, they (partners) want to utilize the yard around the house as a living pharmacy and TOGA as an initial treatment.

Analysis of the relationship between knowledge and participants' attitudes using the Chi-Square test and paired sample t-test. The Chi-Square test tests a data sample's relationship or association between two categorical variables. Usually, Chi-Square produces a statistical value used to determine whether there is a significant relationship between the categorical variables studied. These results are used to support or reject the hypothesis. While the paired sample t-test is a test of the difference between two paired samples. Paired samples are the same subjects but experience different treatments. This difference test is used to analyze the research model before and after. This test is one of the methods used to assess the effectiveness of treatment, which is characterized by differences before and after treatment is given (Wahyudi et al., 2023).

**Table 4.** The results of the relationship between knowledge and attitude from participants (before and after)

Category	Chi-square	Wilcoxon
The influence of knowledge against attitudes before the material	0.690	0.000
The influence of knowledge against attitudes after the material	3.399	0.000
The influence of knowledge before and after the material	30.00	1.000
The influence of attitudes before and after the material	6.087	0.001

Table 4 shows that the relationship between knowledge and participant attitudes about TOGA knowledge is very varied and influenced by socialization material. Prior knowledge of attitudes before the material obtained a chi-square value of 0.690, indicating that participant knowledge before the material did not affect attitudes. It is also in accordance with the Wilcoxon test showing a value of 0.000 ( $p$ -value > 0.05), which means there is a difference in knowledge of attitudes before the material.

While there is a significant difference with a value of 30.000 between knowledge before and after being given the material and Wilcoxon obtained 1.000 which indicates no difference in knowledge before and after the material. Participant knowledge after being given the material has no significant effect on attitudes after the material with a chi-square value of 3.399, and the Wilcoxon test obtained 0.000, which means there is a difference in the influence. However, in the participants' attitudes before and after being given the material, there is a significant influence with a value of 6.087, and the Wilcoxon test shows a difference with a  $p$ -value of 0.001.

#### 4. CONCLUSION AND RECOMMENDATIONS

The TOGA socialization activity in Kedayon Village RT.07/RW.13 Kamanisan Village, Curug District, Banten Province, can be felt directly by the community from the enthusiasm and success of efforts to increase understanding and attitudes related to utilizing TOGA as a family companion medicine and initial treatment measures. The level of community knowledge and attitudes towards using TOGA before and after socialization was very different. The increase in participant knowledge before socialization was only 86.76 percent, and after being given material exposure, it became 90 percent. Meanwhile, the community's attitude towards using TOGA with a strongly agreed response increased from 12 to 22 people. The results of the Chi-Square statistical analysis test showed that there was a significant influence between knowledge before and after being given material. In addition, the attitude before there was material exposure to the attitude after receiving the material had a significant influence. Meanwhile, the paired sample t-test showed a difference between knowledge before and attitude before, knowledge after to attitude after, and attitude before and after when receiving the material.

There needs to be a TOGA planting program on the empty land of the Kamanisan village office, Curug District, to be used as a pilot project and followed independently by the community around the yard. The types of medicinal plants are very diverse, so further information is needed regarding how to utilize and process them according to their properties to cure a disease. It is better to follow up in collaboration with other partners, such as the relevant Health Office, to obtain feedback and a broad impact from this community service program.

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#### REFERENCES

- Fadhil, Z., Laila, S., & Elmiyati, E. (2022). Hubungan pengetahuan masyarakat terhadap tanaman obat keluarga (TOGA) di Gampong Meunasah Intan. *Serambi Saintia Jurnal Sains dan Aplikasi*, 10(2), 71–78. <https://doi.org/10.32672/jss.v10i2.4954>
- Latief, M., Tarigan, I. L., & Amaris, N. C. (2022). Pemanfaatan tanaman obat keluarga (TOGA) sebagai upaya swamedikasi melalui pembuatan minuman immunostimulan. *Jurnal Pengabdian Pada Masyarakat UnMa Banten*, 7(2), 533–541. <https://doi.org/10.30653/002.202272.3>
- Lau, S. H. A., & Herman, H. (2019). Studi perbandingan tingkat pengetahuan masyarakat tentang obat herbal dan obat sintetik di Campagayya Kelurahan Panaikang Kota Makassar. *Jurnal Farmasi Sandi Karsa*, 5(1), 33–37.
- Menteri Kesehatan Republik Indonesia. (2016). Peraturan Menteri Kesehatan Nomor 9 Tahun 2016 tentang Upaya Pengembangan Kesehatan Tradisional Melalui Asuhan Mandiri Pemanfaatan Taman Obat Keluarga dan Keterampilan.
- Muhlisah, F. (2015). *Mari bertanam TOGA (Tanaman Obat Keluarga)*. Aswaja Pressindo.
- Natasya, D., Tunggeng, M. G. R., Annisa, P. R., Nopianti, N. I., Dawa, M. M. A., Jafar, N., & Gani, A. (2024). Socialization, cultivation, and utilization of empty land for family medicinal plants. *Abdimas: Jurnal Pengabdian Masyarakat Universitas Merdeka Malang*, 9(3), 555–563. <https://doi.org/10.26905/abdimas.v9i3.12965>
- Prapitasari, B., Pramudya, A., & Haryadi, D. (2020). Keanekaragaman dan kelimpahan jenis anggrek (Orchidaceae) di Resort Selabintana Taman Nasional Gunung Gede Pangrango (TNGGP) Jawa Barat. *BIOSFER, Jurnal Biologi & Pendidikan Biologi*, 5(1), 24–30. <https://doi.org/10.23969/biosfer.v5i1.2569>



- Safutri, W., Nurfala, Y., & Areza, M. (2023). Penyuluhan pemanfaatan tanaman obat keluarga (TOGA) dan pelatihan budidaya tanaman di Desa Wonodadi RT. 002 RW. 002 Kecamatan Gadingrejo Kabupaten Pringsewu Lampung. *Jurnal Pengabdian Kepada Masyarakat Ungu*, 5(1), 1–7. <https://doi.org/10.30604/abdi.v5i1.1027>
- Sahetapy, M. (2018). Penyuluhan dan pelatihan tanaman obat keluarga desa Sasak Kabupaten Tangerang Provinsi Banten. In *Prosiding Seminar Nasional Tahun 2018 Publikasi Hasil Penelitian dan Pengabdian Kepada Masyarakat*, 362–367.
- Sari, N., & Andjasmara, T. C. (2023). Penanaman tanaman obat keluarga (TOGA) untuk mewujudkan masyarakat sehat. *Jurnal Bina Desa*, 5(1), 124–128. <https://doi.org/10.15294/jbd.v5i1.41484>
- Sari, S. M., Ennimay, & Rasyid, T. A. (2019). Pemanfaatan tanaman obat keluarga (TOGA) pada masyarakat. *Dinamisia: Jurnal Pengabdian Kepada Masyarakat*, 3, 1–7. <https://doi.org/10.31849/dinamisia.v3i2.2833>
- Savitri, A. (2016). *Tanaman ajaib basmi penyakit dengan TOGA (Tanaman Obat Keluarga): Mengenal ragam dan khasiat TOGA meramu jamu tradisional/herbal dengan TOGA*. Bibit Publisher.
- Siregar, R. S., Tanjung, A. F., Siregar, A. F., Salsabila, S., Bangun, I. H., & Mulya, M. O. (2020). Studi literatur tentang pemanfaatan tanaman obat tradisional. In *Scenario (Seminar of social sciences engineering and humaniora)*, 385-391.
- Sopandi, S., & Mansur, A. A. (2023). Effectiveness of the potential-based capacity building and empowerment program for santri students in Ciherang Village. *Dinamisia: Jurnal Pengabdian Kepada Masyarakat*, 7(6), 1494-1504. <https://doi.org/10.31849/dinamisia.v7i6.12557>
- Utami, W. K., & Akbar, B. I. (2021). Penanaman obat keluarga (TOGA) dalam mendukung pencegahan COVID-19 di Desa Cimandiri Kabupaten Lebak. *Jurnal Pengabdian Dinamika*, 8, 19–26.
- Wahyudi, D., Idris, J., & Abidin, Z. (2023). Tren dan isu penelitian uji-t dan chi kuadrat dalam bidang pendidikan. *LINEAR: Journal of Mathematics Education*, 4(2), 182-196. <https://doi.org/10.32332/linear.v4i2.7987>
- Yumita, A., Wulandari, N., & Hoirurrozi, I. (2023). Kajian pengetahuan dan praktik pemanfaatan obat tradisional Indonesia untuk meningkatkan sistem imun tubuh. *Jurnal Ilmiah Farmasi Attamru*, 4(2), 83–97. <https://doi.org/10.31102/attamru.2023.4.2.83-97>
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