International Journal of Advance Scientific Research (ISSN – 2750-1396) VOLUME 03 ISSUE 03 Pages: 16-24

SJIF IMPACT FACTOR (2021: 5.478) (2022: 5.636) (2023: 6.741)

OCLC – 1368736135



🛛 🔀 Google 崎 WorldCat\* 👧 MENDELEY





Journal Website: http://sciencebring.co m/index.php/ijasr

Copyright: Original content from this work may be used under the terms of the creative commons attributes 4.0 licence. **O** Research Article

# ANALYSIS OF METHODS OF IMPROVING PRIMARY PREVENTION MEASURES CARRIED OUT IN THE EARLY STAGES OF BREAST CANCER AND PRE-CANCER DISEASES BY STUDYING THE RISK FACTORS

Submission Date: March 14, 2023, Accepted Date: March 19, 2023, Published Date: March 24, 2023 Crossref doi: https://doi.org/10.37547/ijasr-03-03-03

#### Dilfuzahon Zakirjanovna Mamarasulova

Ph.D., Docent, Head Of The Department Of Oncology And Medical Radiology, Andijan State Medical Institute, Andijan, Uzbekistan

#### Dilbarkhon Abdulkosimovna Urmanbaeva

Senior Teacher At The Department Of Oncology And Medical Radiology, Andijan State Medical Institute, Andijan, Uzbekistan

#### Albina Faalievna Validova

Republican Specialized Scientific And Practical Center Of Oncology And Radiology Of Andijan Regional Branch, Andijan, Uzbekistan

#### Vycheslav Hrehorovich Garumov

Republican Specialized Scientific And Practical Center Of Oncology And Radiology Of Andijan Regional Branch, Andijan, Uzbekistan

# Abstract

During the implementation of this interesting research method, activities were organized under the motto "Let's all fight against breast cancer" with the help of patronage nurses trained on the basis of the pilot program of breast early detection, and special questionnaires were conducted and analyzed among women living in Andijan region and Andijan city. Based on the results of the analysis, women were divided into risk groups, and preventive measures were selected that should be implemented in the future. International Journal of Advance Scientific Research (ISSN – 2750-1396) VOLUME 03 ISSUE 03 Pages: 16-24 SJIF IMPACT FACTOR (2021: 5.478) (2022: 5.636) (2023: 6.741) OCLC – 1368736135 Crossref 0 S Google S WorldCat MENDELEY



# **K**eywords

Breast cancer, prevention, early diagnostics, risk factors, objective examination of the mammary gland, precancerous breast diseases, genetic factors.

# INTRODUCTION

The main way to reduce disability and death rates from breast cancer (BC) is to increase the quality of educational programs among the population and to inform about the goals of the planned intervention. Government, non-governmental organizations, representatives of health organizations, as well as oncologists in many countries with experience of long-term screening programs for this disease are in constant focus [5,6,8].

In Western European countries, the main method of attracting the population to targeted screening is through personal mailing of addressed invitations to women to be screened. The invitation contains information about the screening procedure (its exact time, date and coordinates of the institution where the examination will be conducted). In the conditions of Andijan region, the use of this method remains impossible for a number of reasons [4,12].

The analysis of the data presented above shows the need to conduct such research among the women of the Andijan region, which has the highest population density in the Republic of Uzbekistan. Conducting such researches in this region indicates that the region has its own geographical, climatic, demographic and ecological indicators [6]. It is undoubtedly important to study the epidemiological situation of oncological diseases in the region with high natural development of the population and to compare these indicators with the indices of the Republic. In addition, the provided oncological data, as well as medical examination and questionnaire materials conducted with citizens, require careful clarification [3].

Compatibility of the topic of our article with the priority directions of scientific research works of the Republic of Uzbekistan [15].

PF-5590 of the President of the Republic of Uzbekistan dated December 7, 2018 "On comprehensive measures to fundamentally improve the healthcare system of the Republic of Uzbekistan" and PF-6110 dated November 12, 2020 completely "Introduction of new mechanisms to the current activities of primary medical and sanitary care institutions" and on measures to further increase the effectiveness of reforms in the health care system", Resolution No. PQ-4891 of November 12, 2020 "On additional measures to ensure public health by further increasing the effectiveness of medical preventive work" and this This study serves to a certain extent in the implementation of the tasks defined in other regulatory and legal documents adopted in the direction [1,5].

International Journal of Advance Scientific Research (ISSN – 2750-1396) VOLUME 03 ISSUE 03 Pages: 16-24 SJIF IMPACT FACTOR (2021: 5.478) (2022: 5.636) (2023: 6.741) OCLC - 1368736135



Crossref doi 🔀 Google 🏷 WorldCat<sup>®</sup> 🔼 MENDELEY

## **M**ATERIALS AND METHODS

We and leading mammologists based the modification of the Gale model, taking into account the factors that cause it in the climate where we live, population density and the climate of the Fergana Valley, and the questionnaire was created and widely used. In order to fulfill the tasks, set before the research, under the motto "Let's all fight against breast cancer", questionnaire data was collected and studied from 2181 women (1116 Andijan city, 1065

Andijan region) women, based the on questionnaire data, breast cancer and cancer pathology was involved in the investigation in order to determine.

### **R**ESULTS AND DISCUSSION

Women from 17 to 75 years of age who answered the questions of the questionnaire were included in the clinical research object, who were involved in the preventive examination conducted by the specialists of the branch and the department (Table 1).

#### Table 1

#### Women aged 17 to 75 years who answered questionnaires and underwent preventive examinations

Patients of the examined group	Quantity	
	abs.	%
The first subgroup is breast cancer	21	1,91%
The second subgroup is mammary gland disease	886	38,2
The third subgroup is healthy women	1374	59,89%
Total :	2181	100,0

The average age of the examined patients is 46.5±1.0 years, the average age of healthy women is 45.2+0.8 years, the age of women with breast disease is 42.1±1.4 years, the average age of breast cancer patients is age was -51.7±0.9 years.

In Andijan city and Andijan region, the cause-andeffect relationship between breast cancer and

death from medical-demographic, ecologicalhygienic factors and disease indicators was studied. The risk factors of the origin of breast cancer were evaluated and a group of women with a high risk of developing this pathology was identified. In Andijan region and Andijan city, the priority directions of diagnosis of BC in connection with the spread of the disease and

International Journal of Advance Scientific Research (ISSN – 2750-1396) VOLUME 03 ISSUE 03 Pages: 16-24 SJIF IMPACT FACTOR (2021: 5.478) (2022: 5.636) (2023: 6.741) OCLC – 1368736135



carcinogenic factors were shown. A program for the prevention of mammary gland disease was formed.

Information on breast cancer was obtained from the following documents:

1) Questionnaire on checking the risk factors of the origin and development of breast cancer (2181 questionnaires);

2) 7 mobile examination materials for the purpose of research and preventive examination of risk factors for the development of breast cancer in women of Andijan region and Andijan city in 2017-2019;

Examination of individual oncological risk factors for the development of BC was performed according to the principle of BC 101 patients "case-control", "case", 448 women "control". Consent was obtained from all women before filling out the questionnaire.The results of the study were obtained by the author from the examination and questioning of the patient, from the processing of the questionnaire (questionnaire), filling out the patient's inpatient and outpatient medical card, from the dispensary monitoring control card, from the patient's notification of the first diagnosis, from the hospitalization and examination logs, from the paraclinical research reports.

Methodological support is intended to improve the activities of oncology dispensary specialists to trainers focused on the primary link of health care:

• Screening rooms – implementation of a practical activity for Q&A on the note "BC Disease Alert",

• Elimination of defects of mammographic research,

• Improving the professional skills of doctors and medical staff on physical examination of BC,

formation of risk groups for BC,

• Effectiveness of the work of the panel of doctors on the analysis and study of the report of the late diagnosis of BC in order to minimize defects in preventive, dispensary, sanitary-educational work.

#### Table 2

#### General description of patients participating in the study (based on questionnaire analysis)

International Journal of Advance Scientific Research (ISSN – 2750-1396) VOLUME 03 ISSUE 03 Pages: 16-24

SJIF IMPACT FACTOR (2021: 5.478) (2022: 5.636) (2023: 6.741)

OCLC - 1368736135



Crossref 💩 😵 Google 🏷 World Cat® 🕅 MENDELEY

Age		
• median age	57	
	35/77	
• minimum/maximum age		
Menstrual function	335 (99,7%)	
	1 (0,3%)	
• postmenopause		
<ul> <li>premenopause/perimenopause</li> </ul>	8/17	
Menarche		
• minimum/maximum age	16/40	
Maternal age		
• minimum / maximum age	94 (27,9%)	
	24 (7,1%)	
Family anamnesis	74 (22,0%)	
• relatives of the first degree of consanguinity	20 (5,9%)	
• relatives of the second degree of consanguinity	9 (2,7%)	
	9 (2,7%)	
	2 (0,6%)	





The average age of the patients participating in the study was 57 (35-77) years. 2 patients 2 (0.6%) age unknown (patient did not return after

obtaining written consent, no follow-up was recorded, age was not determined).

#### Table 3

# Characteristics of patients participating in the study in accordance with the Gale model and specific risk factors

Menarche		
• 7-11 years old	39 (11,6%)	
• 12-13 years old	148 (44,0%)	
• Age 14 and older	134 (39,9%)	
• unknown age	15 (4,5%) a	
First birth and age		
• under 20	18 (5,4%)	
• 20-24 years old	138 (41,1%)	
• 25-29 years old	81 (24,1%)	
• Age 30 and older	44 (13,1%)	
• did not give birth	41 (12,2%)	
• no data	14 (4,1%)	
First-degree relatives with BC		
• not sick	235 (69,9%)	
• 1 relative	84 (25,0%)	
• More than 1 relative	10 (3,0%)	
• no data	7 (2,1%)	

International Journal of Advance Scientific Research (ISSN – 2750-1396) VOLUME 03 ISSUE 03 Pages: 16-24 SJIF IMPACT FACTOR (2021: 5.478) (2022: 5.636) (2023: 6.741) OCLC - 1368736135 😵 Google 🏷 WorldCat 🕅 MENDELEY



Crossref doi

Fine needle aspiration /Biopsy related to suspected BC		
258 (76,8%)		
50 (14,9%)		
24 (7,1%)		
4 (1,2%)		
Total 74		
54 (73,0%)		
18 (24,3%)		
2 (2,7%)		
-	258 (76,8%) 50 (14,9%) 24 (7,1%) 4 (1,2%) <b>Total 74</b> 54 (73,0%) 18 (24,3%)	

Significant risk factors were observed in the patients involved in the study. Many of them had an early onset of menarche: 44.0% of patients had their first menstruation at the age of 12-13, 11.6% of patients had it earlier than the age of 12. Very few (5.4%) patients had their first birth before the age of 20 years. Therefore, 41.1% of patients at the age of 20-24 had their first birth, 24.1% at the age of 25-29, 13.1% at the age of 30 and older, and 12.2% of patients did not give birth. In 28% of patients with BC, first-degree consanguinity was detected, and in 3% of patients, second- and third-degree consanguinity was detected. 22% of patients had mammary nodules requiring diagnostic puncture/biopsy to rule out BC. Mainly mammary tumors are in the form of fibroadenoma (FA) and intraocular papilloma (IP). Atypical hyperplasia was diagnosed in 2.7% of cases.

The risk of developing BC over 5 years according to the Gale model is presented in Table 4. Risk was calculated for 179 of 180 patients without a personal history of BC.

#### Table 4

For 5 years according to Gale's model the risk of developing breast cancer

International Journal of Advance Scientific Research (ISSN – 2750-1396) VOLUME 03 ISSUE 03 Pages: 16-24 SJIF IMPACT FACTOR (2021: 5.478) (2022: 5.636) (2023: 6.741)







Risk Factors		
Low, less than 1.67%	70 (39,1%)	
High, 1.67% and more	109 (60,9%)	
Total	179 (100%)	

According to Gale's model, a high risk of developing BC was found in 109 (60.9%) patients.

Referred for an in-depth medical examination for women classified as high-risk according to the Gale model.

# Conclusion

According to the data of the questionnaire and palpation of the mammary gland, more than half of the women who underwent the ultrasound examination were diagnosed with precancerous diseases and breast cancer. Patronage led to nurses working on a program for early detection of breast pathology, public understanding of the purpose of planned preventive examinations, and a dramatic improvement in women's coverage of preventive examinations.

# References

- **1.** A.D. Kaprin, V.V. Starinsky, G.V. Petrova Malignant neoplasms in 2018 (morbidity and mortality).
- **2.** Bondarev, S.A. The main causes and prevalence of malignant tumors: Cancer....

Life goes on. – 2011 [Electronic resource]. – Access mode: http://www.cancer.ic.ck.ua.

- **3.** Beishembaev M. I., Soodonbekov E. T., Aidarbekova A. A., Sulaimanova A. A. Review of the state of the oncological service in the Kyrgyz Republic // Eurasian journal of oncology. 2014. No. 1(1). S.20-23.
- 4. Elizarova, T.V. Hygienic significance of heavy metals under anthropogenic impact on the body / T.V. Elizarova, L.A. Mikhailova // Quality, food safety and public health: materials of the regional scientific and practical conference. Chita, 2015. S. 30–33.
- The incidence of lung cancer in the population of the Tomsk region / L.F. Pisareva, I.N. Odintsova, V.A. Vorobyov et al. // Siberian journal of oncology. - 2012. - No. 4 (52). - P. 43-47.
- The incidence of breast cancer in the female population of the Irkutsk region. Risk factors / L.F. Pisareva, A.P. Boyarkina, E.V. Panferova et al. // Siberian journal of oncology. 2012. No. 5 (53). P. 12–17.
- **7.** The incidence of breast cancer in the indigenous and alien population of Siberia and the Far East / L.F. Pisareva, I.N. Odintsova, O.A.

International Journal of Advance Scientific Research (ISSN - 2750-1396) VOLUME 03 ISSUE 03 Pages: 16-24 SJIF IMPACT FACTOR (2021: 5.478) (2022: 5.636) (2023: 6.741) OCLC - 1368736135 Crossref O S Google S WorldCat MENDELEY



Ananina and others. // Healthcare of the Russian Federation. - 2012. - No. 4. - P. 37–41.

- Zaridze, D.G. Cancer prevention. A guide for doctors / D.G. Zarid Ze. - M.: IMA-PRESS, 2012. - 224 p.
- 9. Health of the population of the Republic of Altai in 2012 (Annual state report) [Electronic resource].- Access mode: http//miac.med04.ru.
- **10.**I.N. Odintsova, L.F. Pisareva, A.V. Khryapenkov SIBERIAN JOURNAL OF ONCOLOGY. 2015. No. 5. R. 95-101
- 11.Ilnitsky, A.P. New legal document in the field of primary cancer prevention (SanPiN 1.2.2353-08 "Carcinogenic factors and basic requirements for the prevention of carcinogenic hazard") / A.P. Ilnitsky //

Primary prevention of cancer. - 2018. - No. 1/2. - P. 4-11.

- 12.Imyanitov, E.N. Molecular oncology: clinical aspects /
- 13. Kosykh, N.E. Models and methods of population epidemiological studies of socially significant diseases (on the example of malignant neoplasms) / N.E. Kosykh, S.Z. Savin, A.Yu. Desyatov. Vladivostok: Dalnauka, 2016 148 p.
- 14. Manchuk, V.T. Status and trends in the formation of health of the indigenous population of the North and Siberia / V.T. Manchuk, L.A. Nadtochiy // Bulletin of SO RAMS. - 2010. - V. 30, No. 3. - S. 24–32.
- **15.**Oncology from congress to congress / V.V. Starinsky, V.I. Chissov, Yu.S. Sidorenko, R.Sh. Khasanov // Oncology. - 2013. - No. 3. - P. 4–9.