

STUDY OF WOMEN'S HEALTH PROMOTION AND PREVENTION ACTIONS: FOCUS ON CERVICAL CANCER, BREAST CANCER AND SEXUALLY TRANSMITTED INFECTIONS

ohttps://doi.org/10.56238/isevjhv3n5-005

Receipt of originals: 10/11/2024 Acceptance for publication: 11/11/2024

Vera Lúcia Fugita dos Santos¹, Júlia Castilho Brunca², Letícia Bailon Cucarolla³, Melissa Macedo Ferracini⁴, Gustavo Junior Munhoz Trindade⁵, Maria Beatriz Pereira Bueno⁶, Luís Fernando Saraiva⁷, Eduarda Karolina Veschi⁸, Paulo Capel Takassi⁹ and Mariana Segreto Sala Ávila¹⁰

ABSTRACT

In Brazil, one of the tumors that most affects women is cervix, being the third most incident type. The best form of prevention is the use of condoms during sexual intercourse and vaccination, in addition to screening by collecting the Pap smear. Another neoplasm that affects women is breast cancer, and in Brazil it was estimated that more than 65,000 new cases were estimated for 2021. In addition, sexually transmitted infections are common among women, requiring rapid tests to detect Hepatitis B and C, Syphilis and HIV. Objectives: To promote women's health and prevent the main gynecological diseases and sexually transmitted infections (STIs), by collecting material for oncotic colpocytology; performing the clinical examination of the breasts for breast cancer screening; health education for STI prevention. Methods:

E-mail: verafugita@hotmail.com

LATTES: http://lattes.cnpq.br/7659727827154172

E-mail: juliac_brunca@hotmail.com

LATTES: http://lattes.cnpq.br/7267232005087508

E-mail: lebailoncuca@gmail.com

LATTES: http://lattes.cnpq.br/7233112721040557

E-mail: macedomelissa0@mail.com

LATTES: https://lattes.cnpq.br/2316929535240571

⁵ Medical student at the University Center of Votuporanga – SP

E-mail: gustavotrindade111@gmail.com

LATTES: http://lattes.cnpq.br/6221179063931361

⁶ Medical student at the University Center of Votuporanga – SP

E-mail: mabepbueno@gmail.com

LATTES: http://lattes.cnpq.br/7146146512618712

⁷ Medical student at the University Center of Votuporanga – SP

E-mail: Ifsaraiva10@gmail.com

LATTES: http://lattes.cnpq.br/2315705754413542

⁸ Medical student at the University Center of Votuporanga – SP

E-mail: eduarda-veschi@hotmail.com

LATTES: https://lattes.cnpq.br/5955338437982467

⁹ Medical student at the University Center of Votuporanga – SP

E-mail: paulotakassi@hotmail.com

LATTES: https://lattes.cnpq.br/5207899252996218

¹⁰ E-mail: mariana.avila152004@gmail.com

LATTES: http://lattes.cnpq.br/3978589192895470

¹ Professor, Dr. at the University Center of Votuporanga – SP

² Medical student at the University Center of Votuporanga – SP

³ Medical student at the University Center of Votuporanga – SP

⁴ Medical student at the University Center of Votuporanga – SP



Descriptive, exploratory action research, with quantitative-qualitative analysis. Results: Among others, it was observed that most participants (46%) were in the age group of 20 to 40 years; 61% had performed the last Pap smear collection in 2021; Regarding contraception, 77% reported not using the contraceptive pill and; On clinical examination of the breasts, 92% did not present any alteration. Conclusions: The study provided the opportunity for collaboration with Primary Care services in the promotion of women's health and health education actions for the development of autonomy and self-care.

Keywords: Prevention. Cervical Cancer. Breast Cancer. Sexually Transmitted Infections.



INTRODUCTION

CERVICAL CANCER

In Brazil, excluding non-melanoma skin tumors, cervical cancer (CC) is the third most common type of cancer among women, being more common between 35 and 49 years of age. The incidence in women up to 24 years of age is very low (0.99% of cases) and screening is less efficient in detecting it. For the year 2023, 17,010 new cases were estimated, which represents a considered risk of 13.25 cases per 100 thousand women (INCA, 2020).

In the regional analysis, cervical cancer is the second most incident in the North (20.48/100 thousand) and Northeast (17.59/100 thousand) regions and the third in the Central-West (16.66/100 thousand). In the South region (14.55/100 thousand) it occupies the fourth position and, in the Southeast region (12.93/100 thousand), the fifth position. The incidence rates and the number of new cases estimated are important to assess the magnitude of the disease in the territory and to program local actions (INCA, 2020).

According to Viana (2012), the evolution of infection by the Human Papilloma Virus (HPV, serotypes 16 or 18) to CC, that is, the neoplasm originates in the transformation zone of the squamocolumnar junction (SCJ) and advances internally from the original SCJ towards the external orifice and over the columnar villi, to constitute the transformation zone. The process involves four steps:

- 1- Infection of the metaplastic epithelium of the cervical transformation zone (squamous or glandular);
- 2- Persistence of viral infection, with integration of the viral genome into the host's DNA:
- 3- Progression of persistently infected epithelium to cervical precancer;
- 4- Invasion through the basement membrane of the epithelium.

The natural history of cervical cancer presents a long period of precursor, asymptomatic lesions, curable in almost all cases when properly treated, known as Cervical Intraepithelial Neoplasia (CIN) II/III, or high-grade lesions, and AIS. CIN I, on the other hand, represents the cytomorphological expression of a transient infection produced by HPV and has a high probability of regressing, so that it is not considered a precursor lesion of cervical cancer. (Passos, 2017)



CC has epidermoid histology in 70 to 90% of cases, whereas adenocarcinomas, originating from endocervical columnar cells, occur in about 25% of cases and are associated with a worse prognosis. (Passos, 2017)

CC presents in its initial phase in an asymptomatic or little symptomatic form, causing many patients not to seek help at the beginning of the disease. It grows locally, reaching the vagina, paracervical tissues and parametriums, and can compromise the bladder, ureters and rectum. Distant dissemination occurs mainly by the lymphatic route, and may also occur by the hematogenous route. The patient's most common complaints involve yellowish, foul-smelling, and even bloody vaginal discharge, irregular menstrual cycles, intermenstrual spotting, postcoital bleeding, and pain in the lower abdomen and during sexual intercourse. In the more advanced stages, the patient may report anemia, due to bleeding; low back pain, due to ureteral involvement; hematuria and voiding changes, caused by bladder invasion; and changes in bowel habit, due to invasion of the rectum. Patients may also experience pain in the lumbar spine and pelvic pelvis, due to the impairment, sometimes, of the pelvic wall. (Passos, 2017)

The best way to prevent HPV infection is to use a condom during sexual intercourse and get vaccinated – the immunizer is distributed free of charge by SUS. It is worth noting, however, that condoms do not completely prevent HPV infection, since the lesions may be present in areas not protected by the condom. (Passos, 2017)

The quadrivalent vaccine prevents infection by HPV-6, 11, 16 and 18 that cause genital warts. Its composition is made up of particles from the virus's capsule (surface antigen), which stimulates the humoral response with the production of antibodies and memory cells. (Federal Government, 2022)

The duration of vaccine effectiveness is important, as HPV infection is known to peak shortly after age 20 and cervical cancer occurs in the 40s. The vaccines are approved for administration to women up to 26 years of age and must be effective for more than 10 years to ensure protection. Immunization should take place in two doses with an interval of 6 months, both for boys and girls, preferably between 9 and 14 years old, when it is more effective, according to the Ministry of Health. Screening procedures for cervical intraepithelial neoplasia and cancer should remain unchanged in both vaccinated and unvaccinated women. (Federal Government, 2022)

Periodic Pap smear continues to be the most widely adopted strategy for cervical cancer screening. The search for high coverage of the population defined as a target is



the most important component in the scope of primary care, in order to achieve a significant reduction in the incidence and mortality of this type of cancer (INCA, 2016).

BREAST CANCER

According to the Brazilian Society of Pathology (2016), "Breast cancer is a malignant tumor that happens due to genetic changes in the cells of the mammary gland. Such cells become defective and proliferate in a disordered manner, thus leading to the formation of a lump in the breast, in neighboring tissues (armpit lumps) or in other parts of the body (distant metastases)".

It was estimated that in 2021, in Brazil, more than 65,000 cases of breast cancer were diagnosed, with a risk of more than 60 diagnoses per 100 thousand women. Several factors can contribute to these statistics, including genetic factors, lifestyle, long-term use of hormone replacement therapy (INCA, 2022).

It is important for women to be aware of the risk factors for breast cancer and to have routine checkups (includes screening mammography, for women aged 50 to 69 without signs and symptoms of breast cancer, once every two years) in order to detect any signs of cancer early. In addition, it is recommended to follow other prevention measures, such as maintaining a healthy weight, avoiding excessive alcohol use, regularly engaging in physical activity, avoiding tobacco consumption, eating a healthy diet, and seeking treatment for any pre-existing conditions that may influence the risk of developing breast cancer (INCA, 2022). There are authors who indicate the self-touch of the breasts as a form of body knowledge and possible detection of alterations.

The Clinical Breast Examination is used to evaluate signs and symptoms reported by patients in order to make the differential diagnosis between suspicious cancer alterations and those related to benign conditions. It consists of static inspection, dynamic inspection, and palpation. Static inspection aims to identify possible asymmetries, differences in skin color and changes in the contour of the breast. Dynamic inspection, on the other hand, has the purpose of looking for bulges, retractions and tumors, through effort maneuvers. Palpation aims to detect retractions and/or bulges in the subcutaneous tissue, at the intermediate level and deeper into the chest wall. The areola and nipple region should also be palpated, in addition to the papillary discharge investigation. (Brazil, 2013)



SEXUALLY TRANSMITTED INFECTIONS

Another subject addressed in the current study is sexually transmitted infections such as HIV, syphilis and hepatitis B and C, although they have already been widely studied and numerous efforts have been made by the World Health Organization and the Ministry of Health to prevent these pathologies, the expected success has not yet been achieved and many new cases continue to be registered per year. (Barth, 2018)

Early diagnosis of these infections is essential for the prevention of congenital syphilis, a condition that can have consequences with damage to the newborn, early treatment of HIV, since individuals with a suppressed viral load have a lower chance of transmission and maintain the integrity of the immune system, to reduce the occurrence of chronicity caused by the hepatitis B and C viruses, which can lead to liver cirrhosis and cell hepatocarcinoma. (Barth, 2018)

The Unified Health System (SUS) provides rapid tests for the detection of these infections that can be done with a sample of whole blood obtained by venipuncture, from the digital pulp or with oral fluid samples. Depending on the manufacturer, they can also be performed with serum and/or plasma. The process is simple, fast and confidential at all stages. (Barth, 2018)

However, these tests, despite sometimes being subject to difficulty in interpretation (weakly visible reaction), arrived on the market with a great purpose: to provide a result in a simpler and faster way, in which the patient does not have to wait days to receive the diagnosis, nor does he have to return to remove it: just wait around 30 minutes at the site to have it in hand. This prevents the evasion of the patient, who in another situation, may not return to the laboratory/office, either for fear or other reasons, thus not knowing if he has a disease, consequently, without the appropriate treatment if he needs it. (Barth, 2018)

AIDS

AIDS is the disease caused by infection with the Human Immunodeficiency Virus (HIV). This virus attacks the immune system. The most affected cells are CD4+ T lymphocytes. The virus is able to alter the DNA of that cell and make copies of itself. After multiplying, it breaks the lymphocytes in search of others to continue the infection. (Brazil, 2023)



HIV is a retrovirus, classified in the subfamily of *lentiviridae* and is a sexually transmitted infection. These viruses share some common properties, such as prolonged incubation period, infection of blood and nerve cells, and suppression of the immune system. (Brazil, 2023)

The Brazilian epidemic is concentrated in some population segments that are often inserted in contexts that increase their vulnerabilities and have HIV prevalence higher than the national average, which is 0.4%. These populations are, gay and other MSM, trans people, people who use alcohol and other drugs, people deprived of liberty, sex workers, priority populations. (Brazil, 2023).

These are population segments that have a transversal character and their vulnerabilities are related to local social dynamics and their specificities. These populations are the population of adolescents and young people, the black population, the indigenous population, the homeless population. (Brazil, 2023).

It is of paramount importance that people living with HIV and/or AIDS who are not on treatment or maintain a detectable viral load can transmit the virus to others through unprotected sex, by sharing contaminated syringes or from mother to child during pregnancy and breastfeeding, when proper prevention measures are not taken (Brasil, 2023).

The best technique to avoid AIDS / HIV is combined prevention, which consists of the simultaneous use of different prevention approaches, applied at different levels to respond to the specific needs of certain population segments and certain forms of HIV transmission. (Brazil, 2023).

Given this fact, if there was a risk situation, such as unprotected sex or sharing syringes, there is an indication for HIV testing. If the sexual risk exposure occurred less than 72 hours ago, the administration of HIV Post-Exposure Prophylaxis (PEP) should be evaluated. The diagnosis of HIV infection is made from blood collection or oral fluid. (Brazil, 2023).

Hepatite B

Hepatitis B is a contagious viral disease caused by the hepatitis B virus (HBV), in which the infection can present itself symptomatically and asymptomatically. Furthermore, between 2000 and 2017 it was the cause of 21.3% of deaths from hepatitis, in which the signs are related to other liver diseases (tiredness, dizziness,



nausea, fever, pain, yellowing skin and eyes), being transmitted in unprotected sexual intercourse, performing procedures without adequate sterilization, shared use of syringes and needles, blood transfusion, breastfeeding and sharp accidents.

In addition, laboratory confirmation occurs through HBV serological markers, in which treatment is carried out through medical follow-up and medications, however, prevention is carried out by the hepatitis B vaccine, use of condoms during sexual intercourse and not sharing objects of personal use. (Brazil, 2024)

Hepatite C

Hepatitis C is a contagious viral infectious disease caused by the hepatitis C virus (HCV), which can be an asymptomatic or symptomatic infection, in which 80% of those infected progress to the chronic form. Furthermore, symptoms are rare, and 80% of those infected do not present clinical manifestations, in which the form of transmission is contact with contaminated blood, reuse or failure to sterilize equipment, sexual intercourse without the use of condoms and from mother to child during pregnancy or childbirth.

In addition, the diagnosis is by routine rapid tests or blood donation, and the treatment is with direct-acting antivirals (DAA), in order to prevent infection, which is done by using condoms during sexual intercourse, not sharing objects that have contact with blood and medications (drugs). (Brazil, 2024)

Syphilis

Syphilis is a chronic venereal infection, endemic in all parts of the world caused by the bacterium *Treponema pallidum*, which is a microorganism whose only natural host is the human being. The most common form of infection is through contact with a skin or mucosal lesion of a sexual partner with early-stage syphilis, being transmitted from these lesions during sexual activity through microcracks in the skin or mucous membranes of the uninfected partner. (Kumar, 2018)

Primary syphilis, whose lesion is called cancer, appears at the site of entry of the spirochete, and resolves spontaneously in a period of 4 to 6 weeks, and can be followed by secondary syphilis in about 25% of patients who did not receive treatment. The manifestations of secondary syphilis include generalized lymphadenopathy and varied



mucocutaneous lesions, which resolve without any specific antimicrobial therapy, characterizing the initial latent phase of syphilis. (Kumar, 2018)

In addition, in patients with untreated syphilis, they progress to the late latent phase, or tertiary syphilis, defined as being after one year of the initial infection, and is marked by the development of lesions in the cardiovascular system, in the central nervous system, and lesions in other organs are less frequent. Patients in this phase are less infectious than those in the primary or secondary stages. (Kumar, 2018)

Another mode of transmission is congenital Syphilis, being from the infected mother to the fetus through the placenta, at any time during pregnancy. The likelihood of transmission is highest during the early stages (primary and secondary) of the disease. Because the manifestations of maternal disease can be subtle, routine serological tests for syphilis are mandatory for all pregnant women. (Kumar, 2018)

OBJECTIVES

PRIMARY OBJECTIVE

Promote and prevent major gynecological diseases and sexually transmitted infections (STIs).

SECONDARY OBJECTIVES

- Perform collection of material for oncotic colpocytology (pap smear);
- Perform clinical breast examination for breast cancer screening;
- Conduct health education for STI prevention and breast self-examination.

METHOD

Descriptive, exploratory action research, with quanti-qualitative analysis of the data. Thiollent (1985) defines action research as "a type of empirically based research that is conceived and carried out in close association with an action or with the resolution of a collective problem and in which researchers and participants representative of the situation or problem are involved in a cooperative or participatory way."



PARTICIPANTS

Women residing in the territory covered by the Basic Health Unit (UBS) "Jerônimo Figueira da Costa Neto", recruited through invitations delivered by community health agents and spontaneous demand in the routine of the UBS, in the months of April and May 2023. Participants were 18 women, aged between 20 and 70 years. All women who attended and adhered in the mentioned period were included.

MATERIAL OR INSTRUMENTS

The materials used for Pap smear collection were: procedure gloves, disposable aprons and sheets, vaginal speculum, cotton or gauze, Cherron forceps, Ayre spatula, endocervical brush, glass slide with frosted end for identification, number 2 black graphite pencil and 95% ethanol fixer.

The materials for carrying out the rapid tests were: kits for rapid tests for syphilis, HIV and hepatitis B and C.

For guidance on breast self-examination and sexually transmitted infections , models and mannequins were used: silicone breasts and acrylic pelvis, as well as male and female condoms and didactic illustrations of STIs.

LOCATION

Basic Health Unit "Consultório Municipal Jerônimo Figueira da Costa Neto", located at Avenida Campo Grande, n°4956, in the Jardim Bom Clima neighborhood, in the city of Votuporanga-SP. The activities were carried out in the Pap smear collection room and in the waiting room.

PROCEDURES

- Reception of the participant;
- Health education guidelines in the anteroom;
- Data collection to fill out the request for oncotic Pap smear, through anamnesis;
- Placement of disposable apron;
- Positioning for clinical breast examination;
- Positioning for Pap smear collection;
- Fixing of slides containing biological material;



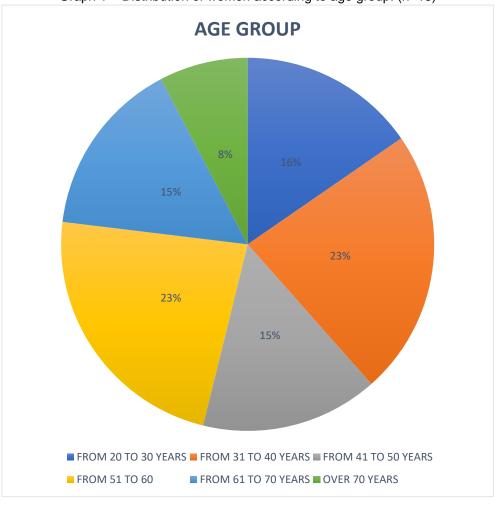
Packing of the blades in wooden boxes.

The technique for collecting Pap smears is described below, according to the Ministry of Health (2016): the vaginal speculum without lubricant is introduced to visualize the cervix. After removing excess mucus, secretion or blood with cotton, Ayre's spatula is supported in the endocervical canal, and a scraping is performed at the squamocolumnar junction (SCJ) through a 360° rotation movement. The sample from the posterior cul-de-sac of the vagina is also obtained by scraping, with the blunt end of the Ayre spatula. The spatula is left to rest on the speculum and the endocervical material is immediately collected. The brush specially designed for this purpose is inserted through the external cervical orifice, and a complete rotation is performed in the canal that can be finished with a back and forth movement, being careful not to traumatize the mucosa, avoiding bleeding. The specimens obtained are spread on the same glass slide delicately and quickly, making thin and uniform smears. The still wet smear should be immediately immersed in 95% ethanol, where it remains until the moment of staining (at least 15 minutes and not exceeding two weeks). This is followed by staining of the cytological samples, which consists of the application of a nuclear dye (hematoxylin) and two cytoplasmic dyes (Orange G6 and EA - eosin, light green or bright green and Bismarck's brown). The smears are bleached in xylol, assembled and taken for microscopic evaluation.

RESULTS AND DISCUSSIONS

It is recalled that the objective of the present study was to collaborate with the promotion of women's health, to help the health unit to achieve the stipulated goal of preventive examination and to increase adherence to rapid tests for syphilis, HIV, hepatitis B and C. In addition, health education promoted autonomy for self-care. Eighteen (18) women participated and the main results obtained are shown in graphs below.





Graph 1 – Distribution of women according to age group. (n=18)

The definition of which women should be screened has been discussed in all interested segments. However, there is a consensus that women who have never had sexual intercourse are not at risk of cervical cancer because they have not been exposed to the necessary risk factor for this disease: persistent infection by oncogenic types of HPV. Regarding the age group, there are several facts indicating that, directly or indirectly, screening in women under 25 years of age has no impact on reducing the incidence or mortality from cervical cancer. A study by the *International Agency for Research on Cancer* (IARC) estimated that when starting screening at 25 years of age, and not at 20 years of age, only a 1% reduction in the cumulative incidence of cervical cancer is lost. (INCA, 2016)

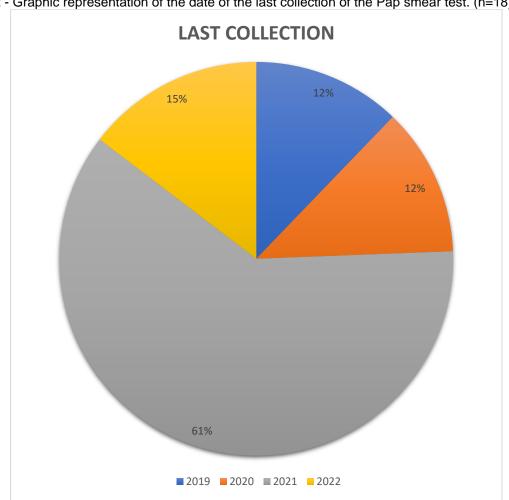
Thus, the incidence of invasive cervical cancer in women up to 24 years of age is very low and screening is less efficient in detecting it. On the other hand, earlier initiation could lead to an increase in diagnoses of low-grade lesions, which have a high probability of regression and result in a significant increase in colposcopies and the



possibility of overtreatment, increasing the risk of obstetric and neonatal morbidity associated with a future pregnancy.

There is little objective evidence on when women should end cervical cancer screening. Women with negative cytological screening between the ages of 50 and 64 have an 84% decrease in the risk of developing an invasive carcinoma between the ages of 65 and 83 years, compared to women who were not screened. However, as the interval since the last examination increases, there is a slight increase in the risk of developing a new carcinoma (moderate evidence).

In the last edition of the Brazilian Guidelines for Cervical Cancer Screening, published in 2011, the age of women with no previous history of pre-invasive disease was increased from 59 to 64 years to end the screening, which is in line with the most current knowledge and with the vast majority of current recommendations. (INCA, 2016)



Graph 2 - Graphic representation of the date of the last collection of the Pap smear test. (n=18)

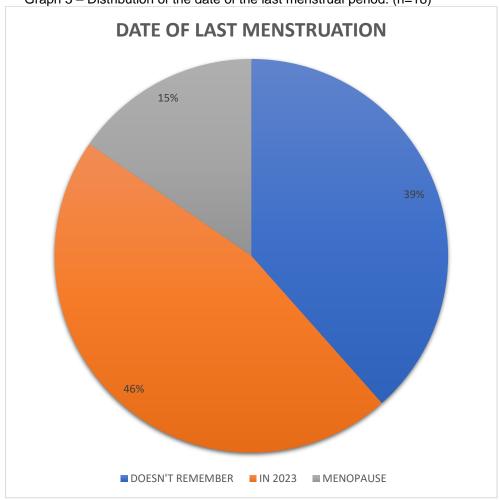


When the natural history of cervical cancer is investigated, it usually presents a long period of precursor, asymptomatic lesions, curable in almost all cases when properly treated, known as cervical intraepithelial neoplasia - CIN II/III, or high-grade lesions, and adenocarcinoma *in situ*. CIN I, on the other hand, represents the cytomorphological expression of a transient infection produced by HPV and has a high probability of regression, and is currently not considered a precursor lesion of cervical cancer. (INCA, 2016)

In 1988, the Ministry of Health held the Consensus Meeting, which was attended by several international and national experts, as well as representatives of scientific societies and various ministerial bodies. From then on, it was defined that in Brazil, the Pap smear test should be performed in women between 25 and 60 years of age, once a year and, after two consecutive negative annual tests, every three years.

This recommendation was based on a study carried out by IARC, published in 1986 and involving eight countries. This study, which served as the basis for a set of standards currently in force in the world, demonstrated that, in women between 35 and 64 years of age, after a negative cervical Pap smear, the subsequent test can be performed every three years, with similar efficacy to the annual test. This allowed the creation of models that estimated, after a negative cytopathological test and 100% coverage, a percentage reduction in the cumulative incidence of invasive cervical cancer of 93.5% for intervals of up to one year between cytopathological tests. For intervals of up to three years between exams, the estimated reduction is 90.8%, with high evidence. (INCA, 2016)





Graph 3 – Distribution of the date of the last menstrual period. (n=18)

Among the previous recommendations for Pap smear collection, the Ministry of Health (2013) mentions that the test should not be done during the menstrual period, as the presence of blood can impair the cytopathological diagnosis. You should wait for the fifth day after the end of menstruation.

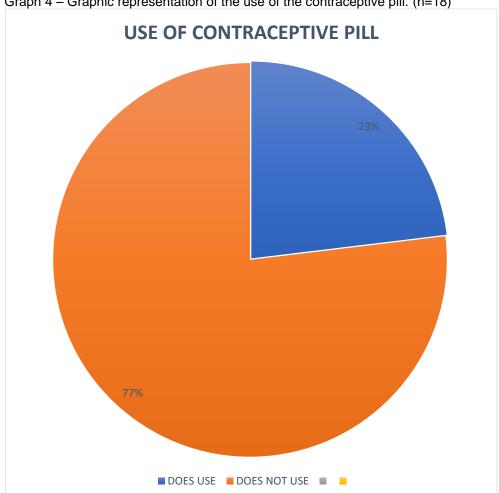
In addition, the use of lubricants, spermicides or vaginal medications should be avoided for 48 hours before collection, since such substances cover the cellular elements, making microscopic evaluation difficult, impairing the quality of the sample for cytopathological examination.

Also, intravaginal exams, such as ultrasound, must be scheduled within 48 hours prior to collection, due to the gel used for the introduction of the transducer.

Although usual, the recommendation of sexual abstinence prior to the test is only justified when condoms with lubricant or spermicides are used. In the cytopathological



analysis, the presence of spermatozoa does not compromise the microscopic evaluation. (Brazil, 2013).



Graph 4 – Graphic representation of the use of the contraceptive pill. (n=18)

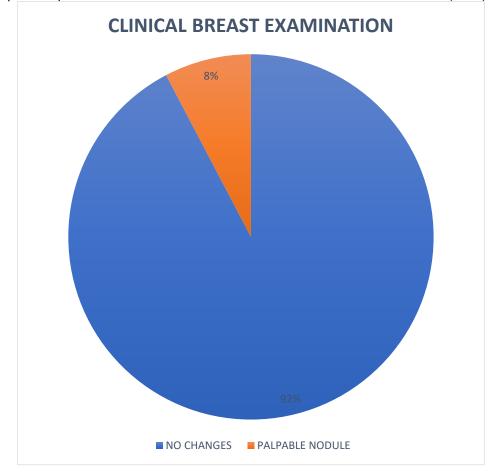
In Brazil, with the fall in the birth rate, which began in the 1960s, the expectation is that the population will reach its maximum in 2035, reaching 225.3 million inhabitants, and begin its decline in absolute terms from then on. (FINOTTI, 2015)

Analyzing the prevalence of contraceptive methods, according to the Ministry of Health, based on the National Household Survey (PNDS, 2006), among women who regulate fertility, most use modern contraceptive methods, with 29% of women currently married (married or not) being sterilized, 21% using pills, 6% using male condoms, 5% having a vasectomized partner, and only 3% using traditional methods (such as periodic abstinence/schedule and coitus interrupted). (USP, 2021)

With regard to information on contraceptive methods, several studies have shown that this knowledge is practically everyone's, although not all women know all the



methods or know much about each of them. The male condom and the pill are the most cited methods, reaching figures above 70%, although condoms are not among the most used. (FINOTTI, 2015)



Graph 5 – Graphical representation of the results found in the clinical breast examination (MCS). (n=18)

ECM is seen as a good option for screening when compared to mammography, in cases in which breast cancer is mostly advanced, this is due to its possible effect of early detection of palpable lesions and, consequently, reducing the stage of the disease at the time of diagnosis (*down-staging*) (INCA, 2015).

Some studies point to an increase of between 5% and 7% in the possibility of detecting breast cancer cases when screening is performed through ECM in conjunction with mammography, and this has also been an argument currently presented in defense of the adoption of this type of exam. (INCA, 2015)

The early diagnosis of breast cancer in the routine of Basic Health Units is essential to reduce the high rates of advanced disease in the country, and the confirmation of the presence of disease is carried out through cytohistological



examinations. In this sense, the association of clinical examination with imaging tests and cytology or histology allows the diagnosis of the presence or absence of breast cancer. This "diagnostic tripod" has a high probability (99%) when clinical examination, imaging and cytohistology are positive for malignancy. (FIOCRUZ, 2018)

For women aged 40 to 49 years, the Brazilian recommendation is the annual clinical examination and diagnostic mammography in case of altered results. For women aged 50 to 59 years, it is necessary to have a mammogram every 2 years and an annual clinical breast examination (Brasil, 2013)

Regarding the orientations provided for health education on Sexually Transmitted Infections, it was observed that most of the participants had previous knowledge related to the main diseases and/or those that most affect the population. Thus, among the strategies used, it was chosen to encourage the performance and dissemination of rapid tests for early detection.

In addition to speed, rapid tests are allies of populations living in hard-to-reach places. Because they do not require a laboratory structure like other standard tests, rapid tests cover a larger number of people, allowing the diagnosis and treatment of individuals who would otherwise not be diagnosed. (Barth, 2018)

For all these reasons, rapid tests have become fundamental for the diagnosis of diseases, with the consequent decrease in their transmission and also in the number of aggravating factors and mortality, thus having a great impact on Public Health. (Barth, 2018)

FINAL CONSIDERATIONS

Among others, the development of the present study provided the opportunity to contribute to Health Education on the use of condoms and the performance of rapid tests for the prevention of STIs. In addition, it provided clarification on the importance of self-care about the main clinical signs and symptoms of breast cancer, through the practice of observation and palpation, in the context of knowing one's own body, with the aim of making women more aware of the normal appearance of their breasts and the warning signs, as it is believed that even in countries with screening programs with large coverage, More than 75% of breast cancer patients initially present with signs and symptoms.



In this scenario, it is important that the entire health team understands and assumes responsibility for changing the panorama of high mortality caused by the various types of cancer and, therefore, students in professional training should be prepared through curricular structures, which allow the acquisition of knowledge and the development of skills and attitudes to improve welcoming, techniques and procedures for the prevention of breast and cervical cancer.



REFERENCES

- 1. Barth, P. O., & Beck, S. T. (2018). Importância da implantação de testes rápidos para o diagnóstico de doenças com impacto na saúde pública. Disciplinarum Scientia. Série: Ciências da Saúde, Santa Maria, [s. l.], 30 maio 2018.
- Brasil, Ministério da Saúde. (2023). Aids: O que é, causas, sintomas, diagnóstico, tratamento e prevenção. Portal gov.br. Disponível em: https://www.gov.br/saude/pt-br/assuntos/saude-de-a-a-z/a/aids-hiv. Acesso em: 6 mar. 2023.
- 3. Brasil, Ministério da Saúde. (2013). Controle dos cânceres do colo do útero e da mama. Caderno de Atenção Básica nº13. Biblioteca Virtual em Saúde do Ministério da Saúde. Disponível em: https://bvsms.saude.gov.br/bvs/publicacoes/controle_cancer_colo_utero_mama.p df. Acesso em: 27 fev. 2023.
- 4. Brasil, Ministério da Saúde. (2024). Hepatite B. Disponível em: https://www.gov.br/saude/pt-br/assuntos/saude-de-a-a-z/h/hepatites-virais/hepatite-b. Acesso em: 02 set. 2024.
- 5. Brasil, Ministério da Saúde. (2024). Hepatite C. Disponível em: https://www.gov.br/saude/pt-br/assuntos/saude-de-a-a-z/h/hepatites-virais/hepatite-c. Acesso em: 02 set. 2024.
- Brasil, Ministério da Saúde. Secretaria de Vigilância em Saúde, Departamento de Vigilância Epidemiológica. (2005). A, B, C, D, E de hepatites para comunicadores (Série F. Comunicação e Educação em Saúde). Ministério da Saúde. ISBN 85-334-1012-3.
- Finotti, M. (2015). Manual de anticoncepção. Federação Brasileira das Associações de Ginecologia e Obstetrícia (FEBRASGO). Disponível em: https://central3.to.gov.br/arquivo/494569/. Acesso em: 31 ago. 2024.
- 8. Fiocruz: Fundação Oswaldo Cruz. (2024). Câncer de mama: do exame clínico ao exame de imagem. Disponível em: https://portaldeboaspraticas.iff.fiocruz.br/atencao-mulher/cancer-de-mama-do-exame-clinico-ao-exame-de-imagem/. Acesso em: 01 set. 2024.
- Governo Federal. (2022). Calendário Nacional de Vacinação do Adolescente. In E. P. Passos (Org.), Calendário Nacional de Vacinação do Adolescente (anexo). Disponível em: https://www.gov.br/saude/pt-br/assuntos/saude-de-a-a-z/c/calendario-nacional-de-vacinacao/calendario-vacinal-2022/anexo-calendario-de-vacinacao-do-adolescente_atualizado_-final-20-09-2022-copia.pdf. Acesso em: 27 fev. 2023.
- 10. INCA. Instituto Nacional de Câncer José Alencar Gomes da Silva. (2020). Dieta, nutrição, atividade física e câncer: uma perspectiva global: um resumo do terceiro relatório de especialistas com uma perspectiva brasileira. Rio de Janeiro: INCA.



- 11. INCA. Instituto Nacional de Câncer José Alencar Gomes da Silva. (2016). Diretrizes brasileiras para o rastreamento do câncer do colo do útero (2. ed. rev. atual). Coordenação de Prevenção e Vigilância, Divisão de Detecção Precoce e Apoio à Organização de Rede. Rio de Janeiro: INCA. ISBN 978-85-7318-296-5. Disponível em: https://www.inca.gov.br/publicacoes/livros/diretrizes-brasileiras-para-o-rastreamento-do-cancer-do-colo-do-utero. Acesso em: 31 ago. 2024.
- 12. INCA. Instituto Nacional de Câncer José Alencar Gomes da Silva. (2015). Diretrizes para a detecção precoce do câncer de mama no Brasil. Rio de Janeiro: INCA. ISBN 978-85-7318-274-3. Disponível em: https://www.inca.gov.br/sites/ufu.sti.inca.local/files//media/document//diretrizes_de teccao_precoce_cancer_mama_brasil.pdf. Acesso em: 31 ago. 2024.
- Kumar, V. (2018). Robbins Patologia Básica. Grupo GEN. E-book. ISBN 9788595151895. Disponível em: https://integrada.minhabiblioteca.com.br/#/books/9788595151895/. Acesso em: 06 mar. 2023.
- 14. Passos, E. P. (Org.). (2017). Rotinas em Ginecologia (7. ed. rev. e atual). Artmed.
- 15. USP. Universidade de São Paulo. (2021). Métodos contraceptivos: um panorama sobre o acesso e utilização pelas mulheres no Sistema Único de Saúde. Biblioteca Digital de Trabalhos Acadêmicos da USP. [s. l.].