

Use of condoms and lubricants during the COVID-19 pandemic

Uso de condones y lubricantes durante la pandemia de COVID-19

Utilização de preservativos e lubrificantes durante a pandemia por COVID-19

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Abstract

This study aimed to assess condom and lubricant use during the COVID-19 pandemic and related factors. An online questionnaire was distributed to the target population, comprising individuals of both sexes aged 18 and over. Statistical analysis included descriptive and inferential analyses. Spearman's and chi-square tests were used with a significance level of 0.05. Of the 510 participants, 71.0% used contraceptives regularly. The male condom (55.1%) and the pill (37.9%) were the most used methods. 12.9% used condoms more frequently, and 23.5% used lubricants more frequently during the pandemic. There were no significant differences between sex, education level, sexual orientation, and the number of condoms and lubricants used per month, but there was a statistically significant difference concerning age ($p < 0.05$). Condom use was higher among younger individuals up to 25 years of age. It is important to evaluate the consumption of condoms and lubricants among the younger population to better understand and raise awareness among this population to adopt best practices for preventing STIs and protecting sexual and reproductive health.

Descriptors: Consumption; COVID-19; Lubricants; Condoms; Prevention.

Resumen

El objetivo de este estudio fue evaluar el uso de condones y lubricantes durante la pandemia de COVID-19 y los factores relacionados. Se distribuyó un cuestionario en línea a la población objetivo de personas de ambos sexos, mayores de 18 años. El análisis estadístico incluyó análisis descriptivos e inferenciales. Se utilizaron las pruebas de Spearman y chi-cuadrado con un nivel de significancia de 0,05. De los 510 participantes, el 71,0% usaba anticonceptivos regularmente. El condón masculino (55,1%) y la píldora (37,9%) fueron los métodos más utilizados. El 12,9% usó condones con mayor frecuencia y el 23,5% usó lubricantes con mayor frecuencia durante la pandemia. No hubo diferencias significativas entre sexo, nivel de educación, orientación sexual y el número de condones y lubricantes utilizados por mes, pero hubo una diferencia estadísticamente significativa en relación con la edad ($p < 0,05$). El uso del condón fue mayor entre las personas más jóvenes de hasta 25 años de edad. Es importante evaluar el consumo de condones y lubricantes entre la población más joven para comprender mejor y concientizar a esta población para que adopte mejores prácticas para prevenir las ITS y proteger la salud sexual y reproductiva.

Descriptores: Consumo; COVID-19; Lubricantes; Preservativos; Prevención.

Resumo

Objetivou-se avaliar o consumo de preservativos e lubrificantes durante a pandemia por COVID-19 e fatores relacionados. Foi divulgado um questionário online à população-alvo de indivíduos, de ambos os sexos, com idade igual ou superior a 18 anos. A análise estatística incluiu a análise descritiva e inferencial. Foram utilizados os testes de Spearman e Qui-quadrado com um nível de significância de 0,05. Dos 510 participantes, 71,0% utilizavam contraceptivos regularmente. O preservativo masculino (55,1%) e a pílula (37,9%) foram os métodos mais utilizados. 12,9% usaram mais preservativos e 23,5% usaram mais lubrificantes durante a pandemia. Não se registaram diferenças significativas entre o sexo, o nível de escolaridade, a orientação sexual e o número de preservativos e lubrificantes consumidos por mês, mas houve uma diferença estatisticamente significativa em relação à idade ($p < 0,05$). O consumo de preservativos foi maior entre mais jovens até aos 25 anos. É importante avaliar o consumo de preservativos e lubrificantes, na população mais jovem, para melhor compreender e sensibilizar esta população a adotar melhores práticas para a prevenção de IST e proteger a saúde sexual e reprodutiva.

Descritores: Consumo; COVID-19; Lubrificantes; Preservativos; Prevenção.



Introduction

During the coronavirus disease 2019 (COVID-19) pandemic, social distancing and self-isolation forced changes in human behavior and relationships. Although the goal was to save lives, many people suffered from anxiety, depression, panic, and other physiological and psychological changes that also resulted in changes in sexual activity^{1,2}. Social distancing and reducing close contact have been effective policies in containing the spread of the disease, both in monogamous and non-monogamous relationships^{3,4}. More research is needed to understand the impact of the pandemic on sexual health⁵⁻⁷, but some studies show that COVID-19-related restrictions were linked to higher rates of sexual dysfunction and reduced sexual activity.

Contraceptive use varies globally, with different methods employed in various regions. The male condom is a readily available method for preventing unwanted pregnancy and sexually transmitted infections (STIs), including HIV. Despite being safe, affordable, and widely available, its use continues to face resistance from both men and women⁸.

Lubricants are widely used to enhance sexual pleasure, reduce pain during intercourse, and facilitate the use of condoms and sex toys⁹. Using lubricants with condoms can make sex satisfying and effective, whether vaginal or anal¹⁰. They can also improve sexual health and well-being, especially in people with vaginal dryness or dyspareunia. Lubricants are also used with condoms to reduce breakage, slippage, or falling off, which increases protection against STIs⁹⁻¹⁰. But sociocultural norms, gender dynamics, age, and education influence lubricant preferences and use during sex⁹.

Contraception is crucial for the sexual and reproductive health of all individuals. In 2020, 374 million new STI infections occurred globally among adults aged 15 to 49, with one of four curable STIs: syphilis, chlamydia, gonorrhea, and trichomoniasis. Most of these diseases could be prevented with the correct use of condoms¹⁰.

Although the real impact of COVID-19 is not known, essential health services have been disrupted in 92% of countries, including those related to sexual and reproductive health¹¹, as well as conditioned access to commercial points of sale of lubricants and condoms, this study aimed to evaluate the use and consumption of lubricants and condoms during the COVID-19 pandemic and related factors.

Methodology

In this exploratory, descriptive-correlational study, a questionnaire was developed and distributed online to all individuals of both sexes, aged 18 or older, who used lubricants and condoms and who agreed to participate voluntarily and anonymously in this study and complete the questionnaire. Access to the questionnaire was disseminated through social media and by email to Portuguese Polytechnic Higher Education Institutions. The questionnaire was available from March 21 to May 31, 2022.

Participation in the study and completion of the questionnaire were voluntary and open to all. At the beginning of the questionnaire, the scope and objectives of

the study were explained, along with the estimated time required to complete the questionnaire. The data were safeguarded for academic and research purposes only, as well as participants' right to refuse to complete the questionnaire. Participants' right to confidentiality and anonymity was safeguarded, and no harm was anticipated from participating in the study.

The questionnaire included questions on sociodemographic characteristics (age, gender, sexual orientation, educational and professional status), questions related to contraceptive use, including the use of lubricants and condoms (frequency, reasons, access), and questions on sexual habits, behaviors, and practices, including sexual experience, number of sexual partners, sexual desire, frequency of sexual intercourse, and age at first sexual experience. Questions on individual perceptions of the effectiveness and use of lubricants and condoms were asked using a five-point Likert scale (1 - strongly disagree to 5 - strongly agree).

Data were analyzed using IBM Statistical Package for the Social Sciences (SPSS) version 28.0 for Windows. Statistical analysis included descriptive analysis of the data (frequency, mean, median, standard deviation, minimum, and maximum values). Spearman's and chi-square tests were used for inferential analysis, with a significance level of 0.05.

The study was approved by the Ethics Committee of the principal investigator's Higher Education Institution (CE-IPG Opinion No. 1/2022). Data collection complied with research ethics principles and the General Data Protection Regulation (GDPR). Each participant provided free, informed consent to participate in the study before completing the questionnaire.

Results

Of the 510 individuals who responded to the questionnaire, 55.9% were women. The mean age was 31.09 (SD ± 10.92) years. Over 75% were heterosexual (23.52% were men), 16.9% were homosexual (15.7% were men), and 8.0% were bisexual (4.3% were men). 64.1% had higher education qualifications, and there was a high representation of tertiary sector workers (48.6%) and students (39.2%). The mean age at first sexual experience was 17.50 years (SD = ± 2.72). 60.0% of women were between 16 and 18 years old at the time of their first sexual intercourse (min: 13; max: 29), while almost 60.0% of men had their first sexual intercourse between 14 and 17 years old (min: 11; max: 34). Among homosexuals, 16.9% were under 15 years old at their first sexual experience, 33.7% were between 15 and 16 years old and 22.9% were between 17 and 18 years old. Among bisexuals, 50.0% of individuals had their first sexual intercourse between the ages of 16 and 17. 82.9% of individuals were sexually active, and 16.3% (5.2% of women and 11.4% of men) had more than one sexual partner. 90.9% of heterosexuals (63.5% of women and 27.2% of men), 57.0% of homosexuals (34.9% of women and 53.5% of men), and 68.3% of bisexuals (31.7% of women and 36.6% of men) had had only one sexual partner.

Regarding contraceptive use, 70.6% reported using



some form of contraception during their first sexual experience. When asked whether they regularly used any contraceptive method, 71.0% responded affirmatively, with the male condom (55.1%) and the contraceptive pill (37.9%) being the most used methods, although 21.4% did not use any contraceptive method. Pharmacies (46.5%) and supermarkets (45.9%) were the most popular places to purchase contraceptive methods (Table 1).

Regarding the reasons for using contraceptive

methods, the most frequently mentioned reason was to avoid unwanted pregnancy (59.6%) and prevent infections (STIs) (39.6%). There was clear recognition of the effectiveness of condoms, as over 80% of the sample agreed that condoms are effective in preventing STIs.

When asked whether COVID-19 changed their sexual habits, 40.4% responded affirmatively, mainly regarding the number of times they had sexual intercourse (85.4%) and the change in sexual desire and interest (43.7%).

Table 1. Sexual behaviors, habits, and practices. Guarda, Portugal, 2022

| | Frequency (n) | Percentage (%) |
|--|------------------|-------------------|
| Which contraceptive method(s) do you use regularly? | | |
| Pill | 190 | 37.9 |
| IUD | 19 | 3.8 |
| Vaginal Ring | 3 | 0.6 |
| Implant or Patch | 21 | 4.2 |
| Male Condom | 276 | 55.1 |
| Female Condom | 8 | 1.6 |
| Coitus Withdrawal | 29 | 5.8 |
| Morning-After Pill | 12 | 2.4 |
| Why do you use the contraceptive methods mentioned? | | |
| To prevent an unwanted pregnancy | 304 | 59.6 |
| To prevent infections (STIs) | 202 | 39.6 |
| To feel safe | 148 | 29.0 |
| Because I was advised to use it (by a doctor or other healthcare professional) | 60 | 11.8 |
| Do you use other products during sex? (n = 510) | | |
| Sex Toys | 134 | 26.3 |
| Clothing | 35 | 6.9 |
| Poppers | 33 | 6.5 |
| Where do you usually obtain/buy contraceptive methods? (n = 510) | | |
| Pharmacy | 237 | 46.5 |
| MNSRM Sales Location | 41 | 8.0 |
| Hypermarket/Supermarket | 234 | 45.9 |
| Online Store | 45 | 8.8 |
| Health Center | 88 | 17.3 |

67.1% of heterosexuals said that COVID-19 did not change their habits, while homosexuals (69.5%) and bisexuals (68.3%) said it did.

Regarding the perception of the effectiveness and use of condoms and lubricants, more than 26% agreed or strongly agreed that male condoms are safer than female condoms, and more than 40% reported that condom use reduces sexual pleasure. 70% disagreed or strongly disagreed with using condoms only in new relationships or with new sexual partners. 69.2% strongly disagreed that condoms should be used only between same-sex partners and in certain sexual positions (68.4%). Regarding non-condom users, more than 40% indicated that they did not use them because they felt uncomfortable or because they only had one sexual partner (37.3% strongly agreed). Regarding the use of lubricants, more than 47% agreed or strongly agreed that they increased sexual libido, 64.1% agreed that they improved vaginal sex, and 66.1% that they improved anal sex (Table 2).

Regarding the use of condoms and lubricants

during the pandemic period evaluated, 50.8% of individuals did not use condoms (28.82% of heterosexual women and 12.35% of heterosexual men, 6.47% of homosexuals and 2.94% of bisexuals) and 47.8% did not use lubricants during the COVID-19 pandemic (30% of heterosexual women and 11.76% of heterosexual men, 3.53% of homosexuals and 2.35% of bisexuals).

Among condom users during COVID-19, 22.5% were heterosexual women and 11.2% were heterosexual men, 10.0% were homosexual men, and 5.1% were bisexual men. Among lubricant users, 21.4% were heterosexual women and 11.8% were heterosexual men, 12.9% were homosexual men, and 5.7% were bisexual men. 87.1% no longer used condoms (46.08% of heterosexual women and 19.61% of heterosexual men, 13.92% of homosexual men and 7.26% of bisexual men) and 76.47% no longer used lubricants (43.72% of heterosexual women and 16.86% of heterosexual men, 10.00% of homosexual men and 5.29% of bisexual men) during the pandemic.



| | I totally disagree | | I disagree | | I neither agree nor disagree | | I agree | | I totally agree | | Likert scale | |
|---|--------------------|------|------------|------|------------------------------|------|---------|------|-----------------|------|--------------|-----|
| | n | % | n | % | n | % | n | % | n | % | Mean | SD |
| Regarding condoms, do you consider that... | | | | | | | | | | | | |
| Male condoms are safer than female condoms | 49 | 9.6 | 59 | 11.6 | 263 | 51.6 | 84 | 16.5 | 55 | 10.8 | 3.1 | 1.0 |
| They reduce sexual pleasure | 78 | 15.3 | 98 | 19.2 | 123 | 24.1 | 149 | 29.2 | 62 | 12.2 | 3.0 | 1.3 |
| They should only be used in a new relationship or with new partners | 229 | 44.9 | 128 | 25.1 | 78 | 15.3 | 49 | 9.6 | 26 | 5.1 | 2.1 | 1.2 |
| They should only be used between same-sex partners | 353 | 69.2 | 92 | 18.0 | 49 | 9.6 | 11 | 2.2 | 5 | 1.0 | 1.5 | 0.8 |
| They should only be used in certain sexual positions | 349 | 68.4 | 78 | 15.3 | 63 | 12.4 | 14 | 2.7 | 6 | 1.2 | 1.5 | 0.9 |
| I don't use condoms because | | | | | | | | | | | | |
| I have allergies | 133 | 62.1 | 29 | 13.6 | 28 | 13.1 | 11 | 5.1 | 13 | 6.1 | 1.8 | 1.2 |
| It's uncomfortable | 64 | 30.0 | 23 | 10.8 | 38 | 17.8 | 48 | 22.5 | 40 | 18.8 | 2.9 | 1.5 |
| Because my religion doesn't allow it | 167 | 78.4 | 19 | 8.9 | 24 | 11.3 | 2 | 0.9 | 1 | 0.5 | 1.4 | 0.8 |
| Because I'm too young | 163 | 76.9 | 21 | 9.9 | 27 | 12.7 | 1 | 0.5 | 0 | 0 | 1.4 | 0.7 |
| Because I only have one partner | 64 | 28.4 | 16 | 7.1 | 24 | 10.7 | 37 | 16.4 | 84 | 37.3 | 3.3 | 1.7 |
| Because I don't want to use it | 71 | 32.7 | 10 | 4.6 | 40 | 18.4 | 40 | 18.4 | 56 | 25.8 | 3.0 | 1.6 |
| Regarding lubricants, do you consider that... | | | | | | | | | | | | |
| Increase sexual libido | 21 | 4.1 | 27 | 5.3 | 218 | 42.7 | 177 | 34.7 | 67 | 13.1 | 3.5 | 0.9 |
| Improve vaginal sex | 14 | 2.7 | 12 | 2.4 | 157 | 30.8 | 220 | 43.1 | 107 | 21.0 | 3.8 | 0.9 |
| Improve anal sex | 13 | 2.5 | 10 | 2.0 | 150 | 29.4 | 181 | 35.5 | 156 | 30.6 | 3.9 | 0.9 |
| Improve oral sex | 78 | 15.3 | 84 | 16.5 | 239 | 46.9 | 75 | 14.7 | 34 | 6.7 | 2.8 | 1.1 |
| Improve sexual practices (games, etc.) | 16 | 3.1 | 9 | 1.8 | 139 | 27.3 | 233 | 45.7 | 113 | 22.2 | 3.8 | 0.9 |
| Improve the effectiveness of condoms | 35 | 6.9 | 45 | 8.8 | 234 | 45.9 | 138 | 27.1 | 58 | 11.4 | 3.3 | 1.0 |
| I don't use lubricants because... | | | | | | | | | | | | |
| It's uncomfortable | 71 | 40.3 | 27 | 15.3 | 66 | 37.5 | 10 | 5.7 | 2 | 1.1 | 2.1 | 1.0 |
| I have less pleasure | 64 | 36.8 | 28 | 16.1 | 71 | 40.8 | 6 | 3.4 | 5 | 2.9 | 2.2 | 1.1 |
| Because my religion doesn't allow it | 97 | 55.7 | 21 | 12.1 | 54 | 31.0 | 1 | 0.6 | 1 | 0.6 | 1.8 | 0.9 |
| Because I'm too young | 92 | 52.9 | 26 | 14.9 | 54 | 31.0 | 2 | 1.1 | 0 | 0 | 1.8 | 0.9 |
| Because I only have one partner | 83 | 47.4 | 22 | 12.6 | 57 | 32.6 | 6 | 3.4 | 7 | 4.0 | 2.0 | 1.1 |
| Because I don't want to use it | 33 | 17.2 | 14 | 7.3 | 56 | 29.2 | 38 | 19.8 | 51 | 26.6 | 3.3 | 1.4 |

Table 2. Perceived effectiveness of condoms and lubricants. Guarda, Portugal, 2022



Although less significant, it is important to note that 12.9% responded that they used more condoms (5.3% of heterosexual women and 3.9% of heterosexual men, 2.5% of homosexual men and 0.8% of bisexual men) and 23.5% more lubricants during the COVID-19 pandemic (7.7% of heterosexual women and 6.7% of heterosexual men, 6.3% of homosexual men and 2.7% of bisexual men).

69.4% used less than one pack of condoms per month (32.5% of all women and 36.4% of all men) and 71.2% used less than one pack of lubricant per month (32.7% of women; 34.0% of men). 13.7% of homosexuals and 5.9% of bisexuals used less than one pack of condoms per month,

and 13.6% of homosexuals and 5.5% of bisexuals used less than one pack of lubricant per month.

There were no statistically significant differences between sex, educational level, sexual orientation, and the number of condom packs consumed per month ($p \geq 0.05$), even for those who had more than one sexual partner (Table 3). There was a statistically significant difference between the average consumption of condom packs per month and age ($p < 0.05$), as consumption was significantly higher in the younger age group (up to 25 years). There were also no differences between sex, age, educational level, and sexual orientation in the consumption of lubricant packs per month (Table 4).

Table 3. Monthly condom consumption by sex, age, educational level, and sexual orientation during the COVID-19 pandemic. Guarda, Portugal, 2022

| | Less than 1 | | 1 to 3 | | 4 to 6 | | More than 6 | | P* |
|--|-------------|------|--------|------|--------|-----|-------------|-----|-------|
| | n | % | n | % | n | % | n | % | |
| Sex | | | | | | | | | |
| Feminine | 149 | 70.3 | 56 | 26.4 | 5 | 2.4 | 2 | 0.9 | 0.445 |
| Masculine | 133 | 68.6 | 49 | 25.3 | 6 | 3.1 | 6 | 3.1 | |
| Age | | | | | | | | | |
| Up to 25 years | 102 | 58.6 | 60 | 34.5 | 6 | 3.4 | 6 | 3.4 | <0.05 |
| 26 to 49 years | 162 | 77.9 | 38 | 18.3 | 5 | 2.4 | 3 | 1.4 | |
| 50 years or older | 20 | 74.1 | 7 | 25.9 | 0 | 0 | 0 | 0 | |
| Educational qualifications | | | | | | | | | |
| EB3 (3rd Cycle of Basic Education: 7th, 8th, and 9th grades) | 8 | 80.0 | 1 | 10.0 | 1 | 10 | 0 | 0 | 0.147 |
| Secondary Education (10th, 11th, and 12th grades) | 91 | 65.0 | 39 | 27.9 | 3 | 2.1 | 7 | 5.0 | |
| Bachelor's Degree | 121 | 68.4 | 48 | 27.1 | 7 | 4 | 1 | 0.6 | |
| Master's Degree | 51 | 76.1 | 15 | 22.4 | 0 | 0 | 1 | 1.5 | |
| Doctorate | 12 | 85.7 | 2 | 14.3 | 0 | 0 | 0 | 0 | |
| Sexual orientation | | | | | | | | | |
| Heterosexual | 203 | 68.8 | 78 | 26.4 | 8 | 2.7 | 6 | 2 | 0.782 |
| Homosexual | 57 | 73.1 | 16 | 20.5 | 2 | 2.6 | 3 | 3.8 | |
| Bisexual | 24 | 66.7 | 11 | 30.6 | 1 | 2.8 | 0 | 0 | |

Table 4. Monthly consumption of lubricant packaging by gender, age, educational qualifications, and sexual orientation during the COVID-19 pandemic. Guarda, Portugal, 2022

| | Less than 1 | | 1 to 3 | | 4 to 6 | | More than 6 | | P* |
|--|-------------|-------|--------|------|--------|------|-------------|-----|-------|
| | n | % | n | % | n | % | n | % | |
| Sex | | | | | | | | | |
| Feminine | 140 | 76.1 | 32 | 17.4 | 10 | 5.4 | 2 | 1.1 | 0.198 |
| Masculine | 130 | 66.7 | 43 | 22.1 | 19 | 9.7 | 3 | 1.5 | |
| Age | | | | | | | | | |
| Up to 25 years | 108 | 73.0 | 27 | 18.2 | 11 | 7.4 | 2 | 1.4 | 0.908 |
| 26 to 49 years | 144 | 68.9 | 44 | 21.1 | 17 | 8.1 | 4 | 1.9 | |
| 50 years or older | 20 | 80.0 | 4 | 16.0 | 1 | 4.0 | 0 | 0 | |
| Educational qualifications | | | | | | | | | |
| EB3 (3rd Cycle of Basic Education: 7th, 8th, and 9th grades) | 5 | 32.5 | 3 | 37.5 | 0 | 0 | 0 | 0 | 0.673 |
| Secondary Education (10th, 11th, and 12th grades) | 95 | 71.4 | 25 | 18.8 | 11 | 8.3 | 2 | 1.5 | |
| Bachelor's Degree | 108 | 67.5 | 35 | 21.9 | 14 | 8.8 | 3 | 1.9 | |
| Master's Degree | 49 | 74.2 | 12 | 18.2 | 4 | 6.1 | 1 | 1.5 | |
| Doctorate | 14 | 100.0 | 0 | 0 | 0 | 0 | 0 | 0 | |
| Sexual orientation | | | | | | | | | |
| Heterosexual | 198 | 74.7 | 49 | 18.5 | 15 | 5.7 | 3 | 1.1 | 0.094 |
| Homosexual | 53 | 65.4 | 16 | 19.8 | 9 | 11.1 | 3 | 3.7 | |
| Bisexual | 21 | 58.3 | 10 | 27.8 | 5 | 13.9 | 0 | 0 | |

Discussion

The objective of this study was to evaluate the use of condoms and lubricants during the COVID-19 pandemic. A previous assessment by this research group of condom and lubricant sales in Portugal in 2020, compared to 2021 and 2022, revealed a decrease in condom and lubricant sales after the first lockdown, both in pharmacies and over the counter. However, several studies reported that condom access difficulties were less than 9%¹²⁻¹³. Erasquin et al¹³ reported that condomless sex was similar during COVID-19 and before COVID-19. Chen et al¹⁴, in their study of undergraduate and graduate students during COVID-19, found that students maintained access to their preferred contraceptive methods during the COVID-19 pandemic.

In our study, 70.6% reported using some form of contraception during their first sexual experience, and 55.1% regularly used condoms. Some risky sexual behaviors were identified, including having multiple or different partners, early age at first sexual intercourse, and 21.4% of individuals engaging in sex without a condom or any other contraceptive method, despite the perceived effectiveness of condoms and lubricants. Over 40% reported that the COVID-19 pandemic changed their habits, most of which related to the number of times they had sex and sexual desire. Most of these changes were identified by homosexual and bisexual individuals. In the first year of the pandemic, several studies reported a decrease in sexual activity and sexual desire^{1,4,15-16}, but Ellakany et al¹⁷ reported a significant increase in sexual activity among students compared to non-students. In this study, 12.9% used more condoms and 23.5% used more lubricants during the COVID-19 pandemic. Kennedy et al¹⁸ highlighted that the reasons for using lubricants included greater comfort, reduced dryness, pain and discomfort, increased sexual pleasure (for oneself or one's partner), partner preference, ease in reaching orgasm, among other benefits. Qaderi et al¹⁵

highlighted that the most indicative changes in sexual behavior during the pandemic were the increase in masturbation and the use of sex toys, which may explain the use of lubricants during the pandemic.

The limitations primarily center on the sample size and the dissemination of the questionnaire, although the intended objectives were achieved. Given the scarcity of available data on condom and lubricant use during the COVID-19 pandemic, and globally, among younger populations, it is expected that these results may contribute to the need for more and better practices related to sexual and reproductive health and raise awareness among healthcare professionals and individuals about the importance of counseling and the regular and appropriate use of these medical devices.

Conclusion

In conclusion, this study provides valuable information related to condom and lubricant use and sexual habits during the COVID-19 pandemic among young Portuguese individuals. The benefits of condom and lubricant use were highlighted, although more than half did not use condoms during sexual intercourse. Assessing condom and lubricant use, focusing on the younger population, is important for better understanding sexual habits, practices, and behaviors to better define STI prevention strategies, safer sex practices, and improve sexual and reproductive health. Health professionals play a crucial role in providing accurate information, guidance, and support to individuals regarding sexual and reproductive health, and their contraceptive and sexual protection options and preferences.

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