



RELATIONSHIP BETWEEN THE APPROVAL OF THE ADOPTION OF CHILDREN BY HOMOSEXUALS AND THE ATTITUDE TOWARDS HOMOSEXUALITY AMONG MEDICAL STUDENTS AND GRADUATES

RELACIÓN ENTRE LA APROBACIÓN DE LA ADOPCIÓN DE HIJOS POR HOMOSEXUALES Y LA ACTITUD FRENTE A LA HOMOSEXUALIDAD EN ESTUDIANTES Y EGRESADOS DE MEDICINA

Marco Antonio Tipula Mamani^{1,a}, Lincol Marx Cruz Aquino^{2,a}, María Isabel Vásquez Suyo^{3,c}
Maritza Dorila Placencia Medina^{4,d}

ABSTRACT

Introduction: Due to changes in the composition of the family and society, the adoption of children by homosexuals is becoming more frequent. It has been found that opposition to this request is often related to homophobia. In Peru there are no studies on these aspects. **Objectives:** To determine the correlation between adoption approval and attitude towards homosexuality in medical students and graduates, Lima, Peru. **Methods:** The observational and cross-sectional study was carried out. 205 people over 21 years of age participated. The Attitude Toward Homosexuality Scale (EAH-10) was used and the question "Should homosexual couples be allowed to adopt children like heterosexual couples?". The relationships were made with the Pearson (r) and Spearman (rs) correlation coefficient. **Results:** Quantitatively, a negative and significant correlation was found between the response with the attitude towards homosexuality ($r = -0.727$; $rs = -0.718$) and a positive and significant correlation with the number of homosexual friends ($r = 0.402$; $rs = 0.399$). 57.6% indicated approval of the question posed. Greater intolerance attitudes were found in men than in women ($r = 0.328$; $p = 0.000$). A multiple linear regression model showed that attitude towards homosexuality, sex, and number of homosexual friends are good predictors of acceptance of homosexual adoption. **Conclusions:** The response was significantly correlated with attitudes of homophobia and with the number of homosexual friends. Furthermore, homophobic attitudes were higher in men.

Key words: Homosexuality; Adoption; Homophobia; Medicine students; Peru (source: MeSH NLM).

RESUMEN

Introducción: Debido a los cambios en la composición de la familia y la sociedad, la adopción de hijos por homosexuales se está haciendo más frecuente. Se ha encontrado que la oposición a esta solicitud suele relacionarse a homofobia. En el Perú no existen estudios sobre estos aspectos. **Objetivos:** Determinar la correlación entre la aprobación de la adopción y la actitud frente a la homosexualidad en estudiantes y egresados de medicina, Lima, Perú. **Métodos:** Se realizó el estudio observacional y transversal. Participaron 205 personas mayores de 21 años. Se empleó la Escala de Actitud hacia la Homosexualidad (EAH-10) y la pregunta "¿A las parejas homosexuales debería permitírseles adoptar hijos como a las parejas heterosexuales?". Las relaciones se realizaron con el coeficiente de correlación de Pearson (r) y Spearman (rs). **Resultados:** Cuantitativamente, se encontró correlación negativa y significativa entre la respuesta con la actitud hacia la homosexualidad ($r = -0,727$; $rs = -0,718$) y una correlación positiva y significativa con el número de amistades homosexuales ($r = 0,402$; $rs = 0,399$). El 57,6% indicó aprobación a la pregunta planteada. Se encontró actitudes de intolerancia mayores en varones que en mujeres ($r = 0,328$; $p = 0,000$). Un modelo de regresión lineal múltiple mostró que la actitud hacia la homosexualidad, sexo y número de amistades homosexuales son buenos predictores de la aceptación de adopción homosexual. **Conclusión:** La respuesta se correlacionó significativamente con actitudes de homofobia y con el número de amistades homosexuales. Además, las actitudes homofóbicas fueron mayores en los varones.

Palabras clave: Homosexualidad; Adopción; Homofobia; Estudiantes de Medicina; Perú (fuente: DeCS BIREME).

¹ Grupo de investigación "Educación Médica". Facultad de Medicina, Universidad Nacional Mayor de San Marcos, Lima, Perú.

^a Medical surgeon.

^b Master's in Occupational Health.

^c Specialist in Psychiatry.

^d Doctor in Pharmacy and Biochemistry.

Cite as: Marco Antonio Tipula Mamani, Lincol Marx Cruz Aquino, María Isabel Vásquez Suyo, Maritza Dorila Placencia Medina. Relationship between the approval of the adoption of children by homosexuals and the attitude towards homosexuality among medical students and graduates. Rev. Fac. Med. Hum. October 2021; 21(4):748-757. DOI 10.25176/RFMH.v21i4.3817

Journal home page: <http://revistas.urp.edu.pe/index.php/RFMH>

Article published by the Magazine of the Faculty of Human Medicine of the Ricardo Palma University. It is an open access article, distributed under the terms of the Creative Commons License: Creative Commons Attribution 4.0 International, CC BY 4.0 (<https://creativecommons.org/licenses/by/4.0/>), that allows non-commercial use, distribution and reproduction in any medium, provided that the original work is duly cited. For commercial use, please contact revista.medicina@urp.edu.pe





INTRODUCTION

Adoption by homosexual couples is a controversial topic in multiple countries and causes intense and antagonistic reactions. The adoption request by these couples has been more frequent over the years due to changes in the composition of families, as well as the society in which it is developed, and, nowadays, it is evident that its ways have changed and do not adjust to the classical family model⁽¹⁻³⁾. The development of biotechnology has influenced the appearance of these changes⁽⁴⁾. Furthermore, the parental capabilities have been debated and the possible psychosocial effects in children raised in the same home by non-heterosexual parents. The majority of studies have shown similar effects with respect to this form of parenting, others with negative results and in some positive effects⁽⁵⁻⁸⁾. On the other hand, part of the opposition in the adoption by homosexuals has heterosexism or traditional heterocentrism as its base which suggests that the only form of admissible families is the model of Greco-Latin and Judeo-Christian tradition⁽⁹⁾. We know the way of becoming parents has changed over time in accordance with social and technological adjustments. However, the purpose of parenthood has remained untouched, which is based on nurturing children with necessary affection, and, therefore, allow that they be completely prepared to function in society as adults⁽¹⁰⁾. Currently, sexual prejudice, discrimination, and exclusion against homosexuals exists in various forms in different social classes. Therefore, the mentioned heterosexism, homophobic fears, oppression, and general stigma, which surround homosexuals who choose to adopt children, are relevant contemporary issues in several countries because these factors tend to hinder said decision^(11,12). Literature on adoption rights refers that the protection of abandoned childhood represents the greatest interest, and this should guide the decisions on this issue⁽¹³⁾. Multiple studies, foreign and national, in students and health professionals have shown important percentages on attitudes of intolerance towards homosexuality⁽¹⁴⁻¹⁷⁾. This is a reason for concern because doctors, among other professionals, have the responsibility, when the authority requires it, of establishing the physical and mental adequacy of the adopter⁽¹⁸⁾. Also, many people are prone to express disagreement beforehand regarding the adoption of minors by homosexuals and this could be related to some form of homophobia⁽¹⁰⁾ as was evidenced in a study performed in Colombia among medical students⁽⁹⁾.

In Peru, sexual minorities, characterized by high conservatism, exist in which the right to a homosexual partnership or marriage have not been acknowledged and neither has the adoption of children by same, given that a large sector of the population, fundamentally religious, rejects these applications⁽¹⁹⁾. It is known that their rights have been accepted in several countries, globally and regionally, in accordance with literature that refers significant differences do not exist in the parenting of children by heterosexual or homosexual couples, and that the conditions described in some studies are due to external causes, such as social stereotypes and prejudice, derived from the relationships with the community prior to those within the family⁽²⁰⁻²²⁾. The general objective of our study was to determine the correlation between acceptance of adoption with the attitude towards homosexuality, and as secondary objectives, the frequency of adoption acceptance, relationships between the first two mentioned variables with the religious attitude and some sociodemographic variables.

METHODS

Study design and population

An observational, cross-sectional and analytical study was carried out.

Population and sample

The population consisted of students (6th year and 7th year) and graduates without / with SERUMS (Rural and Urban Marginal Health Service), calling themselves non-serumist or serumist graduates, from the School of Human Medicine of the National University of San Marcos (UNMSM) located in Lima, Peru. A probability sampling was carried out. Due to the considerations of social confinement due to the health emergency, the statistical formula for a finite population of 600 people was used, with a confidence level of 92% and a margin of error of 5%. By simple random sampling, 204 people were calculated. The students who were taking the complete curriculum for the academic year 2020, for the aforementioned years, of the Human Medicine school of the UNMSM and the students or graduates who accepted their participation were included (digitally described at the beginning of the survey). Students who were in other academic years and doctors who had already completed the SERUMS were excluded. The sample collected was composed of 206 respondents between students and graduates (one survey was incompletely filled out, which was

eliminated). Finally, the sample was made up of 205 participants.

Variables and instruments

The survey was structured in the following manner:

Sociodemographic data

Sex, age, "do you practice a religion?" and number of known close people that are homosexuals (homosexual friends).

Attitude towards Homosexuality Scale with ten reactants (EAH-10)

Made-up of 10 items with the option of Likert answer (1, totally in disagreement to 5, totally in agreement). The total score ranges from 10 to 50. It was considered as Tolerant attitude (≤ 18 points), Indifferent (19-27), and Intolerant or homophobic (≥ 28 points)⁽¹⁵⁾. In a sample of 400 Mexican students, a high internal consistency was calculated (alfa de Cronbach = 0,87)⁽²³⁾.

Francis brief scale on attitude towards Christianity (Francis-5)

This scale quantifies the attitude on religion, and a pattern of polytomous Likert-type answers with five answer options were presented, from "completely disagree" to "completely agree". Each answer receives zero and four, respectively. The total score is between 0 and 20, the higher the score obtained, the more positive attitude towards Christianity⁽²⁴⁾. In a sample of 365 Colombian medical students, we found a high internal consistency (Cronbach's alpha = 0.96)⁽²⁵⁾.

Question: "Should homosexual couples be allowed to adopt children same as heterosexual couples?" from the Attitude towards Lesbians and Gay Men Scale (ATLG) with five Likert-type answer options (1, totally disagree to 5, totally agree)⁽²⁶⁾.

Procedures

Once the project by the Escuela Académica de Medicina and the Comité de Ética de Investigación was approved, we contacted the current general delegates from 4 years (6th, 7th, graduate non-serumista and graduate serumista), requesting their support by posting the survey in virtual official groups in WhatsApp or Facebook for each year. A survey was developed using a virtual tool Google Forms to fill out online between the months of June and July, putting the informed consent before the beginning of its development. The registered data

were sent and registered in the Microsoft Excel 2019 version software.

Data analysis

The data obtained was analyzed with the statistical program IBM-SPSS version 25 and Stata 16.2. A descriptive, bivariate and multivariate analysis was performed. Frequencies, percentages, median and standard deviation (SD) were found for quantitative variables and proportions for qualitative variables. We compared the median and SD for individual groups with the Student t-test. The bivariate correlations were carried out with the Pearson (r) and Spearman (rs) coefficients for the parametric and non-parametric numerical variables, respectively. A significant correlation was established with the values greater than 0.300 and probabilities (p) lower than 0.05⁽⁹⁾. The multivariate analysis was performed with a multiple linear regression model. The confidence for both scales was evaluated with the Cronbach's Alpha coefficient (α).

Ethical considerations

The study was carried out in consonance with the Declaration of Helsinki and was approved by the Comité de Ética de Investigación de la Universidad San Marcos with the act number 20-0025. Participation was voluntary, anonymous and it did not imply risk for any participant.

RESULTS

Of 205 people that participated, among students and graduates, there is a similar quantity among women and men. With respect to age, 73.6% (n = 151) are between 24 and 30 years of age, in relation to those who know someone homosexual, the majority 44.4% (n = 91) refer that know between one and two homosexuals. The other sociodemographic data can be observed in Table 1.

With Francis brief scale, we obtained a total score between 0 and 20, a median of 11.78 (DE = 6,977) and Cronbach's alpha of 0.984 with CI 92% (0.98129639 - 0.98391649). With the scale of attitude towards homosexuality, the scores varied between 10 and 50, the median was 18.03 (DE = 7,920), and Cronbach's alpha was 0.906 with CI 92% (0.89181046 - 0.90605005). 13,2% (n = 27), 25,4% (n = 52) and 61,5% (n = 126) showed scores for homophobic, indifferent and tolerant attitude, respectively. The sample's capacity was calculated from the Pearson



coefficients for both scales (EAH-10 and Francis-5), whose powers surpassed 99.9%, since 40 and 142 surveyed, respectively, was enough. Regarding the question "Should homosexual couples be allowed to adopt children same as heterosexual couples?"; 57,6% (n = 118) indicated approval (between agree and very much agree) to the possibility of adoption. The other answer percentages are shown in Table 2.

With the Student t-test in relation to sex, the median and standard deviations were compared for both scales (EAH and Francis Scale), whose results were significant, which are shown on Table 3. With respect to correlations between dependent variables (adoption approval and attitude towards homosexuality) and the independent variables, a significant negative correlation was evidenced between the answer on attitude towards homosexuality ($r = -0,727$; $p = 0,000$) and a significant positive correlation with the number of homosexual friends ($r = 0,402$; $p = 0,000$). The attitude on homosexuality analysis was significantly correlated with sex ($r = 0,328$; $p = 0,000$) and with the number of homosexual friends ($r = -$

$0,351$; $p = 0,000$). The other correlation results were evidenced in Table 4.

Now, if we consider the result of the multiple linear regression model, the acceptance of homosexual adoption was analyzed as a dependent variable and as independent variables were attitude towards homosexuality, sex, age, do you practice a religion?, year of study, people known as homosexuals, and attitude towards religion. The results were statistically significant to the model, except the variables: age, do you practice a religion? year of study, people known as homosexuals, and attitude towards religion. The value of the R and R squared were 0,948 and 0,899, respectively (Table 5). Likewise, taking attitude towards homosexuality as the dependent variable and sex, age, do you practice a religion?, year of study, people known as homosexuals and attitude towards religion as independent variables. The results were statistically significant to the model, except age, do you practice a religion?, year of study and attitude towards religion. The value of R y R squared were 0,429 and 0,184, respectively (Table 6).

Table 1. Frequency of demographic variables of 205 surveyed.

| Variables | | n (%) |
|--------------------------------------|-------------------------|------------|
| Sex | Feminine | 107 (52,2) |
| | Masculine | 98 (47,8) |
| Age | 21-23 | 30 (14,6) |
| | 24-26 | 78 (38,0) |
| | 27-30 | 73 (35,6) |
| | >30 | 24 (11,7) |
| Do you practice a religion? | Si | 105 (51,2) |
| | No | 100 (48,8) |
| Year of study | 6th | 50 (24,4) |
| | 7th | 43 (21,0) |
| | Graduated not serumista | 76 (37,1) |
| | Graduated serumista | 36 (17,6) |
| People close known to be homosexuals | 0 | 51 (24,9) |
| | 1-2 | 91 (44,4) |
| | 3-4 | 34 (16,6) |
| | ≥5 | 29 (14,1) |

ORIGINAL PAPER

Table 2. Frequency of acceptance of adoption of children by homosexual couples.

| Answer | Feminine | Masculine | n (%) |
|--------------------|----------|-----------|-----------|
| Disagree very much | 6 | 17 | 23 (11,2) |
| Disagree | 12 | 15 | 27 (13,2) |
| Not sure | 18 | 19 | 37 (18,0) |
| Agree | 29 | 30 | 59 (28,8) |
| Agree very much | 42 | 17 | 59 (28,8) |

Table 3. Student t-test according to measurement scale.

| Scales | Sex | n (%) | Mean | DE | p |
|---------------|-----|------------|-------|-------|--------|
| EAH-10 | F | 107 (52,2) | 15,55 | 6,226 | <0,001 |
| | M | 98 (47,8) | 20,74 | 8,679 | |
| Francis Scale | F | 107 (52,2) | 12,92 | 6,701 | 0,015 |
| | M | 98 (52,2) | 10,54 | 7,093 | |



Table 4. Pearson and Spearman Correlations.

| Correlation | | r | p | rs | p |
|--------------------------------|--------------------------------|--------|-------|--------|-------|
| Answers regarding Adoption | Sex | -0,255 | 0,000 | -0,259 | 0,000 |
| | Age | -0,276 | 0,000 | -0,259 | 0,000 |
| | Do you practice a religion? | -0,219 | 0,002 | -0,247 | 0,000 |
| | Year of study | -0,013 | 0,852 | 0,000 | 0,995 |
| | Homosexual friends | 0,402 | 0,000 | 0,392 | 0,000 |
| | Attitude towards homosexuality | -0,727 | 0,000 | -0,712 | 0,000 |
| | Religious attitude | -0,231 | 0,001 | -0,222 | 0,001 |
| Attitude towards homosexuality | Sex | 0,328 | 0,000 | 0,350 | 0,000 |
| | Age | 0,222 | 0,001 | 0,236 | 0,001 |
| | Do you practice a religion? | 0,149 | 0,033 | 0,218 | 0,002 |
| | Year of study | -0,028 | 0,690 | 0,022 | 0,754 |
| | Homosexual friends | -0,351 | 0,000 | -0,348 | 0,000 |
| | Religious attitude | 0,190 | 0,006 | 0,189 | 0,007 |

ORIGINAL PAPER

Table 5. Multiple linear regression with respect to homosexual adoption acceptance.

| Model | Unstandardized coefficients | | Standardized coefficients | | |
|--------------------------------|-----------------------------|-------------|---------------------------|--------|-------|
| | B | Desv. Error | | t | Sig. |
| (Constant) | 0,447 | 0,215 | | 2,081 | 0,039 |
| Attitude towards homosexuality | 1,393 | 0,041 | 0,884 | 34,123 | 0,000 |
| Sex (masculine) | -0,220 | 0,063 | -0,083 | -3,481 | 0,001 |
| Age | -0,013 | 0,039 | -0,009 | -0,340 | 0,734 |
| Do you practice a religion? | 0,028 | 0,079 | 0,011 | 0,354 | 0,724 |
| Year of study | 0,007 | 0,032 | 0,005 | 0,216 | 0,829 |
| Homosexual attitude | 0,112 | 0,034 | 0,082 | 3,279 | 0,001 |
| Attitude towards religion | -0,011 | 0,006 | -0,060 | -1,946 | 0,053 |

Dependent variable: Acceptance of homosexual adoption.
 Statistically significant (p < 0,05)

Table 6. Multiple linear regression regarding attitude towards homosexuality.

| Model | Unstandardized coefficients | | Standardized coefficients | | |
|-------------------------------|-----------------------------|-------------|---------------------------|--------|-------|
| | B | Desv. Error | t | Sig. | |
| (Constant) | 0,991 | 0,267 | 3,717 | 0,000 | |
| Sex (masculine) | 0,385 | 0,095 | 0,269 | 4,070 | 0,000 |
| Age | 0,108 | 0,058 | 0,132 | 1,871 | 0,063 |
| Do you practice a religion? | 0,010 | 0,120 | 0,007 | 0,082 | 0,935 |
| Year of study | -0,048 | 0,049 | -0,070 | -0,988 | 0,324 |
| Homosexual friends | -0,167 | 0,050 | -0,226 | -3,338 | 0,001 |
| Attitude towards religion | 0,014 | 0,009 | 0,136 | 1,561 | 0,120 |
| Actitud hacia la religiosidad | -0,011 | 0,006 | -0,060 | -1,946 | 0,053 |

Dependent variable: Attitude towards homosexuality
Statistically significant ($p < 0,05$)

ORIGINAL PAPER

DISCUSSION

The present research is the first study carried out in Peru that is centered on the adoption of children by homosexuals in relation to other variables. Due to the few Works regarding homosexuality in Peru, no valid scales with the Peruvian population exist. Therefore, we used the scales (EAH-10 and Francis-5) with validation performed in countries with similar sociocultural characteristics such as Mexico and Colombia. The prevalence of homophobia in our work was 13.2% which is found below 35% found in a Peruvian study(14), but above 1-3% and 3% found in works carried out in Colombia and Mexico(27,28). These differences may be explained due to the greater conservatism in Peru in relation to other (29), and despite this the attitudes of intolerance have decreased. This may be due to the changes in education, greater contact with homosexuals or different forms of information that currently exist about homosexuality.

From our results, a significantly negative correlation exists between the answers to established questions and attitudes of intolerance towards homosexuality. That is to say, that the less the acceptance a greater attitude of intolerance towards homosexuals exists. This result is similar with what Campos Arias-Colombia(9) claims, in medical students, a work

that associated the question regarding adoption and the attitude towards homosexuality. This may be due to what is described, that many people of different sectors of our society are prone to show disagreement a priori about adoption of children by non-heterosexuals and this could be related to some form of homophobia⁽¹⁰⁾, which is still institutionalized in many countries through diverse actions of the security forces such as judicial, political and religious⁽³⁰⁾. These results describe that homophobic attitudes still persist in the professional judgment, which have work to be done, since, as mentioned, doctors are the qualified people to establish the integral adequacy of those that request an adoption.

57,6%, between in agreement and very much in agreement, indicated approval of the question about adoption. These results don't have a relation with what Campos Arias-2011⁽⁹⁾ and Tománek-2016⁽³¹⁾ claim, who found in their studies that 13,5% and 32% indicated approval, respectively. This discordance may be explained since, in the younger generational groups, there exist more tolerant attitudes about union or adoption by homosexuals than in adults^(17,32). Said tolerance may be due to that today's youth tends to be more connected with homosexual colleagues or have a greater openness for existing knowledge⁽³³⁾. It has also been said that the training and current educational level taught in university



centers would explain the less prejudices against homosexuality as described in a study comparing the attitudes towards homoparenthood among youth and the current knowledge in students and parents⁽³⁴⁾. Furthermore, the rejection still present for adoption may be explained by the still existing fear in the population due to that the information about homoparenthood and its effects on minors is scarce and not available except to researchers and scholars interested in the topic⁽³⁵⁾.

Among the last secondary objectives, we found a significant correlation between the response and the number of homosexual friends, significant correlation between homophobic attitudes and the number of homosexual friends and more intolerant attitudes in men than women against homosexuality. These results keep concordance with what Huarcaya et. Al⁽¹⁵⁾ and other studies on health professionals⁽³⁶⁻³⁹⁾ claim. Furthermore, in our study, we found that, although not significant, in women there is a tendency to a greater acceptance than men of adoption of children by same-sex couples (Table 2). This is in concordance with what Whatley et al⁽⁴⁰⁾ claim, that women have more favorable attitudes compared to men towards adoption. The significant relationships with the quantity of known homosexuals may be explained due to the positive experience that tends to modify the representations and prior attitudes that people have towards homosexuals⁽⁴¹⁾. Homophobia is more pronounced in men may be explained by the greater stigmas that men tend to have against LGBT people⁽⁴²⁾. It has also been said that men tend to internalize, with greater intensity, the prohibition of homosexual deviation imposed by culture⁽²⁸⁾; for example, a study carried out in three Asian cities refers that the influence of Confucianism is related with a negative perception of homosexuality⁽⁴³⁾. A work even found that some men with high rates of homophobia have homosexual interests⁽⁴⁴⁾. It seems that the attitudes of acceptance of rights for non-heterosexuals, including adoption as already mentioned, are presented in a larger extent with the level of information about them, as evidenced by Jabson et. Al⁽⁴⁵⁾, in doctors, and other authors^(16,46), in students. With the multiple linear regression analysis model proposed, we were able to find that the attitude towards homosexuality, sex, and the amount of homosexual friends directly influences in

the decision for acceptance of homosexual adoption. Furthermore, according to the same model, sex and number of homosexual Friends influence in the attitude towards homosexuality.

This research had other limitations besides the ones from the methodology used. First, the limitations of social change due to the pandemic by SARS-CoV-2 effect, that may have influenced the decision to participate by considering it irrelevant to the context. Second, the research topic, due to the not yet open way of thinking towards social changes, with respect to gender identity, to express with clarity and uphold their decisions motivating controversy, may even generate a bias in the frequency of acceptance for adoption due to the abstention that some people may have in participating. Third, among those that participated we may have bias in their response due to the self-criticism that they may have towards their own attitudes towards homosexuality. Fourth, the sample size may possibly not be large enough for the findings to be generalized. Fifth, we have to recognize that the disapproving attitude of people towards homosexuality is immersed since the historic unfolding of humanity and even more since the cultural religious conception, which is why it is not enough to explain it with the limited dimensions used in the present. Finally, future research, regarding this not greatly studied topic, would help us to increase knowledge in this area and strengthen the integral training of future doctors.

We recommend strengthening the integral training on this matter in the student population of the escuela de medicina humana de la UNMSM, in addition to expanding research about this topic on knowledge in our country.

CONCLUSION

It was determined that a significant correlation exists between the answer to the question and attitudes of intolerance towards homosexuality. 57.6% approved the adoption of children by homosexual couples. The answer was significantly correlated with the number of homosexual friends. Finally, greater homophobic attitudes were found in men than women and a significant correlation between homophobic attitudes or intolerance towards homosexuality with the number of homosexual friends.

Authorship contributions: PPP and ABC have participated in the conception of the article, data collection, drafting and approval of its final version. PPP performed the data analysis and ABC obtained the financing.

Financing: External financing was not used for this research.

Interest conflict: The authors have no conflict of interest to report regarding this research.

Received: May 10, 2021

Approved: August 3, 2021

Correspondence: Marco Antonio Tipula Mamani

Address: Jr. Nevado Huandoy #218, urb. Santa Elizabeth, 15408, San Juan de Lurigancho, Lima, Perú

Telephone: +51 910250258

Email: 12010039@unmsm.edu.pe

BIBLIOGRAPHIC REFERENCES

- Jenkins M, Lambert EG, Baker DN. The Attitudes of Black and White College Students Toward Gays and Lesbians. *J Black Stud.* 2009;39(4):589-613. DOI: 10.1177/0021934707299638.
- Martínez Zuluaga JP, Sáenz Lozada ML, Echeverry Raad J. Efectos de Adopción Y Crianza Homoparental. *Arch Med Manizales.* 2019;19(2):396-406. DOI: 10.30554/archmed.19.2.3321.2019.
- Grotevant HD, Lo AY. Adoptive parenting. *Curr Opin Psychol.* 2017;15(1):71-75. DOI: 10.1016/j.copsyc.2017.02.020.
- Buil E, García Rubio E, Lapastora M, Rabasot M. La adopción por homosexuales. *Anu Psicol Jurídica.* 2004;14(1):81-98. Disponible en: <https://journals.copmadrid.org/apj/art/af4732711661056eadbf798ba191272a>.
- Farr RH, Bruun ST, Patterson CJ. Longitudinal associations between coparenting and child adjustment among lesbian, gay, and heterosexual adoptive parent families. *Dev Psychol.* 2019;55(12):2547-2560. DOI: 10.1037/dev0000828.
- Fond G, Franc N, Purper-Ouakil D. Homoparentalité et développement de l'enfant: données actuelles. *L'Encéphale.* 2012;38(1):10-15. DOI: 10.1016/j.encep.2011.05.005.
- Golombok S, Mellish L, Jennings S, Casey P, Tasker F, Lamb ME. Adoptive Gay Father Families: Parent-Child Relationships and Children's Psychological Adjustment. *Child Dev.* 2014;85(2):456-468. DOI: 10.1111/cdev.12155.
- McConnachie AL, Ayed N, Foley S, Lamb ME, Jadva V, Tasker F, et al. Adoptive Gay Father Families: A Longitudinal Study of Children's Adjustment at Early Adolescence. *Child Dev.* 2020;0(0):1-19. DOI: 10.1111/cdev.13442.
- Campo Arias A. Aceptación de la adopción por hombres homosexuales en estudiantes de medicina. *Rev Colomb Enferm.* 2011;6(6):29-34. DOI: 10.18270/rce.v6i6.1431.
- Mazú Manzur D, Gómez de la Torre M, Hernández Paulsen G. Adopción de Niños por personas homosexuales ¿Pertinentemente Viable? [Internet] [Tesis de Grado]. [Santiago, Chile]: Universidad de Chile, Santiago, Chile; 2008. Disponible en: Recuperado de http://repositorio.uchile.cl/tesis/uchile/2008/de-manzur_d/pdfAmont/de-manzur_d.pdf
- Amodeo A, Esposito C, Bochicchio V, Valerio P, Vitelli R, Bacchini D, et al. Parenting Desire and Minority Stress in Lesbians and Gay Men: A Mediation Framework. *Int J Environ Res Public Health.* 2018;15(10):2318. DOI: 10.3390/ijerph15102318.
- Lobaugh ER, Clements PT, Averill JB, Olguin DL. Gay-Male Couples Who Adopt: Challenging Historical and Contemporary Social Trends Toward Becoming a Family. *Perspect Psychiatr Care.* 2006;42(3):184-195. DOI: 10.1111/j.1744-6163.2006.00081.x.
- Nofal L, Pedrido O. Adopción homoparental: derechos LGT a la adopción. *Las Tesinas Belgrano Fac Derecho Cienc Soc Abog.* 2010;(No 398):1-28. Disponible en: http://repositorio.ub.edu.ar/bitstream/handle/123456789/555/398_Nofal.pdf?sequence=2&isAllowed=y
- Nieto-Gutiérrez W, Komori-Pariona JK, Sánchez AG, Centeno-Leguía D, Arestegui-Sánchez L, De La Torre-Rojas KM, et al. Factors associated with homophobia in medical students from eleven Peruvian universities. *Rev Colomb Psiquiatr Engl Ed.* 2019;48(4):208-214. DOI: 10.1016/j.rcpeng.2018.01.003.
- Huarcaya-Victoria J, Dávila-Palacios JS, De la Cruz-Oré J. Relación entre la actitud hacia la homosexualidad y actitud religiosa en médicos de un hospital general. *An Fac Med.* 2018;79(2):138-143. DOI: 10.15381/anales.v79i2.14940.
- Colonnello E, Toccini L, Ciocca G, Limoncin E, Moscato G, Andreoni M, et al. Attitudes and Knowledge Towards Homosexuality: An Observational Study on a Sample of Medical Students. *J Sex Med.* 2020;17(1):123-138. DOI: 10.1016/j.jsxm.2020.04.019.
- Colli Magaña GC, Osorno Villanueva JB, Quintal Colli KG, Chan Chávez IA. Aceptación de la adopción por parte de parejas homosexuales. *Rev Electrónica Psicol Iztacala.* 2011;14(3):1-12. Disponible en: <http://www.revistas.unam.mx/index.php/rep/article/view/27643>.
- Goldberg AE, Frost RL, Manley MH, McCormick NM, Smith JZ, Brodzinsky DM. Lesbian, Gay, and Heterosexual Adoptive Parents' Experiences with Pediatricians: A Mixed-Methods Study. *Adopt Q.* 2020;23(1):27-62. DOI: 10.1080/10926755.2019.1675839.
- Tello Aguinaga KW. Causas de la politización reactiva del conservadurismo evangélico en el Perú contemporáneo. *Polítai Rev Cienc Política.* 2019;10(19):13-33. DOI: 10.18800/polítai.201902.001.
- Bolaños Enríquez T, Charry Morales A. Prejuicios y homosexualidad, el largo camino hacia la adopción homoparental. *Especial atención al caso colombiano. Estud Const.* 2018;16(1):395-424. DOI: 10.4067/S0718-52002018000100390.
- Chaparro Piedrahíta LJ, Guzmán Muñoz YM. Adopción homoparental: Estudio de derecho comparado a partir de las perspectivas de los países latinoamericanos que la han aprobado. *CES Derecho.* 2017;8(2):267-297. DOI: 10.21615/cesder.8.2.4.
- Messina R, D'Amore S. Adoption by Lesbians and Gay Men in Europe: Challenges and Barriers on the Journey to Adoption. *Adopt Q.* 2018;21(2):59-81. DOI: 10.1080/10926755.2018.1427641.
- Moral de la Rubia J, Martínez Sulvárán JO. Escala de actitud hacia la homosexualidad propiedades psicométricas y aspectos diferenciales por sexos. *Rev Int Cienc Soc Humanidades SOCIOTAM.* 2011;21(1):105-24. Disponible en: <https://biblat.unam.mx/es/revista/sociotam-revista-internacional-de-ciencias-sociales-y-humanidades/articulo/escala-de-actitud-hacia-la-homosexualidad-propiedades-psicométricas-y-aspectos-diferenciales-por-sexos>.



24. Cogollo Z, Gómez-Bustamante EM, Herazo E, Campo-Arias A. Validez y confiabilidad de la escala breve de Francis para actitud ante el cristianismo. *Rev Fac Med.* 2012;60(2):103-10. Disponible en: http://www.scielo.org.co/scielo.php?script=sci_arttext&pid=S0120-00112012000200004&lng=es&nrm=iso.
25. Campo-Arias A, Herazo E, Oviedo HC. Estructura interna y confiabilidad de la escala breve de Francis en estudiantes de Medicina. *Pensam Psicológico.* 2017;15(2):7-14. DOI: 10.11144/Javerianacali.PPSI15-2.eice.
26. Campo-Arias A, Oviedo HC, Herazo E. Escala para homofobia: validez y confiabilidad en estudiantes de medicina de una universidad de Bogotá (Colombia), 2010. *Arch Med.* 2014;14(1):9-20. Disponible en: http://www.scielo.org.co/scielo.php?script=sci_arttext&pid=S0034-74502012000400011
27. Moral de la Rubia J, Valle de la O A, Martínez Gómez E. Evaluación del rechazo hacia la homosexualidad en estudiantes de medicina y psicología con base en tres escalas conceptualmente afines. *Psicol Desde El Caribe.* 2013;30(3):526-50. Disponible en: <https://www.redalyc.org/articulo.oa?id=21329176005>.
28. Moral de la Rubia J, Valle de la O A. Measurement of attitudes toward lesbians and gay men in students of health sciences from northeast Mexico. *J Behav Health Soc Issues.* 2014;6(1):51-65. DOI: 10.5460/jbhisi.v6.1.47602.
29. Rottenbacher de Rojas JM. Conservadurismo político, homofobia y prejuicio hacia grupos transgénero en una muestra de estudiantes y egresados universitarios de Lima. *Pensam Psicológico.* 2012;10(1):23-37. Disponible en: http://www.scielo.org.co/scielo.php?script=sci_arttext&pid=S1657-89612012000100002
30. O'Brien J. Heterosexism and Homophobia. En: *International Encyclopedia of the Social & Behavioral Sciences* [Internet]. 2da ed. Elsevier; 2015. p. 790-795. doi: 10.1016/B978-0-08-097086-8.10204-1. Disponible en: <https://linkinghub.elsevier.com/retrieve/pii/B9780080970868102041>
31. Tománek P. HETERONORMALITA VOVZTAHU K SOCIÁLNÍM ADOPTIVNÍM RODIČMI. *Lifelong Learn – Celoživotní Vzděl.* 2016;6(1):104-130. DOI: 10.11118/lifele20160601104.
32. Anand PV. Attitude Towards Homosexuality: A Survey Based Study. *J Psychosoc Res.* 2016;11(1):157-166. DOI: 10.3389/fpsyg.2016.01592
33. Rodríguez-Castro Y, Lameiras Fernández M, Carrera Fernández V, Vallejo-Medina P. Validación de la Escala Moderna de Homofobia en una muestra de adolescentes. *An Psicol.* 2013;29(2):523-533. DOI: 10.6018/analesps.29.2.137931.
34. Castiblanco Guataquirá AM, Roa Cuburuco MA. Actitudes hacia la adopción homoparental: un estudio comparativo entre padres de familia de una institución educativa y jóvenes universitarios [Internet] [Tesis de Grado]. [Villavicencio, Colombia]: Universidad Santo Tomás, Villavicencio, Colombia; 2019. Disponible en: Recuperado de <http://hdl.handle.net/11634/18023>
35. Barragán-Pérez V, Berenzon-Gorn S, García De la Torre GS, Lara-Muñoz M del C. Actitudes hacia la homoparentalidad: Validación psicométrica de dos escalas en una muestra de estudiantes mexicanos. *Med UNAB.* 2016;19(2):85-94. DOI: <https://doi.org/10.29375/01237047.2362>.
36. Lopez CE, Taype-Rondán A. Asociación entre compromiso religioso y presentar actitudes negativas hacia hombres homosexuales, en un grupo de estudiantes de medicina peruanos. *Acta Médica Peru.* 2017;34(1):33-40. DOI: http://www.scielo.org.pe/scielo.php?script=sci_arttext&pid=S1728-59172017000100006
37. Hlado P. Postoje univerzitetnih študentů pedagogicky orientovaných studijních programů k homosexualitě měřené na škále Homosexuality Attitude Scale. *Pedagog Orientace.* 2015;25(3):438-464. DOI: 10.5817/PedOr2015-3-438.
38. Picha Mamani SL. Actitudes hacia la homosexualidad en profesionales de la salud [Internet] [Tesis de Grado]. [Arequipa, Perú]: Universidad Católica de Santa María, Arequipa, Perú; 2015. Disponible en: Recuperado de https://alicia.concytec.gob.pe/vufind/Record/UCSM_d776b0cd680b58e614fba706abd0be4c/Description#tabnav
39. Torales J, Barrios I, Torres A, Dunjó N, Benítez MG, Villalba J, et al. Attitude of Medical Students in Paraguay Towards Homosexuality. *East Asian Arch Psychiatry.* 2018;28(3):101-103. DOI: 10.12809/eaap1730.
40. Whatley MA, Cave SJ, Breneiser JE. The Development of a Scale to Assess Attitudes toward Homosexual Adoption: A Preliminary Investigation. *North Am J Psychol.* 2016;18(1):107-22. DOI: 10.1037/t49293-000
41. Moral de la Rubia J, Valle de la O A. Escala de Actitudes hacia Lesbianas y Hombres Homosexuales (ATLG) 2. Distribución y evidencias de validez. *Rev Electrónica Nova Sci.* 2011;4(1):153-71. Disponible en: http://www.scielo.org.mx/scielo.php?script=sci_arttext&pid=S2007-07052012000100007.
42. Eick U, Rubinstein T, Hertz S, Slater A. Changing attitudes of high school students in Israel toward homosexuality. *J LGBT Youth.* 2016;13(1-2):192-206. DOI: 10.1080/19361653.2015.1087930.
43. Feng Y, Lou C, Gao E, Tu X, Cheng Y, Emerson MR, et al. Adolescents' and Young Adults' Perception of Homosexuality and Related Factors in Three Asian Cities. *J Adolesc Health.* 2012;50(3):S52-S60. DOI: 10.1016/j.jadohealth.2011.12.008.
44. Cheval B, Radel R, Grob E, Ghisletta P, Bianchi-Demicheli F, Chanal J. Homophobia: An Impulsive Attraction to the Same Sex? Evidence From Eye-Tracking Data in a Picture-Viewing Task. *J Sex Med.* 2016;13(5):825-834. DOI: 10.1016/j.jsxm.2016.02.165.
45. Jabson JM, Mitchell JW, Doty SB. Associations between non-discrimination and training policies and physicians' attitudes and knowledge about sexual and gender minority patients: a comparison of physicians from two hospitals. *BMC Public Health.* 2016;16(1):256. DOI: 10.1186/s12889-016-2927-y.
46. Melendres Yallerco HA, Velarde Torres MS. Nivel de información y actitudes hacia la homosexualidad [Internet] [Tesis de Grado]. [Arequipa, Perú]: Universidad Nacional de San Agustín, Arequipa, Perú; 2018. Disponible en: Recuperado de <http://repositorio.unsa.edu.pe/handle/UNSA/6157>

Indexed in:


<https://alicia.concytec.gob.pe/vufind/>
