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FOR SPECIAL SECTION: THE PUZZLE OF SEXUAL ORIENTATION

# Is Male Androphilia a Context-Dependent Cross-Cultural Universal?

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#### Abstract

The cross-cultural ethnographic literature has traditionally used the label male "homosexuality" to describe sexual relationships between biological males without considering whether or not the concept encompasses primary sexual attraction to adult males. Although male androphilia seems to be found in all national populations, its universal existence in tribal populations has been questioned. Our goal is to review previous cross-cultural classifications and surveys of male same sex behavior to present a system that does justice to its varied expressions, especially as it is informed by contemporary sexuality research. Previous comparative research does not effectively distinguish male same sex behavior from male androphilia. Using the standard cross-cultural sample (SCCS) as a sampling frame and the ethnographic sources in the human relations area files and elsewhere, we present distributional data on various forms of male same sex behavior. The SCCS is useful because it is designed to be representative of all historically known social formations and the sample is designed to reduce similarities as a consequence of common descent or historical origin as well as reduce the probability of diffusion of sociocultural practices from one culture to another. Our results show that male same sex behavior as well as male androphilia is much more common than previously estimated in the SCCS. With our findings, we make an argument that male androphilia is a context-dependent cross-cultural universal.

Keywords: Male same sex behavior, Sexual orientation, Cross-cultural universals, Male androphilia, Ethnology

#### Introduction

Nearly without exception in nation states (countries governed by a centralized and hierarchical political system) male androphilia is found at rates between about 2-4 % of the population (Gates, 2011; Vasey & VanderLaan, 2014; Whitam, 1983). There are three lines of evidence that suggest male androphilia should be present or potentially present in all social systems. The first is strong evidence that male androphilia is heritable through research showing a strong concordance among monozygotic and dizygotic twins compared to unrelated siblings and these rates are greater than the local population average (e.g., Bailey, Dunne, & Martin, 2000; Bailey & Pillard, 1991; for a review, see Ngun, Ghahramani, Sánchez, Bocklandt, & Vilain, 2011). Further, these studies consistently show that male androphilia is more highly heritable in monozygotic twins than in dizygotic twins.

The second is comparative research in a variety of national populations demonstrating that biological factors (i.e., maternal immune hypothesis) are implicated through what is known as the fraternal birth-order effect (Blanchard, 1997). Numerous researchers (see Bogaert & Skorska, 2011 for a review) working with a wide variety of national populations have documented a consistent increased probability of male androphilia with each male born to a mother in righthanded males. It is hypothesized that with each male born the mother's immune system responds ever more strongly to counteract male-specific androgens produced by prior male fetuses which, in turn, leads to a higher probability of male androphilia. While the mechanism that underlies this process is hypothetical, the evidence of birth-order effects is exceptionally robust. It is estimated that about 15 % of all male androphilia may be attributed to this effect (Cantor, Blanchard, Paterson, & Bogaert, 2002). This research has been consistently replicated across the globe in modern

societies and in a traditional society (Vasey & VanderLaan, 2007; VanderLaan & Vasey, 2011) as well.

The third is high female fertility through sexually antagonistic selection (Camperio Ciani, Cermelli, & Zanzotto, 2008). Mothers who bear androphilic sons are likely to have elevated fertility which, in part, compensates for the production of low fitness androphilic sons. In effect, androphilic sons are produced as a side effect of high female fertility. The precise mechanism for this effect remains elusive. Replications of this model are rather inconsistent but promising (King et al., 2005; Rahman et al., 2008; VanderLaan & Vasey, 201).

Given this evidence, we have no clear reason to believe male androphilia, underpinned by one or more of these established biological bases, would be absent in small-scale societies encapsulated within nation states and would not surface in a wide range of environmental and social conditions. One way to evaluate the possible universality of male same sex behavior and male androphilia is by using the standard cross-cultural sample. The SCCS is an indexed database of textual information (ethnographic reports) on 186 societies that ethnologists use to test cross-cultural generalizations and theories (Murdock & White, 1969). As described in Methods section, it is designed to overcome the problem of a non-random sample of societies. A number of cross-cultural surveys on small-scale societies using the SCCS (e.g., Broude & Greene, 1976) show that "homosexuality" is "rare or absent" in 21.6 % of societies. As we will document, there are a number of problems in this widely used survey and others (e.g., Ford & Beach, 1951) to document the frequency of male same sex behavior. First, and perhaps most obvious, is the classification of "rare or absent" that does not distinguish rare from absent. Based on national surveys, one would clearly expect that male same sex behavior to be rare given its incidence of 2-4 % in national populations. The second problem is that these surveys do not distinguish between male same sex behavior and male androphilia. Same sex behavior is a necessary but not a sufficient requirement for male androphilia. Thus, in these surveys, any same sex behavior, regardless of an actor's orientation, is classified as "homosexuality." In his attempt to classify different forms of male same sex behavior using the SCCS, Crapo (1995) wrote:

Even within individual ethnographies, it may be impossible to distinguish accurately between homosexual behavior and homosexual orientation, homosexuality and bisexuality, homosexuality and transvestism, or between the absence of a recognized concept of homosexuality and the stigmatization of homosexuality. (p. 180)

In this article, we have three goals. The first is to revisit the societies (or cases) used in Broude and Greene's sample to reexamine those societies, in which they classified male same sex behavior (homosexuality in their terminology) as

rare or absent to distinguish between rare and absent. In this reexamination, we availed ourselves of additional ethnographic information unavailable to Broude and Greene's when they performed their research 40 years ago. This is important because they were unable to find information on male same sex behavior in 62 % of societies in the SCCS. Ultimately, we produce data on the frequency of male same sex behavior as well as male androphilia that are more accurate and may be used to test hypotheses to determine whether the presence or forms of male same sex behavior correlate with social structural and/or cultural factors. Based on sometimes incomplete ethnographic investigation, the second goal is to classify different forms of male same sex behavior to determine which represents male androphilia as defined by psychologists and sex researchers or is simply male same sex behavior. Finally, we argue that male androphilia is a context-dependent cross-cultural universal (Chapais, 2014) whose variable expression or suppression is likely affected cultural factors.

#### Previous Surveys of Male Same Sex Behavior

Two foundational cross-cultural surveys cast doubt on the universality of male same sex behavior. The first was published by Ford and Beach (1951). They summarized:

In 49 (64 per cent) of the 76 societies other than our own for which information is available, homosexual activities of one sort or another are considered normal and socially acceptable for certain members of the community. The most common form of institutionalized homosexuality is that of the "berdache" or transvestite. The berdache is a male who dresses like a woman, performs women's tasks, and adopts some aspects of the feminine role in sexual behavior with male partners. (p. 137)

The second was Broude and Greene's (1976) survey of the 186 society standard cross-cultural sample of the HRAF. They found only five societies of 42 (or 11.9 % of their sample) in which there was no concept of homosexuality (coded as "no concept of homosexuality"). Using a different measure in another 41 of 70 societies (58 % of their sample), homosexuality was coded as rare or absent.

The survey by Ford and Beach is less useful than Broude and Greene's because the data set employed is not based on any reasonable sampling universe that would avoid the problem of independence (or Galton's problem, see below). As far as we can ascertain, it simply represents their ad hoc sampling of societies in which there is information on human sexuality and/or male same sex behavior. Broude and Greene, in contrast, use the SCCS which is suited to providing unbiased cross-cultural estimates of the prevalence of male same sex behavior (or any other cultural practice, for that matter). It also represents a "gold standard" for comparative ethnological research (<u>http://eclectic.ss.uci.</u> <u>edu/~drwhite/worldcul/sccs.html</u>).

#### **Conceptual Problems**

As noted, a good deal of anthropological research on male same sex behavior does not distinguish male same sex behavior (any same sex sexual contact) from male androphilic orientation (i.e., male attraction and arousal to adult males) in the context of male sexuality (e.g., Broude & Greene, 1976). For example, Minturn, Grosse, and Haider (1969) purport to show that "Male homosexuality occurs among a large minority of the male population, i.e., more than 20 % but less than 50 percent" in 14.5 % of societies in their cross-cultural sample (p. 314, column 31). Several researchers have noted the unreasonableness of this claim (Crapo, 1995; Reiss, 1986; Williams, 1986). "Homosexuality" in Minturn et al. is conceptualized simply as malemale sex and ignores the issues of identity, orientation, and arousal which informs the accepted psychological definitions of male androphilia. For example, in many highland New Guinea societies, male to male fellatio is a required and a frequently coerced rite of passage for the achievement of manhood. Whether it represents male androphilia among participants is rarely established. This problem is magnified in later cross-cultural surveys that use Broude and Greene's (1976) previously coded data from research that does not distinguish between male same sex behavior and male androphilia to test cross-cultural hypotheses or to make descriptive generalization about the distribution of male same sex behavior cross-culturally (Barber, 1998; Barthes, Godelle, & Raymond, 2013).

To some extent, this issue is further complicated by a failure to distinguish between two types of male androphilia that appear to be culturally mediated. In general, in those societies that recognize more than two genders, male androphilia takes a different form compared to societies who only recognize two genders (Vasey & VanderLaan, 2014). Vasey and VanderLaan distinguish between sex-gender congruent androphilia (sometimes called egalitarian homosexuality) and transgendered androphilia (or berdache or transvestism in Callendar & Kochems, 1983). (It should be noted that transvestism in the ethnographic literature usually means cross-dressing.) In the latter, a third gender is typically named (e.g., winkte among the Lakota Sioux or fa'afafine among Samoans), socially recognized, and usually accepted, and individuals who are identified as transgendered males take on female roles and appear to preferably have sex with heterosexual or masculine males. The former, sex-gender congruent androphilia, conforms to a type that seems to be common in most national or industrial populations. Such individuals identified as males are attracted to other androphilic males and do not shift as strongly toward female gender roles.

The major survey works of Greenberg (1988) and Murray (2000) document a wide variety of male same sex practices historically and cross-culturally. While these works are important compendia and justifiably frequently cited, they provide an uneven picture of cross-cultural variation in male same sex behavior because they do not provide a sample of independent societies. By restricting our survey to societies in the SCCS, we will be in a much stronger position to understand whether male same sex behavior is universal and how it may be related to certain social formations and the role that cultural systems play in its allocation.

#### Methods

As noted, most of the anthropological comparative research on male same sex behavior is based on the ethnographic bibliographies compiled for the standard crosscultural sample and the human relations area files (e.g., Barber, 1998; Broude & Greene, 1976; Minturn et al., 1969). The SCCS was created by Murdock and White (1969) to deal with "Galton's problem" or statistical independence in comparative research. Cultures that are geographically proximate and speak closely related languages are more likely in the past to have derived from a recent common culture. Statistically, they are not independent cases. In addition, cultures that are geographically proximate may have traits in common through diffusion or borrowing of cultural traits. To circumvent this problem of non-independence, Murdock and White divided the world into 200 independent sampling provinces that consisted of closely related cultures. They then selected a single culture in 186 of these provinces that was best described. A limited set of authoritative publications from journal articles, monographs, etc., are available for each society. These texts, for the most part, are indexed following the Outline of Cultural Materials (Murdock, 1961) such that one can quickly locate information on cultural traits from family composition to puberty ceremonies and political organization. Through the years, more than 2000 variables have been coded using the SCCS. Most of the coded information has been published in journals such as Ethnology and Cross-Cultural Research, and they are also online at http://ehrafworldcultures.yale.edu/ehrafe/ or World Cultures at http://www.worldcultures.org/.

The text data in the SCCS for each culture tend to be extensive, but it can be variably detailed reflecting specific research interests. Importantly, not all scholarly published information on each culture is in the SCCS even though new data on each society are periodically updated. If one were to examine general information on aspects of marriage or family for each society, useful information would likely be present. However, there are many dimensions of human behavior, sexuality in particular, that are absent or sparsely described in publications used in the SCCS. As a consequence, when one reads certain comparative surveys based on the SCCS, "no data" is not an uncommon variable value. Through an examination of scholarly work on SCCS societies not contained in the SCCS database, we attempted to circumvent the "no data" problem. For example, through our research, we were able to reduce the "no data" entries to 28 % (see Tables 1, 2 and "Discussion" section) from 62 % in Broude and Greene (1976). This is important because codes published by Broude and Greene have served sources by others who use their codes (e.g., Barber, 1998). Although we could have availed ourselves to an alternative society in an ethnographic case in the same sampling province when "no data" were available in the key culture, as did Crapo (1995) and VanderLaan, Ren, and Vasey (2013), we chose not to do so in order to maintain sampling continuity with previous research. Our new codes, as well as the ethnographic sources we used, are presented in ESM Appendix 1: Data Table and Data Sources by Society for Classification of Male Same Sex Behavior.

#### **Classification of Male Same Sex Behavior**

A number of researchers have developed typologies of male same sex behavior. We rely on the work of Greenberg (1988), Gregersen (1996), Crapo (1995), and Murray (2000) with modifications informed by VanderLaan et al. (2013). While these classifications are exceptionally useful and document the diversity of male same sex behavior, they do not give us a realistic sense of the proportions found worldwide. With the exception of Crapo and VanderLaan et al., none has a proper sampling frame through use of something akin to the SCCS. With these considerations in hand, we present our classification of male same sex behavior below and the dimensions that differentiate these forms. We importantly distinguish male androphilia from male same sex behavior without evident male same sex orientation.

Finally, it is also important to note that in 22 societies there is more than one type of male same sex behavior, as we later document in Table 4. To avoid double counting in the distributional data presented in Table 3 on forms of male same sex behavior and given our goal is to determine whether male androphilia is universal, we prioritized both sex-gender congruent and transgendered forms of male same sex behavior in Table 3 over the other forms documented in Table 4.

Immediately below is our classification of different forms of male same sex behavior.

Table 1. Broude and Greene's Column 19

Classification	Frequency	Percent
Absent or rare	40	21.5
No data	116	62.4 16.1
Present, not common	30	16.1
Total	186	100.0

#### Transgendered Androphilia (Gender-Stratified or Pathic)

Transgendered androphiles perform typical female gender roles, may dress like females, are sexually attracted to masculine males, are often considered a third gender, and have sex with purportedly heterosexual males and typically not with one another. Transgendered individuals may be socially named (e.g., *winkte* among the Lakota Sioux) and are socially distinguished from non-transgendered males and females.

#### Sex-Gender Congruent Androphilia (Adult Egalitarian)

Sex-gender congruent androphilic males self-identified as males tend to perform male economic and domestic roles, are attracted to other males, commonly have sex with one another, and the social relationship between males is usually equal. Although this form is not well described anthropologically, it is the most common form in state-level societies, or social formations with a centralized political bureaucracy and considerable social stratification (see Vasey & VanderLaan, 2009 for details).

#### Age-Stratified (or Mentorship or Transgenerational)

Murray (2000) defined three subtypes of age-stratified male same sex behavior, and we use his distinctions below. Agestratified same sex behavior refers to sex occurring exclusively between males of different age grades, usually older adult males with post-pubescent, adolescent to young and unmarried males. In most cases, same sex behaviors outside of specified age-graded relationships are discouraged or prohibited. As noted by Crapo (1995) and Murray (2000), these forms sometimes have a life historical pattern. The younger partner may be expected to restrict his sexuality to same sex males, while the older partner who may be married may be permitted to engage in same and opposite sex interactions. When the younger partner matures and marries, he takes on a younger partner with whom he has same sex relations.

"Masculinity enhancing," this first subtype occurs when same sex behaviors are designed to enhance a boy's masculinity. These relationships are common among societies with high frequencies of warfare, are especially celebrated among warriors of these societies, and are widespread in certain parts of New Guinea (Herdt, 1984). In most cases, boys are required to fellate older unmarried men in order to mature through the regular ingestion of semen. In many cases, same sex contact ceases at marriage. There is evidence that some boys and men may avidly partake in this behavior, while in other cases it is disliked by both and younger males may be coerced with threats. We were unable to document masculinity enhancing forms in our sample even though, as noted, it is widespread in highland New Guinea.

Classification	Frequency	Percent
Absent	12	6.5
No data	51	27.4
Present	123	66.1
Total	186	100.0

 Table 2. Recode of Broude and Greene's Column 19

**Table 3.** Distribution of male same sex behavior types ("no data" excluded)

Туре	Frequency	Percent
Transgendered	65	48.1
Sex-gender congruent	17	12.6
Present-unknown	19	14.1
Juvenile-egalitarian	9	6.7
Age-stratified	13	9.6
Absent	12	8.9
Total	135	100.0

"Non-masculinizing," the second type occurs between older men and young boys. It is not conceived as a way to either masculinize or feminize the boy over the long term. As a child, boys may be involved in "women's work" and be expected to submit to the sexual advances of adult males. In these cases, the boys transition to heterosexual males as adults, who may or may not have sexual relationships with young boys. While documented elsewhere, we found no examples of this form in our sample.

"Juvenile initiated" is the third subtype and involves young boys taking an active and insertive role in sexual relationships with older men. Often (but not always) this is in the form of solicited prostitution and seems to be quite rare cross-culturally. While documented elsewhere, we found no examples of this form in our sample.

#### Juvenile-Egalitarian

Male same sex relationships may be common or accepted among prepubescent or socially immature boys. As with adult sex-congruent androphilia systems, there are no cultural or social distinctions between individuals; however, in many cases, it is expected that sexual behavior will cease at puberty or marriage. In some instances, there is evidence that not all individuals involved in these relationships as juveniles become exclusive male gynephiles when adult; in some societies, this persistent same sex behavior is accepted without question, in others it is accepted but discouraged, and in some persistence is forbidden and negatively sanctioned.

#### Absent and No Data

Finally, we have coded some societies where male same sex behavior is "absent" and cases where there are "no data." By absent, we mean an affirmative statement by the ethnographer that male same sex behavior does not exist. No data simply means there is no information at all on male same sex behavior.

Given our classification and the limitations of the ethnographic record, gender congruent and transgendered androphilia are defined as forms of male sexual attraction to adult males. Whether the other forms such as age-stratified represent same sex sexual attraction to adult or even juvenile males is unclear. In the juvenile-egalitarian form, sexual attraction to females seems paramount, but female sexual partners are unavailable. Juvenile males may be making the best of a bad situation as do men in prisons (Hensley, 2002; Kunzel, 2008). In the age-stratified non-masculinizing system the issue of sexual orientation may be very complex and can range from male hebephilia for the oldest of the pair combined with male androphilia for the younger partner. Alternatively, it may be that male same sex behavior is a substitute for absence of female partners as in the juvenile-egalitarian form. In masculinity enhancing system, there may be a complete lack of sexual attraction in many cases but not for all. We revisit these issues in the conclusion in our consideration of context-dependent cross-cultural universals.

#### Results

Our results are subject to multiple interpretations even though we have significantly reduced the number of no data cases (Tables 1, 2). This is largely a consequence of inadequate characterizations of male same sex behavior in

**Table 4.** Primary and secondary types of male same sex sexuality

Primary form	Secondary form					
	Age-stratified	Juvenile-egalitarian	Present-unknown	Sex-gender congruent	Transgendered	Total
Age-stratified	0	3	1	0	0	4
Juvenile-egalitarian	1	0	2	0	0	3
Sex-gender congruent	5	4	0	0	1	10
Transgendered	3	0	1	4	0	8
Total	9	7	4	4	1	25

the ethnographic record. Nevertheless, the data show that male androphilia is by far the most common form of male same sex behavior and other forms of male same sex behavior may also be instances of male androphilia. Finally, in a significant number of societies, there are multiple forms of male same sex behavior.

In Tables 1 and 2, we compare our first results to Broude and Greene's (1976: 417) coding of the frequency of homosexuality (Column 19: 417). Their coding of "no data" is not included in their original tabular output. However, we have modified their original Table 3 (from p. 418) to include it, so the "no data" column can be compared to the same in our Table 2. The most striking difference between our coding and theirs is in societies coded as "No data": In Broude and Greene, a full 62 % of the SCCS (116 cases) was coded as "no data," but using our method of searching outside of the SCCS source bibliographies for additional ethnographic reports we were able to reduce this number to 52 cases or 28 % in Table 2. Just as importantly, in Table 1, Broude and Greene classified 40 cases or 21.5 % of their sample as "absent or rare." Our Table 2 distinguished absent from rare and found 14 cases (7.5 %) we could classify as absent.

In Table 3, we removed "No data" to calculate the percentages to find that male same sex behavior is present in 91.1 % of all societies. In our classification, we followed distinctions made described in our methods section on different forms of same sex behavior, but vagueness in the ethnographic record did not permit us to use those cases as effectively as we would have desired. Male androphilia in both the transgendered and sex-gender congruent forms composed 57.5 % of the cases in Table 3, with the transgendered form composing 77.9 % of male androphilia cases.

Although we attempted to use Murray's threefold classification of age-stratified male same sex behavior, we were unable effectively to employ it owing to a lack of requisite detail in the ethnographic record. Consequently, our agestratified is a complete merging of Murray's threefold classification and simply means there were significant age differences in males who engage in same sex behavior. We uncovered no examples of masculinity enhancing or juvenile initiated in our sample.

The juvenile-egalitarian form, representing 6.7 % of the sample, is most probably a temporary male same sex behavior that may simply be a consequence of limited or no access to females in societies, for example, where young males have no access to females because of high rates of polygyny, late male marriage, and betrothal of pubescent girls to older males.

Finally, in 22 cases or 16.4 % of our sample, male same sex behavior was acknowledged, but there was not sufficient information for classification.

Finally, in a number of societies, there are multiple forms of male same sex behavior. In Table 4, we present data on 22 societies in which we found more than one form of male same sex behavior representing 18 % of all societies where male same sex behavior is reported. As noted in the Method section, by secondary male same sex behavior, we mean non-androphilic forms and those forms that were less culturally salient or more poorly described than the primary form. This being said, we cannot say with great confidence whether primary forms are more common than secondary forms even though this was our best interpretation given our sources. In Table 4, the most common secondary form, sex-gender congruent androphilia, is found in 36.4 % of all societies on which we have data on more than one form of male same sex behavior.

If we combine absent with juvenile-egalitarian, we can conclude that male androphilia is absent in at least 16.4 % of our sample. Given what we have said about age-stratified same sex behavior as well as "present-unknown," this means that the presence of male androphilia ranges from a minimum of 57.5 % to a maximum 83.6 % in our sample.

#### Discussion

We have reviewed and reassessed, through new research, cross-cultural ethnological findings on male same sex behavior in order to determine whether male androphilia is a human universal. In reviewing previous research, we encountered two problems: (1) a conflation of male same sex behavior with male and rophilia and (2) the paucity of detailed information on male same sex sexual behavior in the SCCS source bibliographies leading to difficulties in classification. To rectify these problems, we went outside the narrow confines of the ethnographic reports and sources in the SCCS by incorporating ethnographic data for each society in the SCCS from sources that are not currently in the SCCS database. In doing so, we were able to newly document 64 societies in which there was information on male same sex behavior. Crapo (1995) and Murray (2000) provided typologies of different male same sex behaviors that allow one to begin to distinguish, to a marginal degree in some cases, between male same sex behavior and male androphilia. We used a modified version of their typologies in an attempt to provide a picture of the distribution of male same sex behavior cross-culturally. Our new tabulations reveal that male same sex behavior is absent in 9.7 % of all societies or present in 89.6 % of all societies (Table 3). If we restrict male same sex behavior to male androphilia by including sex-gender congruent and transgendered androphilia, we find that male androphilia is present in at least 57.5 % (Table 3) of societies in our sample.

Age-stratified same sex behavior is difficult to interpret. We offer two perspectives. One interpretation is that older males having sex with younger males could simply be a case of making the best of a bad situation as is the case, for example, in same sex behavior in prisons (Hensley, Tewksbury, & Castle, 2003). Males without a sexual outlet because they are unmarried could be using young males as a means to deal with their sex drives even though they are gynephilic in orientation. Of course, the same could be said of younger partners. One could test this hypothesis in societies where men are frequently absent from settlements for long periods of time (e.g., pastoral nomads) or where there are high rates of polygyny and late male marriage compared to an opposite set of circumstances.

Another interpretation is that age-stratified systems male same sex behavior may permit a culturally constrained form of male androphilia to express itself for some males. For example, there are reports of apparent male androphilia in societies such as the well-known Sambia (Herdt, 1984) that have age-stratified masculinizing same sex behavior. It is possible that in such societies the expression of gender congruent or transgendered androphilia is not permitted and the realization or channeling of male androphilia is only permitted through age-stratified same sex behavior.

#### Absence and Absence of Evidence

Our cross-cultural survey indicates that approximately 28 % (52 cases) of the 186 societies in the SCCS have no information on male same sex behavior even though the "no data" problem is not uncommon in cross-cultural research. Although we were able to reduce Broude and Greene "no data" by 64 cases from 116 to 52, we feel we need to address the issue of no data directly before addressing whether male androphilia is, following Chapais (2014), a context-dependent cross-cultural universal.

Table 3 shows that male same sex behavior is reportedly absent in 9.7 % (13 cases) in our sample. Absence here means the ethnographer has specifically stated that the male same sex behavior does not exist after presumably seeking to determine whether it existed. The best-documented example of absence we know of is Hewlett and Hewlett's (2010) research on the hunting and gathering Aka Pygmies (the Aka are not in our SCCS database but the closely related Mbuti are and male same sex behavior is absent, see ESM Appendix 1). In their in-depth interviews of 56 individuals aged 18-70 on sexuality in the context of HIV research, informants had a difficult time imagining the mechanics of male same sex, did not have a concept of male same sex behavior, and knew no one who engaged in it. (Even more surprising, perhaps, is that the Aka do not know how to masturbate.) Marlowe (2004), who has done extensive research on mating strategies from an evolutionary perspective, and long-term ethnographic research on hunting and gathering Hadza (who are in our SCCS database), repeatedly asked his informants whether they had a concept of male same sex behavior or knew of it and the answer was no (Marlowe, 2010). However, in most of the other cases coded as absent, the ethnographer did not describe the effort he/she expended to ascertain the absence of male same sex behavior.

In 28 % of the SCCS (52 of 186), we found no data or mention of male same sex behavior. Clearly, it is possible that in some societies male same sex behavior does not exist, but the ethnographer failed to note its nonexistence. However, one cannot expect an ethnographer to document the absence of a cultural practice or behavior unless that practice is deemed to be rather common cross-culturally, an important research topic, or if he/she did not research on allied topics such as sexuality, mate choice, or marriage.

There are at least four possibilities for lack of evidence some of which may be interrelated: (1) male same sex behavior was not relevant to the ethnographer's research, or the ethnographer was oblivious to the practice; (2) the ethnographer recorded male same sex behavior in his/her field notes but never published on the topic; (3) male same sex behavior was absent; or (4) the ethnographer did not wish to write about "unsavory" patterns of behavior because they either did not want to discredit the people studied or did not want to write about it because of stigma to the researcher (Chiñas, 1992; Williams, 2000). Without interviewing the ethnographer or gaining access to his/her field notes, one cannot know for certain.

Finally, even when male same sex behavior is identified in ethnography, the description is sometimes vague or so brief that we could not place it in our system of classification. For example, in Table 3, 22 cases (16.4 % of the sample) labeled "present-unknown" male same sex behavior were identified for this sort.

Given our results on the frequency of male androphilia, we argue that it is a context-dependent human universal that applies to a biologically predisposed subset of males. On the nature of human universals, Chapais (2014) quotes Brown's well-known work on human cross-cultural universals:

As Brown (1991: 42) put it, the implicit definition was approximately as follows: a trait or complex present in all individuals (or all individuals of a particular sex and age range), all societies, all cultures, or all languages—provided that the trait or complex is not too obviously anatomical or physiological or too remote from the higher mental functions. (cited in Chapais, 2014, p. 762)

Chapais (2014) distinguished context-independent universals, as defined by Brown above, from what Chapais defined as context-dependent universals which are patterns of behaviors that invariably or consistently arise in specific social circumstances in some cultures or population segments. We offer courtship as an example of a context-dependent universal for clarification. Courtship can be defined as the process by which individuals selectively interact to determine whether others are suitable for short-term or long-term sexual relationships. Courtship is nearly universally found in vertebrates when the cost of reproduction is high and reproductive output is correspondingly low (Daly, 1978). In human courtship, each sex assesses qualities relevant to mating such as intelligence, status, kindness, wealth, physical fitness, attractiveness, and health, willingness to invest, common interests (Buss & Schmitt, 1993). Assessment strategies may include demonstrations of the above through clever conversation, gift-giving, dance, athletic performance, artistic demonstration. However, in societies where sexual segregation outside of close kin is strongly enforced, courtship interactions are expressly forbidden or severely limited for both of the sexes, and these restrictions are enforced by moderate to lethal sanctions (e.g., "honor killings"; Baker, Gregware, & Cassidy, 1999). In such societies, parents and close kin select mates oftentimes with little or no consultation of the couples who are to marry and in many cases objections to arranged marriage partners are futile or dangerous (Apostolou, 2010). Family members and close kin may be recruited to surveil and prevent courtship attempts. For example, Apostolou's (2007) cross-cultural survey using the SCCS classified marital choice from complete parental arrangement to courtship (with two mixed forms between) and he found that in onethird of societies parental arrangement was the dominant mode of mate selection. Evidence that the urge to court is a human universal comes from attempts by young men and women to court despite the dangers (Baker et al., 1999; Kressel, 1981). So strong is the urge to court a potential partner that cross-cultural research shows that women sometimes threaten suicide if they are forced into an arranged marriage (Syme, Garfield, & Hagen, 2016).

Following this line of reasoning, it seems to us that male androphilia is a context-dependent human universal. As we have shown, male androphilia is present in at least 57.5 % of our sample (Table 3) and it appears to be universal in statelevel societies. It seems to emerge where cultural and social factors permit its expression through recognition of its acceptability, and it emerges even where male androphiles face discrimination and severe repression. Evidence of the canalizing role culture plays is seen in the distinction between sex-gender congruent androphilia and transgendered androphilia as documented in VanderLaan et al. (2013). In both cases, there are many commonalities in early psychosocial developmental such as greater female typical behavior and separation anxiety and low levels of rough and tumble play (see Vasey & VanderLaan, 2015 for more details). Where the cultural system accepts boys who express interest and devotion to opposite sex activities and interests, and where sexual attraction to same sex individuals is not strongly disapproved, transgendered forms seem to emerge. As noted, such societies often have a named third gender for such individuals. Sex-gender congruent androphilia seems to emerge in cultures where males are expected to assume masculine economic and domestic roles and encouraged to identify as masculine males. Generally, such males identify as males and seek sex with one another. Our comparative data demonstrate that transgendered androphilia is by far the most common form of male androphilia, and it may be the case that it represents an ancestral form because it is found in social systems that have characterized humans for most of their evolutionary history (VanderLaan et al., 2013). However, that still does not answer the underlying question of why certain cultures produce sex-congruent forms or why in others male androphilia does not emerge. It is our hope that the basic distributional data presented here will assist others in answering these questions and it is a task we have set before ourselves in a future publication.

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#### **Compliance with Ethical Standards**

*Conflict of interest:* The authors declare no conflict of interest. *Ethical Approval:* This article does not contain any studies with human participants or animals performed by any of the authors.

#### Supplementary material (following References)

Appendix 1: Data Table

Appendix 2: Data Sources by Society for Classification of Male Same Sex Behavior

#### References

- Apostolou, M. (2007). Sexual selection under parental choice: The role of parents in the evolution of human mating. *Evolution and Human Behavior*, 28(6), 403–409.
- Apostolou, M. (2010). Sexual selection under parental choice in agropastoral societies. *Evolution and Human Behavior*, 31(1), 39-47.
- Bailey, J. M., Dunne, M. P., & Martin, N. G. (2000). Genetic and environmental influences on sexual orientation and its correlates in an Australian twin sample. *Journal of Personality and Social Psychology*, 78(3), 524–536.
- Bailey, J. M., & Pillard, R. C. (1991). A genetic study of male sexual orientation. Archives of General Psychiatry, 48(12), 1089–1096.
- Baker, N. V., Gregware, P. R., & Cassidy, M. A. (1999). Family killing fields: Honor rationales in the murder of women. *Violence Against Women*, 5(2), 164–184.
- Barber, N. (1998). Ecological and psychosocial correlates of male homosexuality: A cross-cultural investigation. *Journal of Cross-Cultural Psychology*, 29, 387–401.
- Barthes, J., Godelle, B., & Raymond, M. (2013). Human social stratification and hypergyny: Toward an understanding of male homosexual preference. *Evolution and Human Behavior*, 34(3), 155–163.
- Blanchard, R. (1997). Birth order and sibling sex ratio in homosexual versus heterosexual males and females. *Annual Review* of Sex Research, 8, 27–67.
- Bogaert, A. F., & Skorska, M. (2011). Sexual orientation, fraternal birth order, and the maternal immune hypothesis: A review. *Frontiers in Neuroendocrinology*, 32(2), 247–254.
- Broude, G., & Greene, S. (1976). Cross-cultural codes on twenty sexual attitudes and practices. *Ethnology*, *1*5, 409–429.
- Brown, D. E. (1991). *Human universals*. Philadelphia: Temple University Press.
- Buss, D. M., & Schmitt, D. P. (1993). Sexual strategies theory: An evolutionary perspective on human mating. *Psychological Review*, 100(2), 204.
- Callender, C., & Kochems, L. M. (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 24(4), 443–470.

- Camperio Ciani, A., Cermelli, P., & Zanzotto, G. (2008). Sexually antagonistic selection in human male homosexuality. *PLoS One*, 3(6), e2282.
- Cantor, J. M., Blanchard, R., Paterson, A. D., & Bogaert, A. F. (2002). How many gay men owe their sexual orientation to fraternal birth order? *Archives of Sexual Behavior*, 31(1), 63–71.
- Chapais, B. (2014). Complex kinship patterns as evolutionary constructions, and the origins of sociocultural universals. *Current Anthropology*, 55(6), 751–783.
- Chiñas, B. (1992). *The Isthmus Zapotecs: A matrifocal culture of Mexico*. New York: Harcourt College Publishers.
- Crapo, R. (1995). Factors in the cross-cultural patterning of male homosexual behavior: A reappraisal of the literature. *Cross-Cultural Research*, *95*, 178–202.
- Daly, M. (1978). The cost of mating. *The American Naturalist*, 112(986), 771–774.
- Ford, C. A., & Beach, F. A. (1951). *Patterns of sexual behavior*. New York: Harper and Brothers.
- Gates, G. J. (2011, April). *How many people are lesbian, gay, bisexual, and transgender?* The Williams Institute. Retrieved from https://escholarship.org/uc/item/09h684x2.
- Greenberg, D. (1988). *The construction of homosexualities*. Chicago: University of Chicago Press.
- Gregersen, E. (1996). *The world of human sexuality: Behaviors, customs, and beliefs*. New York: Ardent Media.
- Hensley, C. (2002). *Prison sex: Practice and policy*. Boulder, CO: Lynne Rienner Publishers.
- Hensley, C., Tewksbury, R., & Castle, T. (2003). Characteristics of prison sexual assault targets in male Oklahoma correctional facilities. *Journal of Interpersonal Violence*, 18(6), 595–606.
- Herdt, G. (Ed.). (1984). *Ritualized homosexuality in Melanesia*. Berkeley: University of California Press.
- Hewlett, B. S., & Hewlett, B. L. (2010). Sex and searching for children among Aka foragers and Ngandu farmers of Central Africa. African Study Monographs, 31(3), 107–125.
- King, M., Green, J., Osborn, D. J., Arkell, J., Hetherton, J., & Pereira, E. (2005). Family size in white gay and heterosexual men. *Archives of Sexual Behavior*, 34(1), 117–122.
- Kressel, G. M. (1981). Sororicide/filiacide: Homicide for family honour [and comments and reply]. *Current Anthropology*, 22(2), 141–158.
- Kunzel, R. G. (2008). Criminal intimacy: Prison and the uneven history of modern American sexuality. Chicago: University of Chicago Press.
- Marlowe, F. W. (2004). Mate preferences among Hadza huntergatherers. *Human Nature*, 15(4), 365–376.
- Marlowe, F. (2010). *The Hadza: Hunter-gatherers of Tanzania*. Berkeley: University of California Press.

- Minturn, L., Grosse, M., & Haider, S. (1969). Cultural patterning of sexual beliefs and behavior. *Ethnology*, *8*(3), 301–318.
- Murdock, G. P. (1961). *Outline of cultural materials*. New Haven, CT: HRAF Press.
- Murdock, G. P., & White, D. (1969). Standard cross-cultural sample. *Ethnology*, 8(4), 32–69.
- Murray, S. O. (2000). Homosexualities. Chicago: University of Chicago Press.
- Ngun, T. C., Ghahramani, N., Sánchez, F. J., Bocklandt, S., & Vilain, E. (2011). The genetics of sex differences in brain and behavior. *Frontiers in Neuroendocrinology*, 32(2), 227–246.
- Rahman, Q., Collins, A., Morrison, M., Orrells, J. C., Cadinouche, K., Greenfield, S., & Begum, S. (2008). Maternal inheritance and familial fecundity factors in male homosexuality. *Archives* of Sexual Behavior, 37(6), 962–969.
- Reiss, I. L. (1986). *Journey into sexuality: An exploratory voyage*. Upper Saddle River, NJ: Prentice Hall.
- Syme, K. L., Garfield, Z., & Hagen, E. (2016). Testing the bargaining vs. inclusive fitness models of suicidal behavior against the ethnographic record. *Evolution and Human Behavior*, 37(3), 179–192.
- VanderLaan, D., Ren, Z., & Vasey, P. (2013). Male androphilia in the ancestral environment. *Human Nature*, 24(4), 375-401.
- VanderLaan, D. P., & Vasey, P. L. (2011). Male sexual orientation in Independent Samoa: Evidence for fraternal birth order and maternal fecundity effects. *Archives of Sexual Behavior*, 40(3), 495–593.
- Vasey, P., & VanderLaan, D. (2007). Birth order and male androphilia in Samoan *fa'afafine*. *Proceedings of the Royal Society B*, 274, 1437–1442.
- Vasey, P. L., & VanderLaan, D. P. (2009). Maternal and avuncular tendencies in Samoa. *Human Nature*, 20(3), 269–281.
- Vasey, P. L., & VanderLaan, D. P. (2014). Evolving research on the evolution of male androphilia. *Canadian Journal of Human Sexuality*, 23(3), 137–147.
- Vasey, P. L., & VanderLaan, D. P. (2015). Evolutionary developmental perspectives on male androphilia in humans. In V. Zeigler-Hill, L. L. M. Welling, & T. K. Shackelford (Eds.), Evolutionary perspectives on social psychology (pp. 333–346). New York: Springer.
- Whitam, F. (1983). Culturally invariable properties of male homosexuality: Tentative conclusions from cross-cultural research. *Archives of Sexual Behavior*, 12(3), 207–226.
- Williams, W. L. (1986). *The spirit and the flesh: Sexual diversity in American Indian Culture*. Boston, MA: Beacon Press.
- Williams, W. (2000). Comment on "The evolution of human homosexual behavior" by Kirkpatrick, R. C. Current Anthropology, 41, 385–413.

# Appendix 1: Data Table

SCCS#	Culture	Primary Same Sex Classification	Secondary Same Sex Classification
1	Nama Hottentot	Sex-gender congruent	No data
10	Luguru	No data	No data
100	Tikopia	Sex-gender congruent	No data
101	Pentecost	Present - unknown	No data
102	Mbau Fijians	Juvenile-egalitarian	No data
103	Ajie	Sex-gender congruent	No data
104	Maori	Transgendered	No data
105	Marquesans	Transgendered	No data
106	Samoans	Transgendered	No data
107	Gilbertese	Transgendered	No data
108	Marshallese (Majuro)	Present - unknown	No data
109	Trukese (Chuuk)	Absent	No data
11	Kikuyu (Gikuyu)	Absent	No data
110	Yapese	No data	No data
111	Palauans	No data	No data
112	Ifugao	Transgendered	No data
113	Atayal	No data	No data
114	Chinese	Transgendered	Age-stratified-nm
115	Manchu	Sex-gender congruent	Age-stratified-unknown
116	Koreans	Sex-gender congruent	Transgendered
117	Japanese	Sex-gender congruent	Age-stratified-unknown
118	Ainu	No data	No data
119	Gilyak (Nivkh)	Transgendered	No data

12	Ganda	No data	No data
120	Yukaghir	Present - unknown	No data
121	Chukchee	Transgendered	No data
122	Ingalik	Transgendered	No data
123	Aleut	Transgendered	No data
124	Copper Eskimo	No data	No data
125	Montagnais	No data	No data
126	Micmac	Transgendered	No data
127	Saulteaux (Ojibwa)	Transgendered	No data
128	Slave	Transgendered	No data
129	Kaska	Transgendered	Sex-gender congruent
13	Mbuti	Absent	No data
130	Eyak	Transgendered	No data
131	Haida	No data	No data
132	Bellacoola	Transgendered	No data
133	Twana	No data	No data
134	Yurok	Transgendered	No data
135	Pomo (Eastern)	Transgendered	No data
136	Yokuts (Lake)	Transgendered	No data
137	Paiute (North.)	Transgendered	No data
138	Klamath	Transgendered	No data
139	Kutenai	Transgendered	No data
14	Nkundo Mongo	Age-stratified	Juvenile-egalitarian
140	Gros Ventre	Transgendered	No data
141	Hidatsa	Transgendered	No data
142	Pawnee	Transgendered	No data

143	Omaha	Transgendered	No data
144	Huron	No data	No data
145	Creek	Transgendered	No data
146	Natchez	Transgendered	No data
147	Comanche	Present - unknown	No data
148	Chiricahua	Transgendered	No data
149	Zuni	Transgendered	No data
15	Banen	No data	No data
150	Havasupai	Present - unknown	No data
151	Papago	Transgendered	No data
152	Huichol	Transgendered	No data
153	Aztec	Present - unknown	No data
154	Popoluca	Transgendered	No data
155	Quiche	No data	No data
156	Miskito	No data	No data
157	Bribri	No data	No data
158	Cuna (Tule)	Transgendered	No data
159	Goajiro	Age-stratified	No data
16	Tiv	No data	No data
160	Haitians	Present - unknown	No data
161	Callinago	No data	No data
162	Warrau	Transgendered	No data
163	Yanomamo	Sex-gender congruent	Juvenile-egalitarian
164	Carib (Barama)	No data	No data
165	Saramacca	No data	No data
166	Mundurucu	Absent	No data

167	Cubeo (Tucano)	Age-stratified	Juvenile-egalitarian
168	Сауара	Absent	No data
169	Jivaro	Transgendered	No data
17	lbo (Igbo)	Absent	No data
170	Amahuaca	No data	No data
171	Inca	Transgendered	No data
172	Aymara	Transgendered	No data
173	Siriono	Present - unknown	No data
174	Nambicuara	Sex-gender congruent	Age-stratified-unknown
175	Trumai	Juvenile-egalitarian	Age-stratified
176	Timbira (Canela)	Transgendered	No data
177	Tupinamba	Transgendered	No data
178	Botocudo	No data	No data
179	Shavante (Serente)	Absent	No data
18	Fon	Sex-gender congruent	Juvenile-egalitarian
	Aweikoma		
180	(Kainggang)	Absent	No data
181	Сауиа	No data	No data
182	Lengua	No data	No data
183	Abipon	No data	No data
184	Mapuche	Transgendered	No data
185	Tehuelche	Transgendered	No data
186	Yahgan	Present - unknown	No data
19	Ashanti	Age-stratified	No data
2	Kung Bushmen	Juvenile-egalitarian	No data
20	Mende	No data	No data
21	Wolof	Transgendered	No data

22	Bambara	No data	No data
23	Tallensi	No data	No data
24	Songhai	No data	No data
25	Pastoral Fulani	No data	No data
26	Hausa	Transgendered	No data
27	Massa (Masa)	No data	No data
28	Azande	Age-stratified	No data
29	Fur (Darfur)	No data	No data
3	Thonga (Bathonga)	Transgendered	Age-stratified-nm
30	Otoro Nuba	Transgendered	No data
31	Shilluk	No data	No data
32	Мао	No data	No data
33	Kaffa (Kafa)	No data	No data
34	Masai	Absent	No data
35	Konso	Transgendered	No data
36	Somali	No data	No data
37	Amhara	Transgendered	No data
38	Bogo	No data	No data
39	Kenuzi Nubians	No data	No data
4	Lozi	No data	No data
40	Teda	No data	No data
41	Tuareg	Age-stratified	No data
42	Riffians	Present - unknown	No data
43	Egyptians	Age-stratified	No data
44	Hebrews	Present - unknown	No data
45	Babylonians	Present - unknown	No data

46Rwala BedouinPresent - unknown47TurksAge-stratified48Gheg AlbaniansSex-gender Congruent49RomansAge-stratified5MbunduPresent - unknown	No data         Present - unknown         Age-stratified-nm         No data         No data
48Gheg AlbaniansSex-gender Congruent49RomansAge-stratified	Age-stratified-nm No data
49 Romans Age-stratified	No data
5 Mbundu Present - unknown	No data
50 Basques Present - unknown	No data
51 Irish Absent	No data
52 Lapps Absent	No data
53 Yurak Samoyed No data	No data
54 Russians Age-stratified	No data
55 Abkhaz Present - unknown	No data
56 Armenians No data	No data
57 Kurd Sex-gender Congruent	Juvenile-egalitarian
58 Basseri No data	No data
59 Punjabi (West) Present - unknown	No data
Suku (Orang Suku	
6 Laut) Absent	No data
60 Gond Juvenile-egalitarian	Present - unknown
61 Toda Present - unknown	No data
62 Santal Transgendered	Present - unknown
63 Uttar Pradesh No data	No data
64 Burusho Transgendered	No data
65 Kazak Sex-gender Congruent	No data
66     Khalka Mongols     Age-stratified	No data
67 Lolo Sex-gender Congruent	Juvenile-egalitarian
68 Lepcha Present - unknown	No data
69 Garo Juvenile-egalitarian	Present - unknown

Remba	No data	No data
Lakher	No data	No data
Burmese	Transgendered	No data
Lamet	No data	No data
Vietnamese	Transgendered	Age-stratified-unknown
Rhade	No data	No data
Khmer	No data	No data
Siamese	Present - unknown	No data
Semang	Age-stratified	No data
Nicobarese	No data	No data
Andamanese	Sex-gender Congruent	No data
Nyakyusa	Age-stratified	Juvenile-egalitarian
Vedda	No data	No data
Tanala	Transgendered	No data
Negri Sembilan	Transgendered	No data
Javanese	Transgendered	No data
Balinese	Transgendered	No data
Iban	Transgendered	No data
Badjau	Transgendered	Sex-gender congruent
Toradja	Transgendered	No data
Tobelorese	No data	No data
Alorese	Juvenile-egalitarian	No data
Hadza	Juvenile-egalitarian	No data
Tiwi	Sex-gender Congruent	No data
Aranda	Sex-gender Congruent	Age-stratified-nm
Orokaiva	Transgendered	No data
	BurmeseBurmeseLametVietnameseRhadeKhmerSiameseSemangNicobareseAndamaneseNyakyusaVeddaTanalaNegri SembilanJavaneseBalineseIbanBadjauToradjaTobeloreseAloreseHadzaTiwiAranda	LakherNo dataBurmeseTransgenderedLametNo dataVietnameseTransgenderedRhadeNo dataKhmerNo dataSiamesePresent - unknownSemangAge-stratifiedNicobareseNo dataAndamaneseSex-gender CongruentNyakyusaAge-stratifiedVeddaNo dataTanalaTransgenderedJavaneseTransgenderedJavaneseTransgenderedIbanTransgenderedIbanTransgenderedToradjaTransgenderedTobeloreseNo dataAloreseJuvenile-egalitarianTiwiSex-gender CongruentArandaSex-gender Congruent

93	Kimam	Sex-gender Congruent	No data
94	Kapauku	No data	No data
95	Kwoma	Juvenile-egalitarian	No data
96	Manus	Juvenile-egalitarian	No data
97	New Ireland (Lesu)	Absent	No data
98	Trobrianders	Present - unknown	No data
99	Siuai	Present - unknown	No data

#### Кеу

#### SCCS#:

Culture's Numerical Identification in the Standard Cross-Cultural Sample

#### Culture:

Name of culture

Primary Same Sex Classification:

Male same sex classification used for Table 2

Secondary Same Sex Classification:

Male same sex classification used for Table 3

# Data Sources by Society for Classification of Male Same Sex Behavior

# <u>Abkhaz</u>

Luzbetak, L. J. (1951:169-171). *Marriage and the family in Caucasia*. New York, NY: Johnson Reprint Corporation.

# <u>Ajie</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Aleut</u>

Callender, C., Kochems, L. M., (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

# <u>Alorese</u>

Du Bois, C. A., Kardiner, A., Oberholzer, E., & others. (1944:70). *The people of Alor: A social-psychological study of an east Indian island.* Harper.

Greenberg, D. F. (1990:69). The construction of homosexuality. University of Chicago Press.

# <u>Amhara</u>

Messing, S. D. (1957:550). The highland-plateau Amhara of Ethiopia. *Dissertations available from ProQuest*. Paper AAI0023619. http://repository.upenn.edu/dissertations/AAI0023619. Cited in:

Greenberg, D. F. (1990:61). The construction of homosexuality. University of Chicago Press.

#### **Andamanese**

Cipriani, L. (1961:493). Hygiene and medical practices among the Onge (little Andaman). *Anthropos*, 481-500.

Cipriani, L., Cox, D. T., & Cole, L. (1966:22). *The Andaman islanders*. Weidenfeld and Nicolson London.

Greenberg, D. F. (1990:69). *The construction of homosexuality*. University of Chicago Press.

Gregersen, E. (1996). *The world of human sexuality: Behaviors, customs, and beliefs*. Ardent Media.

#### <u>Aranda</u>

Strehlow, C. (1913:38). *Das sociale Leben der Aranda-und Loritja-Stämme*. Frankfurt: Baer.Cited in: Murray, S. O. (2000:26). *Homosexualities*. University of Chicago Press.

# <u>Ashanti</u>

Cardoso, F. L. & Werner, D. (2003). Homosexuality. In *Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* (pp. 204-215). Springer Science & Business Media.

# Aweikoma (Kaingang)

Henry, J. (1964:18). *Jungle people: A Kaingáng tribe of the highlands of Brazil.* New York: Vintage Books.

# <u>Aymara</u>

Mitchell, W. (2003). Aymara. In *Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* (pp. 274-282). Springer Science & Business Media.

# <u>Azande</u>

Evans-Pritchard, E. E. (1970:1430). Sexual inversion among the Azande. *American Anthropologist*, *72*(6), 1428-1434. Cited in: Murray, S. O. (2000:161). *Homosexualities.* University of Chicago Press.

Evans-Pritchard, E. E. (1971:183). *The Azande: History and political institutions*. Clarendon Press Oxford. Cited in: Murray, S. O. (2000:161). *Homosexualities*. University of Chicago Press.

# <u>Aztec</u>

Kimball, G. (1993). Aztec homosexuality: The textual evidence. *Journal of Homosexuality*, *26*(1), 7-24.

# <u>Badjau</u>

Murray, S. O. (2002:139). Pacific homosexualities. Universe.

Nimmo, H. (1978:94). The relativity of sexual deviance: A Sulu example. U. of Oklahoma Press.

#### **Balinese**

Parker, L. (2003). Balinese. In *Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* (pp. 303-313). Springer Science & Business Media.

#### **Basques**

del Valle, T., & Begiristain, J. A. (1985:212). Mujer vasca: Imagen y realidad. Anthropos.

Dynes, W. R. (1992:199). *History of homosexuality in Europe and America* (Vol. 5). Taylor & Francis.

# <u>Bellacoola</u>

Callender, C., Kochems (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Bororo</u>

Baldus, H., & Lillios, I. (1937:30). Social Position of The Woman Among The Eastern Bororo. *Ensaios De Etnologia Brasileira, By Herbert Baldus*. Sao Paulo, Brazil: Companhia Editora Nacional.

# <u>Burmese</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Burusho</u>

Tobe, J. H. (1960:465-466). *Hunza: Adventures in a land of paradise.* St. Catharines, Ont.: Provoker Press.

# <u>Cayapa</u>

Altschuler, M. (1971). Cayapa personality and sexual motivation. *Human Sexual Behavior*, 38-58.

# <u>Chinese</u>

Greenberg, D. F. (1990:92,439-441). *The construction of homosexuality*. University of Chicago Press.

Hinsch, B. (1990). *Passions of the cut sleeve: The male homosexual tradition in china*. University of California Press.

# <u>Chiricahua</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Chukchee</u>

Cardoso, F. L. & Werner, D. (2003). Homosexuality. In *Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* (pp. 204-215). Springer Science & Business Media.

Bogoras, W. (1950). *Materials for study of the Chukchee language and folklore: Collected in the Kolyma district*. TL Bolt. Cited in: Murray, S. O. (2000:314). *Homosexualities*. University of Chicago Press.

# <u>Comanche</u>

Linton, R. (1945:84). The Comanche. In A. Kardiner (Ed.), *The psychological frontiers of society* (pp. 47-99).

# <u>Creek</u>

Katz, J. (1976). *Gay American history: Lesbians and gay men in the USA: A documentary history.* Plume. Cited in:

Greenberg, D. F. (1990:86). The construction of homosexuality. University of Chicago Press.

Le Moyne, J. (1875). Narrative of le moyne, an artist who accompanied the French expedition to Florida under laudonniere, 1564. *Translated From the Latin of De Bry. Boston.* Cited in: Greenberg, D. F. (1990:86). *The construction of homosexuality.* University of Chicago Press.

Swanton, J. R. (1922). *Early history of the creek Indians and their neighbors* (Vol. 73). Government Printing Office. Cited in: Greenberg, D. F. (1990:86). *The construction of homosexuality*. University of Chicago Press.

Swanton, J. R. (1924:697). *Annual report of the Bureau of American Ethnology: Aboriginal culture of the southeast* (Vol. 42). US Government Printing Office.

#### <u>Crow</u>

Callender, C., Kochems, L. M., (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

Denig, E. T. (1961:187). *Five Indian tribes of the upper Missouri: Sioux, Arickaras, Assiniboines, Crees, Crows* (Vol. 59). University of Oklahoma Press.

#### Cubeo (Tucano)

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Goldman, I. (1963:181). *The Cubeo Indians of the Northwest Amazon*. University of Illinois Press.

Greenberg, D. F. (1990:68). The construction of homosexuality. University of Chicago Press.

Jackson, J. E. (1983:189). *The fish people: Linguistic exogamy and Tukanoan identity in Northwest Amazonia.* Cambridge University Press.

Reichel-Dolmatoff, G. (1971:19). *Amazonian cosmos: The sexual and religious symbolism of the Tukano Indians.* University of Chicago Press Chicago.

# <u>Cuna (Tule)</u>

Tice, K. E. (1995:74, 152). *Kuna crafts, gender, and the global economy.* University of Texas Press.

Howe, J. (2003). Balinese. In *Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* (pp. 581-591). Springer Science & Business Media.

# **Egyptians**

Ammar, H. (1998:192). *Growing up in an Egyptian village: Silwa, province of Aswan* (Vol. 4). Taylor & Francis.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Klunzinger, C. B. (1878:190). Upper Egypt: Its people and its products. AMS Press Inc.

Murray, S. O. (2000:43, 189-190). *Homosexualities*. University of Chicago Press.

# <u>Eyak</u>

Callender, C., Kochems, L. M (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Fon</u>

Herskovits, M. (1938:289). Dahomey: An ancient west African kingdom. (2 vols.). Cited in: Murray, S. O. (2000:250-253, 364-365). *Homosexualities.* University of Chicago Press.

# <u>Garo</u>

Sinha, T. (1966:97). *The psyche of the Garos.* Anthropological Survey of India, Government of India.

# **Gheg Albanians**

Hahn, Johann Georg von. (1853), *Albanesische Studien*. Jena: Mauke.Cited in: Murray, S. O. (2000:60-62). *Homosexualities*. University of Chicago Press.

#### **Gilbertese**

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# Gilyak (Nivkh)

Black, L. (1973:66). The Nivkh (Gilyak) of Sakhalin and the lower Amur. *Arctic Anthropology*, 1-110.

Shternberg, L. I. A. K. (1999). *The social organization of the Gilyak* (Vol. 82). American Museum of Natural History.

# <u>Goajiro</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### Gond

Elwin, V. (1947:447, 656). The Muria and their ghotul. In Oxford university press.

Fuchs, S. (1960). The Gond and Bhumia of Eastern Mandla. Bombay, NY: Asia Pub. House.

#### Gros Ventre

Callender, C., Kochems, L. M (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### <u>Hadza</u>

Marlowe, F. (2003). Hadza. In *Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* (pp. 425-432). Springer Science & Business Media.

#### <u>Haitians</u>

Herskovits, M. J. (1937:117). Life in Haitian valley. Anchor Books.

Simpson, G. E. (1942). SEXUAL AND FAMILIAL INSTITUTIONS IN NORTHERN HAITI\*. *American Anthropologist*, *44*(4), 655-674.

# <u>Hausa</u>

Besmer, Fremont E. 1983. *Horses, Musicians & Gods: The Hausa Cult of Possession-Trance.* South Hadley, Mass.: Bergin & Garvey Publishers.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Smith, M. F. (1954:64). Baba of karo, a woman of the Muslim Hausa. Yale University Press.

# <u>Havasupai</u>

Broude, G. J., & Greene, S. J. (1976). Cross-cultural codes on twenty sexual attitudes and practices. *Ethnology*, *15*(4), 409-429.

Whitam, F. L., & Mathy, R. M. (1986). *Male homosexuality in four societies: Brazil, Guatemala, the Philippines, and the United States.* New York: Praeger

# <u>Hebrews</u>

Broude, G. J., & Greene, S. J. (1976). Cross-cultural codes on twenty sexual attitudes and practices. *Ethnology*, *15*(4), 409-429.

# <u>Hidatsa</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### <u>Huichol</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Jurgenson, J. L. (1997). Mexico. In D. J. West & R. Green (Eds.), *Sociolegal control of homosexuality* (pp. 87-96). Springer.

Lumsden, I. (1991). Homosexuality, society and the state in Mexico. Canadian Gay Archives.

Zingg, R. M., Pfeiffer, H., & Pfeiffer, M. H. (1937:111, 141). *The Huichols: Primitive artists*. GE Stechert.

# <u>Iban</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Haddon, A. C., & Start, L. E. (1936). *Iban or sea Dayak fabrics and their patterns.* University Press. Cited in: Murray, S. O. (2000:331). *Homosexualities.* University of Chicago Press.

Van der Kroef, J. M. (1954). Transvestism and the religious hermaphrodite in Indonesia. *University of Manila Journal of East Asiatic Studies*, *3*, 257-265. Cited in: Murray, S. O. (2000:331). *Homosexualities*. University of Chicago Press.

# <u>Ibo (Igbo)</u>

Smith, D. J. (2003). Igbo. In *Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* (pp. 508-516). Springer Science & Business Media.

Ottenberg, Simon. 1989. *Boyhood Rituals In An African Society: An Interpretation.* Seattle: University of Washington Press.

# <u>lfugao</u>

Kwiatkowski, L. M. (2003). Ifugao. In *Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* (pp. 498-507). Springer Science & Business Media.

# <u>Inca</u>

Murra, J. V. (1980:154). *The economic organization of the Inka state* (Vol. 1). Jai Press Greenwich, CT.

# <u>Ingalik</u>

Callender, C., Kochems, L. M (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Irish</u>

Arensberg, C. M., & Kimball, S. T. (1940). Family and community in Ireland. In Harvard University Press.

Messenger, J. C. (1971). Sex and repression in an Irish folk community. *Human Sexual Behavior: Variations in the Ethnographic Spectrum*, 3-37.

# Isthmus Zapotec

Chiñas, B. (1973). *The Isthmus Zapotecs: Women's roles in cultural context*. Holt, Rinehart and Winston New York.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Japanese</u>

Cardoso, F. L., & Werner, D W. (2004). Homosexuality. *In Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* Carol Ember and Melvin Ember, eds. P. 204-215. New Haven: Human Relations Area Files

Ihara, S. (1972). Comrade loves of the Samurai. Rutland, VT: Tuttle.

Leupp, G. P. (1994). *Male colors: The construction of homosexuality in Tokugawa Japan*. Berkeley: University of California Press.

Murray, S. O. (2000:70). *Homosexualities*. University of Chicago Press.

Pinkerton, S. D., & Abramson, P. R. (1997:67). Japan. In D. J. West & R. Green (Eds.), *Sociolegal control of homosexuality* (pp. 67:85). Springer.

# <u>Javanese</u>

Beatty, A. (2002:485). Changing places: Relatives and relativism in java. *Journal of the Royal Anthropological Institute*, *8*(3), 469-491.

Geertz, C. (1976:291, 295). *The religion of java*. University of Chicago Press.

Koentjaraningrat. (1985:231). *Javanese culture*. Issued under the auspices of the Southeast Asian Studies Program, Institute of Southeast Asian Studies [by] Oxford University Press.

# <u>Jivaro</u>

Tessmann, G. (1930:361). *The Indians of northeastern Peru.* Hamburg: Friedrichsen, de Gruyter & Co.

# <u>Kaska</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Callender, C., Kochems, L. M (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

# <u>Kazak</u>

Werner, C. (2004). Kazakhs. *In Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* Carol Ember and Melvin Ember, eds. P. 572-580. New Haven: Human Relations Area Files

#### Khalka Mongols

Maiskii, I. (1921:73). *Contemporary Mongolia*. Irkutskoe Otdelenie: Gosudarstvennoe Izdatel'stvo.

# <u>Kikuyu (Gikuyu)</u>

Kenyatta, J. (1953). *Facing Mount Kenya: The traditional life of the Gikuyu.* London: Secker and Warburg.

# <u>Kimam</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Klamath</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Callender, C., Kochems, L. M (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

# <u>Konso</u>

Hallpike, C. R. (1972:150-151). The Konso of Ethiopia. In *A study of the values of Cushitic people*. Cambridge University Press. Cited in: Greenberg, D. F. (1990:61). *The construction of homosexuality*. University of Chicago Press.

#### <u>Koreans</u>

Kim, Y. -G., & Hahn, S. -J. (2006). Homosexuality in ancient and modern Korea. In *Culture, health & sexuality* (Vol. 8, pp. 59-65). Taylor & Francis.

#### Kung Bushmen

Shostak, M. (1981:113-115). *Nisa: The life and words of a !Kung woman.* Cambridge, MA: Harvard University Press.

# <u>Kurds</u>

Hansen, H. H. (1961:176). *The Kurdish woman's life: Field research in a Muslim society, Iraq* (Vol. 7). Nationalmuseet.

Murray, S. O. (2000:54). *Homosexualities*. University of Chicago Press.

Masters, W. M. (1954:80, 263). *Rowanduz: A Kurdish administrative and mercantile center*. University Microfilms.

# <u>Kutenai</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Kwoma</u>

Whiting, J. W. M. (1941:50-51). Becoming a Kwoma: Teaching and learning in a new guinea tribe. Cited in: Greenberg, D. F. (1990:67). *The construction of homosexuality*. University of Chicago Press.

# <u>Lango</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, 29(2), 178.

# <u>Lepcha</u>

Gorer, G. (1967:102, 120). *Himalayan village: An account of the Lepchas of Sikkim*. Basic Books New York.

Morris, J. (1938:191). *Living with Lepchas: A book about the Sikkim Himalayas.* W. Heinemann Limited.

#### Mae Enga

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### <u>Manchu</u>

Edwards, W. (n.d.). <u>Homosexuality and communist china: Cultural legacy and reform in China.</u> Thesis. Published by The Kinsey Institute, University of Indiana. <u>http://www.indiana.edu/~kinsey/library/e-text/Edwards/Edwards\_biblio.html</u>

#### <u>Manus</u>

Mead, M. (1930:165, 193, 198). Growing up in new guinea. Morrow & company. New York.Cited in: Greenberg, D. F. (1990:67). *The construction of homosexuality.* University of Chicago Press.

# <u>Maori</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, 29(2), 178.

#### <u>Mapuche</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### **Marguesans**

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### Marshallese (Majuro)

Erdland, A. (1914:107). *The Marshall islanders; life and customs, thought and religion of a south seas people*. Anthropos Bibliothek Ethnological Monographs.

Dvorak, G. (2014) "Two Sea Turtles: Intimacy between Men in the Marshall Islands" in Besnier, N., & Alexeyeff, K. (Eds.), Gender on the edge: Transgender, gay, and other Pacific Islanders. Hong Kong University Press.

#### <u>Masai</u>

Talle, A. (2004). Maasai. *In Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* Carol Ember and Melvin Ember, eds. P. 608-618. New Haven: Human Relations Area Files

#### Mbau Fijians

Bullough, V. L. (1976). Sexual variance in society and history. John Wiley & Sons.

Presterudstuen, G.-H. (2014). Men trapped in women's clothing: homosexuality, crossdressing, and masculinity in Fiji Gender on the Edge: Transgender, Gay, and Other Pacific Islanders (pp. 162).

#### <u>Mbundu</u>

Broude, G. J., & Greene, S. J. (1976). Cross-cultural codes on twenty sexual attitudes and practices. *Ethnology*, *15*(4), 409-429.

# <u>Mbuti</u>

Turnbull, C. M. (1976:121). *Wayward servants: The two worlds of the African pygmies.* Greenwood Pub Group.

Turnbull, C. M. (1983:56). *The Mbuti pygmies: Change and adaptation*. Holt, Rinehart, and Winston.

# <u>Micmac</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Mundurucu</u>

Blackwood, E. (2013). *The many faces of homosexuality: Anthropological approaches to homosexual behavior.* Routledge.

#### <u>Murngin</u>

Minturn, L., Grosse, M., & Haider, S. (1969). Cultural patterning of sexual beliefs and behavior. *Ethnology*, *8*(3), 301-318.

#### Nama Hottentot

Schapera, I. (1930:242, 322). Culture of the Hottentots. In I. Schapera (Ed.), (Vol. The Khoisan Peoples of South Africa; Bushmen and Hottentots, pp. 221-418). London: Routledge.

#### Nambicuara

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, 29(2), 178.

Lévi-Strauss, C. (1948:86, 95). *Family and social life of the Nambikwara Indians.* Soc. des Américanistes.

Levi-Strauss, C. (1948:366). The Nambicuara. US Government Printing Office.

Strauss, C. L. (1943:400). The social use of kinship terms among Brazilian Indians. *American Anthropologist*, *45*(3), 398-409.

Price, D. (1981:698-699). Nambiquara leadership. American Ethnologist, 686-708.

# <u>Natchez</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, 29(2), 178.

#### <u>Navaho</u>

Callender, C., Kochems, L. M, S. E. (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

#### Negri Sembilan

Peletz, M. G. (1996:123-124, 128-131). *Reason and passion: Representations of gender in a Malay society.* University of California Press.

#### New Ireland (Lesu)

Powdermaker, H. (1933). Life in Lesu. In WW Norton & Co.

#### Nkundo Mongo

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, 29(2), 178.

Hulstaert, G. (1938). *Le marriage des Nkundo*. Brussels: Librairie Falk. Cited in: Murray, S. O. (2000:197-198). *Homosexualities*. University of Chicago Press.

#### <u>Nyakyusa</u>

Blackwood, E. (2013). *The many faces of homosexuality: Anthropological approaches to homosexual behavior*. Routledge.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Wilson, G. (1936:273). An introduction to Nyakyusa society. *Bantu Studies*, 10(1), 253-291.

Wilson, M. H. (1959:197). *Communal rituals of the Nyakyusa*. Published for the International African Institute by the Oxford University Press.

#### <u>Omaha</u>

Callender, C., Kochems, L. M (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### <u>Orokaiva</u>

Herdt, G. H. (1993). Ritualized homosexuality in Melanesia. University of California Press.

#### Otoro Nuba

Nadel, S. F. (1947). *The Nuba: An anthropological study of the hill tribes in Kordofan.* AMS Press Inc.

# Paiute (Northern)

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### <u>Papago</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Mondimore, F. M. (2010). A natural history of homosexuality. JHU Press.

#### <u>Pawnee</u>

Callender, C., Kochems, L. M., (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Dorsey, G. A., Murie, J. R., & Spoehr, A. (1940). Notes on Skidi Pawnee society. *Publications of the Field Museum of Natural History. Anthropological Series*, 67-119.

Weltfish, G. (1965:29). *The lost universe: With a closing chapter on the universe regained* (Vol. 121). New York, Basic Books.

#### Pentecost (Vanautu)

Jowitt, A. (2005). Reconstructing custom: the politics of homophobia in Vanuatu. *Alternative Law Journal*, *30*, 10.

#### Pomo (Eastern)

Callender, C., Kochems, L. M., Bleibtreu-Ehrenberg, G., Broch, H. B., Brown, J. K., Datan, N., . . . Jacobs, S. E. (1983). The North American berdache [and comments and reply]. *Curren Anthropology*, 443-470.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Popoluca</u>

Yetman, D. A. (2010:56). *The Opatas: In search of a Sonoran people*. University of Arizona Press.

#### <u>Pukapuka</u>

Greenberg, D. F. (1990:59). *The construction of homosexuality*. University of Chicago Press.

#### Punjabi (West)

Broude, G. J., & Greene, S. J. (1976). Cross-cultural codes on twenty sexual attitudes and practices. *Ethnology*, *15*(4), 409-429.

# **Riffians**

Broude, G. J., & Greene, S. J. (1976). Cross-cultural codes on twenty sexual attitudes and practices. *Ethnology*, *15*(4), 409-429.

#### <u>Romans</u>

Greenberg, D. F. (1990). The construction of homosexuality. University of Chicago Press.

Lewis, N., & Reinhold, M. (1966:267). *Roman civilization: Sourcebook ii: The empire*. New York: Harper and Row.

Murray, S. O. (2000). Homosexualities. University of Chicago Press.

#### **Russians**

Greenberg, D. F. (1990). The construction of homosexuality. University of Chicago Press.

Schuyler, E. (1876). *Turkistan: Notes of a journey in Russian Turkistan, Khokand, Bukhara, and Kuldja* (Vol. 2). S. Low, Marston, Searle & Rivington. Cited in: Murray, S. O. (2000:192-193). *Homosexualities.* University of Chicago Press.

#### Rwala Bedouin

Musil, A. (1928:473). *The manners and customs of the Rwala Bedouins* (Vol. 6). American Geographical Society.

#### <u>Samoans</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Santal</u>

Mukherjea, C. (1962:401,409,483). *The Santals* (Vol. 3). Calcutta: A. Mukherjee & Co., Private Ltd.

#### Saulteaux (Ojibwa)

Callender, C., Kochems, L. M (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

Grant, P. (1890:357). The Saulteaux Indians about 1804. Les Bourgeois De La Compagnie Du Nord-Ouest: Recits Des Voyages, Inedits Relatifs Au Nord-Ouest Canadien, 2.

Landes, R. (1937:54). Ojibwa sociology (Vol. 29). Columbia University Press.

# <u>Semang</u>

Neill, J. (2008:52). The origins and role of same-sex relations in human societies. McFarland.

#### Shavante (Serente)

Maybury-Lewis, D. (1967:83). Akwe-Shavante society. Clarendon Press Oxford.

Nimuendajú, C. (1942:25). The Serente (Vol. 4). Southwest Museum Administrator of the Fund.

#### <u>Sherpa</u>

Cameron, M. W. (2004). Nepali. *In Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* Carol Ember and Melvin Ember, eds. P.733-740. New Haven: Human Relations Area Files

#### Siamese\*

Kaufman, H. K. (1960:136). *Bangkhuad: A community study in Thailand* (Vol. 10). Tuttle Publishing.

Totman, R. (2003). *The third sex—kathoey: Thailand's ladyboys*. London, England: Souvenir Press.

# <u>Siriono</u>

Holmberg, A. R. (1946:189). *The Siriono: A study of the effect of hunger frustration on the culture of a semi-nomadic Bolivian Indian society*. Human Relations Area Files.

# <u>Siuai</u>

Oliver, D. L. (1955:498-499). A Solomon island society: Kinship and leadership among the Siuai of Bougainville. Harvard University Press Cambridge, Mass.

# <u>Siwans</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Slave</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Honigmann, J. J., & Anthropology, Y. U. D. O. (1946:84, 110). *Ethnography and acculturation of the Fort Nelson slave*. New Haven: Published for the Department of Anthropology, Yale University, Yale University Press.

# Suku (Orang Suku Laut)

Lenhart, L. (2004). Orang Suku Laut. *In Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* Carol Ember and Melvin Ember, eds. P. 750-759. New Haven: Human Relations Area Files

# <u>Tanala</u>

Broude, G. J., & Greene, S. J. (1976). Cross-cultural codes on twenty sexual attitudes and practices. *Ethnology*, *15*(4), 409-429.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### <u>Tehuelche</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Cooper, J. M. (1946). *Patagonian and Pampean hunters*. US Government Printing Office. Cited in: Greenberg, D. F. (1990:57). *The construction of homosexuality*. University of Chicago Press.

#### Thonga (Bathonga)

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

Greenberg, D. F. (1990:61). The construction of homosexuality. University of Chicago Press.

Murray, S. O. (2000:164). *Homosexualities*. University of Chicago Press.

# <u>Tikopia</u>

Firth, R. (1936:494-495). *We, the Tikopia: A sociological study of kinship in primitive Polynesia. With a pref. By Bronislaw Malinowski.* Allen & Unwin.

Murray, S. O. (2000:369). *Homosexualities*. University of Chicago Press.

# <u> Timbira (Canela)</u>

Crocker, W. H. (2004). Canela. *In Encyclopedia of Sex and Gender: Men and Women in the World's Cultures.* Carol Ember and Melvin Ember, eds. P. 345-355. New Haven: Human Relations Area Files

# <u>Tiwi</u>

Pilling, A. R. (1992). Homosexuality among the Tiwi of north Australia. *Murray (1992a: 25-32).* Cited in: Murray, S. O. (2000:27). *Homosexualities.* University of Chicago Press.

# <u>Toda</u>

Peter, P. (1963:264). A study of polyandry. *Mouton, the Hague*, 55, 64-69.

#### <u>Toradja</u>

Adriani, N. (1951). The bare'e-speaking Toradja of central Celebes (the east Toradja): Second volume. *Amsterdam: Noord-Hollandsche Uitgevers Maatschappij, HRAF MS. Ix, 810.* Greenberg, D. F. (1990:62). *The construction of homosexuality.* University of Chicago Press.

#### **Trobrianders**

Malinowski, B. (1937:89). Sex and repression in savage society. Bronislaw Malinowski.

Malinowski, B. (1932:453, 469-473). The sexual life of savages in north-western Melanesia: An ethnographic account of courtship, marriage, and family life among the natives of the Trobriand islands, British new guinea. Routledge.

#### Trukese (Chuuk)

Gladwin, T., & Sarason, S. B. (1953:115, 282). Truk: Man in paradise.

#### <u>Trumai</u>

Greenberg, D. F. (1990:11). The construction of homosexuality. University of Chicago Press.

Murphy, R., & Buell, Q. (1955:82-83, 104). *The Trumai Indians of central Brazil*. Locust Vally, N.Y: J. J. Augustin.

#### <u>Tuareg</u>

Lhote, H., & Sipfle, M. (1944:28). The Hoggar Tuareg. Paris: Payot.

# <u>Tupinamba</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Turks</u>

Akgunduz, A., & Ozturk, S. (2011). Ottoman history-misperceptions and truths. IUR Press.

Kinross, L. (1977). *The Ottoman centuries: The rise and fall of the Ottoman Empire*. New York, NY: Morrow Quill Paperbacks.

# Uttar Pradesh

Crooke, W. (1896). The Tribes and Castes of the North-western Provinces and Oudh (Vol. 2). Calcutta: Office of the superintendent of government printing. (Specifically p. 495-497) Opler, M. E. (1961). Further comparative notes on the Hijarā of India. American Anthropologist, 63(6), 1331-1332.

Nanda, S. (1990). Neither man nor woman: The hijras of India. Belmont: Wadsworth Publishing Company <u>Vietnamese</u>

Murray, S. O. (2000:336). *Homosexualities*. University of Chicago Press.

Newton, N. (2015). Homosexuality and Transgenderism in Vietnam. In Handbook of Sexuality Studies in East Asia. Eds. Vera Mackie and Mark McClelland. Abindon, UK: Routledge Press, pp. 255-267.

# <u>Warrau</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, 29(2), 178.

# <u>Wolof</u>

Gorer, G. (1935:11). *Africa dances: A book about West African Negroes.* WW Norton. Cited in: Greenberg, D. F. (1990:61). *The construction of homosexuality.* University of Chicago Press.

Crowder, M. (1959:68). *Pagans and politicians*. London: Hutchinson [1959]. Cited in: Greenberg, D. F. (1990:61). *The construction of homosexuality*. University of Chicago Press.

#### <u>Yahgan</u>

Cooper, J. M. (1917:170). Analytical and critical bibliography of the tribes of Tierra del Fuego and adjacent territory. US Government Printing Office. Cited in: Greenberg, D. F. (1990:81). The construction of homosexuality. University of Chicago Press.

Gusinde, M. (1937). *Die yamana: Vom leben und denken der wassernomaden am kap hoorn.* Verlag der Internationalen Zeitschrift" Anthropos,". Cited in: Greenberg, D. F. (1990:81). *The construction of homosexuality.* University of Chicago Press.

# <u>Yakut</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Yanomamo</u>

Chagnon, N. A. (1966:61-63). *Yanomamö warfare, social organization and marriage alliances.* Dissertation.

Chagnon, N. A. (1968:75). Yaomamö, the fierce people. Holt, Rinehart and Winston.

Early, J. (2014:120). The population dynamics of the Mucajai Yanomama. Elsevier.

Murray, S. O. (2000:372). *Homosexualities*. University of Chicago Press.

#### Yokuts (Lake)

Callender, C., Kochems, L. M (1983). The North American berdache [and comments and reply]. *Current Anthropology*, 443-470.

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, 29(2), 178.

#### Yucatec Maya

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

#### <u>Yukaghir</u>

Neill, J. (2008). The origins and role of same-sex relations in human societies. McFarland.

# <u>Yurok</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.

# <u>Zuni</u>

Crapo, R. H. (1995). Factors in the cross-cultural patterning of male homosexuality: A reappraisal of the literature. *Cross-Cultural Research*, *29*(2), 178.