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Highlight

**THE TALKING CURE OF A VOIDANT
PERSONALITY DISORDER: REMISSION
THROUGH EARNED-SECURE ATTACHMENT**

Jeffrey Guina, M.D.

Dedicated to the Trans-theoretical Practice and Research of Psychotherapy

A Four-Component Model of Sexual Orientation & Its Application to Psychotherapy

BRAD BOWINS, M.D., F.R.C.P.(C)

Distress related to sexual orientation is a common focus in psychotherapy. In some instances the distress is external in nature as with persecution, and in others it is internal as with self-acceptance issues. Complicating matters, sexual orientation is a very complex topic producing a great deal of confusion for both clients and therapists. The current paper provides a four component model—sexual orientation dimensions, activation of these dimensions, the role of erotic fantasy, and social construction of sexual orientation—that in combination provide a comprehensive perspective. Activation of dimensions is a novel contribution not proposed in any other model. With improved understanding of sexual orientation issues, and utilization of this knowledge to guide interventions, psychotherapists can improve outcomes with their clients. Also described is how dimensions of sexual orientation relate to transgender. In addition to improving psychotherapy outcomes, the fourcomponent model presented can help reduce discrimination and persecution, by demonstrating that the capacity for both homoerotic and heteroerotic behavior is universal.

KEYWORDS: sexual orientation; homosexuality; bisexuality; heterosexuality; heteroerotic; homoerotic; transgender

INTRODUCTION

Sexual orientation is a topic charged with reactions, producing anxiety and distress in those grappling with their identities, and triggering prejudice and discrimination from those who do not understand the nature of sexual orientation. Anxiety and distress frequently arise from confusion regarding what sexual orientation means, and how it applies to a given individual. Amongst younger adults there is often uncertainty as to what orientation characterizes them. Frequently, there is fear and guilt related to

Centre for Theoretical Research in Psychiatry & Clinical Psychology. **Mailingaddress:**2200 Yonge Street, Suite 700, Toronto, Ontario, M4S 2C6, Canada. e-mail: brad.bowins@bellnet.ca

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what family and friends will think for sexual orientations other than heterosexual. In addition, the “coming out” process can be one of the most difficult challenges a person faces. Anxiety and distress is often compounded if there are transgender issues. From the perspective of external influences, prejudice and discrimination are still rampant, despite progress in accepting homosexuality, bisexuality, and transgender. Research reveals that discrimination and persecution based on sexual orientation issues is still a very real concern. For example, the 2012 European Union Agency For Fundamental Rights lesbian, gay, bisexual and transgender survey, collected responses from 93,079 LGBT (Lesbian, Gay, Bisexual, Transgender) individuals residing in the EU and Croatia. As pertains to workplace discrimination finding a job and remaining at one in the last 12 months, the results revealed lesbians 21%, gay men 20%, bisexual women 16%, bisexual men 16%, and transgender 29% experienced unfair treatment (European Union Agency For Fundamental Rights, 2012). Regarding violence or harassment in the last five years the average was 26%, and 35% for transgender individuals (European Union Agency For Fundamental Rights, 2012). These experiences greatly add to the anxiety and distress experienced by LGBT individuals.

A major reason for all the confusion, anxiety, distress, and also discrimination, is widespread misunderstanding of what sexual orientation is actually comprised of. Many of those experiencing distress and anxiety regarding sexual orientation issues, present to psychotherapists in the hope of reducing these negative emotions, or recovering from the impact of discrimination. Psychotherapists often help these patients with therapeutic interventions focused on self-acceptance, relationship issues, and trauma. However, given the overall lack of clarity regarding what sexual orientation constitutes, therapists struggle to provide a comprehensive picture to their clients, thereby limiting the potential of psychotherapy. Despite years of research from various perspectives, we still do not fully understand what sexual orientation is. Given the multitude of theories for sexual orientation, only abbreviated coverage of the various proposed explanations will be attempted here, and interested readers can consult the following papers for a more detailed discussion (Blackwood 1985; Byne 1995; Byne & Parsons 1993; Ciani et al., 2008; Dickemann, 1995; Fahs 2009; Haumann 1995; Heenen-Wolff 2011; Gammon & Isgro, 2006; Iasenza 2010; McKenzie 2010; Poiani 2010; Priebe & Svedin 2013; Rahman 2005; Swaab, 2004).

Theories attempting to explain sexual orientation take the form of psychodynamic, social learning, biological, and evolutionary. Regarding psychoanalytic, the focus is on the child's identification with the other-sex parent, related to rejection by the same-sex parent, and consequent adoption of gender characteristics of the identified with other-sex parent, including attraction to those of the same biological sex as the child (Bieber, 1962; Evans, 1969; Freud, 1905/1962). Studies supporting this process were highly flawed, such as utilizing select samples with characteristics that supported the theory, and a comprehensive path analysis by Bell et al. (1981), involving a large sample, found no support for the psychoanalytic perspective. Furthermore, the notion that homosexuals have gender atypical behavior is not supported by research (Friedman, 1988; Friedman & Downey, 2002; Larson, 1981; Storms, 1980). The social learning perspective argues that sexual orientation and gender behaviors arise from reinforcement effects during development, such as a mother reinforcing effeminate behaviors in a son, but the path analysis by Bell et al. (1981) found absolutely no support.

Potentially more promising are a host of biological theories. Various hypothalamic structures have been proposed to account for sexual orientation, such as the interstitial nucleus of the anterior hypothalamus (INAH)-3 (LeVay, 1991), but none has stood up to repeat investigation (Byne et al., 2001). Likewise, specific genes have been implicated, mainly on the female X chromosome as with Hamer et al. (1993), but further studies have not yielded any of particular significance (Rice et al., 1999). Blanchard (2008) discovered that male homosexuals tend to have older brothers, leading to the proposal that anti-male antibodies increase after each male offspring. The theory is deeply flawed for several reasons: First, most male homosexuals are the only child, have sisters, or are the oldest. Second, the male anti-body hypothesis appears to lack validity (Whitehead, 2007). Third, non-representative sampling might have produced the results, as research with more representative sampling has not replicated it (Bearman & Bruckner, 2002). Fourth, non-heterosexual males also have older sisters, and not just older brothers, taking away from the significance of older brothers (Kangassalo et al., 2011).

Evolutionary perspectives attempt to explain the paradox of how genes not leading to reproduction could persist. Wilson (1978) presented the perspective that homosexual individuals are more altruistic to kin, thereby advancing their homosexual genes via kin selection. However, there is no evidence at all that homosexuals are more altruistic (Small, 1995).

Heterozygous advantage proposed by MacIntyre and Estep (1993) states that in a balanced state, akin to sickle cell anemia, a gay gene could be adaptive, perhaps via more effeminate characteristics fostering better childcare in males. This theory is deeply flawed based on the incorrect notion that a single gene leads to homosexuality (Rice et al., 1999), and that homosexuality is associated with other-sex gender characteristics. Emphasizing the role of multiple genes, Miller (2000) proposed balanced polymorphism, whereby in a balanced state there is an adaptive advantage, such as feminizing genes aiding males in childcare. The theory is not supported based on how feminine characteristics are not more common in homosexual males (Friedman, 1988; Friedman & Downey, 2002; Larson, 1981; Storms, 1980), and the incorrect notion that masculinity in males has no value in childrearing, when research indicates that this is false (Tither & Ellis, 2008). Ciani et al. (2008) proposed antagonistic selection, whereby males with homosexual genes do poorly, but their female relatives have a reproductive advantage. The theory is based on complex mathematical projections, and although too detailed to cover here, there are flaws with each of the assumptions, and the predictions are unlikely to hold over the entire spectrum. It also appears to only apply, if at all, to select female relatives in different populations (Vanderlain et al., 2014). In addition, it has nothing to say about female homosexuality.

Interestingly, not one of the proposed explanations appears to consider that sexual orientation conceived as homosexual, heterosexual, or bisexual, might only be a partially accurate description of naturally occurring events. In addition, most theories focus on male homosexuality. While male and female homosexuality could potentially arise from completely different origins, the most parsimonious explanation likely consists of common processes. Although several of the theories have attempted to explain the evolutionary paradox, all fail for a variety of reasons (Blackwood 1985; Byne 1995; Byne & Parsons 1993; Ciani et al., 2008; Dickemann, 1995; Gammon & Isgro, 2006; Haumann 1995; Rahman 2005; Small, 1995; Swaab, 2004).

A four-component model of sexual orientation is presented here providing a comprehensive picture of sexual orientation, resolving the evolutionary paradox of homosexuality, for both male and females. The sexual orientation categories of bisexuality and asexuality, that often provoke more confusion than homosexuality, are also understandable. The four components consist of: Dimensions of sexual orientation, activation of these dimensions, erotic fantasy, and social construction, with activation of dimensions a novel component. Each will be presented, along with a brief discussion regarding

how dimensions of sexual orientation relate to transgender. The information will assist psychotherapists in understanding this complex topic, and will enable them to provide a comprehensive picture of sexual orientation to their clients and intervene more effectively. The four-component model presented will also improve self-acceptance and decrease discrimination.

DIMENSIONAL ORGANIZATION OF HUMAN SEXUAL ORIENTATION

A crucial concept is whether homoerotic and heteroerotic behavior (including actions and cognitive/emotional events such as attraction patterns and fantasy) is organized discretely or continuously. Natural phenomena tend to be organized continuously, because continuums provide for trait variation necessary for natural selection and evolution (Behrman & Kirkpatrick, 2011; Brousseau et al., 2013; Chevin & Lande, 2013; Darwin, 1858). Traits lacking any variation (truly discrete) either persist if selection pressures favor the given characteristics or perish if not favored, an either/or scenario. Ample trait variation provided by a continuous organization of forms, allow for the most adaptive variant/s to become more represented in succeeding generations (Behrman & Kirkpatrick, 2011; Brousseau et al., 2013; Chevin & Lande, 2013; Darwin, 1858). A formal statement that might be referred to as the “continuum principle” is warranted considering our automatic tendency to apply discreteness to what are almost universally continuous variables—Natural phenomena tend to occur on a continuum, and any instance of hypothesized discreteness requires unassailable proof (Bowins, 2015). In regards to sexual orientation, there is no evidence that it is discrete despite the tendency of people to dichotomize it in terms of heterosexual and homosexual, with several researchers from diverse fields of enquiry proposing that it is organized dimensionally (Friedman, 1988; Kauth, 2000; Kinsey et al., 1948; Kinsey et al., 1953; LeVay, 2012; Money, 1988; Muscarella, 1999; Priebe & Svedin, 2013; Shively & DeCecco, 1977; Storms, 1980; Weinrich, 1980, 1982).

While it appears that sexual orientation is dimensional, the question arises as to how many dimensions apply? Although appealing for its simplicity, a single dimension ranging from homosexual to heterosexual, as for example used by Kinsey (1948, 1953), presents some major conceptual and practical problems (Muscarella, 1999; Shively & DeCecco, 1977; Storms, 1980). To start, homosexual and heterosexual motivation must represent a tradeoff, with more of one meaning less of the other. Consequently, a bisexual individual is less hetero than a strictly heterosexual orientation, and less homo than a fully

homosexual orientation. Clearly this is not the case, as many bisexuals report urges for both sexes of comparable or greater strength than strict heterosexuals and homosexuals (Shively & DeCecco, 1977; Storms, 1980). It also implies that strict homosexuals and heterosexuals must have powerful urges towards their respective sex of attraction, not accounting for a range of sexual motivation in both groups. Another major problem involves the fourth so-called dimension of sexual preference—Asexuality. According to a one-dimension model, asexuals, demonstrating very low motivation for either sex are equivalent to bisexuals, an obviously false scenario (Muscarella, 1999; Shively & De Cecco, 1977; Storms, 1980). On the Kinsey scale asexuals have to be placed off the scale with an X rating, or if on the actual scale placed at the same point as bisexuals (Kinsey et al., 1948).

Klein (1993) proposed a multidimensional model of sexual orientation (Klein Sexual Orientation Grid). The grid incorporates different dimensions at three points in a person's life—Past, present, and idealized future. The dimensions consist of sexual attraction, sexual behavior, sexual fantasies, emotional preference, social preference, lifestyle preference, and self-identification, with ratings from 1-7 (other-sex only/heterosexual only to same-sex only/homosexual only). While Klein's grid does provide a rich description of behavior and preferences linked to sexual orientation there are several limitations. One problem being that by trying to provide more dimensions the model ironically might not include enough dimensions, such as age and masculine/feminine behavior. Of even greater significance is that the dimensions proposed appear to be measuring the same construct (Weinrich et al. 1993). A factor analytic study by Weinrich et al. (1993), using 2 samples, found that one factor loaded on all of the grid's 21 components (3 for past, present, and idealized future and the 7 dimensions), meaning that they are all measuring the same construct or dimension. A likely reason for these results is that Klein's "dimensions" probably only constitute descriptors of sexual orientation dimensions. For example, sexual attraction, sexual behavior, sexual fantasies, lifestyle preference, and self-identification, might only describe sexual orientation dimensions and not constitute actual dimensions. Supporting this assertion is the finding by Priebe and Svedin (2013) that different measures of sexual orientation (identity, attraction, and behavior) are significantly associated with each other.

Another method of conceptualizing sexual orientation is two separate dimensions of homoerotic and heteroerotic (Shively & De Cecco 1977; Storms, 1980). According to a two-dimensional model there are both

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homoerotic and heteroerotic motivations applicable to everyone (Shively & De Cecco, 1977; Storms, 1980). This conceptualization of human sexual orientation fits much better with the realities of bisexual and asexual orientations. For example, a bisexual person can have robust desires for both same and other-sex partners, comparable in intensity to homosexuals and heterosexuals, respectively, as fits with observations (Shively & DeCecco, 1977; Storms, 1980). Furthermore, asexual individuals are not placed in the same category as bisexuals or rated off the scale, being accurately characterized by a low or zero standing on both the heteroerotic and homoerotic dimensions. Homosexuals have a lower level of heteroerotic motivation and substantially higher homoerotic motivation, with the reverse pattern for heterosexuals.

If there are separate homoerotic and heteroerotic dimensions, how might they be structured? One option is the model by Michael Storms (1980) plotting homoerotic and heteroerotic motivations on a chart with horizontal and vertical axes. “Hetero-eroticism” is rated on the horizontal axis from low to high, and “homo-eroticism” is placed on the vertical axis also from low to high. According to this representation, asexuals are low on both motivations, bisexuals are high on both, and heterosexuals and homosexuals high on the motivation consistent with their sexual orientation, and low on the one that is inconsistent with their sexual orientation. This precise organization is problematic in that it does not readily allow for low ratings other than for asexuals. What about bisexuals with fairly low motivation for both sexes, homosexuals with higher but limited motivation for same-sex individuals, and heterosexuals with higher but restricted motivation for other-sex partners? Separate side-by-side homoerotic and heteroerotic dimensions appear to make more sense, with asexuals at the very low end of both, homosexuals having higher same-sex motivation regardless of the precise levels, heterosexuals higher other-sex motivation regardless of the precise levels, and bisexuals with variable but substantial motivation for both sexes. Separate homoerotic and heteroerotic dimensions mean that humans have the capacity for both, with motivations ranging from potentially zero to very high.

If there are two dimensions—homoerotic and heteroerotic—for sexual orientation, the question arises as to why this organization evolved? To answer this question it is important to consider sexual behavior in animal species, and in particular homoerotic behavior. Heteroerotic behavior is easier to explain from an evolutionary fitness perspective given that it directly

facilitates reproduction. Homoerotic behavior raises a so-called Darwinian or evolutionary paradox, based on how behavior that seemingly does not facilitate reproduction could have evolved (Adriaens & De Block, 2006). However, homoerotic behavior is clearly present in many species including insects, reptiles, fish, birds, mammals, and primates (Bagemihl, 1999; de Waal, 1982; de Waal & Lansing, 1997; Dunkle, 1991; Edwards & Todd, 1991; Fox, 2001; Goodall, 1965; Kano, 1992; Kirsch & Rodman, 1982; Levan et al., 2009; Mehlman, & Chapais, 1988; Mitchell, 1979; Paoli et al., 2006; Poiani 2010; Smuts and Watanabe, 1990; Vasey, 1995; Vasey, 2004; Vasey & Jiskoot, 2010; Weinrich, 1982; Yamagiwa, 1987). In primates it has been observed and studied in many species such as Japanese macaques (Mehlman, & Chapais, 1988; Vasey, 2004; Vasey & Jiskoot, 2010), stumptail macaques (Mitchell, 1979), rhesus monkeys (Mitchell, 1979), white-handed gibbons (Edwards & Todd, 1991), yellow baboons (Smuts and Watanabe, 1990), as well as great apes including chimpanzees, bonobos, mountain gorillas, and orangutans (de Waal, 1982; de wall & Lansing, 1997; Edwards & Todd, 1991; Fox, 2001; Goodall, 1965; Kano, 1992; Paoli et al., 2006; Taub, 1990; Yamagiwa, 1987).

Interactions with members of the same species can be social or sexual, and involve same-sex and other-sex individuals. These interactions are well characterized by the terms homosocial and heterosocial for non-sexual interactions, and homoerotic and heteroerotic for sexual interactions (Muscarella, 1999; Muscarella, 2000). Some of the specific functions proposed for homoerotic behavior amongst animal species include proceptivity enhancement (stimulation aiding in heterosexual sex), receptivity reduction (ensuring that a competitors reproductive energy is wasted facilitating more reproductive opportunities for the initiator of this strategy), expulsion of low-quality sperm, ritualized aggression to establish dominance and territory, practice for heterosexual copulation, tension regulation, reconciliation, and alliance formation (Bagemihl, 1999; deWaal & Lansing, 1997; Kirsch & Rodman, 1982; Levan et al., 2009, Poiani, 2010; Savage-Rumbaugh, & Wilkerson, 1978; Van der Dennen, 1995; Vasey, 1995). The first three explanations seem to apply more to cognitively simpler animals such as reptiles (Kirsch & Rodman, 1982; Levan et al., 2009).

Reviewing the literature on 33 primate species demonstrating homoerotic behavior, Vasey (1995) found the strongest support for alliance formation, with substantial support also for reconciliation and tension reduction. These three functions actually align in that they promote social solidarity amongst

same-sex individuals. Fairbank et al. (1977) proposed that alliance formation could provide an adaptive explanation for homosexual behavior. Male yellow baboons mounting and manipulating the other's genitalia form solid alliances against other males (Smuts and Watanabe, 1990). In bonobos female homoerotic behavior allows partners to monopolize food sources and guard against male harassment (Kano, 1992). Homoerotic alliance formation actually appears to enhance survival and reproductive success (Akers & Conway, 1979; deWaal & Lansing, 1997; Muscarella, 2000; Small, 1993; Vasey, 1995; Weinrich, 1980). For example, less dominant baboon and rhesus males, who occupy perimeter positions making them more vulnerable to attack, frequently form homoerotic connections not involving dominant-submissive displays (Mori, 1979; Pusey & Packer, 1987). These relationships help ensure assistance in the event of an attack by a predator or aggression by a more dominate male if an attempt is made to reproduce (Mori, 1979; Pusey & Packer, 1987; Vasey, 1995). Homoerotic behavior can be quite extensive including mutual embracing, grooming, penis display, touching, mutual masturbation, oral stimulation and mounting (Muscarella, 2000).

More directly demonstrating an enhancement of evolutionary fitness, homoerotic behavior can actually increase access of subordinate males to reproductively active females (Akers & Conway, 1979; Boelkins & Wilson, 1972; Hanby et al., 1971; Muscarella, 2000). For example, sexual activity between peripheral males can stimulate increased testosterone that in combination with alliance formation, leads to reproductive opportunities (Muscarella, 2000). Frequently, younger peripheral male rhesus monkeys establish homoerotic relationships with more dominant established males, the former gaining social support and elevated dominance status, thereby increasing the chances of reproduction (Boelkins & Wilson, 1972). The dominance status of lower ranking female rhesus monkeys and Japanese macaques, has also been observed to be elevated when the individual forms a homoerotic alliance with a more socially dominant female (Akers & Conway, 1979; Hanby et al., 1971). Elevated status and alliance formation means protection, resources, and reproductive access to the more dominant males of the group, presumably possessing better quality genes (Akers & Conway, 1979; Hanby et al., 1971; Muscarella, 2000). Amongst bonobos an individual who does not form homoerotic alliances is at a distinct disadvantage when it comes to securing important resources including mates (deWaal & Lansing, 1997).

Although it is difficult to directly relate sexual behavior in animals to humans, it is unlikely that human sexuality arose completely independently. Nature tends to conserve adaptations refining and building on existing templates, suggesting that the homoerotic and heteroerotic templates are likely to continue in humans. Furthermore, considering the extensive similarities between primates and humans, it is reasonable to expect that homoerotic alliance formation, and the related social functions of tension reduction and reconciliation, might play a role in human homoerotic behavior (Muscarella, 1999, 2000). Human homoerotic behavior dates well back into prehistory with 17,000-year old Paleolithic cave paintings showing male erections connected (Ross, 1973). Furthermore, it has been recorded in many cultures past and present (Ford & Beach, 1951; Greenberg, 1988; Herdt, 1988). Commonly male homoerotic behavior occurs between young men undergoing initiation into adulthood and more dominant older men (Ford & Beach, 1951; Mackey, 1990). Such unions appear to elevate the status of the younger lower ranking male, enabling him to acquire higher status mates for himself and relatives (Boswell, 1994; Cantarella, 1992; Hirsch, 1990; Kauth, 2001; Muscarella, 2000). This occurrence has been observed and recorded in Chinese, Japanese, Roman, and Greek societies (Boswell, 1994; Cantarella, 1992; Hirsch, 1990).

Homoerotic behavior between females is also noted in ancient Chinese, Greek, Roman, and numerous other civilizations (Adriaens & De Block 2009; Boswell, 1980; Ford & Beach, 1951; Greenberg, 1988; Hirsch, 1990), but details are less clear due to the greater emphasis on recording male events (Muscarella, 2000). As with non-human primates human female homoerotic behavior probably aided in alliance formation providing protection, resources, and mating opportunities with higher ranking male members of the society (Adriaens & De Block 2009; Kauth, 2001; Muscarella, 2000). Heteroerotic behavior also likely assists in alliance formation, tension reduction, and reconciliation, but it can also generate conflict and competition between same-sex individuals—If a young reproductively active individual attempts to establish an alliance with an older other-sex individual, this might well be reacted to with aggression from more dominant same-sex individuals.

Both homoerotic and heteroerotic behaviors then appear common amongst various animal species and human societies, providing distinct benefits. It might be suggested that this perspective only represents a hypothesized evolutionary mechanism vulnerable to creative interpretation.

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However, considering first, the widespread presence of these two dimensions in very diverse animal species, second, clear-cut functions served by them, third, the evidence for alliance formation, reconciliation, and tension reduction in primates, fourth, the apparent adaptive nature of these functions applied to humans, thereby satisfying a high threshold for any postulated evolutionary function, and fifth, the impracticalities associated with a single dimension of sexual orientation, it is reasonable to assume that homoerotic and heteroerotic dimensions exist in humans, likely serving at least the functions of alliance formation, reconciliation, and tension reduction. Additional value might be derived simply from pleasure and sexual release.

A very important issue that stands out, is why most people are “heterosexual” if there are homoerotic and heteroerotic dimensions? While homoerotic behavior apparently can indirectly facilitate reproductive success, heteroerotic behavior does so directly, at least prior to the introduction of birth control strategies. Given the pivotal role of other-sex contact in reproduction it is highly feasible that heteroerotic motivation is naturally higher in most individuals than homoerotic motivation, as represented by placement on each dimension. “Heterosexuality” describes heteroerotic motivation homoerotic motivation, whereas “homosexuality” captures the less common scenario of homoerotic motivation heteroerotic motivation.

ACTIVATION/DEACTIVATION OF DIMENSIONS

If there are separate homoerotic and heteroerotic dimensions, the question arises as to how they are expressed in each individual? As a starting point, it is likely that genetic and early (even prenatal) environmental factors produce a given level of motivation on each dimension that varies between individuals, although research will have to prove this supposition. The dominant motivation is the one most likely to be active and expressed. Hence, if there is a higher level of motivation on the homoerotic dimension, then the person will most likely identify with being homosexual. The non-dominant dimension though can be activated by specific circumstances, including even an opportunity for pleasure, resulting in the expression of an individual’s given level of motivation.

Homoerotic behavior has been noted to increase in same-sex settings including schools, prisons, and religious institutions such as nunneries (Bell et al., 1981; Diamond, 2006; Maeve, 1999; Money, 1988). Adolescent boys in same-sex boarding schools partake in more homoerotic relationships than

those in mixed-sex schools, but do not demonstrate higher rates of homoerotic behavior as adults (Bell et al., 1981; Money, 1988). The same phenomenon at all-female colleges is common being known as “lesbian until graduation” (Diamond, 2006). In prisons women have been found to bond sexually based on the need for friendship and a relationship that is supportive and not hostile (Maeve, 1999). In settings other than forced ones such as prisons, this occurrence might partly be explained by selection (homosexual individuals might unconsciously or consciously seek such settings). However, “selection” cannot account for the observed shift to more heteroerotic behavior in other-sex settings (Bell et al., 1981; Diamond, 2006; Maeve, 1999; Money, 1988). A viable alternative explanation is that the same-sex setting activates the homoerotic dimension resulting in its expression, at least when there is significant level of motivation on that dimension. As pertains to the heteroerotic dimension, triggers such as a reproductive opportunity or alliance formation can activate this dimension. The notion that sexual orientation dimensions can be activated or deactivated aligns with research indicating that homoerotic behavior can be elicited by circumstances (Easpaig et al., 2014; Iasenza, 2010; Kennedy, 2010; McKenzie, 2010; Pedersen & Kristiansen, 2008).

Sexual orientation dimension activation/deactivation might help account for some puzzling occurrences. One such occurrence is why identical twins are only 20–50% concordant for sexual orientation (Bailey & Pillard, 1991). Aside from early environmental non-shared influences impacting on the level of homoerotic and heteroerotic motivation, it is feasible that alternative dimensions might be preferentially activated in each twin as development proceeds, perhaps as a way of establishing individual identities. This differential activation of sexual orientation dimensions takes the twins down different paths of sexual development helping to distinguish them. Another puzzling occurrence that can be explained by sexual dimension activation/deactivation is sexual abuse having variable effects on sexual behavior, in some instances seemingly intensifying motivation for individuals of the same sex as the perpetrator, and in other instances reducing it (Bramblett & Darling, 1997; Brown, 1963; Harrison et al., 2008; McLaughlin et al., 2012). Sexual abuse, and particularly during a vulnerable period of development, can activate the sexual dimension corresponding to the sex of the perpetrator; the homoerotic dimension in the case of same-sex perpetrators and heteroerotic with other-sex perpetrators. Activation of the dimension results in the expression of an individual’s given level of

motivation in the form of behavior, attraction, fantasy, and perhaps self-identification. This early and often repetitive activation of the given dimension can lead to overly sexualized behavior consistent with the activated dimension, although over-sexualization generally can also occur. Sexualization of behavior is one of the most consistently reported impacts of sexual abuse (Calam et al., 1998; Estes & Tidwell, 2002; Hotte & Rafman, 1992; Putman, 2003), and might be more likely to occur when sexual arousal transpires (Hall et al., 1998). Calam et al. (1998) followed 144 sexually abused children and adolescents for 2 years post investigation, and found that sexualized behavior increased over this time frame. Research has shown that sexual abuse involving close relatives maximizes sexualization of behavior, apparently due to sexualization of attachment, according to Middleton (2013).

In line with how sexual abuse can have variable impacts on expressed sexual orientation (Bramblett & Darling, 1997; Brown, 1963; Harrison et al., 2008; McLaughlin et al., 2012), deactivation of the corresponding sexual dimension can occur when the event is sufficiently traumatic at the time. Consequently, the person's level of motivation will not be expressed. Hence, a male violently abused by an older male might experience deactivation of the homoerotic dimension, and reject such behavior even if there is a substantial motivation for it. A female aggressively abused by a male likewise might experience deactivation of the heteroerotic dimension, and hence not express this motivation even if her level is quite high. Deactivation of a sexual orientation dimension due to trauma might in some instances increase the likelihood of the alternative dimension being activated, at least in the context of a circumstance that can activate it. The comment might be raised that sexual abuse is always traumatic, and hence should routinely result in deactivation of the corresponding sexual orientation dimension. However, older individuals who sexually abuse children or adolescents frequently are quite attentive to the needs of those they abuse, and are violent only in a minority of instances, meaning that the abuse is not always traumatic, at least in the immediate context (Murray, 2000). The impact of sexual abuse on expressed sexual orientation should not be construed as abuse causing sexual orientation; instead, the impact is restricted to the expression of an individual's level of homoerotic and heteroerotic motivations via activation/deactivation of these dimensions. Different brain regions are activated in response to sexual stimuli consistent and inconsistent with expressed sexual orientation, in line with how the brain largely operates on

the basis of activation/deactivation (Paul et al., 2008), suggesting the possibility of a neural basis for homoerotic and heteroerotic dimension activation/deactivation.

An apparent zero motivation on one or both of the homoerotic and heteroerotic dimensions can also be accounted for by deactivation. This is certainly conceivable in the case of sexual abuse and some forms of mental illness. For example, with severe depression a person loses motivation for many self-sustaining behaviors, and sexual functioning can be non-existent (Bowins, 2004). Medications for depression can greatly impede sexual motivation (Zemishlany & Weisman, 2008), but based on extensive clinical experience severely depressed people often report having no libido prior to taking medication. The deficit state of schizophrenia, consisting of so-called absence symptoms including apathy, amotivation, avolition, anhedonia (absence of pleasure), motor retardation, affective blunting and absence of play and curiosity, can remove most or all sexual motivation in some individuals (Bemporad, 1991; Mahurin et al., 1998). Consequently, in severe variants of depression and schizophrenia, as well as sexual abuse, homoerotic and heteroerotic dimensions can be fully deactivated.

EROTIC FANTASY

Select theorists and researchers have focused on the role of erotic fantasy. Psychoanalysts such as Freud (1908/1962) hypothesized that erotic fantasy compensates for repressed sexuality. However, research clearly reveals that erotic fantasy is an indicator of healthy sexuality, and not a compensation for impairments (Crepault & Coulture, 1980; Kinsey et al., 1948; Kinsey et al., 1953; Leitenburg & Henning, 1995; Lentz & Zeiss, 1983). For example, Crepault and Coulture (1980) found that men who frequently have sexual fantasies during intercourse tend to be more sexually active generally with robust erotic fantasies outside of sexual activity, better capacity to control the timing of ejaculation, a more active role in sex, and other indicators of heightened sexuality, such as experimentation with homoerotic behavior. Lentz & Zeiss (1983) discovered that women who have more erotic fantasies during masturbation experience more frequent orgasms during intercourse.

As pertains to sexual orientation, Daryl Bem (1996) is most recognized for emphasizing the role of erotic fantasy, proposing that biology plays an indirect role in sexual orientation by influencing childhood temperaments that guide a child's preferences for sex-typical or sex-atypical activities and peers. Due to "atypical" preferences the child feels different from same-sex

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peers, the exotic part. The heightened physiological (autonomic) arousal derived from feeling different than same-sex individuals, later becomes eroticized to sexual arousal for that same class of peers, a process he refers to as “sexual imprinting.” Despite it being a very creative theory and incorporating erotic fantasy, there are major problems with it. For one, many homosexual individuals do not have preferences different than same-sex peers (Larson, 1981). The notion that homosexual men are effeminate and homosexual women are masculine is a stereotype that is typically not born out by research data (Friedman, 1988; Friedman & Downey, 2002; Larson, 1981), although some studies find support for the notion (Lippa, 2005). Many homosexuals have very gender typical preferences (Friedman, 1988; Friedman & Downey, 2002; Larson, 1981; Storms, 1980). Second, in several instances “atypical” preferences represent a transgender issue (see the transgender section). Third, the theory is only meaningful within the context of a single erotic dimension from homo to hetero—If both dimensions exist in each person there is no need to explain heterosexual or homosexual orientations in either/or terms.

A much more profound role for erotic fantasy in sexual orientation, than what a theory such as Bem’s suggests, actually transpires—Erotic fantasy adds an entire layer of sexuality beyond actual behavior! When sexuality in animals is considered the focus is on sexual acts, in part because that is all that is observable, but also due to how animals probably do not engage in erotic fantasy. Perhaps the most intelligent animals, such as dolphins and great apes, might have some fantasy equivalent to that of a 2–3 year old child (Reiss, 2011), but overall the role of erotic fantasy in animals is likely very limited. The evolution of human intelligence amplifies psychological states such as emotional experiences (Bowins, 2004). Human intelligence amplifies sexuality via erotic fantasy (Adam et al., 2011; Carvalho et al. 2013; Leitenberg & Henning, 1995; Smith & Over, 1990). Erotic fantasy is at least as important to sexuality as actual behavior, meaning that it adds another level or layer to sexual orientation. Anyone doubting the value of erotic fantasy to human sexual orientation must consider this question—If a person engages in erotic fantasy that is exclusively focused on same-sex individuals, but only partakes in sex with other-sex individuals, what sexual orientation do they best fit into? Given the private nature of erotic fantasy there is no censorship or negative influence, unless derived from a person’s own self-judgment, hence it tends to be a more accurate indicator of a person’s level

of homoerotic and heteroerotic motivation (Adam et al., 2011; Kinsey et al., 1948; Kinsey et al., 1953; Storms, 1980).

Erotic fantasy can also activate sexual orientation dimensions. The power of erotic fantasy to activate sexual orientation dimensions is likely crucial in how motivation for one or both appear to be able to increase over time, consistent with the notion of sexuality being a fluid and dynamic process that can vary throughout the life cycle (Kauth, 2001; Klein et al., 1985; Eschoffier, 1998). For example, if a person has a pleasing homoerotic relationship during adolescence, erotic fantasy over time about this experience will continuously activate the homoerotic dimension. This activation will increase the likelihood of repeat experiences that in combination with erotic fantasy will further intensify homoerotic motivation. Sexual fantasy can also augment the role of dimension activation/deactivation in accounting for the impact of sexual abuse on subsequent sexual behavior: When a person is sexually abused even in childhood some pleasure can be experienced, perhaps just from the attention being paid to the individual, aligning with how the abuser is often not violent and can be quite attentive to the immediate needs of the child (Murray, 2000). Erotic fantasy facilitated by the pleasure and attention component, combined with ongoing activation of the relevant sexual dimension derived from direct contact (homoerotic if same-sex and heteroerotic if other-sex), might amplify sexual arousal for the incident. On the other hand, if the experience is violent, frightening, or damaging, erotic fantasy might be blocked reinforcing deactivation of the relevant sexual dimension, thereby reducing or eliminating sexual interest.

SOCIAL CONSTRUCTION

A biological basis exists for homoerotic and heteroerotic dimensions due to their beneficial impact on evolutionary fitness. However, the social environment plays a profound role in how sexual orientation is understood or framed, and this social construction influences how homoerotic and heteroerotic behavior is expressed (Focault, 1980; Thorpe, 1992). Categories of sexual orientation have been socially constructed throughout time (Focault, 1980; Thorpe, 1992). For example, in ancient Greece no terms for homosexual, heterosexual, or bisexual existed, the most important aspect of sexuality being whether a person engaged in the active or passive role (Dover, 1989; Thorpe, 1992). The passive role was for inferiors defined in reference to their society, such as women, slaves, or male youths not yet citizens

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(Dover, 1989). A citizen could penetrate any non-citizen he pleased, but a citizen could not take the passive role and be penetrated orally or otherwise (Thorpe, 1992). Clearly this is a very different social definition relative to that of our modern industrial era.

Currently, 10% to 20% of South Seas cultures approve of homoerotic contact between older and younger individuals (Herdt, 1988). For example, among the Sambia of highland Papua New Guinea, boys age 7 to 10 are ritually inducted into homoerotic relationships with older males (Herdt, 1988). Even after 10 or so years in these homoerotic relationships the younger males move on to heteroerotic relationships, as culturally prescribed, without any apparent impact on sexual functioning (Bhugra et al., 2010; Stoller & Herdt, 1985; Williams, 1936). In ancient Greek and Roman societies homoerotic relationships between men and young males were considered acceptable, so long as the man was active and the younger male passive (Thorp, 1992). Homoerotic relationships, facilitated by the particular social/cultural construction of sexuality, aid in alliance formation between younger males and more established older men of the society (Muscarella, 2000). In such instances the homoerotic dimension is likely activated, and those having a non-zero motivation for it (apparently the case in most or all individuals based on South Seas and historical examples) actively engage in such behavior, and yet most often shift to heteroerotic relationships later on involving activation of that dimension.

The social construction of sexual orientation can then strongly guide how sexuality is expressed. In modern industrial society this takes the form of establishing a permanent identity as opposed to behavior itself. Jeffrey Weeks (1985) indicates a distinction must be made “between homosexual behavior, which is universal, and a homosexual identity, which is historically specific.” Historically (and in some current South Seas cultures) the focus has been on behavior and not a permanent identity (Ford & Beach, 1951; Herdt, 1998; Thorpe, 1992; Weeks, 1985; Williams, 1936). In modern industrial society a shift has occurred to homoerotic and heteroerotic behavior as a permanent identity reinforcing a dichotomous perspective. The reasons for this shift are not clear, but one potential candidate might be defensive compensation for a lack of identity arising from industrialization. With industrialization people primarily serve to enhance productivity and economic growth, and as such are secondary, a notion that would have been inconceivable in ancient Greek or Roman times, or in more modern South Seas cultures. Interestingly, as modern industrial society encroaches on regions such as Papua New Guinea,

sexual practices are shifting away from traditional approaches to ones more in line with Western ideology (Knauff, 2003). Identities such as “homosexual” can compensate for the secondary status of people in an industrial form of social organization. They provide a powerful in-group status and sense of belonging based on shared preferences, interests, beliefs, customs, and behavioral styles (Reynolds et al., 2000). Such identities can help compensate for another aspect of industrialization, namely the isolation that many people experience as the family structure present in hunting-gathering and agricultural forms of social organization deteriorates.

Sexual identity can take many specific forms, and theories from diverse perspectives have suggested many options for male and female sexual orientation identities (Bieber et al., 1962; Ciani et al., 2008; Dickemann 1993; Farr & Degroot 2008; Freud, 1905/1962; Foucault, 1980; MacIntyre & Estep 1993; Sala et al., 2009; Thorpe, 1992; Wilson, 1978). However, regardless of the specific content, behavior has been remade into an identity. Transformed into an identity, homoerotic and heteroerotic behavior become more than mere acts that can shift with circumstances; it characterizes a person. A “homosexual” identity is typically adopted when a person has a higher homoerotic motivation and lower heteroerotic motivation, and a “heterosexual” identity when homoerotic and heteroerotic motivation levels are reversed. A bisexual identity tends to occur when both homoerotic and heteroerotic motivations are quite robust. However, based on dichotomous homosexual and heterosexual identities, bisexuality is difficult to process (Fahs, 2009; Gammon & Isgro, 2006).

When “homosexuality” and “heterosexuality” are framed as identities, erotic fantasy and actual physical behavior inconsistent with the given orientation are difficult to understand and accept producing confusion, guilt, and anxiety, unless a person identifies with being bisexual. Homoerotic and heteroerotic behavior adaptive in a given circumstance, but inconsistent with sexual orientation identity, is likely to be suppressed. This occurrence extends to reproductive behavior when a person identifies with being “homosexual,” resulting in the evolutionary paradox. The prominence of homosexual and heterosexual identities then obscures and over-rides the natural organization of sexual behavior into homoerotic and heteroerotic dimensions. Consequently, the less dominant dimension is more likely to be deactivated.

TRANSGENDER & SEXUAL ORIENTATION DIMENSIONS

Transgender is largely a gender identity issue (Coleman et al., 1989; Greenfield et al., 2010; Zucker & Bradley, 1995). It is proposed that the terms homoerotic and heteroerotic be anchored based on gender identity. Hence, if a person identifies with being male, homoerotic pertains to erotic fantasy and actual sexual behavior involving males, and heteroerotic erotic fantasy and actual sexual behavior involving females, irrespective of anatomical sex. If a person identifies with being female, homoerotic behavior refers to erotic fantasy and actual sexual behavior involving females, and heteroerotic erotic fantasy and actual sexual behavior towards males, irrespective of anatomical sex. In the event of a true intersex state where the person adopts a dual gender identity, or neither, the terms homoerotic and heteroerotic breakdown, although the person still has the two sexual orientation dimensions. Regarding terminology, a potential option in the event of a dual gender identity, is bierotic, as it describes erotic fantasy and actual sexual behavior involving both males and females, anchored in a gender identity that is equally male and female. This term would not be applicable to bisexuals who identify either with being male or female, but only to those who have a dual gender identity. A trans gender status can also help explain why some “homosexuals” display prominent other-sex behavior, mannerisms, and appearance—The real issue might be that the person is actually transgender, and hence sexual interest in those of the same biological sex makes them “heterosexual,” given how sexual orientation should be anchored in gender identity.

APPLYING THE FOUR COMPONENTS TO PSYCHOTHERAPY

The purpose of the present paper is to provide psychotherapists with a comprehensive model of sexual orientation that will assist them in helping clients. By understanding each of the four components of sexual orientation and how they relate to each other, therapists can more effectively work with and communicate the nature of sexual orientation. Each component contributes to a better understanding of sexual orientation. Issues pertaining to sexual orientation that arise in psychotherapy are diverse, but typically fall into the categories of anxiety/distress arising from confusion over sexual orientation identity and how certain actions/fantasies conflict with this identity, selfacceptance, and the impact of discrimination. By communicating the nature of sexual orientation as encompassed by the four-component model, the anxiety, confusion, and friction between actions/fantasies and

perceived sexual orientation should resolve. In addition, the humanistic nature of the model should help reduce discrimination, and even self-recrimination, given that it is harder to persecute someone for what is normal to have (both homoerotic and heteroerotic behavioral dimensions). Furthermore, some of the anger fueling sexual orientation discrimination, likely arises from the frustration many people have in trying to process fantasies and actions inconsistent with their identified with sexual orientation.

A key feature of the model that will help many clients is an appreciation of how sexual orientation is organized dimensionally, because all too often people dichotomize sexual orientation into heterosexual or homosexual categories making it very difficult to process fantasy and behavior that is inconsistent. Within this dichotomous framework bisexuality and asexuality are also difficult to understand, because how can a person have both or neither when one or the other must occur? Understanding that we each appear to have two separate dimensions—homoerotic and heteroerotic—resolves much of the confusion. A “heterosexual” has stronger heteroerotic motivation, a “homosexual” stronger homoerotic motivation, a bisexual significant motivation on both dimensions, and asexual people very low levels for both motivations. Given that the homoerotic and heteroerotic dimensions are separate from one another, action or fantasy relevant to one does not influence the other dimension. In a psychotherapy setting the strength of these motivations can easily be rated on 1 to 10 point scales for both fantasy and actions. Combining the ratings for fantasy and actions will provide a solid measure of both homoerotic and heteroerotic motivations. Given how erotic fantasy is often a more accurate indicator of the strength of homoerotic and heteroerotic motivations, it is suggested that a 2X greater weighting be applied to the erotic fantasy measure. Applying the dimensions to transgender individuals simply involves anchoring the sexual orientation dimension to self-perceived gender identity; if a person identifies with being female, then homoerotic applies to fantasy and actions directed towards females, and heteroerotic towards males, the reverse of what often occurs.

Both sexual orientation dimensions can be activated by circumstances, resulting in the expression of the person’s given level of motivation, although, typically the dominant dimension is the one most likely to be activated. This activation process helps explain why in same-sex settings homoerotic behavior can occur, but shift to more heteroerotic behavior in other-sex settings—The presence of same-sex individuals and certain needs

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such as alliance formation, comfort, or even just sexual release, can activate the homoerotic dimension, and assuming that there is more than a very low level of motivation, behavior consistent with it is expressed. Sexual abuse has variable effects on sexual orientation behavior, a key reason being that pleasure associated with the occurrence can activate the relevant sexual orientation dimension (for instance, homoerotic if same-sex), but if the experience is painful or terrifying it can deactivate the relevant dimension. In discussions with clients activating triggers for sexual orientation dimensions can be explored. By understanding these triggers hard to process fantasies and actions can become more meaningful, such as those associated with sexual abuse.

For most animals behavior is all that counts, but with humans erotic fantasy is a crucial element of sexuality actually comprising a level beyond actions, consistent with how the evolution of human intelligence amplifies psychological states. Erotic fantasy itself can lead to pleasing sexual experiences, and in turn fantasy about the event can keep activating the relevant sexual orientation dimension, not infrequently resulting in more actions consistent with the activated sexual orientation dimension. Erotic fantasy then tends to be a component of sexual orientation that activates dimensions. Exploring a client's erotic fantasy life during psychotherapy sessions can be very revealing regarding the relative strength of the homoerotic and heteroerotic dimensions, and how closeted the person is. Helping the individual to better align erotic fantasy and actual behavior will help improve self-acceptance and reduce sexual frustration.

The social construction of sexual orientation greatly influences how it is expressed. Prior to industrialization and still in some South Pacific cultures behaviors are central, with both homoerotic and heteroerotic behaviors being expressed. With industrialization behavior has been transformed into homosexual and heterosexual identities. This identification process tends to deactivate the sexual orientation dimension, and ensuing behaviors, inconsistent with the orientation identified with. Consequently, enormous confusion occurs such as when a person who identifies with being heterosexual fantasizes and even acts in a homoerotic way. Bisexuality is also difficult to process given how a person is expected to identify with being homosexual or heterosexual. Framing sexual orientation in terms of homoerotic and heteroerotic dimensions, and understanding how "homosexual" and heterosexual" identities relate to these two dimensions, can greatly aid in self-acceptance, such as when identity clashes with

behavior or fantasy, and when “coming out.” Essentially, it is not a matter of an either/or identity, but both behavioral capacities in varying strengths.

Discrimination based on sexual orientation is also greatly increased due to our social construction of sexual orientation into identities, because ingroup/outgroup distinctions are created, when in reality we all have homoerotic and heteroerotic capacities. Considering how we have socially constructed sexual orientation, it is not surprising that there is so much self and externally induced stress and anxiety pertaining to it—We have created a neurotic scenario. By helping clients transform sexual orientation identities into behaviors, consistent with the natural organization of sexual orientation, this anxiety and distress can be substantially reduced.

CONCLUDING NOTE

Beyond assisting with sexual orientation concerns, the four components presented can explain the Darwinian or evolutionary paradox of how “homosexual” behavior could ever evolve, given that it does not directly facilitate reproduction—With the capacity for both homoerotic and heteroerotic behavior, and the benefits of the former even for enhancing reproductive opportunities, the presence of “homosexual” behavior is not inconsistent with reproduction. It is only when “homosexuality” becomes an identity excluding reproductive behavior that the paradox arises. Another strength of the four-component model consists of male and female sexual orientation being on an equal footing, arising from the same processes. Discrimination can also be diminished, because the presence of heteroerotic and homoerotic dimensions in each of us removes the ingroup/outgroup distinctions that arise from sexual orientation identities.

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