AN ANALYSIS OF THE RELATIONSHIP BETWEEN SEXUAL ATTITUDES AND GENERALIZED IRRATIONAL BELIEF SYSTEMS

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By
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Throughout the course of history there have been attitudes about appropriate and inappropriate behavior between the sexes. Some attitudes, such as those derived from religion, tend to be of a conservative, or strict, nature while others of cultures less sexually inhibited tend to be more liberal, or lenient. The purpose of this thesis is to determine if there is any relationship between the level of one's sexual attitudes (lenient, moderate or strict) and one's level of rationality (or irrationality). More specifically, this investigation will determine if one's individual irrational beliefs, according to Ellis, vary in any significant way between levels of sexual attitudes.
One hundred and eighty-two subjects, 91 males and 91 females, participated in the experiment. They were given the attitude portion of the Sex Knowledge and Attitude Test and the Irrational Belief Test. Half of the subjects took the Sex Knowledge and Attitude Test first and the other half of the subjects took the Irrational Belief Test first. The results indicated that there was no stratification of sexual attitudes in this sample. There was no overall significant difference in irrational beliefs between males and females. Examination of the individual irrational beliefs indicated that there is a statistically significant difference for 9 of the 10 irrational beliefs. Males were found to be irrational in the categories of "blame others" and "precise solutions." Females were found to be more irrational in the categories of "approval," "frustration intolerance," "external causes," "dwell on negative," "problem avoidance," "rely on strong others," and "doomed by past."

Factors to be considered in the interpretation of the data are the possible external and internal invalidity of the Sex Knowledge and Attitude Test and the relativity of the terms "rational" and "irrational" beliefs. No group scored higher than the standardized normal population.
Stephen F. Jones
Approved for the Major Department

[Signature]
Approved for the Graduate Council
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CHAPTER 1
INTRODUCTION

Since the origin of time, there have been the male and female sexes. As long as the two interact, there will be attitudes that develop throughout society regarding appropriate (and inappropriate) behavior. In researching the history of sexual attitudes and behavior, it must be noted that the tabulations to follow are a result of the study of the only comprehensive texts on the subject that could be found. Church edicts that will be cited may serve to initiate and drive social behavior, but many customs that will be mentioned may not reflect the norms of that particular time. More specifically, the views of the history of sex will be those of Tannahill (1980), Licht (1974) and Murstein (1974).

Prior to the beginning of recorded history, little is known about male and female roles and relationships. What small amount is known indicates that males and females were somewhat equal in status. During the paleolithic period, males kept the species alive while females were also keeping the species alive via childbirth. The increased social status of the role assumed by the males resulted in a stratification of male and female roles. The male was self-assured in his social prowess, but it is interesting
to note that it was not until late, around 9000 B.C., that males realized the connection between intercourse and conception. Also during this era, the male began to expand his attitudes toward sex. He still considered it normal that a female was constantly pregnant; subserviance was to be expected. The male also felt that the female engaged in the sexual act only to gain physical gratification. Morality and sex had yet to be integrated. By the end of the paleolithic period, the male strongly felt he was superior in all respects to the female.

In ancient Greece, gods are often depicted in terms of their sexual strength or vulnerability. Homer's *Iliad* contains a scene of Zeus and his wife, Hera, in which she attempts to sexually manipulate Zeus in order to assist the Greeks. Her plan was foiled in that she succumbed to his intense sensuality. A cursory glance through the important events in ancient Greece indicate the significance of sexuality in memorable occurrences.

The Greeks tended to visualize women in two distinct categories: the mother (saintly) or the courtesan. Stated by a Greek author: "We have courtesans for our pleasure, concubines for daily personal service, and married women to bear us children and manage our house faithfully" (p. 100).

In Sparta, it was socially acceptable for a married man to "transfer" his marital rights with his wife to a
stronger, more virile man in the hopes of stronger children. Whether the offense was premarital sex or adultery, Greek law was very direct to the women. If an unmarried woman had sex, severe punishment occurred. In one instance, the girl's father locked her in a house with a horse. The girl died of hunger and the horse consumed the girl. When an adulterous woman was discovered, several sanctions were imposed: she could not wear any type of ornaments in the public temples and if she was adorned, the first man who saw her could tear her clothes from her and beat her. This treatment was intended not to kill—only to humiliate.

One final, albeit humorous, note from the Greek culture was their conception of the physical aspects of sex. They saw physical sensuality as being a disease, a violent form of madness. In this instance, the mind lost control of the body. Greek physicians called the germ bacillus eroticus and the poison exited through the eyes.

Roman culture was influenced by Greek civilization, but not more dutiful of service and purpose than the Greeks. Rome had three types of marriage, of which one is important in the inspection of sexual attitudes. One form of marriage, confarreatio, was basically a contemporary Catholic wedding; another form, coemptio, was similar to a civil wedding. The third form of marriage was usus which was legal for only one year following the onset of a "continuous association." If usus was unsuccessful, there
was no social stigma attached. This provided a trial marriage.

The gods which arose from Rome were quite similar to some of the Greek gods. Dionysus, god of the vineyards and the vintage became Bacchus, god of drink and drunkenness. Bacchus developed a decadent cult which survived for a short time. One of the most debaucherous times in Roman history was the advent of Caligula to the throne of the Roman empire. The orgies of the Romans are well known, but what occurred during Caligula's reign makes all others seem mild, for example, bestiality and incest were commonplace.

Once the Roman empire was destroyed, the Roman Emperor allied himself with the Christian church. The early Christians were highly in favor of celibacy. It was seen as the most pure way to sanctify one's body which was considered "members of Christ." Augustine greatly influenced Christian thinking. Prior to his self-imposed celibacy, Augustine engaged quite frequently in sexual encounters. Once declared celibate, he launched on a tirade against the moral degradation the act of intercourse allowed. To further advocate Augustine's position, priests in the local village at that time advised that marital sex was the only acceptable "type" of sex, and then only for the purpose of conception. A sin which carried severe
penances was contraception. Coitus interruptus merited two to ten years of penances whereas nocturnal emissions required seven psalms immediately following the incident and thirty psalms the next morning. Anal and/or oral intercourse was considered extremely vile and perpetrators were subject to three to fifteen years of penance. The penance usually took the form of abstainence from food, water, sex or any "self-indulgent" behavior.

At this time, the Church interpreted and associated the biological urges of sex with satanic temptation. Even death did not bring salvation from earthly desires. Certain church laws determined that no male corpses were to be buried next to female corpses unless the female corpse was "safely" decomposed.

In Asia, sex was considered a "sacred duty" that a good Chinese person indulged in in order to achieve the Way--Taoism--their level of perfect peace. Officially, during the Han dynasty (206 B.C.-A.D. 24), eight sexually explicit manuals were listed among the most important books of that time. Evidently, since intercourse was a way to the Chinese version of heaven, they felt it should be perfected. The Chinese felt that the sex act was mortal- izing the interaction of yin (female) and yang (male), cosmic forces physically reflected as genitalia.

All the sex manuals emphasize yang satisfaction. They
encourage continual changing of partners in order to best facilitate yang potency. As late as 1950, certain secret sects in Communist China strongly encouraged promiscuous sex "as a route to immortality and freedom from disease."

During the Han Dynasty, both male and female homosexuality was socially accepted, almost fashionable. In later dynasties, many Chinese felt that bisexual parents bore hermaphroditic children.

To the Hindus of India of the past, sex was considered a religious duty—a pleasurable method in which one improved one's karma. Karma is the Hindu belief that, upon death, one who has lived one's life "correctly" will be reincarnated at a higher level; conversely, if one has lived life "incorrectly", one will be reincarnated at a lower level. The Hindus wrote many sex manuals, and these manuals bore tremendous resemblances to the Chinese sex manuals. The most famous of the Indian sex manuals was the Kamasutra which classified sex techniques very objectively. It was an incredibly strong factor in determining sexual attitudes for that time period in India. The Kamasutra set several steadfast rules about social classes and behavior, but is relevant to the current review of sexual attitudes in that it recognized emotional interactions among men and women. It acknowledged the concept of love; the author of the text cautioned the reader that
the strategies developed and elaborated upon in the
Kamasutra applied only to those who are not "in love."
This distinction made between sex and love found in the
Kamasutra was the notable difference between it and the
Chinese sex manuals. Perhaps the interesting aspect of
Hindu culture was the lackadaisical attitude toward sex.
Sex customs dictated a culture similar to the "free sex
and love" atmosphere prevalent in the western world.

The religion of Islam was an aggregation of Arab,
Jewish and Christian beliefs. The followers of Islam
(Muslims) resided in the Middle East and portions of
Africa. This train of thought allowed for the notion of
polygamy for males and introduced the idea of the harem.
Muhammed, the Prophet of Islam, favored polygamy so some
type of "social security" could be provided for widows of
dead war veterans. He also listed several forms of punish­
ment that women have sustained from God as a result of
Eve's infamous encounter with the evil serpent in the
Garden of Eden. Due to these sanctions levied against women,
they were segregated into harems. So, in actuality
harems reflected sentiments of social isolationism and
segregation rather than exemplifying a primitive form of
male chauvinism.

Islam groups also developed the notion of the eunuchs.
Sultans had several hundred women in individual harems and
problems such as boredom, frustration and irritation would develop. Sultans appointed those men who had had some or all of their sex organs removed to guard and control the members of the harem. The eunuchs also served as personal attendants to the sultan.

The medieval period gave a fresh perspective on the image of women. The idea of "courtly love" emerged as a significant attitudinal change from the past. Women were being thought of as Ladies, signifying virtue. The image of courtly love began in literature of the time, as well as the songs. The protocol involved was highly similar to contemporary gothic romances: a woman of a high social class married to some type of feudal lord (that she did not love) finds a lover, but they must keep their affair secret. Many less significant people are involved and they either try to protect or destroy the relationship. Rarely, in the literature and music, is the sex act mentioned; often, it was not even inferred. With this as a premise, the woman was a paragon of virtue, deeply loved, and the recipient of this highly naive and idealized version of interpersonal encounters. *Art of Courtly Love* was a significant text of its time period as it defined courtly love in terms of love and action; love and excitement. It is here where chivalry began.

Thomas Aquinas was an influential medieval figure.
His conception of marriage was that it served two primary functions: one, it was the only manner by which children can be conceived without sin and two, hopefully it kept the men from sexual behavior that was considered deviant. According to St. Thomas, bestiality was the most sinful deviance. He had devised a rank order list of all deviances, with fornication being the least severe. Kissing, touching and caressing was permitted as long as they were not lust-oriented.

Incubi and succubi (male and female demons which sexually enticed people) were common among those who denied lust-filled thoughts. The concept of incubi and succubi indirectly related to the idea of courtly love—a woman (usually) succumbs uncontrollably to a male, however bizarre he may be, and was able to express her innermost sexual desires without fear of retribution from society and without guilt. St. Thomas feared pregnancy of innocent females by the incubi and he hypothesized it in a most unusual way. The succubus would have sex with a mortal man, convert to an incubus, and then have sex with a woman. Also during this period of time, the chastity belt was invented. Originally it was considered as a rape-prevention measure, but it also eased the minds of many husbands who questioned the fidelity of their wives. Chastity belts were advertised in surgical instrument catalogues until the 1930's.
as a masturbation deterrent.

Prostitution was prevalent and the Church, which had a great deal of power, did nothing to ban it. St. Thomas Aquinas and St. Augustine both felt that it would be much more detrimental to remove the prostitutes. They felt that removing prostitutes would release the "excess lust" to other areas of life. The Church was so moved that they brought (and thereby condoned) prostitution to their temples. Bath houses also became popular. Even then, bath houses were used for the same purposes they are today. The approval of, and active participation with, prostitution combined with the popularization of bath houses helped to create the first severe epidemic of syphilis.

The Renaissance brought a tremendous explosion of creativity and scientific discovery. It also initiated a tremendously egocentric era. Men learned how to become cultured and courteous; they emerged as cultivated men with incredible moral turpitude. Public discussions of sex were common and accepted in Renaissance times. Thoughts of sex also permeated the art and literature of this time. Explicit poetry and artwork, often of a bisexual nature, was greatly revered. One example of the laxity of Italian law was exemplified in the episode of Brantome, who came to Italy and became highly infatuated with a young man who was happily married. Brantome invited both the man and
woman to visit. When the couple retired for the night, Brantome hid, then appeared, threatening the young man at knifepoint to commit sexual acts. Italian law permitted this.

Whether homosexual, bisexual or heterosexual, Renaissance men had differing opinions of women. The perception of women as virtuous had dissipated by this time. Women began to become active in social and religious circles and as they did, men seemed to be somewhat cognizant of the plight of the woman. In an early 16th century book on manners, The Book of the Courtier, it is stated, "... And if we really consider the truth, we shall also recognize that in our understanding of great issues, far from distracting us, they awaken our minds ..." (p. 288).

Reports from observers of Incas in Peru, Mayas in Yucatan and Aztecs in Mexico prior to European arrivals indicated many sexual travesties. Mayans approved of homosexuality over heterosexuality for adolescents; it was hoped that heterosexual relations would occur only during marriage. Adult homosexuality was also condoned. Aztecs were quite the opposite. They imposed death for homosexuals and transvestites. The Incas "dragged" zoophilics and sodomizers through the streets, then publicly hanged them. So, the reports of sexual perversions were likely exaggerated. The church decided to agree with the
more sordid possibilities. When arriving in America, the priests were given detailed questions to ask those already there, ranging from types of sexual behavior to with whom the acts were committed. The only interracial sexual activity allowed—to a great—extent was in a very business-like way (e.g., prostitution, rape).

When the Reformation occurred, many theologians came out with ideas that varied in their view of women. For example, Martin Luther felt virginity and chastity were not the preferred states "of being;" however, he also felt marriage was a vital state of being. John Calvin had a more sympathetic view towards women as humans with feelings, not robots. He admitted the importance of the woman's function in intercourse and childbirth, but he noted that women are an "inseparable part" of a man's existence. The Reformers were also sternly rejecting of extramarital sex. It is during the Reformation that sex was interpreted as being more than just a device for conception. It was finally recognized as a method of indicating affection.

Once the Pilgrims arrived on the North American shores, it was naturally assumed that no sexual relations could or would occur between themselves and the native American Indians. The basic fear, which later converted into prejudices toward groups not similar to these immigrants, allowed for apartheid in almost all sexual actions. The
Pilgrims viewed the human heart as being incredibly sinful. To make matters even more difficult for them, many women died during the first winter. Since there were a preponderance of men and few women, it was difficult to keep sinful hearts sin-free. Punishment for sex outside of marriage was stern (e.g., gallows) no matter the circumstances.

In France, libertinism (the advent of "free thinking"), or having no concern of good and evil, evolved. It was a self-centered philosophy that had four stages: selection, seduction, subjection and separation. It was a cruel game to play and was touted in the works of the Marquis de Sade. He wrote several novels depicting brutality and sadistic subserviance of women. The significance of even mentioning de Sade is due to the fact that he wrote for the money; if there were not a demand for such literature, there would not have been a supply of it. Obviously a great deal of people, albeit privately, were reading de Sade's books. Even if out of curiosity, the sexual attitudes of a portion of society were slanted towards interest in de Sade's literary exploits.

The nineteenth century brought with it the Victorian age, which had a tremendous impact on the consensus of sexual attitudes. In this era, the art of courtly love was rejuvenated, bringing with it significant losses in the strides of women to be assessed as more than some untouchable
prima donna on a pedestal. Once again, women were passive recipients. To further elucidate this cultural regression, one need look no further than an 1878 British Medical Journal in which six months of the journal was devoted to the question of whether a ham could turn rancid when touched by a woman who was menstruating. During the Victorian era, it was assumed that no "virtuous" woman knew of sexual desire. In other words, she should be undersexed. This insistence on denial and perhaps rejection of sexual desires placed a strain on the husbands as well as the wives. The church gave religious credence to the wives in a 1894 proclamation which (paraphrased) stated: a husband who has sex with his wife for any reason other than childbearing was, in essence, making his wife a "private prostitute;" that a husband should have sex with his wife at the most once a week--preferably once a month and that a husband must never have sex with his wife when she's menstruating or while she is pregnant. Not too surprisingly, many husbands took their sexual urges to others, namely prostitutes. Considering the restricted moral atmosphere of the time, it seems almost hypocritical that prostitution was thriving as never before. As expected, rates of venereal disease increased drastically. It became so severe, the British government enacted the Contagious Diseases Act of 1864 and 1866. This act removed carriers of the venereal diseases by registering prostitutes. Those lower-class
girls forced into the profession for money had no objections, but strong opposition arose from those higher-class ladies of "high repute" who prostituted themselves in utmost anonymity. The act was repealed in 1883.

The attitude towards virginity during Victorian times is also significant. Rumors arose that sex with a virgin could cure venereal disease. Unfortunately, many former virgins of the time could sadly disagree. The idea of "deflowering" a virgin became a greatly sought-after concept. Kings in olden times had the privilege of having sex with a bride prior to the husband; Roman customs dictated the deflowering occur as a result of sexual contact with pagan gods; and many civilizations (e.g., Rome, Greece) staged public deflowerings in order to prove to the village that the bride was indeed virginal.

Trends that arose in the general population eventually manifested themselves in the world of prostitution. It cost a great deal to deflower a virgin prostitute. Virgin prostitute brothels sprang up and the girls, if retained, would have her hymen reconstructed. This practice is done today in Japan by nonprostitutes. Often the virgins and pseudovirgins had to produce "virginal bleeding." They accomplished this by many methods: inserting bloody sponges into the vagina; inserting fish bladders filled with blood; at the more extreme level, leeches and broken glass were
inserted.

One final aspect of the Victorian era not yet mentioned was the prevalence of homosexuality. The incidence of homosexual prostitution greatly increased towards the end of the nineteenth century in the United States and Britain. In an action not surprising for the time, a Criminal Law Amendment Act of 1885 was passed in Britain. This legislation was initially intended to quash the numerous brothels with female prostitution. Eventually, prostitution from either sex was denoted as illegal. This law even went as far as to ban any sexual relationships between men, consenting or not. This law remains, despite current legalization of homosexual relations between consenting adults.

Back in America, one of the movements that influenced sexual attitudes of the newly forming west of the 1800's was the suffrage movement that stressed temperance. Although it was mainly involved with social issues such as freedom for slaves, drinking and modifications in marital arrangements (benefitting women), the sexual ramifications of said issues were dealt with also. Once the suffrage movement was in full swing, another group devoted to the abolition of vices such as drinking and prostitution was established. The Women's Christian Temperance Union (WCTU) was devoted to cultivating a new, strong morality, especially among
the uncultured male of the time. Although their intentions were honorable, the uncompromising fervor of the WCTU drove away many who would have otherwise been sympathetic.

In a more contemporary vein, attempts at quantifying the physiological mechanisms involved in sex was begun by John B. Watson, the founder of behaviorism. Watson and one of his graduate assistants proceeded to engage in sexual activity while being "wired" for physiological changes (e.g., autonomic variations). Unfortunately for him, however, the society of Baltimore in the 1920's was not liberal enough to sanction this behavior. Once his research was discovered, Watson became immersed in an intense scandal which resulted in the loss of his position at Johns Hopkins University and a divorce from his wife (Rosenzweig and Leiman, 1982). Due to unforeseeable circumstances, Watson's data were never published.

Kinsey (1948, 1953) was next to study sexual behavior and attitudes and did so via questionnaires. It is of interest to note that only white respondents were included in the published results (Hyde, 1982). The questionnaires were administered to males and females ranging in age from preadolescence to old age. A summarization of the Kinsey results by Feldman and MacCulloch (1980) appears in Appendix 1.

While analyzing his data, Kinsey noted some general
differences between male and female sexual behavior that was not age-dependent. For example, sexual responsiveness develops earlier in the male than the female. Males reached their peak frequency of sexual outlets a few years after adolescence; females reach their peak in their forties. The main source of masturbation for males was spoken/printed material; for females, it was self-discovery. Ninety-three percent of the total male sample had masturbated at some time; sixty-two percent of the females had masturbated.

Nocturnal sex dreams, with or without emissions, occurred in virtually all males; 70% of the females experienced this type of dream. The age of greatest frequency in males was the teens to twenties; in females, it was in the forties. The incidence of premarital intercourse was greater for males than females (71 and 20 percent, respectively).

Feldman and MacCulloch also report that almost all couples reported intercourse. The frequency decreased with age. Masturbation, petting and premarital intercourse increased the capacity for orgasm within marriage. Approximately 50% of the married men surveyed had had extramarital sexual encounters by age 40, compared to 25% of the married women. The frequency of extramarital sex increases with age for females, but decreases for males.
Fifty percent of the males and thirty percent of the females had some type of homosexual arousal by age 45. Homosexual females were found to have fewer sex partners than homosexual males.

Several conclusions can be derived from this portion of Kinsey's data. Males appear to be at their sexual peak in late adolescence while females peak in their forties. According to this study, females engage in non-marital, non-coital activities (e.g., masturbation, sex dreams) at a greatly lowered rate than males. Despite these conclusions, it must be remembered that the Kinsey study may have been biased by poor sampling techniques and/or biased responses.

Feldman and Mac Culloch also cited a comparison study conducted by Redbook magazine in 1975. Although the sample was not as randomly selected as Kinsey's, some contrasts between the two studies can be detected:

1. average age of initial sexual intercourse is now earlier;
2. premarital intercourse prior to age 25 was 33% for Kinsey and 90% for Redbook;
3. religion and post-high school education (separately) do not have as great an effect on one's choice of abstaining or not;
4. they agree with Kinsey in two ways:
(a) premarital sex increases likelihood of extramarital sex;
(b) a small number of married females had had homosexual experiences.

Kinsey can be credited for administering the first pen-to-paper questionnaire regarding sexual attitudes and behaviors. The effort to maintain anonymity can be applauded, as can the somewhat unintentionally racist attempt to be unbiased in sampling (an obvious contradiction in terms). It provided America with a somewhat explicit view of itself—a view it had never experienced prior to this. For all the positive contributions, some detrimental elements must be mentioned. Since it was the first published sex survey of its time, the topic matter itself may have biased the results. Even though names were not used, those of a prudish nature might lie to "fake good," whereas individuals desiring to exert their machismo might respond equally untruthfully to "fake good" in a different way. Also, the fact that the survey was a questionnaire deprived the examiners of a wealth of valuable information that could have been gathered via personal interviews.

The last main body of sex research came from the laboratories of William Masters and Virginia Johnson (1966). Their initial research dealt with two main areas of focus:
specifically defining the physiological mechanisms inherent in the sex act and, attempting to disprove various myths about sex, as did Ellis (1961), in a more cognitive style.

Physiologically, males and females go through a cycle of phases which define the human sexual response. The response consists of four phases in women and five phases in men. Runciman (1975) and McCary (1978) summarize the cycle as:

I. Excitement phase
"The result of whatever is sexually exciting to the individual."

A. Physiologically, in the female:
   1. Nipple erection
   2. Increased blood supply to breasts
   3. Tumescence (clitoral enlargement)
   4. Increases in heart rate and blood pressure
   5. Myotonia (muscle contractions)
   6. A "sex flush"—a flush of the skin originating in the gastric area and extending to the breasts
   7. Vaginal walls start to lubricate

B. Physiologically, in the male:
   1. Nipple erection
   2. Myotonia
   3. Increased heart rate and blood pressure
   4. Initiation of penile erection

II. Plateau phase
"A state of intense sexual tension"

A. Physiologically, in the female:
   1. Great muscular tension all over the body (e.g., involuntary facial grimaces; buttocks and thigh tension)
   2. Carpopedal spasms (spasms in hand and foot muscles)
   3. Greater increases in heart rate, blood pressure and respiration
4. Just prior to orgasm, the clitoris retracts by at least 50%
5. Vaginal muscles contract around the penis

B. Physiologically, in the male:
   1. Voluntary and involuntary muscle tension increases
   2. Carpopedal spasms
   3. Great increases in heart rate, blood pressure and respiration
   4. Corona of penis becomes engorged
   5. Testes elevate and vasocongestion increases their size

III. Orgasm
   "The involuntary climactic spasms which are the result of sexual tensions reaching a peak"
   A. Physiologically, in the female:
      1. Loss of voluntary muscle control
      2. Involuntary contractions of the sphincter muscles in the anus
      3. Heart rate, blood pressure and respiration still increase
      4. Orgasmic platform (outer third of vagina and labia minora) starts to contract strongly
   B. Physiologically, in the male:
      1. Loss of voluntary muscle control
      2. Heart rate, blood pressure and respiration increases
      3. Ejaculation result in contractions of the penis; they coincide with vaginal contractions
      4. Rectal sphincter muscles contract

IV. Resolution phase
   "Sexual tensions lessen and the body returns to its normal unstimulated state"
   A. Physiologically, in the female:
      1. Organs and tissues return to normal
      2. Sex flush disappears
      3. Nipple erection ceases
      4. Muscular tension disappears
5. Perspiration appears
6. Clitoris returns to normal
7. Heart rate, blood pressure and respiration return to normal

B. Physiologically, in the male:
1. Organs and tissues return to normal
2. Sex flush disappears
3. Muscle tension disappears
4. Heart rate, blood pressure and respiration return to normal
5. Perspiration appears
6. Nipple erection occurs for up to one hour after ejaculation
7. Penile engorgement ends--return to normal
8. Testes return to normal

A stage not present in females and not cited by either Runciman or McCary is the refractory period. Masters and Johnson define it as "a temporary state of psychophysiological resistance to sexual stimulation immediately following an orgasmic experience." During this time, it is impossible to start the cycle over, impossible for the man to get an erection. In comparing male and female cycles, it is interesting to note that females alone are capable of multiple orgasms. That appears to contradict earlier reports by Kinsey. A graphical representation of the male sexual response is presented in Figure 1. The female sexual response is depicted in Figure 2.
Aside from the development of the human sexual response cycle, Masters and Johnson were able to dispel some myths about human sexuality. Martin (1981) mentions four of them and the reasons Masters and Johnson disproved them:

(1) It was proven that direct clitoral stimulation is essential for the occurrence of orgasms;

(2) Clitoral orgasms are the only type of orgasms, contrary to Freud who believed women had clitoral and a more mature vaginal orgasm;

(3) Simultaneous orgasms are no indicator of sexual accomplishments. Overconcern about this could itself lead to performance problems.

(4) Penis size does not contribute to female sexual enjoyment. The vaginal walls, they (Masters and Johnson) learned, will contract around any size penis.

The theories expounded by Masters and Johnson have come under fire from time to time. Rumors have arisen that some of the data had been falsified. Even if this were true, their determinations of the physiological mechanisms have been verified. The disclaimers Masters and Johnson added to sexual myths which still permeate our sexual attitudes arose from their validated physiological data. Hindsight is good in that hopefully it helps us to prevent past mistakes from occurring again. The information
gathered that affects sexual attitudes has been replicated and is found to be true (Hite, 1976, 1981). Applicability to life situations is a strong avenue of support for any given theory.

In documenting various sexual behaviors throughout time, it is not unreasonable to ask how behaviors can be directly related to sexual attitudes. Bruce Fretz, a noted authority on sexual attitude assessment, stated, "Our sexual behavior is essentially the result of our attitudes toward sex" (Fretz, 1975). Throughout history, the church or some form of religious observance appeared to have one of the strongest influences on sexual attitudes. Today, studies are being released which postulate other factors, such as city size, as a determinant for certain sexual attitudes. Stephan and McMullin (1982) found a relationship between city size and tolerance of sexual nonconformity (e.g., homosexuality, extramarital sex, premarital sex and pornography). They found that those who moved from small towns to large cities appeared to be more intolerant of the above mentioned forms of sexual non-conformity than those who moved from large cities to small towns and those who remained in large cities were found to be of a higher tolerance level. They further concluded that city size during early learning, or at age sixteen, has the strongest correlation of intolerance among
the sublevels of sexual nonconformists.

It is often difficult to differentiate between moral and religious conscience. Robinson and Jedlicka (1982) contrasted the sexual attitudes and behavior of college students from 1965 to 1980 and found three main differences:

1. Premarital sexual behavior is increasing in both sexes;
2. Attitudinal difference between the sexes are becoming smaller; and
3. A new double standard is evolving; a harder line, with regards to sexual behavior, is drawn for others than for oneself.

D'Augelli and D'Augelli (1977) suggest that premarital sexual involvement is a moral (not strictly religious) issue that reflects decisions arrived at about the quality of interpersonal relationships the person has. Reiss (1960) devised an interpretation of the four basic sexual standards in America. They are:

1. **Double standard**: premarital sex is right for the male but not the female
2. **Permissiveness without affection**: premarital sex is right, whether or not there is any affection
3. **Permissiveness with affection**
4. **Abstinence**

As one reviews the chronicle of sexual customs and attitudes of the past and present, some of these standards are just
as applicable in the early days of this Earth as they are now. Perhaps Schofield (1980) sums it up most appropriately, The underlying assumption is that male sexuality is fundamentally different from female sexuality . . . For no matter what the basic biological behavior structures may be, sexual behavior is 'socially scripted' as contemporary sociologists would say; that is, to say, the individual learns how to be sexual as he or she learns other kinds of social behavior (p. 43).

A relatively new concept in the treatment of sexual dysfunctions is cognitive behavior therapy. There are many variations of this form of treatment, one of which is rational-emotive therapy (RET). In 1958, the first publication dealing with RET was released. Its author, Albert Ellis, is now considered the "founder" of RET. In his 1958 article, "Rational Psychotherapy," Ellis introduced the idea of conducting therapy by helping clients "organize and discipline their thinking." He basically felt that his clients were suffering from the inability to cognitively control their lives and the emotional distress that resulted was strictly an allied consequence of this deficit. More specifically, Ellis cited many illogical, or irrational, ideas that people develop and allow to dominate their thinking. In this
article, he found twelve general irrational beliefs:

(1) "It is a dire necessity for an adult to be loved or approved by everyone for everything he does."

(2) "Certain acts are wrong, wicked or villainous and that people who perform such acts should be severely punished."

(3) "It is terrible, horrible and catastrophic when things are not the way one would like them to be."

(4) "Much human unhappiness is externally caused and is forced on one by outside people and events."

(5) "If something is or may be dangerous or fearsome, one should be terribly concerned about it."

(6) "It is easier to avoid than to face life's difficulties and self-responsibilities."

(7) "One needs something other or stronger than oneself on which to rely."

(8) "One should be thoroughly competent, adequate, intelligent and achieving in all possible respects."

(9) "Because something once strongly affected one's life, it should indefinitely affect it."

(10) "Human happiness can be achieved by inertia and inaction."

(11) "It is vitally important to our existence what other people do, and that we should make great efforts to
change them in the direction we would like them to be."

(12) "One has virtually no control over one's emotions and that one cannot help feeling certain things."

The basic premise of this introductory look into irrational belief systems by Ellis was that the steadfast adherence to the above ideas cause emotional dysfunction. In his 1961 book, A Guide to Rational Living, Ellis once again pleaded his case for more rational, logical thought and presented his list of irrational beliefs, now narrowed down to the first ten of his original twelve. In Reason and Emotion in Psychotherapy (Ellis, 1963), rational-emotive therapy was used to treat two sexual dysfunctions. One client came in for premarital counseling with sex guilt and another, a couple, for treatment of frigidity and impotence. The successful treatment indicated some type of relationship between the tearing down of irrational beliefs and subsequent improvement of sexual relations.

Jones (1968) developed a reliable and valid quantitative measure for each of Ellis' ten main irrational beliefs. The test he constructed, the Irrational Beliefs Test (IBT), was also proven to correlate significantly with other indices of maladjustment. The IBT and the Rational Behavior Inventory, to a lesser extent, are the only tests cited in the literature reviewed as administered measurements of irrational beliefs.
With the theory of RET and irrational beliefs defined; and with the development of reliable and valid testing instruments for measuring these beliefs, Ellis (1969) turned to the question of defining sexual morality in terms of rational thinking. He proposed that sexual morality was just an "offshoot" of morality in general. If one wanted to be morally good (rationally), one will utilize non-defeating, sensible attitudes. Because so many adhered to irrational beliefs as truth, the search for perfection is marred by the fact that no one is perfect. So, Ellis (1969) reasoned, one is highly critical of self and others. Within the realm of sexuality, this is intensified, as religion and others will often inaccurately "espouse the truth."

Ellis (1969) felt that, to humanistically view rational sexual morality, one must not be condemning to another for what they do, even if it is "wrong." As Ellis (1958) noted in discussing the irrational belief of always seeking constant perfection:

... one should do rather than always try to do well and that one should accept oneself as a quite imperfect creature, who has general human limitations and specific fallibilities (p. 48).

Ard (1978) had another view of rational sex ethics based not strictly on Ellis' irrational beliefs, yet is
quite similar to them. Ard's fundamental principles are:

1. The legitimacy of sex—it is a natural, legitimate component of every human being
2. The right of sexual freedom
3. Equality of all in sexual matters
4. Absence of force or coercion into one pattern
5. The frequency and character of sexual acts considered as private matters of personal hygiene
6. No sexual act is barred unless its consequences are harmful

These principles have a great deal of support (Ard, 1974; Ellis, 1954; Guyon, 1948, 1950; Mead, 1942). They emphasize the basic need for freedom in sex that must be given if one is to truly manifest their potential.

The actual theoretical concepts of irrational beliefs and thoughts can be best described in what Ellis (1973) terms "the A-B-C's of RET;"

A = an activity, action or agent that disturbs one (e.g., not being able to achieve orgasm through intercourse)

rB = a rational belief about A (e.g., "It's making me unhappy not to feel sexually satisfied.")

iB = an irrational belief about A (e.g., "I'm a worthless person because I cannot have an orgasm.")

rC = a rational consequence of rB (e.g., "I'll tell my partner and try to focus on my problem. Maybe then we can resolve it.")

iC = an irrational consequence of iB (e.g., "Maybe my partner's 'faking' an orgasm just to spare my feelings. I can't please anyone!!!")
D = disputing the IBs
   (e.g., "Why am I such a failure? I care for my partner and my partner cares for me.")

cE = cognitive effects of D
   (e.g., "Why is it so disastrous that I didn't have an orgasm? It isn't; it's just a blow to my ego.")

bE = behavioral effects of D
   (e.g., "With support and love, I'll get over this in time.")

Figure 3 schematically illustrates this theory.

Insert Figure 3 about here

Rational-emotive therapy is based on the idea that "humans mainly feel disturbed and act dysfunctionally in sex-love and other areas when they escalate, almost any desire, preference or wish into an absolutistic, perfectionistic should, ought, must, command, or demandingness. He sees masturbation as being healthy, but musturbation as being pressuring and anxiety producing" (Ellis, 1975). Ellis treats patients who suffer from sex guilt resulting from the inability to be perfect by teaching the client the A-B-C progression noted above.

Criticisms to Ellis' theory generally fall into two categories: those criticisms against behavior therapies and those criticisms against introspective therapies. Ellis (1963) presents and defends some criticisms fired at all behavioral therapies:
(1) RET is too unemotional, intellectualized and is over-verbal;
(2) RET is superficial therapy based on symptom treatment rather than getting the underlying causes;
(3) RET is too directive, authoritarian and brain-washing.
Meanwhile, other more humanistic objections were proposed:
(4) RET does not work for severely disturbed, mentally limited patients (Grieger and Boyd, 1980);
(5) RET is "inferior in that it emphasizes subjective cognitions of the client--it is not terribly scientific (Mahoney, 1979).

All criticisms aside, one cannot look at irrational beliefs and not look at rational-emotive psychotherapy. Irrational beliefs can best be defined in the context of appropriate and inappropriate behaviors. Irrational beliefs often appear to dictate what is or is not appropriate behavior, and Ellis claims that the dictatorial fashion of the belief itself is inappropriate. Thyer and Papsdorf (1981) perhaps relate the relationship between sexual attitudes (beliefs) and irrational beliefs: "Cognitive therapies aimed at the alleviation of sexual dys functioning or deficits in arousal are often based on the premise that irrational self-statements and unrealistic belief systems inhibit one's capacity for sexual enjoyment (p. 834)."
The purpose of this thesis is to determine if there is any relationship between the level of one's sexual attitudes (lenient, moderate or strict) and one's level of rationality (or irrationality). More specifically, this investigation will determine if one's individual irrational beliefs according to Ellis vary in any significant way between levels of sexual attitudes.
CHAPTER 2

METHOD

Subjects

The subjects were 182 undergraduate college students, 91 males and 91 females, respectively, from introductory psychology classes at Emporia State University. All subjects volunteered to participate in the study.

Apparatus

Two tests were administered to each subject. One test (the attitude portion of the Sex Knowledge and Attitude Test (Miller and Lief, 1972) measured the liberality or conservativity of sexual attitudes. The attitude section of this test consists of 35 five-alternative, Likert-type items. Responses to these items result in the formation of four attitude scales: heterosexual relations, sexual myths, abortion, and masturbation. Raw and standardized scores were obtained. Standardized scores are T scores with a mean of 50 and a standard deviation of 10. According to Miller and Lief, on all scales, high scores are those over 60; low scores are those under 40, a difference of one standard deviation in both directions.
Heterosexual relations (HR) deal with the attitudes toward pre- and extramarital heterosexual behavior. High HR scores indicate liberal attitudes toward such matters; low HR scores indicate a more conservative approach. The sexual myths (SM) scale measures the acceptance or rejection of accepted sexual misinformation. High SM scores reflect rejection of the myths; low SM scores show an acceptance of them. The abortion scale (A) indicates one's overall social, medical and legal attitudes about abortion. High A scores are those more liberal in their consideration of abortion; low A scores are those more conservative in their attitudes of abortion. Lastly, the masturbation (M) scale indicates attitudes toward the sanctioning of masturbation. High M scores are accepting, even encouraging, of this behavior; low M scores are not accepting of it.

To measure the levels of rationality and irrationality for each of Ellis' irrational beliefs, the Irrational Belief Test (Jones, 1968) was given. The test consists of 100 five-alternative, Likert-type items. The instrument contains 10 subscales, each representing Jones' list of Ellis' irrational beliefs mentioned earlier: approval, competence, blame others, frustration intolerance, external causes, dwell on negatives, problem avoidance, rely on strong others, doomed by past and precise solutions.
Individual and total scores are available from this test. When the raw score is obtained, it is then converted to a standardized score. Norms are provided for the entire test and each sten score from each subscale is shown and can be analyzed independently of the others. High sten scores indicate higher irrationality; low sten scores indicate lower irrationality (greater rationality).

Procedure

The administration of all test materials took place during a regularly scheduled class session. All testing materials were presented during the same class session to each subject. The administration and completion of the complete battery of tests required twenty to thirty minutes. Questionnaires were dispersed in a counterbalanced order (half of the students took the Irrational Belief Test first; others took the Sex Knowledge and Attitude Test first).

Before starting the questionnaires, the subjects were asked to denote their sex (M or F) at the top of the first page. Subjects were informed that all materials and responses would be kept completely confidential, and for that reason, to answer as honestly as possible.
Of the 182 students who participated in the survey, all returned fully completed questionnaires. With regard to the Sex Knowledge and Attitude Test, only 9 (4.9%) of the total 182 sampled responded in a manner indicative of "strict" (3, 1.6%) or "lenient" (6, 3.3%) sexual attitudes, as defined by Miller and Lief (1979). Due to the unevenness of sample sizes for the three stratifications of sexual attitudes, the results and inclusion of the Sex Knowledge and Attitude Test will be disregarded.

With the collapse of the factor of sex attitudes, the design now simply compares responses to the Irrational Belief Test between the sexes. The factors of consequence are whether there is, in actuality, a difference in irrational beliefs between males and females. If there is, the important elements to consider are: which irrational beliefs are significantly different, and which sex is more irrational for the above mentioned beliefs.

A mixed-factorial analysis of variance was conducted on the data. Table 1 contains the summary table of results for this analysis.
As indicated in Table 1, a statistically significant difference was found from two sources. There is a difference between the various irrational beliefs and there is a significant interaction ($p < .001$) between sex and irrational belief. There was no statistically significant difference between the sexes.

The sums/means of standardized scores for each various subscore are delineated in Table 2. To most succinctly ascertain significant differences, a simple effects analysis between the sexes, and two single-df comparisons (for each sex, respectively) were conducted. The simple effects analysis was to determine if there is any statistically significant difference at the various individual irrational belief subscores. The single-df comparisons were to determine if there is a significant difference between irrational beliefs within each sex.

The simple effects analysis for the nonrepeated factor, sex, indicated a statistically significant difference present in 9 of 10 subscores. The results are given in detail in
Table 3. The single-df comparisons indicated that both males and females showed a significant difference in their responses to the various irrational beliefs, as shown in Tables 4 and 5.

Males scored higher, and are thus more irrational, in the categories of blame others \( (p < .001) \) and precise solutions \( (p < .001) \). Females scored higher, and are thus more irrational, in the categories of approval \( (p < .001) \), frustration intolerance \( (p < .001) \), external causes \( (p < .001) \), dwell on negative \( (p < .001) \), problem avoidance \( (p < .05) \), rely on strong others \( (p < .05) \) and doomed by past \( (p < .001) \). Gender effect was found to be nonsignificant for the irrational belief of competence.
A thorough review of the literature could not produce any published studies which compared generalized irrational beliefs to sexual attitudes. Not only is this unusual, it presents some unique problems in the interpretation of the present data. One obvious difficulty is that there is no past experimentation to which one can compare current results. The inability to support or refute previous research lends one to view the current research as significant to the extent that it is an initial endeavor into an area of research which merges two areas of great heuristic and practical value.

The disappointing result of the Sex Knowledge and Attitude Test was that there was no diversity in sex attitudes for the sample surveyed. This can be attributable to one, or both, of two possible factors. The population from which the sample was selected is a small midwestern university student body. Perhaps a 6:179:3 ratio accurately reflects a lenient:moderate:strict sexual attitude for a small university in Kansas; however, it is lopsided. To compare 6, 179 and 3 would be statistically meaningless; any statistical analysis with such uneven sample sizes would
yield highly disproportionate and inaccurate results.

Aside from the homogeneity of the sample size, another factor which may have affected the Sex Knowledge and Attitude Test results is the possible internal invalidity of the test. Many people, especially a high proportion of college freshmen, are reluctant to respond honestly, if at all, to a questionnaire about sex in any form or fashion. Another problem with the Sex Knowledge and Attitude Test which could affect its internal validity would be the wording of some of the questions in the test. The wording is above the level of the average college student taking introductory psychology. Miller and Lief (1979) acknowledge that the Sex Knowledge and Attitude Test was standardized with medical students. Once again, the question of the external validity or generalizability of the public to medical students can be raised.

Continuing with the notion of possible internal invalidity affecting the results obtained from the Sex Knowledge and Attitude Test, one must look not only at the group with which the test was standardized, but one should look at the test itself. Following the administration of the questionnaires, several subjects commented on their ignorance of terms such as "coital experience," or "mutual masturbation." This leads one to question whether the subjects
answered in an ignorant, and unintentionally dishonest fashion.

With regard to the Irrational Belief Test, overall, there is no statistically significant difference between the sexes when assessing irrational beliefs. However, upon analysis at each irrational belief subscore, there was a significant gender effect on 9 or 10 of the irrational beliefs.

Reconciling the two facts, obviously different sexes are more irrational at different subscores. As evidenced by Table 3, males are more irrational than females in regard to the lack of acceptance for responsibility of errors, and the belief in precise solutions to all situations. Females, on the other hand, appear to be more irrational with regard to the need for approval, intolerance of frustration, the citing of external causes for behavior, dwelling on negative aspects of life, avoidance of problems, a reliance on strong others, and a pervasive feeling of being doomed by the past. Evidently some sort of "balance" occurs between the sexes and manifests itself in a nonsignificant difference, overall.

The purpose of this thesis was to determine what objective relationship existed between sexual attitudes and
generalized irrational beliefs. It was hoped if some relationship existed between the two, therapeutic strategies in sexual therapy could be geared in a dual approach. No discrete levels of sexual attitudinal permissiveness could be found in this sample. Irrationality was not found to be significantly greater in males than females overall; however, on certain particular irrational beliefs there was found to be a significant difference between the sexes. The label of rationality or irrationality is very relative in this case. No group scored outside of the standardized boundaries for the normal population.

The results and interpretations of this data are multifunctional. Not only does it provide an impetus for further refinement of the assessment instruments, it could lead to further elucidation into basic cognitive errors and distortions which could be an indirect yet significant factor in sexual dysfunction.
TABLES
Table 1.
Summary Table for the Analysis of Sex (Gender) vs. Level of Irrational Beliefs

<table>
<thead>
<tr>
<th>Source</th>
<th>SS</th>
<th>df</th>
<th>MS</th>
<th>F</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sex</td>
<td>7.14</td>
<td>1</td>
<td>7.14</td>
<td>1.04</td>
</tr>
<tr>
<td>Error</td>
<td>1230.97</td>
<td>150</td>
<td>6.84</td>
<td></td>
</tr>
<tr>
<td>Irrational Belief</td>
<td>163.72</td>
<td>9</td>
<td>18.19</td>
<td>8.75*</td>
</tr>
<tr>
<td>Sex x Irrational Belief</td>
<td>73.27</td>
<td>9</td>
<td>8.14</td>
<td>3.91*</td>
</tr>
<tr>
<td>Error</td>
<td>3377.51</td>
<td>1620</td>
<td>2.08</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>4852.61</td>
<td>1819</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* p < .001
Table 2

Sums/Means for Each Subscore on the Irrational Belief Test
(Separated by sex)

<table>
<thead>
<tr>
<th>Subscore</th>
<th>Males</th>
<th>Females</th>
</tr>
</thead>
<tbody>
<tr>
<td>Approval</td>
<td>449/4.93</td>
<td>510/5.60</td>
</tr>
<tr>
<td>Competence</td>
<td>457/5.02</td>
<td>472/5.19</td>
</tr>
<tr>
<td>Blame others</td>
<td>542/5.96</td>
<td>505/5.55</td>
</tr>
<tr>
<td>Frustration Intolerance</td>
<td>464/5.10</td>
<td>497/5.46</td>
</tr>
<tr>
<td>External Causes</td>
<td>449/4.93</td>
<td>473/5.20</td>
</tr>
<tr>
<td>Dwell on Negative</td>
<td>521/5.73</td>
<td>550/6.04</td>
</tr>
<tr>
<td>Problem Avoidance</td>
<td>524/5.76</td>
<td>506/5.56</td>
</tr>
<tr>
<td>Rely on Strong Others</td>
<td>511/5.62</td>
<td>526/5.78</td>
</tr>
<tr>
<td>Doomed by past</td>
<td>508/5.58</td>
<td>550/6.04</td>
</tr>
<tr>
<td>Precise solutions</td>
<td>490/5.38</td>
<td>440/4.84</td>
</tr>
</tbody>
</table>

N                          | 91           | 91            |
Table 3.

Mean Comparisons for the Simple Main Effects on the Gender Factor at Each Level of Irrational Belief

<table>
<thead>
<tr>
<th>Irrational Belief</th>
<th>Males</th>
<th>Females</th>
</tr>
</thead>
<tbody>
<tr>
<td>Approval</td>
<td>4.93</td>
<td>5.60</td>
</tr>
<tr>
<td>(p &lt; .001)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Competence</td>
<td>5.02</td>
<td>5.19</td>
</tr>
<tr>
<td>Blame Others</td>
<td>5.96</td>
<td>5.55</td>
</tr>
<tr>
<td>(p &lt; .001)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Frustration Intolerance</td>
<td>5.10</td>
<td>5.46</td>
</tr>
<tr>
<td>(p &lt; .001)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>External Causes</td>
<td>4.93</td>
<td>5.20</td>
</tr>
<tr>
<td>(p &lt; .001)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dwell on Negative</td>
<td>5.73</td>
<td>6.04</td>
</tr>
<tr>
<td>(p &lt; .001)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Problem Avoidance</td>
<td>5.76</td>
<td>5.56</td>
</tr>
<tr>
<td>(p &lt; .05)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rely on Strong Others</td>
<td>5.62</td>
<td>5.78</td>
</tr>
<tr>
<td>(p &lt; .05)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Doomed by past</td>
<td>5.58</td>
<td>6.04</td>
</tr>
<tr>
<td>(p &lt; .001)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Precise solutions</td>
<td>5.38</td>
<td>4.84</td>
</tr>
<tr>
<td>(p &lt; .001)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Table 4.

Simple Main Effect at Male Level of Gender

<table>
<thead>
<tr>
<th>Source</th>
<th>SS</th>
<th>df</th>
<th>MS</th>
<th>F</th>
</tr>
</thead>
<tbody>
<tr>
<td>Irrational Beliefs</td>
<td>117.48</td>
<td>9</td>
<td>13.05</td>
<td>5.85*</td>
</tr>
<tr>
<td>Error</td>
<td>2008.12</td>
<td>900</td>
<td>2.23</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>2125.6</td>
<td>909</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*p < .001
Table 5.
Simple Main Effect at Female Level of Gender

<table>
<thead>
<tr>
<th>Source</th>
<th>SS</th>
<th>df</th>
<th>MS</th>
<th>F</th>
</tr>
</thead>
<tbody>
<tr>
<td>Irrational Beliefs</td>
<td>122.83</td>
<td>9</td>
<td>13.65</td>
<td>13.13*</td>
</tr>
<tr>
<td>Error</td>
<td>933.04</td>
<td>900</td>
<td>1.04</td>
<td></td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>1055.87</td>
<td>909</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*p < .001
FIGURES
Figure 1.

Masters and Johnson's Human Sexual Response Cycle: Males
Figure 2.
Masters and Johnson’s Human Sexual Response Cycle(s): Female
REFERENCES


APPENDIX 1

SUMMARIZED RESULTS OF KINSEY STUDIES

(Feldman and MacCulloch, 1980)
I. Preadolescent males

A. Orgasms are abrupt, with or without ejaculation
B. Erections are much quicker
C. Multiple orgasms in shorter periods of time than males of any age
D. 40% reported heterosexual activities (mean age of initiation of activities: 9)
E. 50% reported homosexual activities (mean age of onset: 9)

II. Preadolescent females

A. 25% sexually excited prior to puberty
   4% before age 5
B. Pre-puberty orgasms rare
   9% by age 11
C. 18% purely homosexual contacts
   15% purely heterosexual contacts
   15% both
   (all before puberty and not always associated with sexual excitement)

III. Preadolescent males and females

A. Commonest sexual activity for boys and girls—heterosexual: mutual exhibition of genitalia
B. Commonest sexual activity for boys and girls—homosexual: mutual exhibitions of genitals

IV. Adolescent males

A. Average age of first ejaculation: 13 years, 9 months
B. By age 15, 90% had experienced orgasm to ejaculation; primary method: masturbation

V. Adolescent females

A. 30% erotically aroused by age 12
   50% erotically aroused by age 15
   90% erotically aroused by age 20
B. 14% achieved orgasm by age 13
   25% achieved orgasm by age 15
   50% achieved orgasm by age 20
   (Primary methods: heterosexual petting, masturbation, psychological stimulation)
VI. Adult males

A. Number of orgasms:
   1. Teens - 5 per week
   2. Mid-forties - 2-3 per week
   3. After mid-forties - 1-2 per week

B. Sources of sexual activity:
   possibilities: masturbation, nocturnal emissions, premarital intercourse, marital intercourse, extramarital intercourse, homosexual acts
   1. Mean number of sources utilized: 2-3

VII. Adult females

A. 75% of unmarried females experienced orgasm by age 35
   Increase in frequency of orgasms up to age 40, then decline (single females)

B. Pattern similar but less intense for married females

C. At all ages, single most frequent source of sexual outlet: masturbation (unmarried females); intercourse (married females)

D. After mid-thirties, masturbation becomes more important
APPENDIX II
TESTING INSTRUMENTS
SEX KNOWLEDGE AND ATTITUDE TEST
(Attitude Section)

Please indicate your reaction to each of the following statements on sexual behavior in our culture, using the following alternatives:

SD - Strongly disagree
D - Disagree
U - Undecided
A - Agree
SA - Strongly Agree

1. The spread of sex education is causing a rise in premarital intercourse. _____

2. Mutual masturbation among boys is often a precursor of homosexual behavior. _____

3. Extramarital relations are almost always harmful to a marriage. _____

4. Abortion should be permitted whenever desired by the mother. _____

5. The possession of contraceptive information is often an incitement to promiscuity. _____

6. Relieving tension by masturbation is a healthy practice. _____

7. Premarital intercourse is morally undesirable. _____

8. Oral-genital sex play is indicative of an excessive desire for physical pleasure. _____

9. Parents should stop their children from masturbating. _____

10. Women should have coital experience prior to marriage. _____

11. Abortion is murder. _____

12. Girls should be prohibited from engaging in sexual self-stimulation. _____

13. All abortion laws should be repealed. _____
14. Strong legal measures should be taken against homosexuals. 

15. Laws requiring a committee of physicians to approve an abortion should be abolished. 

16. Sexual intercourse should occur only between married partners. 

17. The lower-class male has a higher sex drive than others. 

18. Society should offer abortion as an acceptable form of birth control. 

19. Masturbation is generally unhealthy. 

20. A physician has the responsibility to inform the husband or parents of any female he aborts. 

21. Promiscuity is widespread on college campuses today. 

22. Abortion should be disapproved of under all circumstances. 

23. Men should have coital experience prior to marriage. 

24. Boys should be encouraged to masturbate. 

25. Abortions should not be permitted after the twentieth week of pregnancy. 

26. Experiences of seeing family members in the nude arouse undue curiosity in children. 

27. Premarital intercourse between consenting adults should be socially acceptable. 

28. Legal abortions should be restricted to hospitals. 

29. Masturbation among girls is a frequent cause of frigidity. 

30. Lower-class women are typically quite sexually responsive. 

31. Abortion is a greater evil than bringing an unwanted child into the world.
32. Mutual masturbation in childhood should be prohibited. _____

33. Virginity among unmarried girls should be encouraged in our society. _____

34. Extramarital sexual relations may result in a strengthening of the marriage relationship of the persons involved. _____

35. Masturbation is acceptable when the objective is simply the attainment of sensory enjoyment. _____
IRRATIONAL BELIEF TEST

This is an inventory of the way you believe and feel about various things. There are a number of statements with which you will tend to agree or disagree. Answers are to be circled in either agreement or disagreement. Strongly Agree (A), Agree (a), Neither (n), Disagree (d), and Strongly Disagree (D).

It is not necessary to think over any item very long. Mark your answer quickly and go on to the next statement.

Be sure to mark how you actually feel about the statement not how you think you should feel.

Try to avoid the neutral or "n" response as much as possible. Select this answer only if you really cannot decide whether you tend to agree or disagree with a statement.

1. It is important to me that others approve of me. A and D
2. I hate to fail at anything. A and D
3. People who do wrong deserve what they get. A and D
4. I usually accept what happens philosophically. A and D
5. If a person wants to, he can be happy under almost any circumstances. A and D
6. I have a fear of some things that often bothers me. A and D
7. I usually put off important decisions. A and D
8. Everyone needs someone he can depend on for help and advice. A and D
9. "A zebra cannot change his stripes". A and D
10. There is a right way to do everything. A and D
11. I like the respect of others, but I don't have to have it. A and D
12. I avoid things I cannot do well. A and D
13. Too many evil persons escape the punishments they deserve. A and D
14. Frustrations don't upset me. A and D
15. People are disturbed not by situations, but by the view they take of them. A and D
16. I feel little anxiety over unexpected dangers of future events. A and D
17. I try to go ahead and get irksome tasks behind me when they come up. A and D
18. I try to consult an authority on important decisions. A and D
19. It is almost impossible to overcome the influences of the past. A and D
20. There is no perfect solution to anything. A and D
21. I want everyone to like me. A and D
22. I don't mind competing in activities where others are better than I. A and D
23. Those who do wrong deserve to be blamed. A and D
24. Things should be different from the way they are. A and D
25. I cause my own moods. A and D
26. I often can't get my mind off some concern. A and D
27. I avoid facing my problems. A and D
28. People need a source of strength outside themselves. A and D
29. The impact of the past does not last forever. A and D
30. There is seldom an easy way out of life's difficulties. A and D
31. I like myself even when many others don't. A and D
32. I like to succeed at something but I don't feel I have to. A and D
33. Immorality should be strongly punished. A and D
34. I often get disturbed over situations I don't like. A and D
35. People who are miserable have usually made themselves that way. A and D
36. If I can't keep something from happening, I don't worry about it. A and D
37. I usually make decisions as promptly as I can. A and D
38. There are certain people that I depend on greatly. A and D
39. People overvalue the influence of the past. A and D
40. Some problems will always be with us. A and D
41. If others dislike me, that's their problem, not mine. A and D
42. It is highly important to me to be successful in everything I do. A and D
43. I seldom blame people for their wrongdoing. A and D
44. I usually accept things the way they are, even if I don't like them. A and D
45. A person won't stay angry or blue long
   unless he keeps himself that way. . . . . A a n d D
46. I can't stand to take chances. . . . . . . A a n d D
47. Life is too short to spend it doing
   unpleasant tasks. . . . . . . . . . A a n d D
48. I like to stand on my own two feet. . . . . A a n d D
49. If I had had different experiences, I could
   be more like I want to be. . . . . . . . . A a n d D
50. Every problem has a correct solution. . . . A a n d D
51. I find it hard to go against what others
    think. . . . . . . . . . . . . . . . . . . . A a n d D
52. I enjoy activities for their own sake, no
    matter how good I am at them. . . . . A a n d D
53. The fear of punishment helps people be good. A a n d D
54. If things annoy me, I just ignore them. . . A a n d D
55. The more problems a person has, the less
    happy he will be. . . . . . . . . . . . . A a n d D
56. I am seldom anxious over the future. . . . A a n d D
57. I seldom put things off. . . . . . . . . . . A a n d D
58. I am the only one who can really under­
    stand and face my problems. . . . . . . . . A a n d D
59. I seldom think of past experiences as
    affecting me now. . . . . . . . . . . . . A a n d D
60. We live in a world of chance and probability A a n d D
61. Although I like approval, it's not a real
    need for me. . . . . . . . . . . . . . . . . A a n d D
62. It bothers me when others are better than I
    am at something. . . . . . . . . . . . . A a n d D
63. Everyone is basically good. . . . . . . . . A a n d D
64. I do what I can to get what I want and then
    don't worry about it. . . . . . . . . . . . A a n d D
65. Nothing is upsetting in itself; only the way
    you interpret it. . . . . . . . . . . . . . . . A a n d D
66. I worry a lot about certain things in the
    future. . . . . . . . . . . . . . . . . . . . A a n d D
67. It is difficult for me to do unpleasant
    chores. . . . . . . . . . . . . . . . . . . . A a n d D
68. I dislike for others to make my decisions
    for me. . . . . . . . . . . . . . . . . . . . A a n d D
69. We are slaves to our personal histories. . . A a n d D
70. There is seldom an ideal solution to
    anything. . . . . . . . . . . . . . . . . . . . A a n d D
71. I often worry about how people approve of and accept me. A a n d D
72. It upsets me to make mistakes. A a n d D
73. It's unfair that the "rain falls on the just and the unjust". A a n d D
74. I am fairly easy going about life. A a n d D
75. More people should face up to the unpleasantness of life. A a n d D
76. I find it easy to seek advice. A a n d D
77. A life of ease is seldom very rewarding. A a n d D
78. I find it easy to seek advice. A a n d D
79. Once something strongly affects your life, it always will. A a n d D
80. It is better to look for a practical solution than a perfect one. A a n d D
81. I have considerable concern with what people are feeling about me. A a n d D
82. I often become quite annoyed over little things. A a n d D
83. I usually give someone who has wronged me a second chance. A a n d D
84. I dislike responsibility. A a n d D
85. There is never any reason to remain sorrowful for very long. A a n d D
86. I hardly ever think of such things as death or atomic war. A a n d D
87. People are happiest when they have challenges and problems to overcome. A a n d D
88. I dislike having to depend on others. A a n d D
89. People never change basically. A a n d D
90. I feel I must handle things in the right way A a n d D
91. It is annoying but not upsetting to be criticized. A a n d D
92. I'm not afraid to do things which I cannot do well. A a n d D
93. No one is evil, even though his deeds may be A a n d D
94. I seldom become upset over the mistakes of others. A a n d D
95. Man makes his own hell within himself. A a n d D
96. I often find myself planning what I'd do in different dangerous cases. A a n d D
97. If something is necessary, I do it even if it is unpleasant. A a n d D
98. I don't expect someone else to highly concerned about my welfare. A a n d D
99. I don't look upon the past with any regrets. A a n d D
100. There is no such thing as an ideal set of circumstances. A a n d D