

Non-verbal communication physical attractiveness and mate choices

■ ANSHU JOHRY, MONISHA SINGH AND SANGITA SRIVASTAVA

Received: 12.01.2015; Revised: 04.04.2015; Accepted: 19.04.2015

■ **ABSTRACT :** It is a universal phenomenon that dressing/clothing has an effect on the personality of an individual. One's attire along with other attributes is an important component of attracting members of the opposite sex. This study is focused on what people wear and what are the other attributes which are important in mate choices among boys of college going age. A detail questionnaire consisting of about 35 attributes relating to attire, physical fitness and beauty were asked from 200 boys (n=184). Usually men exhibit, more elaborate ornamentation in mate selection displays. It has been an interesting social survey in collecting cues about why men consider so many factors in mate selection.

See end of the paper for authors' affiliations

ANSHU JOHRY

Department of Home Science,
University of Allahabad,
ALLAHABAD (U.P.) INDIA
Email : anshujohry@gmail.com

■ **KEY WORDS:** Non-verbal communication, Physical attractiveness, Mate choices, BMI (body mass index), WHR (waist hip ratio)

■ **HOW TO CITE THIS PAPER :** Johry, Anshu, Singh, Monisha and Srivastava, Sangita (2015). Non-verbal communication physical attractiveness and mate choices. *Asian J. Home Sci.*, 10 (1) : 116-122.

Non-verbal communication usually occurs through the process of communicating wordless messages using the medium of "silent language" as called by Hall (1959). It is accomplished through different types of non-verbal communication signals such as gesture, body language or posture, facial expression, eye gaze and clothing etc. while communicating with each other, people are constantly sending non-verbal signs to each other and make an impression about themselves to the surrounding people and that impression forms the basis of their acceptance. This acceptance, in turn, functions as a criterion for the success or failure of their communication. In fact, a significant amount of communication that goes on between people is non-verbal. Along with all other non-verbal's signals, clothing is a

prominent source of non-verbal communication apart from bodily beauty and physical fitness. It transmits messages which are important aspects of communication even in the presence of other indicators; certain non-verbal cues tell more about a person. First impressions are formed rapidly and are often highly accurate. After seeing a person for just a second, people make judgments about their personality.

Mate choices can be seen as a special instance of interpersonal attraction; the process of forming and maintaining a close personal relationship with a 'partner', often involving sex. As such, it has gotten much attention in recent psychological research. This interest is well-deserved. It is normal that people are constantly in contact with each other. Research on the need to belong

(Baumeister and Leary, 1995) claims that this need is extremely fundamental and important to human life.

Physical attractiveness :

Physical attractiveness impacts heavily on human mating and non-mating behaviour (Patzner, 2006) and is more important in women than in men (Li and Kenrick, 2006; Gottschall, 2007) body mass and body curvaceousness are two widely acknowledged determinants of women's physical attractiveness. Even though not politically correct and generally perceived as shallow, there is a growing body of evidence that physical attractiveness plays a major role in mate choices (Walster *et al.*, 1966; Hatfield and Sprecher, 1986). In general people with similar levels of physical attractiveness seem to date and mate each other (Berscheid *et al.*, 1971).

Waist hip ratio :

The most popular measure of female body curvaceousness is waist hip ratio (WHR), that is, the ratio of waist girth to hip girth. Breast size, being another trait associated with curvaceousness is a weaker determinant of attractiveness than WHR (Singh and Young, 1995). In most human populations, WHR in young women averages 0.75-0.80 and increases with age; WHR in men is higher than in women by about 0.10-0.15 (Molarins *et al.*, 1999) the low ratio of waist-to-hip ratio size in females is a unique human feature (Singh, 1993) and several adaptive mechanisms might have contributed to its evolution. Firstly, the human newborn has a relatively large head and a large pelvis facilitates its delivery (Rosenberg, 1992). Secondly, a narrow waist may indicate the absence of pregnancy and therefore, current fecundity- a feature that ancestral men sought in women. This may be an especially important cue in humans because women do not signal their present fertility in any other easily perceptible way (Singh, 1993). Thirdly, fat, when deposited around the hips rather than the waist, facilitates bipedal stability of pregnant and lactating women (Pawlowski and Grabarczyk, 2003), contains fatty acids beneficial for brain development of the fetus and infant (Lassek and Gaulin, 2008) and may dishonestly signal a broad pelvis and absence of pregnancy so as to make the woman attractive to men (Low *et al.*, 1987; Furnham *et al.*, 2004).

Body mass index (BMI) :

Although many tissues contribute to body mass, the

amount of adipose tissue is especially strongly related to the body weight (Deurenberg *et al.*, 1991). Among people of normal body mass, fat percentage in women is almost twice as high as in men. The large quantity of adipose tissue in women constitutes a store of energy that can be utilized during pregnancy or lactation (Brown and Konner, 1987).

Body mass in relation to height is commonly determined by body mass index (BMI), which is the weight in kilograms divided by the square of the height in meters (WHO, 2012). Underweight women (BMI<18.5) are physically weak (Artero *et al.*, 2010) and at high risk of developing osteoporosis, ovulatory dysfunction, scoliosis, and intestinal conditions (Lusky *et al.*, 1996). On the other hand, overweight (BMI>25) and especially, obesity (BMI>30) in women is related to an ovulatory cycles (Green *et al.*, 1988), respiratory infections and risk of developing cardiovascular disease, type 2 diabetes.

According to (Morris *et al.*, 1996) wearing clothes without transmitting non-verbal cues is impossible: a person's dress discloses a great deal about that person like other non-verbal cues, clothing signals can be communicated intentionally or unintentionally and they can thus, be interpreted consciously or unconsciously by the observer (Morris *et al.*, 1996). In other words, clothing, According to Molloy (1977) is a primary impression management tool. Accordingly, the first impression produced as a function of clothing messages leads to different reactions and decisions on the part of the receiver. In long term relationship men like women, prefer intelligent marriage partners, friendliness, sense of humour have been rated highly, just as highly as physical attractiveness and beauty across cultures. Buss found that men rated intelligence, kindness and understanding of a prospective mate as important attributes. These traits were more important than physical attractiveness. The sexual jealousy has a universal influence on dynamics of men's and women's relationship, which is beyond the preview of this study. Man rating of women physical traits, including a waist to hip ratio WHR of 0.7, facial feature that signal a combination of sexual maturity, relative youth, body, facial symmetry and age (Cunningham, 1986; Jones, 1995; Jones and Hill, 1993; Kenrick and Keefe, 1992 and Moller *et al.*, 1995).

Body mass index is a measure of leanness to obesity independent of height, is also associated with rated attractiveness. Nume and Montgomerio (2001) found a

negative relation between BMI and the rated attractiveness of women. Women were rated more attractive. The combination of all these traits WHR, age provides cues to women's fertility, women's fertility is low in the teen years it peaks at about the age of 25 and then declines to near zero by age 45 (Manken *et al.*, 1986).

A definition of dress :

Dress was defined as an assemblage of body modifications and supplements displayed by a person in communicating with other human beings (Eicher and Roach-Higgins, 1991). Dress, so defined, includes a long list of possible direct modifications of the body such as coiffed hair, coloured skin, pierced ears and scented breath.

S-O-R model :

Mehrabian and Russell's (1974) SOR model, based on environmental psychology, explain how environments affect behaviour and can be used to explain how dress affects behaviour, because dress can be construed as a micro environment for the body. According to these authors research in environmental psychology has focused on the effect of things in the physical environment on emotions (e.g. pleasure, arousal, dominance) and on a variety of approach avoidance behaviours. The model indicates that stimuli (S) in the environment influence the organism (o) which in turn evokes a behavioural response (R). Researches (Eroglu *et al.*, 2001) have modified the model to include cognition in addition to the emotional states suggested by Mehrabian and Russell as part of (O) because dress stimuli are part of our social environment; it seems plausible to adopt the S-O-R model to explain how dress stimuli affect behaviour. In fact, Lennon and Davis (1989) suggested that impressions (O) as a function of dress (S) affect behavioural responses (R) to target persons. For example, when an individual views someone in creative and pleasing dress, he or she may experience positive affective responses that, in turn, may influence approach behaviour (e.g., standing close, staying around). In contrast, when a person views someone in uncreative and unpleasing dress this may evoke negative affective responses that may in turn result in avoidance behaviour (e.g., stay away from the person).

Hypothesis :

The following hypothesis was formulated for the

study:

- H₁: Dressing sends non-verbal cues to the perceivers.
- H₂: Dressing transmits messages about the socio-economic background, educational background of a person.
- H₃: There are other physical cues which affect boys to perceive the level of attractiveness in women.
- H₄: There are other cues of bodily beauty which effect the level of attraction of body.
- H₅: Physical fitness is a necessary attribute towards attraction towards women.

Objective :

To investigate the cause and effect of physical attraction of the opposite gender. We framed questions on a detail schedule, based on the following variables such as beauty, physical fitness, proportion, dressing (attire) to explore the importance of non verbal communication in personality traits and to investigate the impact of clothing on human behaviour, the present study was undertaken.

■ RESEARCH METHODS

Based on the review, we narrowed down the various aspects of personality and personal interview method was used on college going men aged 22-26 years out of 200 only 184 men could be reached for eliciting information through interview. The questions were mostly based on rating scales. Also questions which were structured into yes/no were also asked. The results were completed on a 10 point hedonic scale of likes and dislikes of men on the following variables.

The questions are framed on a detail schedule based on the following variables.

On the basis of the personal interview the rating of the variables on the boys perception is done on 10 point hedonic scale. The boys were asked several structured and unstructured questions about their choices of a mate. The response was different to illicit in open ended questions.

■ RESEARCH FINDINGS AND DISCUSSION

The results obtained from the present investigation are presented in Tables 1 to 5 and Fig. 1 to 5.

68 per cent men reported that they took non-verbal cues from the attire the women wore, and how they

appeared in those dresses.

Table 1 and Fig. 1 indicate the average mean of the points given on hedonic scales to accessories of dressing.

The bar graph shoes the rating of different variables

Table 1 : Showing boy's perception on dressing	
Independent variables	Average mean
T ₁ Footwear	2.1
T ₂ Any jewellery	0.1
T ₃ Make up	1.0
T ₄ Hair styling	2.0
T ₅ Neatness/ untidiness	5.4
T ₆ Fashion	4.8
T ₇ Physical appearance	7.2
T ₈ Proportion	8.4

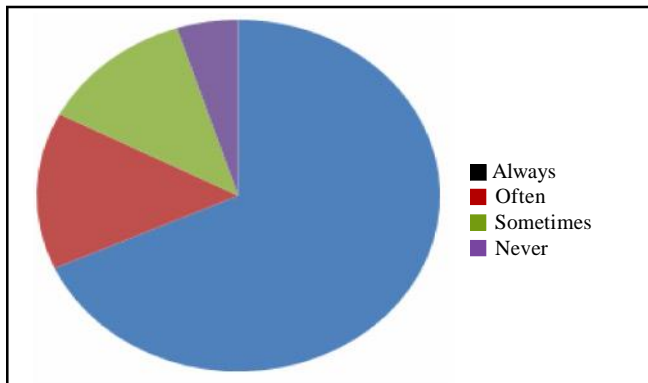


Fig. 1 : Percentage of dressing sends non-verbal cues

Table 2 : Physical attribute	
Independent variables	Average mean
Bodily beauty	7.1
Hair, face, complexion	5.8
Secondary sex attributes	7.0

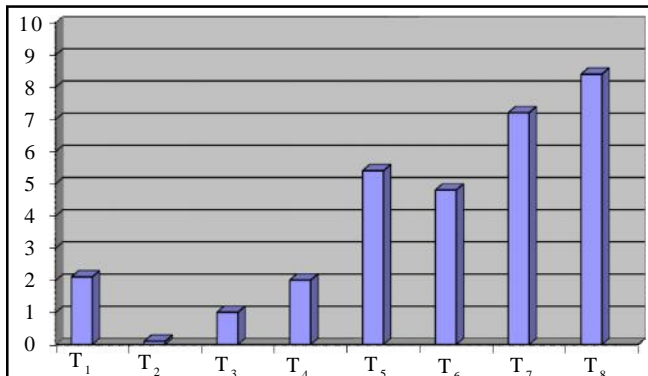


Fig. 2 : Rating of different variables on the hedonic scale

on the hedonic scale.

As indicated in Table 2 bodily beauty attended a very high score of 7.1, equally important in total physical appearance, which also got a score of 7.1, in Table 1.

Table 3 : Body language	
Independent variables	Average mean
Clothing	8.1
Walking	6.2
Talking	7.5
Laughing	4.2
Voice quality	5.7
Physical fitness	8.2

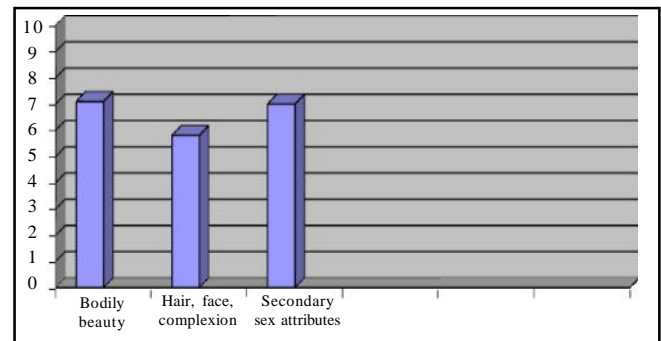


Fig. 3 : Bar graph of physical attribute

Table 4 : Other attributes	
Independent variables	Average mean
Sense of humour	7.6
Intelligence	8.0
Under standing	7.9

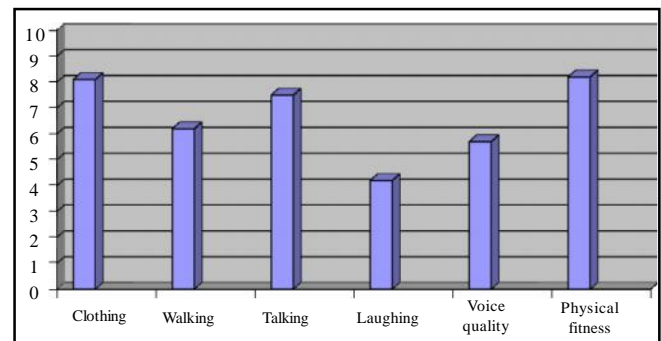


Fig. 4 : Bar diagram of body language

Table 5 : Dressing sense	
Variables (clothing)	Average mean
Descent	9.6
Indescent	5
Vulgar	3

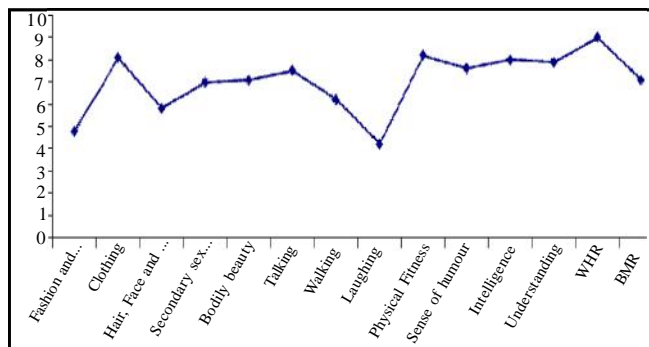


Fig. 5 : Attributes sent by human being to the perceiver

Table 6 : Body proportions

Variables	Average mean
WHR (waist hip ratio)	9.0
BMI (body mass index)	7.1

but much less than the traits of bodily beauty.

In Fig. 4, dressing/ clothing was complimentary to physical fitness. Talking and voice was highly rated.

In Table 4 Intelligence and sense of humour and understanding all of them being functions of brain, were rated above 7, which is a very high score on cognitive function.

Table 5 indicated that descent dressing was given a high rating, which is also a cognitive function; much thinking goes in the way. Appearances are created to illicit a response. The finding indicates, that thought changes into dress and dress changes into response from others.

As per the response from Fig. 5 it is evident that each human being sends about 35 attributes on non-verbal cues to the perceiver. Dressing / clothing got a high score of 8.1, which also collaborates, why women invest so much in dressing up. As per the findings men laid much higher emphasis on physical fitness of the woman and bodily proportions which are indicated by researchers earlier also in WHR of 0.6–0.7. This is the most pleasing figure as it is instinctively tells the perceiver about the physical good health / fitness of the women and she being in readiness to fertility. This being the basis of attraction to the opposite sex. The dress is given due importance because of its social significance of indicating class, education and background. Conclusion based on the analysis of data and review of related literature the study found that beauty, physical fitness, attire and other personality traits form an interesting analogy of how and why men are attracted to women. It is supported that dress is considered as an aspect of non-verbal

communication and has social significance. The most important cue is the WHR (waist hip ratio of 0.7 which holds a high value on the hedonic scale, followed by clothing cues and bodily beauty. Clothing is second skin, to an otherwise beautiful or ugly body. The focus of attractiveness rests on WHR (waist hip ratio) rather than the second skin (clothing). The second skin (dressing) may compliment a beautiful body. The hypothesis H_1 , H_2 , H_3 , H_4 and H_5 were found to be correct.

Good physical and hormonal health is reflected in the physical fitness level which is an important aspect for progeny from the selected mate. This forms the evolutionary basis of being attracted to the women of that age. Men having to play a miniscule, but significant role in the reproductive task takes very fine cues towards selection of a mate, cues are also taken from bare parts of woman's body, where fashion has extended its boundaries to give a glimpse of real proportions.

Interestingly, humours, understanding and intelligence hold equal importance, as that of beauty. Men were found to be more attracted to higher intelligence level. Sense of humour, understanding and intelligence show a score of 7.6, 7.9 and 8, respectively. The cognitive factors played as significant a role as physical beauty.

It can conclusively be reported that brains and beauty are on equal footing in terms of attraction to the opposite sex.

It will be further very interesting to collect data on how women choose a mate and what are the underlying features

Authors' affiliations:

MONISHA SINGH AND SANGITA SRIVASTAVA, Department of Home Science, University of Allahabad, ALLAHABAD (U.P.) INDIA

REFERENCES

- Artero, E.G., España-Romero, V., Ortega, F.B., Jiménez-Pavón, D., Ruiz, J.R., Vicente-Rodríguez, G., Bueno, M., Marcos, A., Gómez-Martínez, S. and Urzánqui, A. (2010). Health-related fitness in adolescents: underweight, and not only overweight, as an influencing factor. The AVENA study. *Scand. J. Med. Sci. Sports*, **20** (3) : 418–427.
- Bar, Moshe, Neta, Maital and Linz, Heather (2006). Very first impressions. *Emotion*, **6** (2): 269-278.
- Barber, N. (1995). The evolutionary psychology of physical attractiveness sexual selection and human morphology. *Ethology & Soc.*, **16** (5) : 395-424.

- Baumeister, Roy F. and Leary, Mark R. (1995).** The need to belong: Desire for interpersonal attachments as a fundamental human motivation. *Psychol. Bull.*, **117**(3):497-529.
- Berscheid, E. (1974).** *Physical attractiveness*. Academic press, NEW YORK, U.S.A.
- Berscheid, E., Dion, K., Walster, E. and Walster, W.G. (1971).** Physical attractiveness and dating choice: A test of the matching hypothesis. *J. Exp. Soc. Psychol.*, **7** (2) : 173-189.
- Brown, P.J. and Konner, M. (1987).** An anthropological perspective on obesity. *Ann. N. Y. Acad. Sci.*, **499** : 29-46.
- Buss, David M. (1985).** Human mate selection. *American Scientists*, **73**: 47-51.
- Cashdan, F. (2008).** Waist-to-hip ratio across cultures: trade of between androgen-dependent traits. *Curr. Anthropol.*, **49** (6) : 1099-1107.
- Cunningham, Michael R. (1986).** Measuring the physical in physical attractiveness: Quasi-experiments on the sociobiology of female facial beauty. *J. Personality & Soc. Psychol.*, **50** (5): 925-935.
- Davis, Leslie L. (1988).** Social cognition and the study of clothing and human Behaviour. *Soc. Behav. & Personal*, **16** (2): 175-186.
- Deurenberg, P., Weststrate, J.A. and Seidell, J.C. (1991).** Body mass index as a measure of body fatness: age- and sex-specific prediction formulas. *British J. Nutr.*, **65**(2): 105-114.
- Dixson, B.J., Li, B. and Dixson, A.F. (2010).** Female waist-to-hip ratio, body mass index and sexual attractiveness in China. *Curr. Zool.*, **56** (2) : 175-181.
- Eckland, B.K. (1986).** Theories of mate selection. *Eugenics Quarterly*, **15** (2) : 71-84.
- Eicher, J.B. and Roach-Higgins, M.E. (1991).** *Describing dress: a system for classifying and defining*. In: R. Barnes and J.B. Eicher (Ed.), *Dress and Gender: Making and Meaning in Cultural Context*, Berg, NEW YORK, U.S.A.
- Eroglu, S.A., Machleit, K.A. and Davis, L.M. (2001).** Atmospheric qualities of online retailing: A conceptual model and implications. *J. Busi. Res.*, **54**(2):177-184.
- Furnham, A., Mistry, D. and McClelland, A. (2004).** The influence of age of the face and the waist to hip ratio on judgements of female attractiveness and traits. *Personal. & Individ. Differ.*, **36** (5) :1171-1185.
- Geary, Jacob and Carven (2004).** Evolution of human mate choices. *J. Sex Res.*, **41** (1): 27-42.
- Gottschall, Jonathan (2007).** Greater emphasis on female attractiveness in homo sapiens: a revised solution to an old evolutionary riddle. *Evolutionary Psychol.*, **5**(2): 347-357.
- Green, B.B., Weiss, N.S. and Daling, J.R. (1988).** Risk of ovulatory infertility in relation to body weight. *Fertil Steril.*, **50** (5): 721-726.
- Hall, Edward T. (1959).** *The silent Language*. Garden City, Doubleday, NEW YORK, U.S.A.
- Hamid, Paul N. (1968).** Style of dress as a perceptual cue In impression formation. *Perceptual & Motor Skills*, **26**:904-906.
- Hatfield, E. and Sprecher, S. (1986).** *Mirror: The Importance of Looks in Everyday Life*. SUNY Press, NEW YORK, U.S.A.
- Jones, D. (1995).** Sexual selection, physical attractiveness, and facial neotony. *Curr. Anthropol.*, **36** (5) :723-748.
- Jones, D. and Hill, K. (1993).** Criteria of facial attractiveness in five populations. *Human Natr.*, **4**(3): 271-296.
- Kenrick, D.T. and Keefe, R.C. (1992).** Age preferences in mates reflect sex differences in human reproductive strategies. *Behav. & Brain Sci.*, **15** (1) : 75-133.
- Koëciński, Krzysztof (2013).** Attractiveness of women's body: body mass index, waist hip ratio, and their relative importance. *Internat. Soc. Behav. Ecol.*, **24** (4) : 914-925.
- Lambert, S. (1972).** Reaction to a stranger as a function of style of dress. *Perceptual & Motor Skills*, **35** (3): 711-712.
- Langhorne, M.C. and Secord, P.F. (1955).** Variations in marital needs with age, sex, marital status, and regional composition. *J. Soc. Psychol.*, **41**: 19-37.
- Lassek, W.D. and Gaulin, S.J.C. (2008).** Waist-hip ratio and cognitive ability: Is gluteofemoral fat a privileged store of neurodevelopmental resources? *Evolution & Human Behav.*, **29** (1) : 26-34.
- Lennon, S.J. and Davis, L.L. (1989).** Clothing and human behavior from a social cognitive framework Part I: theoretical perspectives. *Cloth. & Textiles Res. J.*, **7**(4):41-48.
- Lennon, Sharron J. and Johnson, Kim K.P. (2008).** Dress and human behaviour: A review and critique. *Cloth. & Textiles Res. J.*, **26** (1): 3-22.
- Li, Norman P. and Kenrick, Douglas T. (2006).** Sex similarities and differences in preferences for short-term mates: what, whether and why. *J. Personal. & Soc. Psychol.*, **90**(3): 468-489.
- Low, B.S., Alexander, R.D. and Noonan, K.M. (1987).** Human hips, breasts and buttocks: Is fat deceptive? *Ethol. & Sociobiol.*, **8** (4) : 249-257.
- Lusky, A., Barell, V., Lubin, F., Kaplan, G., Layani, V., Shohat, Z., Lev, B. and Wiener, M. (1996).** Relationship between morbidity and extreme values of body mass index in adolescents. *Internat. J. Epidemiol.*, **25** (4) : 829-834.

- Manken, J., Trussel, J. and Larsen U. (1986).** Age and Infertility. *Sci.*, **233**: 1389.
- Mehrabian, A. and Russell, A. (1974).** *An approach to environmental psychology*. Mass: MIT Press, CAMBRIDGE.
- Møller, A.P., Soler, M. and Thornhill, R. (1995).** Breast asymmetry, sexual selection, and human reproductive success. *Ethol. & Sociobiol.*, **16** (3) : 207–219.
- Molloy, J.T. (1977).** *The women's dress for success book*. Follett Publishing, CHICAGO.
- Morris, T.L., Gorham, J., Cohen, S.H. and Huffman, D. (1996).** Fashion in the classroom: Effects of attire on student perceptions of instructors in college classes. *Comm. Edu.*, **45** (2): 135-148.
- Patzer, G. (2006).** *The power and paradox of physical attractiveness*. Brown Walker Press, Boca Raton, FLORIDA.
- Pawlawski, B. and Grabarczyk, M. (2003).** Centre of body mass and the evolution of female body shape. *Am. J. Hum. Biol.*, **15** (2) : 144-150.
- Perrett, D.I., May, K.A. and Yoshikawa, S. (1994).** Facial shape and judgements of female attractiveness. *Nature*, **368**:239-242.
- Puts (2010).** Beauty and the beast: mechanisms of sexual selection in humans. *Evolu. Human Behav.*, **31** (3) : 157-175.
- Roach-Higgins, M.E. and Eicher, J.B. (1992).** Dress and identity. *Cloth. & Textiles Res. J.*, **10**(4): 1–8.
- Rosenberg, K.R. (1992).** The evolution of modern human childbirth. *American J. Physical Anthropol.*, **89** (15) : 89 – 124. z
- Singh, D. (1993).** Adaptive significance of female physical attractiveness: Role of waist-to-hip ratio. *J. Personal. & Soc. Psychol.*, **65** (2) : 293–307.
- Singh, D. and Young, R. K. (1995).** Body weight, waist-to-hip ratio, breasts, and hips: Role in judgments of female attractiveness and desirability for relationships. *Ethol. & Sociobiol.*, **16** (6) : 483–507.
- Streetwer, S.A. and McBurney, D.H. (2003).** Waist-hip ratio and attractiveness : new evidence and critique of a “a critical test”. *Evol. Hum. Behav.*, **24** (2) : 88-98.
- Vandenberg, S.G. (1979).** Assortative mating or who marries whom? *Behaviour Genetics*, **2** (2-3) : 127-158.
- Walster, E., Aronson, V., Abrahams, D. and Rottmann, L. (1966).** Importance of physical attractiveness in dating behaviour. *J. Personal. & Soc. Psychol.*, **4** (5) : 508-516.

★ ★ ★ ★ ★ 10th Year of Excellence ★ ★ ★ ★ ★