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**TEMPERAMENT STUDY APPLIED SIGNIFICANCE: LITERARY REVIEW
AND OWN DATA**

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The literary review touches the temperament applied significance questions while emphasizing that many diseases and pathological conditions deal to dystemperaments. Also it is discussed the temperament study connection with such typological aspects as ethnic, ethnic-age, ethnic-gender and ethnic-gender-age as well as behavioral strategies. Our personal results demonstrate the connections between interhemispherical asymmetry individual profile and temperament among UMSA students. Eastern approach is different from Russian, Ukrainian one because it often describes not temperament types by themselves but human character separate features.

Key words: temperament, Persian medicine, typological aspects, students.

Temperament study is performed often together with other typological aspects taking into account – ethnic, age, ethnic-age, ethnic-gender, based on control locus (external and internal) [1, p.19-31].

There are works in ethnic aspect about religious views on temperament [2, p.143-162], fire, air, water, soil contribution to human temperament [3, p.1463-1465], temperament for melatonin [4, p.340-342]. Iranian physicians differentiate gastric and hepatic temperament at hypercholesterolemia [5, p.133-138]. Twelve stomach distemperaments were differentiated in Iranian Traditional Medicine and result into stomach diseases [6, p.877-881]. Autonomic nervous system functions quality can be described as modern alternative for the traditional one [7, p.1-23], there is temperament new estimating scale [8, p.1-11], while thinking that medicine effectiveness or the probability of side-effects occurrence can be predicted more accurately by categorizing patients according to their type of disease and considering the patients' temperament, the disease temperament [9, p.1-5], and the medicines' temperament [10, p.237-242]. In Unani Medicine dystemperaments links were found with Alzheimer's, multiple sclerosis, epilepsy, common cold, esophageal and peptic ulcer, herpes simplex, liver problems, colic, jaundice, spleen diseases, kidney and bladder diseases, hemorrhoid, stomach worm, hyperlipidemia, convulsion, depression, muscular, skin, mouth, tongue and teeth diseases, eye and ear problems, asthma, palpitation, bipolar disorder, hypertension, sinusitis, aging, diabetes, diarrhea and others and there was a proposition for physicians to create tumors equilibrium in human organism to avoid diseases and to apply regimen, diet and drugs in their treatment [11, p.3240-3247].

These works touch ethno-gender typological aspect. By Iranian traditional medicine, cold temperament is called sympathetic and warm temperament is called parasympathetic; warm temperament is characterized by less fat level; basal metabolism rate, heart contraction rate, systolic blood pressure, triiodthironine and thyreo-stimulating hormone concentrations were bigger at the warmth temperament; both-sexed people were chosen as the examined [12, p.173-174]. Psychologists take the husband and wife temperament at group training on married men's happiness during counselling and cultural centers [13, p.25-38]. Ethno-gender aspect touches dystemperaments in menstrual cycle disorders [14, p.55-64]. Iranian women with cold temperament (Mizaj in Persian medicine) suffer from postpartum depression

more than the women with the warm one probably due to hormones various levels at these two temperament types [15, p.64-70].

Ethno-age aspect is reflected in the following works. American biologists working in the field of behavioural genetics say about genes responsible for genetic influence on early temperament [16, p.214-223]. Cloninger's questionnaire is widely used in Iranian preschoolers and early temperament is thought to be the one with significant influence on the child further behavior [17, p.39-63]. Iranian students population with warm temperament were happier comparatively to the ones with moderate and cold [18, p.1-6]. Works on correlation between Mizaj and diseases in adult patients were performed much in India [19, p.7-11].

Temperament and age are considered to be children behavior influence predictors at the dental setting by Iranian scientists work results [20, p.119-122]. Only Iranian children and laterborns were at higher risk of developing anxiety and thus worse outcomes in the dental settings [21, p.225-231]. Child temperament some features, socioeconomic measures and child habits (brushing habits mostly) are considered to be the ones influencing on decay appearance in 1,5-2-year-old Iranian children [22, p.3-12]. Shanghai dentists and children psychologists also studied temperaments peculiarities in children [23, p.279-281]. Impulsiveness is considered to be a determinant of child's behavior during sedation in the 36-95-month-old girls and boys without age and gender differences in the USA [24, p.429-435].

Ethno-gender-age aspect can be described by following works: students (males and females) with visual impairment are tended to score higher on extraverted, practical, thinking and organized styles and students without visual impairment are tended to score higher on introverted, intuitive, feeling and flexible styles. The origins of these differences could lie in differences in physical state, the educational system and culture [25, p.59-70]. There exist inventories for temperament and character assessment in the students in various countries in part the Iranian one [26, p.15-24] with specific normative base for the Iranian men and women of different age [27, p.262-266; 28, p.89-98], in part the middle-school children [29, p.81-93] as well as 3-7-year-old children [30, p.165-175]. Babies and mothers good temperament features

can influence positively on family conflicts course by the opinion of the Tarbiat Modarres University Psychology Professor Maria Aguilar Vafaei [31, p.137-147]. Premenstrual syndrome physical and psychological symptoms severity prevalence was improved in the bigger extent in female Iranian students with cold temperament than warm after regular aerobic exercise 8 weeks in duration (students represent separate age category) [32, p.1-12]. Since premenstrual syndrome incidence was observed at moderate temperament mostly (in 49%), combination of hot and wet, hot and dry temperaments (in 38% of the girls) in Iranian high school students, the doctors don't see any relationships between this syndrome and temperament and propose to perform the investigations in bigger populations [33, p.15-23]. Cold and wet uterine temperament can be thought as vaginitis predisposing factor due to enforced infectious secretions in womb [34, p.3589-3595]. Hotness temperament in Iranian male students can be effective factor for sport participation enhancing while wetness and dryness are not related significantly to physical activity any aspect [35, p.117-136]. Palm temperature and sublingual temperature had valuable correlation with temperament in Iranian male and female 20-25 year old students due to which these two indices were proposed to be used for temperament determining [36, p.1-5]. There are also correlation between heart rate and arterial blood pressure with Iranian traditional temperamental model [37, p.45-49], links between hot and cold temperaments with neuroendocrine and immune systems activity parameters [38, p.147-156], atherosclerosis development, constipation [39, p.1438-1439], diabetes mellitus (Iranian children suffering from insulin-dependent diabetes mellitus possessed hot and dry temperament) [40, p.58]. There is correlation between temperament and autonomic cardiac regulation with cardiovascular risk in young Finns [41, p.77-84].

Temperament peculiarities in Iranian females plus avoidance behavioral strategy resulted in somatization disorders in the teachers [42, p.53-65]. Many scientific investigations results emphasized the significant difference between the seven factors of temperament based on the children's age, gender, academic mean score and

parental education level and income. As a whole, there is a consideration about significant association between dystemperament and diseases prevention [43, p.1-6]. UMSA Physiology department paid its attention to detecting the correlations between interhemispherical asymmetry individual profile, temperament types, control locus and behavioral strategies and gender in Iranian and Iraqi [44, p.248-257] students. The present investigation was performed in 81 Iranian students of both faculties (medical and dental) and all courses. We used Eysenck's questionnaire for temperament type assessment and took into account the extremity used for writing at the investigation moment. The results showed that the students of medical department were choleric with melancholism while of the dental one were melancholics with cholericism more. The guys were melancholics with cholericism more and girls were choleric with melancholism in bigger per cents. Left-handers were melancholics with cholericism while right-handers – choleric with melancholism more. Ambidexters were both choleric and melancholic practically in equal extent. These temperament representatives often need bigger individual approach while teaching and bigger support in daily life. Thus, temperament determining indeed has not only theoretical but big applied significance.

LITERATURE LIST

1. Rueda M.R., Rothbart M.K. The influence of temperament on the development of coping: the role of maturation and experience //New Dir Child Adolesc Dev.-2009.-N.124.-P.19-31.
2. Abolghasemi Mohammad J., Analysing the Hadith of temperament a window to talk about human's nature and authority //Medical Figh Quaterly.-Spring 2010.-Vol.2, N.2.-P.143-162.
3. Parvinroo S., Kamalinejad M., Sabetkasaei M. Pharmacological concepts of temperament in Iranian traditional medicine (letter to the editor) //Iranian Journal of Public Health.-October 2014.-Vol.43, N.10.-P.1463-1465.

4. Mohammad B.M., Seyedshenin S., Mehdi B., Foruzan K., Esmail N. Temperament Determination for Melatonin: A bridge from Iranian Traditional to Modern Sleep Medicine //Afr J Tradit Complement Altern Med.-2013.-Vol.10, N.2.-P.340-342.
5. Emtiazy M., Keshavarz M., Khodadoost M., Kamalinejad M., Gooshahgir S.A., Bajestani H.S., Dabbaghian F.H., Alizad M. Relation between Body Humors and Hypercholesterolemia: An Iranian Traditional Medicine Perspective Based on the Teaching of Avicenna //Iran Red Crescent Med J.-2012.-Vol.14, N.3.-P.133-138.
6. Alizadeh M., Khadem E., Aliasl J. Diagnosis Protocol of Stomach Distemperament for Clinical Practice in Iranian Traditional Medicine: A Narrative Review //Iran J Public Health.-2017 Jul.-Vol.46, N.7.-P.877-881.
7. Ananchi O., Saeedimehr M. Rereading the concept of temperament based on the modern medicine //Falsafe-ye Elm (Philosophy of Science).-Fall 2011-Winter 2012.-Vol.1, N.2.-P.1-23.
8. Mojahedi M., Naseri M., Majdzadeh R., Keshavarz M., Ebadini M., Saberi Isfeedvajani M. Reliability and validity assessment of mizaj questionnaire: a novel self-report scale in Iranian traditional medicine //Iranian Red Crescent Medical Journal. (IRCMJ).-March 2014.-Vol.16, N.3.-P.1-11.
9. Bayat A., Kazemi R., Toghiani A., Mohebi B., Tabatabaee M.N., Adibi N. Psychological evaluation in hemodialysis patients //J Pak Med Assoc.-2012.-Vol.62, N.3 (Suppl 2).-S.1-5.
10. Naseri M., Rezaeizadeh H., Taheripanah T., Naseri V. Temperament theory in the Iranian traditional medicine and variation in therapeutic responsiveness, based on pharmacogenetics //Journal of Islamic and Iranian traditional medicine.-Fall 2010.-Vol.1, N.3(3).-P.237-242.
11. Miraj S., Kiani S. A scientific correlation between dystemperament in Unani Medicine and diseases: a systematic review //Electronic Physician.-2016.-Vol.8, N.11.-P.3240-3247.
12. Mohammadi Farsani Gh.R., Movahhed M., Dorosti A.R., Hosseini S., Yunesian M., Mohammadi T. The relation between basal metabolic rate and activity of the

sympathetic-parasympathetic system with Iranian traditional medicine warm and cold temperament //Nutrition and Food Sciences Research.-2014 Nov-Dec.-Vol.1, N. Suppl. (1).-P.173-174.

13. Allameh S.F., Aghaeia A., Atashpour S.H., Moshtaghi M. The effect of transactional analysis group training on married men's happiness referred to counseling and cultural centers //Research in cognitive and behavioral sciences.-Spring-Summer 2014.-Vol.4, N.1(6).-P.25-38.

14. Jafari F., Zafarghandi N., Alizadeh F., Alizadeh M., Karimi M., Moradi F. A study on the frequency of signs and symptoms of dystemperament in retention and infrequent uterine hemorrhage from viewpoint of traditional Iranian medicine //Daneshvar Medicine.-October-November 2011.-Vol.19, N.95.-P.55-64.

15. Torkmannejad Sabzevari M., Eftekhar Yazdi M., Rastaghi S., Rad M. The relationship between different temperament and postpartum depression in health center in Sabzevar, 2017 //Iranian Journal of Obstetrics, Gynecology and Infertility.-2018 September.-Vol.21, N.6.-P.64-70.

16. Saudino K.J. Behavioral Genetics and Child Temperament //J Dev Behav Pediatr.-2005 June.-Vol.25, N.3.-P.214-223.

17. Ali Akbari Dehkordi M., Shaqaqi F., Kakou Joubari A.A., Zare M., Shayeqian Z., Amirabadi F., Khaleqi Delavar F., Shahriari H. An evaluation of psychometric properties of Cloninger's preschool temperament and character inventory (PC-TSI) //Training measurement.-2012.-Vol.3, N.8.-P.39-63.

18. Salmannezhad H., Mojahedi M., Ebadi A., Montazeri A., Mozaffapur S.A., Saghebi R., Gheisari D., Goudarzi S. An Assessment of the Correlation between Happiness and Mizaj (Temperament) of University in Persian Medicine //Iran Red Crescent Med J.-2017 December.-Vol.19, N.12.-P.1-6.

19. Ansari A.H., Zulkifile M., Ali M. An analytical study of concordance between Mizaj and diseases in adult patients of NIUM Hospital, Bangalore //Anc Sci Life.-2010 Jul.-Vol.30, N.1.-P.7-11.

20. Aminabadi N., Puralibaba F., Erfanparast L., Najafpour E., Jamali Z., Adhami S.E. Impact of Temperament on Child Behavior in the Dental Setting //Journal of Dental Research, Dental Clinics, Dental Prospects.-2011.-Vol.5, N.4.-P.119-122.
21. Aminabadi N.A., Sohrabi A., Erfanparast L.K., Oskouei S.G., Ajami B.A. Can birth order affect temperament, anxiety and behavior in 5 to 7-year old children in the dental setting? //J Contemp Dent Pract.-2011 Jul.-Vol.12, N.4.-P.225-231.
22. Aminabadi N.A., Ghoreishizadeh A., Ghoreishizadeh M., Oskouei S.G., Ghojazadeh M. Can child temperament be related to early childhood caries? //Caries Res.-2014.-Vol.48, N.1.-P.3-12.
23. Su J.M., Ye X.W., Ruan W.H., Wu Z.F., Huang X.J. The characteristics of uncooperative children's temperament during dental treatment //Shanghai Kou Qiang Yi Xue.-2006.-N.15.-P.279-281.
24. Lane K.J., Nelson T.M., Thikkurissy S., Scott J.M. Assessing Temperament as a Predictor of Oral Sedation Success Using the Children's Behavior Questionnaire Short Form //Pediatr Dent.-2015.-Vol.37, N.5.-P.429-435.
25. Gholamzadeh Z., Alborzi S. A comparison on temperament-based learning styles among students with and without visual impairments //Contemporary Psychology.-2010.-Vol.5, N.2.-P.59-70.
26. Dadfar M., Bahrami F., Dadafar F., Younesi S.J. Reliability and validity of the temperament and character inventory //Journal of Rehabilitation.-2010.-Vol.11, N.3(43).-P.15-24.
27. Kaviani H. Normative data on temperament and Character inventory (TCI): complimentary findings //Tehran Univ Med J.-2009.-Vol.67, N.4.-P.262-266.
28. Kaviani H., Poor Naseh M. Validation Of Temperament And Character Inventory (TCI) in Iranian Sample: Normative Data //Tehran Univ Med J.-2005.-Vol.63, N.2.-P.89-98.
29. Yazdkhasti F., Javaheri R., Oreizi H.R. Standardization of middle childhood temperament questionnaire and the study of the relationship between childhood temperament and demographic characteristics in Iranian culture //Shahrekord

University Of Medical Sciences Journal.-October-November 2011.-Vol.13, N.4.-P.81-93.

30. Najarpourian S., Samavi S.A., Asadi N. Psychometric properties of the very short form of the children's behavior questionnaire (CBQ) investigation of temperament at 3 to 7 years //Journal of Child Mental (Journal of Child Mental Health).-2017 Fall.-Vol.4, N.3.-P.165-175.

31. Gharahbaghi F., Agular Vafaei M. Marital conflict and the role of child temperament //Developmental Psychology (Journal of Iranian Psychologists).-2009.-Vol.5, N.18.-P.137-147.

32. Shakeri M.T., Jafarnejad F., Mohebbi Dehvani Z. The prevalence of the severity of physical and psychological symptoms in premenstrual syndrome in warm and cool temperament after 8 weeks of regular aerobic exercise //Iranian Journal of Obstetrics, Gynecology and Infertility.-2017 Dec.-Vol.20, N.10.-P.1-12.

33. Mohebbi Dehvani Z., Torkmannejad Sabzevari M., Rastaghi S., Rad M. The relationship between premenstrual syndrome and type of temperament in high school students //Iranian Journal of Obstetrics, Gynecology and Infertility.-2017 July.-Vol.20, N.5.-P.15-23.

34. Adhami S., Tansaz M., Saki Malehi A., Javadnoori M. The relationship between uterine temperament and vaginitis from Iranian traditional medicine point of view //Indo American Journal of Pharmaceutical Sciences.-2017.-Vol.4, N.10.-P.3589-3595.

35. Safari M.A., Koushki Jahromi M., Zar A. The role of four temperaments in predicting physical activity in young men //Sport Physiology & Management Investigations.-2017 Winter.-Vol.8, N.4.-P.117-136.

36. Yousefifard M., Parvizi M., Hosseini M., Chenari M., Ebadiani M., Keshavarz M. Palm temperature and core temperature as important indices of temperament //J Med Physiol.-2018.-P.1-5.

37. Yousefifard M., Parvizi M., Hosseini M., Chenari M., Ebadiani M., Keshavarz M. Heart rate and arterial blood pressure correlation with Iranian traditional temperamental model //J Med Physiol.-2017.-Vol.2, N.2.-P.45-49.

38. Shahabi S., Zuhair M.H., Mahdavi M., Dezfouli M., Torabi Rahvar M., Naseri M., Hosseini Jazani N., Khalkhali H.R. Hot and Cold Natures and Some Parameters of Neuroendocrine and Immune Systems in Traditional Iranian Medicine: A Preliminary Study //The Journal of Alternative and Complementary Medicine.-2008.-Vol.14, N.2.-P.147-156.
39. Elsagh M., Fartookzadeh M., Adibi P., Amini Behbahani F., Kamalinejad M. Basic Temperament among Patients with Functional Constipation //Iran J Public health.-2015 Oct.-Vol.44, N.10.-P.1438-1439.
40. Ilkhani R., Aghanouri Z., Mojahedi M., Montazeri A., Siavash M., Tabatabaei F. Comparing Mizaj (temperament) in type 1 diabetes mellitus and healthy controls: A case-control study //J Res Med Sci.-2019 Jul.-N.24.-P.58.
41. Puttonen S., Elovainio M., Kivimäki M., Koskinen T., Pulkki-Räback L., Viikari J.S.A., Raitakari O.T., Keltikangas-Järvinen L. Temperament, health-related behaviors, and autonomic cardiac regulation: The Cardiovascular Risk in Young Finns Study //Journal of Psychosomatic Research.-2009.-N.67.-P.77-84.
42. Karami J., Yazdanbakhsh K., Karimi P. Investigating the mediating role of attachment styles in explaining the relationship between temperament, character dimensions and somatization disorders among female teachers in Kermanshah //Jorjani Biomedicine Journal.-2017 Spring-Summer.-Vol.5, N.1.-P.53-65.
43. Kopaei R., Khajegir A., Kiani S. The Association between Dystemperament and Prevention of Diseases: A Systematic Review //Journal of Clinical and Diagnostic Research.-2016 Sep.-P.1-6.
44. Ткаченко Е.В. Влияние индивидуального профиля межполушарной асимметрии на когнитивные параметры личности у студентов ВГУЗУ «УМСА» из Ирака //Вісник Харківського Національного Педагогічного Університету ім. Г.С.Сковороди. Психологія, Вип.50.-Х.: ХНПУ, 2015.-С.248-257.