TCS is to Blame: The Impact of Divorce on Physical and Mental Health

Abstract
Background: Divorce rate reaches up to 50–70%. Indisputably divorce recently became one of the most epidemic factors negatively influencing humans’ health whereas its impact on the involved couples and their children is serious and sometimes fatal. The article presents the results of a research study to analyze the most critical grounds for divorce leading to negative health-related consequences.

Method: This research adopts a cross-sectional study design with a quantitative approach based on the data from 195 surveyed respondents. A structured questionnaire covering multiple constructs was used to collect and analyze the data.

Results: This study found that the most critical causes of the marriage failure are the lack of trust, commitment and communication, sensuality and sexuality (TCS) as they lead to declining of the marginal utility (DMU). These factors not only lead to divorce, but also increase the probability of facing different diseases such as depression, aggression, increasing levels of neuroendocrine, epinephrine and norepinephrine as well as conflict ACTH levels. The regression model shows that communication (C) was the most significant outcome in relation to the MU (β = 0.45 and P < 0.0) followed by trust and commitment (TC) (β = 0.34 and P < 0.0) and then by S (β = 0.23 and P < 0.0).

Conclusions: The marginal utility (MU) is directly and positively affected by TCS. The study suggests that lack of MU, lack of intimacy, sensual, and sexual components can lead to frustration, annoyance, anxiety and relationship failure.

Keywords: Divorce, epinephrine, infidelity, marital sex, neuroendocrine, sexuality

Background
The British epidemiologist William Farr was among the first scholars who in 1858 studied the correlation between health and marriage. The result of his study suggests that there is a health advantage to marriage and that a marital loss is a significant risk factor for poor health as shown in Figure 1.

Nobody, hopefully, enters into a marriage with a person thinking they are going to one day deal with an eventual divorce. But 50–70% of couples go for divorce.

Markman et al.[1] argue that millions of people worldwide experience marital distress, destructive conflict, and divorce every year and there are solid evidences that marital distress and family fragmentation are associated with a broad spectrum of risks for adults and children, including problems with mental health and individual adjustment, child behaviour, physical health, and economic success and stability.[2]

Anderson[3] conducted a nearly three decades of research evaluating the impact of family structure on the health and well-being of children. She found that children living with their married, biological parents consistently have better physical, emotional, and academic well-being. Thus, society should support healthy marriages and discourage married couples from divorcing.

Glaser et al.[4] investigated the neuroendocrine and epinephrine functions and behaviour in different couples during their first year of marriage in relation to the marital dissolution or divorce and satisfaction. The study found that epinephrine levels of divorced couples were 34% higher than those who remained married and both epinephrine and norepinephrine were 16% higher at night. Among couples who were still married, conflict adrenocorticotropic hormone (ACTH) levels were twice as high among women whose marriages were troubled 10 years later than among women whose marriages were untroubled. Couples whose marriages were troubled at follow-up produced 34% more norepinephrine during conflict, 24% more norepinephrine during the daytime, and 17% more during night time hours than the untroubled. Many studies reveal a

Address for correspondence:
Prof. Mosad Zineldin,
Department of Medicine and Optometry, Faculty of Health and Life Sciences, Linnaeus University, SE-351 95,
Växjö, Sweden.
E-mail: Mosad.zineldin@lnu.se

Access this article online
Website: www.ijpminjournal.net/www.ipm.ir
DOI: 10.4103/ipm.IJPVM_472_18
Quick Response Code:

How to cite this article: Zineldin M. TCS is to blame: The impact of divorce on physical and mental health. Int J Prev Med 2019;10:141.
higher level of serotonin transporter gene methylation after parental divorce (PD) and stressful life events in adolescents, with a more pronounced association for stressful events during adolescence than during childhood. The aggression and aggressive tendencies appear to be a key risk factor for early divorces, whereas marital communication contributes to the variability in satisfaction in intact marriages.\cite{5}

The effects of PD do not end in childhood. Experiencing PD has also been associated with psychological distress into adulthood and an elevated lifetime risk of major depression. PD has been related to long-term mental health outcomes.\cite{6-8} Adult children of divorced family experience higher psychological distress and are at risk for suicidal attempts and ideation than their peers with non-separated parents.\cite{9-15}

Additionally, sexual incompatibility or dissatisfaction negatively influences the marital outcomes increasingly influencing growth in the numbers of infidelities and/or divorces. Many couples begin to feel lost and start thinking about divorce when their sex lives change. The marital duration negatively affects the frequency of marital sex and extramarital sex has enormous disruptive potential for marriages.\cite{16,17} Extramarital sex is often cited by divorced couples as a prime reason for the divorce and dissolution of their marriages.\cite{16} One main reason for the declining frequency of marital sex with marital duration is the lack of novelty, which is called “honeymoon effect”.\cite{18} Other reasons include the rational choice theory (RCT), the marginal utility (MU) and law of declining of the marginal utility (DMU). RCT states that an actor chooses a course of action that maximizes his/her utility depends on the constraints of this actor’s resources and social institutions.\cite{16} The MU assumes that the consuming a good or service diminishes as the consumption of that good or service increases because of the DMU.\cite{19} If correct, this theory claims that, ceteris paribus, the sole effect of the diminishing marital utility of marital sex will cause the frequency of marital sex to decline with marital duration.\cite{16}

Couples should realize that their sex life can be studied and understood from the view of the RCT, the MU and the DMU theory. In his study, Liu\cite{16} applied the assumption of DMU to explain the phenomenon of the declining frequency of marital sex with marital duration. He argues that RCT consider sexual behaviour as emotional and rational voluntary action provides a certain level of utility. He also assumes that the couples can face challenges of how to maximize the utility drives from marital sexual actions as well from other actions with each other. However, men and women have different preferences, and express themselves sexually in different ways. Many reports argue that men uses extramarital sex (infidelity) twice more than women.\cite{20,21}

Trust, commitment and communication (TC) are keys to sustain a good working marriage relationships. Lack of them promotes poor marital outcomes. Although TC communication measures have been linked to marital discord, divorce and negative health issues across a number of studies, the results are inconsistent.\cite{5,22}

The objective of this study is to identify and analyse the most critical grounds for the divorce leading to negative health-related consequences.

**Methodology**

**Research design**

The research adopts a cross-sectional study design with a quantitative research approach. There were 195 participants in this research (52.7% male and 47.3% female) using snowball approach-based chain-referral sampling. Respondents were asked to fill in a questionnaire by choosing the relevant answer by agreeing or disagreeing using a five points Likert scale ranging from 1 (strongly disagree) to 5 (strongly agree). Four related clusters for marriage and divorce which has 20 items in addition to previous relationship dissolution/divorce were used. These are:

i. Sensuality and sexuality (S) dimensions

ii. Trust and commitment (TC) and dimensions

iii. Communication dimensions (C)

iv. Marginal utility (MU) dimensions in addition to Dissolution/divorce (D).

Data analysis was done using the IBM SPSS statistics version 25.0. The dependent and independent variables will be used for the regression analysis and ANOVA will be utilized to evaluate how the regression model is statistically significant in explaining the dependent variable. Pearson correlation coefficient are also used. The reliability of the questionnaire has been obtained equal to 0.87 with the use of Cronbach’s Alpha. Table 1 shows that values for all items ranges from 0.79 to 0.92 which is considered to be acceptable.
Results

Descriptive statistics and correlation coefficients

Descriptive data on the key variables is presented in Table 2. The sensual and sexual cluster (S) includes the most harmful causes threatening romance, love and marriage relationships which is a result of lack of intimate feelings, low intention to maintain the marriage relationship, etc. MU is also a critical factor impacting divorce when the MU is low or decreasing. The lack of communication factor was in a weaker level which means that the commitment and trust value more in the marriage relationship than the communication skills which is more logical highlighting the fact that trust and commitment are the major principles even when there is a lack of communication skills between the couples. Standard deviation of the variables shows that there is a little variation between the respondents’ views.

Table 3 shows that there is strong correlation between MU and C (r = 0.837) followed by TC (r = 0.824) and S (r = 0.775). The correlation between MU and previous divorce experience was very weak (r = 0.233). There is medium correlation between S (sensuality and sexuality) and D (previous divorce).

Regression testing

Two separate regression models were carried out. The models only involves statistically significant variables. First model is illustrated in Table 3 and shows that the dependent variable previous divorce or relationship dissolution (D) is directly and positively affected by the lack of trust and commitment (TC) which includes items such as unwillingness to sacrifice and devote resources (time, efforts and money) to repair and improve the relationship before the divorce.

Lack of flexibility and personal chemistry is also another reason. TC makes the unique contribution (0.51). One of the unexpected results is that the S which includes lies, unethical behaviour, infidelity, lack of sensuality, positive emotions and sexuality and low intention to enhance or maintain the marriage relationship are not statistically significant in the model with divorce as dependent variable but it is still positively and strongly correlated with the MU and the divorce (D).

Table 4 shows that the dependent variable MU is directly and positively affected by independent variables the S, TC and C. As follows from Table 5, the regression model shows that good communication (C) between the couples increase the MU.

Communication was the most significant outcome in relation to the MU (β = 0.45 and P <0.0) followed by TC (β = 0.34 and P <0) and then by SES (β = 0.23 and P <0.0).

Discussion

Marital, love and romantic relationships often fail. The evil behind the failure is the lack of trust, commitment, communication and sensual and/or sexual satisfaction (TCS). Most previous studies argue that the root cause of most problems in any relationship, whether professional or personal, can be put down to misunderstandings that result from lack of communication. This study found that the most critical causes of the marriage drawback and conflicts that lead to divorce, hence increase the probability of facing different diseases such as increasing levels of neuroendocrine, epinephrine and norepinephrine as well as conflict ACTH levels. Aggression and aggressive tendencies appear to be a key risk factor for early divorces. As shown in Table 5 TC followed by lack of S and the lack of MU or total utility (marital sex and the consumption of other goods and services which gives pleasure and satisfaction) are the main reasons of the divorce.

Trust and commitment factors examined in this study appeared to be more important than communication. Thus,
this study argue that trust and commitment contribute to the variability in satisfaction in intact marriages.

Lack of MU, lack of intimacy, sensual, and sexual components can lead to frustration, annoyance, anxiety and relationship failure. The tendency of failure can cause improper mental and emotional balance between couples which use to be most major cause of the divorce as the final solution. This study is consistent with the studies of Markman et al.\textsuperscript{[1]} and Storksen et al.\textsuperscript{[9]} and agrees that divorce is a reason for decreased quality of life and wellbeing which create many psychological distress.

**Conclusions**

Finally, to prevent some divorces, the couples and the society should believe that it is possible to fix many of these problems mentioned in above list and prevent some divorces. Thus, this study suggests that society should make every effort to retain the family structure that has the best chance of producing healthy environment of adults and children.

**Financial support and sponsorship**

Nil.

**Conflicts of interest**

There are no conflicts of interest.

**Received:** 12 Oct 18 **Accepted:** 30 Mar 19 **Published:** 12 Aug 19

**References**

1. Markman HJ, Rhoades GK, Stanley SM, Ragan EP, Whitton SW. The premarital communication roots of marital distress and divorce: The first five years of marriage. J Fam Psychol 2010;24:289-98.
2. Booth A, Amato PR. Parental predivorce relations and offspring postdivorce well-being. J Marriage Fam 2001;63:197-212.
3. Anderson J. The impact of family structure on the health of children: Effects of divorce. Linacre Q 2014;8:378-87.
4. Glaser JK, Bane C, Glaser R, Malarkey WB. Love, marriage, and divorce: Newlyweds' stress hormones foreshadow relationship changes. J Consult Clin Psychol 2003;71:1768.
5. Rogge R, Bradbury TN, Hahlweg K, Engel J, Thurmairer F. Predicting marital distress and dissolution: Refining the two-factor hypothesis. J Fam Psychol 2006;20:6:156-9.
6. Chun SY, Jang SY, Choi JW, Shin J, Park EC. Long-term effects of parental divorce timing on depression: A population-based longitudinal study. Int J Soc Psychiatry 2016;62:645-50.
7. Kleinsorge C, Covitz LM. Impact of divorce on children: Developmental considerations. Pediatr Rev 2012;33:147-54.
8. Afifi TO, Boman J, Fleisher W, Sareen J. The relationship between child abuse, parental divorce, and lifetime mental disorders and suicidality in a nationally representative adult sample. Child Abuse Negl 2009;33:139-47.
9. Storksen I, Roysamb E, Holmen TL, Tambs K. Adolescent adjustment and well-being: Effects of parental divorce and distress. Scand J Psychol 2007;47:75-84.
10. D’Onofrio BM, Turkheimer E, Emery RE, Slutske WS, Heath AC, Madden PA, et al. A genetically informed study of the processes underlying the association between parental marital instability and offspring adjustment. Dev Psychol 2006;42:486-99.
11. Donald M, Dower J, Correa-Velez I, Jones M. Risk and protective factors for medically serious suicide attempts: A comparison of hospital-based with population-based samples of young adults. Aust N Z J Psychiatry 2006;40:87-96.
12. Park HS, Schepp KG, Hee Jang EH, Young Koo H. Predictors of suicidal ideation among high school students by gender in South Korea. J Sch Health 2006;76:181-8.
13. Hardt J, Sidor A, Nickel R, Kappis B, Petruk P, Egle U. Childhood adversities and suicide attempts: A retrospective study. J Fam Violence 2008;23:713-8.
14. Lizardi D, Thompson RG, Keyes K, Hasin D. Parental divorce, parental depression, and gender differences in adult offspring suicide attempt. J Nerv Ment Dis 2009;197:899-904.
15. Thomson E-F, Dalton A D. Suicidal ideation among individuals whose parents have divorced: Findings from a representative Canadian community survey. Psychiatry Res 2011;187:150-5.
16. Liu C. A theory of marital sexual life. J Marriage Fam 2000;62:363-74.
17. Masters W, Johnson V, Kolodny R. Human Sexuality. New York: Harper Collin.
18. Call V, Sprecher S, Schwartz P. The incidence and frequency of marital sex in a national sample. J Marriage Fam 1995;57:639-52.
19. Coleman J. Foundations of Social Theory. Cambridge, MA: Belknap Press of Harvard University Press.
20. Lamann E, Gagnon JH, Michael R, Michaels S. The Social Organization of Sexuality: Sexual Practices in the United States. Chicago: The University of Chicago Press.
21. England P, Farkas G. Households, Employment, and Gender: A Social, Economic and Demographic View. Aldine, New York; 1986.
22. Vezzetti VC. New approaches to divorce with children: A problem of public health. Health Psychol Open 2016;3:1-13.