FAST PACE OF LIFE AND ITS IMPACT ON HEALTH: RESULTS OF A STUDY FROM THE LARGEST CITY OF PAKISTAN

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Abstract

Background: Increasing modernization and mechanization have turned the life into fast pace and it has devastating effects on the health of the people.
Objective: To identify the perceptions of patients regarding fast pace of life and its impact on health.
Methods: A cross-sectional study was conducted at out-patients department of two tertiary care hospitals in Karachi, Pakistan; from January to March 2013. A total of 401 participants aged > 18 years were recruited through consecutive sampling. Data analysis was done using SPSS 19.0 and multivariable logistic regression was applied to identify impact of fast life.
Results: Out of total 401 participants, 55% of the patients were between 21-35 years of age and majority was females (75%). Majority of the participants was suffering from fast pace life (82%) and main reasons for fast pace life were competition and the increasing needs of the family. Those who were suffering from fast pace life were at risk of affecting their physical health (AOR: 2.6; 95% C.I:1.3-5.2), social life (AOR: 2.1 95% C.I:1.0-4.5), psychological well-being (AOR: 2.4; 95% C.I:1.2-4.5) and are more susceptible to stress and depression (AOR: 4.6; 95% C.I:2.3-9.3).
Conclusion: This study found that majority of urban population is suffering from fast pace of life with severe consequences on its physical, social and mental health. The society seems to be speeding up and becoming less empathic and increasingly stressful. This will have delirious effects on physical and mental health of people in the decades to come. Therefore, it is important for people to take time out for themselves and their families to keep themselves fit for survival in this fast moving world.
Key words: Fast pace, physical health, mental health, spiritual health,
and increased the incidence of obesity, stress, smoking, diabetes and other health issues [10-11]. Spending time with the family is an effective strategy to de-stress and meal times are the best time to mingle with the family [12]. However, a recent study from India has revealed that 10 per cent of the 2,000 parents polled, never have a family meal and less than a third sit down to one every night. Fifteen per cent blamed a lengthy commute and one in five said domestic chores got in the way of a good family get-together [12].

The studies have concluded that fast paced life is a hazard, either from the health or the economical aspect [11]. There is no or very limited data available from Pakistan on this important issue. Therefore, the present study was conducted to identify the perceptions of patients regarding fast pace life and its impact on health of people living in a developing country [Pakistan].

**Methodology:**

This cross-sectional study was carried out from January to March 2013 at out-patients department (OPD) of two tertiary care hospitals i.e. Civil Hospital and Aga Khan University Hospital (AKUH) in Karachi. Karachi is the largest and most populous city of Pakistan. These OPD clinics were chosen to obtain a diverse sample belonging to various socio-economic strata. The patients who visited the OPD clinics of study hospitals, having more than 18 years of age and gave consent to participate were included in the study. However, patients suffering from serious co-morbid conditions like cancer, advance heart failure or terminal renal failure and those who needed special care; intensive care unit or coronary care unit admissions were excluded. A total of 500 adult patients were consecutively approached to take part in this study, out of which 401 (80.2%) agreed to participate and were interviewed.

Participants were interviewed through a pre-tested and structured questionnaire comprising of two sections; socio-demographic profile and effects of fast pace life on physical, psychological and spiritual health. The questionnaire was formulated after thorough literature search and it was shared with experts in the field of family medicine to obtain their suggestions for improvement. The English version of the questionnaire was prepared first and then it was translated into Urdu language. It was back translated in English to check for consistency and to remove any discrepancies. The pre-testing of the Urdu version was done on 20 participants, approximately 5% of the total sample size.

In this study, fast pace life was defined according to the questions used by Prof Richard Wiseman (University of Hertfordshire) who in his study measured the speed of life in 32 countries. The following questions were asked from the respondents and 5 or more ‘yes’ responses on the 07 item questions, suggested the participant is having a fast life. The questions included:

1) Do you seem to glance at your watch more than others?
2) When someone takes too long to get to the point, do you feel like hurrying them along?
3) Are you often the first person to finish at meal times?
4) When walking along a street, do you often feel frustrated because you are stuck behind others?
5) Would you become irritable if you sit for an hour without doing anything?
6) Do you walk out of restaurants or shops if you encounter even a short queue?
7) If you are caught in slow-moving traffic, do you seem to get more annoyed than other drivers?

The respondents were also asked about what they believe is the ‘cause’ of this rapid change and what is their prediction regarding pace of life in the coming years.

Medical graduates were trained for data collection. The data collection was done when the patients came out of the consultation room (exit interview) to avoid chances of recall bias. Written informed consent was obtained from all participants after explaining them about the study protocol. All study personnel were trained in procedures for maintaining confidentiality of the information obtained. No personal identifiers were used in any report or publication arising from this study. The study was conducted in accordance with the 'Ethical principles for medical research involving human subjects' of Helsinki Declaration. The study was reviewed and approved by the Family Medicine research committee at AKUH.

**Statistical Analysis:**

This study did not have any a priori hypothesis so power analysis was not performed. The data was entered in Epi Data version 3.1 and analyzed in Statistical Package for Social Sciences 19.0 (SPSS, Inc., Chicago, IL, USA). Descriptive statistics was performed and proportions were reported for all the categorical variables. Pearson chi-square test and univariate logistic regression was used to identify the factors associated with dependent variable by calculating the crude odds ratios at 95% confidence interval (CI). The variables with p-value of < 0.25 at univariate level were then stepwise entered to multivariable logistic regression. Results were reported in form of adjusted odds ratios with 95% CI. Statistical significance was considered at p-value of < 0.05 throughout the analysis except at the univariate level.

**Results:**

A total of 401 patients' information was included in final analysis. Around 55% of the patients were between 21-35 years while only 8.7% were more than 50 years of age. About 75% of the participants were females and 37% were never married. Moreover, 41% of the patients had 11 to 16 years of schooling while 19.5% could not read or write. Approximately 32% of the patients were self-employed, 18% students and 42% were housewives (table 1).
was a preponderance of participants who believe that fast pace life is affecting their physical health (86%, p value 0.001), social health (76.3%, p value 0.001) and spiritual life (55%, p value 0.001). Both the groups responded that fast pace life is affecting their family life (65.7% vs 54.2%). Approximately 92% of the participants responded that fast pace life is affecting them psychologically and it will continue in years to come (93%).

Table 2: Socio-demographic factors related to fast pace life

| Variable                        | Victim of fast pace life | P-value |
|---------------------------------|--------------------------|---------|
|                                | Yes (n=329)              | No (n=72) |
| Age (in years)                 |                          |         |
| less than 20                    | 48 (14.6)                | 12 (16.7) | 0.92  |
| 21-35                          | 183 (55.6)               | 37 (51.4) |
| 36-50                          | 70 (21.3)                | 16 (22.2) |
| >50                            | 28 (8.5)                 | 7 (9.7)   |
| Gender                         |                          |         |
| Male                           | 84 (25.5)                | 17 (23.6) | 0.73  |
| Female                         | 245 (74.5)               | 55 (76.4) |
| Marital status                 |                          |         |
| Never married                  | 127 (38.6)               | 23 (31.9) | 0.29  |
| Married                        | 202 (61.4)               | 49 (68.1) |
| Educational status             |                          |         |
| Can't read or write            | 69 (21.0)                | 9 (12.5)  | 0.17  |
| Upto 5 years of education      | 17 (5.2)                 | 5 (6.9)   |
| 6-10 years of education        | 63 (19.1)                | 17 (23.6) |
| 11-16 years of education       | 130 (39.5)               | 35 (48.6) |
| >16 years                      | 50 (15.2)                | 6 (8.3)   |
| Occupation                     |                          |         |
| Self-employed                  | 105 (31.9)               | 23 (31.9) | 0.698 |
| Un-employed                    | 24 (7.3)                 | 8 (11.1)  |
| Student                        | 61 (18.5)                | 11 (15.3) |
| Housewife                      | 139 (42.2)               | 30 (41.7) |

Table 2 depicts the socio-demographic factors related to fast pace life. Majority of the participants were suffering from fast pace life (82%). The highest percentage of participants who reported to be a victim of fast pace life were between 21 to 35 years age (55.6%), had at least 11-16 years of education and being female. Housewives also responded that they are affected by the fast pace life. Table 3 shows impact of fast pace life on the health of the patients. Majority (82%) of the patients believed that they were a victim of fast pace life. The patients responded that due to increasing needs (56.5%) and competition (17.3%) the lives have become fast.
The factors associated with fast life and its effect on health (physical, mental, psychological) is given in table 4. Those who were suffering from fast pace life are at risk of affecting their physical health (AOR: 2.6; 95% C.I:1.3-5.2), social life (AOR: 2.1 95% C.I:1.0-4.5), psychological well-being (AOR: 2.4; 95% C.I:1.2-4.5) and are more prone to stress and depression (AOR: 4.6; 95% C.I:2.3-9.3) when adjusted for other variables in the model.

### Table 3: Reasons and Impact of leading a fast pace life

| Variable                                  | Victim of fast pace life | P-value |
|-------------------------------------------|--------------------------|---------|
|                                           | Yes (n=329)              | No (n=72) |         |
| Little time for self and family           |                          |         | <0.001 |
| Yes                                       | 295 (89.7)               | 50 (69.4)|         |
| No                                        | 34 (10.3)                | 22 (30.6)|         |
| Reasons for fast pace life?               |                          |         | 0.141  |
| Increasing competition                    | 57 (17.3)                | 18 (25.0)|         |
| Needs have increased                      | 186 (56.5)               | 32 (44.4)|         |
| Become more materialistic                 | 43 (13.1)                | 7 (9.7)  |         |
| Priorities have changed                   | 31 (9.4)                 | 12 (16.7)|         |
| Expectations have increased               | 12 (3.6)                 | 3 (4.2)  |         |
| Fast pace affecting physical life?        |                          |         |         |
| Yes                                       | 283 (86.0)               | 44 (61.1)| <0.001 |
| No                                        | 46 (14.0)                | 28 (38.9)|         |
| Fast pace affecting social life?          |                          |         |         |
| Yes                                       | 251 (76.3)               | 37 (51.4)| <0.001 |
| No                                        | 78 (23.7)                | 35 (48.6)|         |
| Fast pace affecting family life?          |                          |         | 0.067  |
| Yes                                       | 216 (65.7)               | 39 (54.2)|         |
| No                                        | 113 (34.3)               | 33 (45.8)|         |
| Fast pace affecting spiritual life?       |                          |         | <0.001 |
| Yes                                       | 182 (55.3)               | 24 (33.3)|         |
| No                                        | 147 (44.7)               | 48 (66.7)|         |
| Fast pace affecting psychological well-being? |                      |         |         |
| Yes                                       | 268 (81.5)               | 36 (50.0)| <0.001 |
| No                                        | 61 (18.5)                | 36 (50.0)|         |
| Fast pace affecting work life?            |                          |         | 0.122  |
| Yes                                       | 147 (44.7)               | 25 (34.7)|         |
| No                                        | 182 (55.3)               | 47 (65.3)|         |
| Fast pace causing stress and depression?  |                          |         | <0.001 |
| Yes                                       | 302 (91.8)               | 44 (61.1)|         |
| No                                        | 27 (8.2)                 | 28 (38.9)|         |

The factors associated with fast life and its effect on health (physical, mental, psychological) is given in table 4. Those who were suffering from fast pace life are at risk of affecting their physical health (AOR: 2.6; 95% C.I:1.3-5.2), social life (AOR: 2.1 95% C.I:1.0-4.5), psychological well-being (AOR: 2.4; 95% C.I:1.2-4.5) and are more prone to stress and depression (AOR: 4.6; 95% C.I:2.3-9.3) when adjusted for other variables in the model.

### Table 4: Impact of Fast Pace life on Health (n=401)

| Variable                                  | Slow down your life? | P-value | Adjusted Odds Ratio (95% CI) | P-value |
|-------------------------------------------|----------------------|---------|-------------------------------|---------|
| Fast pace affecting physical life?        | Yes                  | 286 (81.5)| 2.6 (1.3-5.2)                | <0.001 |
|                                           | No                   | 61 (18.5)| 32 (44.4)                    |         |
| Feel helpless in slowing down?            | Yes                  | 233 (70.8)| 2.1 (1.0-4.5)                | <0.001 |
|                                           | No                   | 96 (29.2)| 39 (54.2)                    |         |
| Life becoming faster in years to come?    | Yes                  | 309 (93.3)| 4.6 (2.3-9.3)                | <0.001 |
|                                           | No                   | 66 (19.7)| 6 (8.3)                      |         |

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The factors associated with fast life and its effect on health (physical, mental, psychological) is given in table 4. Those who were suffering from fast pace life are at risk of affecting their physical health (AOR: 2.6; 95% C.I:1.3-5.2), social life (AOR: 2.1 95% C.I:1.0-4.5), psychological well-being (AOR: 2.4; 95% C.I:1.2-4.5) and are more prone to stress and depression (AOR: 4.6; 95% C.I:2.3-9.3) when adjusted for other variables in the model.
Discussion:
This is the first study to estimate the proportion of people leading fast pace life in Karachi, Pakistan and how it affects them. The results show that 82% of the participants were leading a fast pace life, which has affected their physical, psychological and spiritual health. The participants responded that the main reason for leading a fast pace life is because of the competition and the increasing needs of the family. This is true for most of the developing countries where the economies are not growing and the expenses are increasing day by day even for the basic necessities [7]. The weak and exhaustive health structure and the governments of these countries cannot provide affordable health care and education for the young [13]. Therefore the responsibility of providing quality education and health lies with the parents. This puts them under immense stress and to meet both ends they have to live a fast life, leaving the pleasures of little happiness in life.

In early 1900s the scientists believed that stress was not bad, and in fact, it protects humans through fight-or-flight response which helped keep human beings alive when their environment demanded quick physical reactions in response to threats. However, this theory is opposite in modern times. In this era our body’s stress response is regularly triggered by one or the other stressor [14]. Chronic exposure to stress hormones can damage the body. The otherwise functional role of cortisol production has the unintended effect of breaking down important physiological processes [9]. This process, described as allostatic or allostatic load may have deleterious associations with cardiovascular, metabolic, immune systems, brain activity, or central nervous system functioning [9]. This is consistent with the results of the study wherein 86% of the participants who were leading a fast pace life believed that this has affected their physical health. In Asian population, central obesity is found to be more common [15]. According to National Health Survey of Pakistan, 25% of our population is obese. One of the common reasons of not doing physical exercise is lack of time [16]. Exercises can in fact help in releasing endorphins which can assist in reducing stress [17, 18]. Taking frequent effective exercise is one of the best physical stress-reduction techniques available. The incidence of T2DM worldwide is rising exponentially due to increase in sedentary life style leading to central abdominal obesity [16]. The American Psychological Association conducted a survey on stress in 2010. One of the findings from the survey was that stress experienced by women was increasing [19]. Despite the incredible amount of research over the past two decades on religion, spirituality and health, the relationship between religion and health remains poorly understood. Cross-sectional studies have shown an association between religion, better mental health and greater well-being [14, 20]. Prospective studies have also found that religious beliefs and practices predict better mental health across time, with studies ranging in follow-up from a few months to decades [21, 22]. Thus, research from prospective studies and randomized clinical trials supports the hypothesis that religious beliefs and practices may indeed influence mental health [23]. This seems quite plausible, since religious beliefs and teachings are generally supportive of social responsibility, healthy in terms of forbidding drugs and alcohol and enhance social support [14, 24]. Religious communities also provide environment that promotes optimism regarding the future and giving people’s lives purpose and meaning independent of their health and material circumstances [25-27]. However, in today’s world people especially the younger generation does not have time to fulfill their religious obligations and practices, which creates a sense of emptiness and with no or limited social support the person has high chances of getting frustrated, arrogant and stressed [13].

One of the major drawbacks of this increasingly modern and fast life is limited time for self and family which can be the root cause of many problems and can lead to devastating situations [13]. In this study, about 66% of the participants felt that fast life had affected their family life. The increase in the competition and the need to be ahead from the fellow colleagues and friends results in less time with spouse, lower marital quality and consequently divorce [28]. In the last two decades there is a rise in divorce rate in Pakistan. One of the main reasons of these divorces was spousal complaints of lack of time spent with each other [12]. Increasing unemployment and job insecurity are the major stressors to individuals’ work and family lives [29]. Too many work hours or inflexibility in work hours are major problem for families, leaving insufficient time and energy for family life [29]. Due to the economic recession, both the parents have to work and parental feelings of not spending enough time with children are widespread [30]. Juggling responsibilities for work, housework, and child-care can become strenuous resulting in work-family conflict [30]. Employers should have the awareness about the drawbacks of work overload. Because studies have shown that those people who work long hours mostly show their dissatisfaction towards their job. Heavy work to do in limited amount of time makes it difficult for people to handle them and leads to anxiety and frustration.

This study had several potential limitations. Since this was a cross-sectional study so temporality could not be established. Secondly, the sample was obtained from the urban areas; so future studies are warranted on this issue to compare the differences in lives of people living in urban or rural areas. Thirdly, information on some variables such as physical health, psychological health was based on patients’ self-report and we could not verify the validity of the information. Furthermore, this research was conducted in one of the cities of Pakistan, so extrapolation of the study results to other populations should be done with caution.
Conclusion and Recommendations:
In today's world the society seems to be speeding up and becoming less empathic and increasingly stressful. The chronic exposure to stress can have deleterious effects on the physical and mental health of the population. Therefore, it is important for patients to take extra measures to keep them healthy to be fit for survival in this fast moving world.

This study found that family life is affected due to less time. This can be managed through family vacations. Studies reveal that that recreation and leisure activities can have positive effects on family cohesion and can assist in reducing stress and increase family bonding, togetherness and harmony which can reverse the effects of psychological issues [30, 31].

This study also revealed that fast pace life can have devastating effects on mental health of the people. Studies have proven that prayers and involvement in religious activities have been found to be beneficial in keeping positivity in life [32].

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