The Relationship Between the Use of Modern Communication Technologies and Legalism Among Female Students in Yazd

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Abstract

Background: Modern technologies play a main role in the life of citizens specifically their legalism in the new era. In Iran, the rules on the use of modern communication technologies are not clear. The main purpose of this study is to investigate the relationship between the use of modern communication technologies and legalism among female students in Yazd.

Methods: The present study was conducted by the survey technique. The tool used in this study was researcher-made questionnaire which examined the use of internet, computer software, cellphone, and social media as modern technologies and legalism with cognitive, emotional, and behavioral dimensions. The statistical population included female students in Yazd. By using Chochran sampling method, 365 samples were obtained and the research samples were chosen using multistage sampling. Data were analyzed using SPSS V22 software and statistical T tests. It was considered significantly at the level of P < 0.05.

Results: The research findings showed that there was a significant relationship between the use of modern communication technologies and legalism in terms of all aspects (cognitive, emotional, and behavioral) (P < 0.01). While the use of the Internet and computer software did not have any significant relationship with legalism, the use of cellphone and social media had a significant relationship with all dimensions of legalism (P < 0.01) except for cognitive dimension in social media.

Conclusions: Based on these findings, the use of cellphone and social media determines legalism of female students. Therefore, policy makers should put an emphasis on the legislation about using these two main information technologies for the young generation. In addition, families, the media, and schools should promote the socialization of students about the use of cellphone and social media as a strategic approach.

Keywords: Information Technologies, Legalization, Students

1. Background

Media is a part of today's human life. The importance of media is seen in all aspects of human life from identity (1), sport (2), and lifestyle (3) to healthy behavior (4), mental health (5), and M-Health (6). Media has an active presence in social fields like policy (7), family (8), religion and culture (9), military forces (10), and economy (11). Hitt and Brynjolfsson believe that the rapid development of information and communications has had an important effect on human life in recent years (12), because people can receive their needed information in every field wherever they are. The increase of the production of modern communication tools and finally the ease of access made a lot of people in different ages enter this virtual world (13). This factor caused many changes in people’s daily lives.

An important effect of modern technologies is legalism. Legalism is defined as “excessive adherence to law or formula” (14) and “strict, literal, or excessive conformity to the law or to a religious or moral code” (15). Legalism is the main concept in sociology. It is taken for granted that in the modern era, big changes have led to several problems and specifically the breakdown of values and laws. Emile Durkheim defines anomie as “derangement”, and “an insatiable will” (16) which is, in this condition, the breakdown of social norms regulating individual behavior and social interaction (17). In the social changes, regulations are broken and media technologies have a similar effect.

Among different theories on the media and the society, the agenda-setting theory is one of the sociological theories that claim the effect of the media on the cognition and the attitude of people and determining their mental priorities through selection and agenda-setting some subjects and events in the form of news and news reports. In other words, media applies agenda-setting on some subjects and events to affect the knowledge and the information of people. Although they cannot determine how people think, they can determine what they think of (18). An-
other theory is the theory of "use and satisfaction" that believes that the audience, more or less actively, are looking for the content that provides the maximum satisfaction to them. The level of this satisfaction depends on the individuals' needs and interests (19). Also, the "education theory" believes that those who are widely and severely exposed to mass media find the attitudes and behaviors that are consistent with the interpretations presented by the media, not to the spontaneous reality of media (20), images, and messages that may affect the behaviors of teenagers over time (21). Based on the first and the third theories, it can be said that the modern media change the belief and the behavior of agencies in the society. Legalism, as a behavior, includes belief, emotion, and behavior. This study examined legalism and its relationship with the use of modern technologies.

There are several studies around the world that have evaluated the effect of media and modern technologies on behavior. The positive and significant correlation between television violence and aggression was shown (22). Also, it was shown that social media have an effect on social value and belief (23-26). About the Internet and computer, it was shown that the Internet included some antisocial behavior such as addiction (27) and internet sexuality (28). However, studies about the relationship of legalism and the use of modern technologies are rare. Saei et al. showed that the use of the satellite, as a modern technology, has an inverse relationship with legalism, responsibility, and religious believes (29).

Since, Iran’s population forms a young population that has suddenly found an access to a vast network of the media technologies, it is necessary to carry out a study on this issue. One of the social values in this field is the youth’s legalism. The purpose of the present study is to investigate the relationship between legalism and the use of modern communication technologies according to the raised theories.

2. Methods

The present study is a quantitative study with the survey technique. This study is cross-sectional in terms of time, and extensive in terms of depth. The tool used in this study was a researcher-made questionnaire to make sure of the validity, and face validation was also used. For this reason, after making the questionnaire, it was shared with three specialists and their comments were implemented in the questionnaire. After that, their view point about the final revision was implemented and the last revision was made. This revision included three main parts: demographic features, legalism, and the use of modern communication technologies.

Demographic variables included age, level of middle school education (first, second, third), type of school (state, model, gifted, Shahed), father’s and mother’s education. Legalism variable with 22 items included cognitive, emotional, and behavioral aspects. Cognitive aspect with 7 items measured some questions on the cognition of individuals about the legalism for example "obeying the rules makes us achieve our rights more easily". Emotional aspect also with 7 items measured people’s emotions to obey or disobey the rules for example "I feel that I fall backwards whenever I obey the rules". And behavioral aspect with 8 items measured the behavior and commitment of people to obey the rules for example "when the red light is on the traffic light at nights, I prefer to stop my car". It should be noted that all these aspects were asked in the form of Likert scale (totally agree, agree, no idea, disagree, and totally disagree). The variable of “using modern communication technologies” was in the form of 45 items which measured computer software, the Internet, cell phone and social media in the form of Likert scale (very low, low, average, high, very high).

Questionnaire’s reliability was obtained through "the calculation of Cronbach’s alpha". Cronbach’s alpha level that showed the questionnaire’s reliability was 0.896 for the variable of "using information and communications technology" and 0.726 for legalism variable.

The statistical population included 7,714 female high school students in Yazd and according to Cochran sampling formula, 365 samples were obtained. For data collection, multistage sampling method was used. For this reason the combination of probability methods was used for each stage to achieve the probability proportional to size (PPS). At first, Yazd’s department of education was divided into two educational clusters of area 1 and area 2. After that, from each area one cluster was chosen randomly and the respondents were studied randomly within the chosen cluster sampled in the last stage. For inclusion criteria, all students were included in study except those who did not consent with the study and those who were not conscious in the time of sampling. Informed consent was obtained from all participants. Ethical considerations were observed during the study. Data were analyzed by SPSS 22 software and statistical T test was used and it was considered significantly at the level of P < 0.05.

3. Results

Descriptive results show that the minimum age of the respondents is 14 and the maximum age is 19 years old. Their average age is 16.7 (std-deviation = 0.79). The status of their parents’ education shows that 13.9% of fathers are
illiterate and have an elementary degree, 21.2% have middle school diploma, 33% have diploma, and 31.8% have academic degrees. According to the descriptive findings, fathers with diploma and academic degrees have the maximum frequency. Also, the education of mothers shows that 19.8% of them are illiterate and have elementary degree, 20.1% have middle school diploma, 35.6% have diploma, and 24.6% have academic degree. According to the variable of average, the minimum average of respondents is 13.5 and the maximum is 20 and their average GPA is 18.3. Also, the results showed that 73.5% of respondents studied in state schools, 18% in model schools, 15% in gifted school, 6.2% in Shahed schools, and 0.9% in affiliated schools among which state schools had more contribution than other schools (Table 1).

About the relationship between the use of communication technologies and legalism, results showed that there is a significant reverse relationship between these two variables ($P < 0.01$). It means that, the more the people are committed to the rules, the less will be their use of modern communication technologies and vice versa (Table 2).

For a better evaluation, the relationship between the dimensions of technologies and legalism were examined. Results showed that the use of computer software and the Internet did not have any relationship with legalism, while the use of cellphone had a significant relationship with all dimensions of legalism ($P < 0.01$). The use of social media had a significant relationship with all dimensions of legalism except the cognitive part ($P < 0.01$). It means that the use of social media is related to legalism except for the cognitive part of legalism (Table 3).

4. Discussion

The results of this study show that there is a reverse significant relationship between the use of modern communication technologies and legalism. It means that the more the people are committed to the rules, the less they will use modern communication technologies and vice versa. These findings are in line with Saei et al.’s study (29). However, this relationship is only significant in the case of cellphone in all aspects and social media in terms of behavioral and emotional aspects. The cognitive aspect of legalism did not have any relationship with the use of social media. This is not in line with studies that have shown that the media have an effect on social value and belief (23-26). Based on these findings, we can say that the use of computer software and Internet does not affect legalism. This finding is not in line with Fisher and Barak’s study about Internet sexuality (28) and Ma (27). Although these two main types of modern technologies paly the main role in the life of students, their role is not related to their legalism. It seems that their role is replaced with the new media. It means that, in the new situation, the youth are more dependent on new media such as social media and cellphone than Internet and computer as old media.

According to the obtained results and the significant relationship between cellphone and legalism in all aspects (cognitive, emotional, and behavioral), it can be explained that the theory of agenda-setting emphasizes this relationship (19). This theory claims that the effect of media on people’s attitude and cognition and determining their mental priorities are done through highlighting some subjects in the form of news and report. Since the media that contain the contents which show agenda-setting rule or fades it, it affects the mental attitude of the audience. When the audience is ready to accept or reject these rules in terms of cognition, the media also affect their emotional and behavioral aspects. According to the theory of use and satisfaction (19), people are looking for a content which provides the maximum satisfaction to them. When media can develop the rules to attract the audience’s attention, they will also use them in their lives and if they are not satisfied, they will disobey the rules. Because our participants are young and in emotional condition, their emotional satisfaction plays the main role for their behavior. According to the theory of education (20), media messages may affect the behaviors of teenagers by empowering them to gain new attitudes or behaviors overtime. Media has this power to change the attitude of people to the rules and if there are some advertisements on the use or the prohibition of the use of modern communication technologies, people will show reaction to such contents. This group of people follow social media and cellphone for achieving new messages.

The main finding of this study is the role of new modern technologies such as cellphone and social media. Compared with computer and the Internet, these technologies have different functions. In these media, consumers are faced with ongoing information which teach liberty generally. Thus, this worldwide window opens a new way to the world specifically about legalism. Because of the adolescents’ age, our participants stand on the emotional condition where rational behavior does not have any position. Thus, these people behave according to the information that bombard them at any moment.

It can be explained that according to the current status of our society that limits or prohibits the use of these technologies, observing the rule and considering it affect the individuals’ attitude towards using them. The more the commitment of the people to the rules, the less the use of modern communication technologies. Since students make the future, the culture of using modern communication technologies must be taught to them. Since in our
Table 1. Demographic Features of the Participants

| Variables                                | Frequency | Percent | Valid Percent | Cumulative Percent |
|------------------------------------------|-----------|---------|---------------|--------------------|
| Level of middle school education         |           |         |               |                    |
| First                                    | 14        | 3.9     | 5.4           | 5.4                |
| Second                                   | 86        | 24.2    | 35.2          | 38.6               |
| Third                                    | 159       | 44.7    | 61.4          | 100.0              |
| Type of school                           |           |         |               |                    |
| State                                    | 249       | 69.9    | 73.5          | -                  |
| Model                                    | 61        | 17.1    | 18.0          | -                  |
| Gifted                                   | 8         | 2.2     | 2.4           | -                  |
| Shahed                                   | 21        | 5.9     | 6.2           | -                  |
| Father's education                       |           |         |               |                    |
| Illiterate and elementary                | 46        | 12.9    | 13.9          | 13.9               |
| Middle school diploma                    | 70        | 19.7    | 21.2          | 35.2               |
| Diploma                                  | 109       | 30.6    | 33.0          | 68.2               |
| Academic                                 | 105       | 29.5    | 31.8          | 100.0              |
| Mother's education                       |           |         |               |                    |
| Illiterate and elementary                | 65        | 18.3    | 19.8          | 19.8               |
| Middle school diploma                    | 66        | 18.5    | 20.1          | 39.8               |
| Diploma                                  | 117       | 32.9    | 35.6          | 75.4               |
| Academic                                 | 81        | 22.8    | 24.6          | 100.0              |

Table 2. The Relationship Between the use of Communication Technologies and Dimensions of Legalism

| Variables                                | Cognitive | Emotional | Behavioral | Total Legalism |
|------------------------------------------|-----------|-----------|------------|----------------|
|                                          | Mean      | SD        | Mean       | SD             | Mean    | SD        | Mean      | SD             |
| Use of communication technologies        |           |           |            |                |         |           |            |                |
| Less than mean                           | 23.7986   | 5.18683   | 25.0504    | 5.40575        | 29.2324 | 5.05385   | 78.3798    | 13.90829       |
| More than mean                           | 21.9055   | 5.04493   | 23.0299    | 5.50999        | 27.5379 | 5.87322   | 72.2727    | 14.04537       |
| P value                                  | 0.003b    | 0.002b    | 0.01b      | 0.001b         |         |           |            |                |

*Statistical method: independent t test. P < 0.05.

**P < 0.01.

culture, the rules are more towards not using these technologies, the culture of using them must be properly presented in schools through the necessary approaches and measures.

4.1. Conclusion

This study showed that the use of cellphone and social media has an inverse relationship with legalism among female students. Because of the lack of any law about the use of these modern communication technologies in Iran, it proposed that policy makers should pay more attention to the legislation for using these technologies among the young generation. In addition, because using these technologies is due to cultural values, besides legislation; families, media, and schools should pay more attention to the socialization of students about the proper use of these modern technologies. For these reasons, parents, teachers, and broadcasting directors should teach young students about the proper use of new technologies specifically cellphone and social media.
Table 3. The Relationship Between the Dimensions of Legalism and the Use of Modern Communication Technologies (Computer, Internet, Cell Phone, Social Network)

| Variables | Cognitive | Emotional | Behavioral | Total Legalism |
|-----------|-----------|-----------|------------|----------------|
|           | Mean     | SD        | Mean       | SD            | Mean          | SD        |
| Computer software |          |           |            |               |               |           |
| Less than mean | 22.68    | 4.86      | 23.82      | 5.00          | 28.05         | 5.05      | 74.81     | 12.69 |
| More than mean | 22.72    | 5.27      | 23.90      | 5.85          | 28.48         | 5.67      | 75.08     | 15.06 |
| P value   | 0.940    | 0.900     | 0.47       | 0.77          |               |           |
| The internet |          |           |            |               |               |           |
| Less than mean | 22.62    | 4.97      | 23.89      | 4.77          | 28.14         | 4.96      | 74.69     | 12.36 |
| More than mean | 22.80    | 5.22      | 23.80      | 6.21          | 28.35         | 5.74      | 75.0592  | 15.32 |
| P value   | 0.76     | 0.89      | 0.72       | 0.82          |               |           |
| Cellphone |          |           |            |               |               |           |
| Less than mean | 23.5774  | 5.2375    | 24.8589    | 5.56874       | 29.0760       | 5.23788   | 78.1200   | 14.2405 |
| More than mean | 21.6206  | 4.70047   | 22.7261    | 5.32485       | 27.3441       | 5.42492   | 71.1583   | 12.69843 |
| P value   | 0.0008   | 0.0008    | 0.0039     | 0.0009        |               |           |
| Social media |          |           |            |               |               |           |
| Less than mean | 23.1278  | 5.28520   | 24.8250    | 5.53599       | 29.2441       | 5.07346   | 13.90891  | 1.09279 |
| More than mean | 22.1024  | 4.76234   | 22.9248    | 5.26944       | 26.9448       | 5.72415   | 13.5933   | 1.26209 |
| P value   | 0.08     | 0.0006    | 0.0005     | 0.0003        |               |           |

a Statistical method: independent sample t test. P < 0.05.
b P < 0.01.

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