

# Whether Social Media Makes People Feel Happy or **Anxious?**

# A Quantitative Study on the Emotional Impact of Social Media on **Different Age Groups**

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#### **ABSTRACT**

The rapid development of social media has brought many changes to people's lives. People can understand each other's life and daily dynamics faster and more conveniently. However, while social media brings convenience and happiness to people, it also brings anxiety to people's fast-paced life. Of course, people of different ages have different feelings of happiness and anxiety. This paper focuses on the different emotional reactions of social media to people of different ages. The main method of this paper is quantitative research, which adopts the method of questionnaire. Based on the collected questionnaire and data analysis, this paper tries to fully understand the different feelings of social media on teenagers, adults and the elderly. At the same time, educational background is also a variable of our research. This paper finds that people of all ages have different reactions to the impact of social media. The elderly have more obvious psychological changes brought by social media. They are more complex and anxious than young people. This paper will help to deepen the research on the relationship between social media and daily life, and provide some reference value for the research of the elderly in the context of new media.

Keywords: Social Media, Different Generations, Teenagers, anxious, anxiety, happiness, Chinese social media

### 1. INTRODUCTION

With the vigorous development of social media, more and more social media and new social software enter people's life. Social media makes people's lifestyles more and more diverse, and the relationship between people is closer. People can understand each other's life and daily dynamics more quickly and conveniently. However, social media not only brings people happiness, but also anxiety. People of different ages feel different about anxiety.

An important factor is the ease of sharing personal experiences in the digital information age [1]. People can share their experiences through social media to facilitate better communication between people on the one hand, but at the same time, it will be easier to reveal privacy and

be used by unscrupulous people. Therefore, the authenticity and security of online speech need to be confirmed and improved. Social media sites, such as Facebook and Twitter, have rapidly become a central part of young people's lives, with over 90% now using social media, day and night reflects the high dependence of young people on social media and the high demand for daily use of social media [2]. However, excessive use of social media can lead to a lack of concentration in adolescents, which can affect learning, sleep quality, and sleep duration, which can affect health and daily life.

Older adults continue to adopt older information and communication technologies like e-mail [3]. However, their adoption of Web 2.0 applications lags behind younger age groups [4]. For Internet users over the age of 65, only 7% of them maintain a profile on a social

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networking site. In sharp contrast, 75% of younger adults age 18-24 maintain a profile reflect the fact that older adults are significantly less dependent on social media than teenagers and adults [5]. Active participation in online forums enhances older adults' learning experience [6], and can help them increase personal control over their lives. The elder people use the social media for learning some new things or exploring some information rather than making friends or sharing their personal information or life [7]. With the acceleration of social aging, scholars pay more and more attention to the impact of new media on the life of the elderly. Some studies have shown that there is a close relationship between social media use and loneliness in the elderly. The influence of social media on loneliness of the elderly can be affected by the utilization of social support. Mobile social media counseling can help reduce the loneliness of the elderly and improve the social support level of the elderly. It can be used as an effective intervention program to provide intervention for the same type of elderly [8]. Other studies discussed the impact of social media use on the subjective well-being of the elderly from the two dimensions of positive emotion and life satisfaction. They believe that the positive emotions generated by the use of social media are significantly positively correlated with age and social behavior. The life satisfaction of the elderly due to the use of social media is significantly correlated with age, monthly disposable income, education level, social behavior and information behavior. Research shows that social media information behavior has a significant regulatory effect on the positive emotions of the elderly's subjective well-being [9]. Therefore, in the face of the increasingly serious population aging, the government should take action to design and provide more targeted social media for the elderly. In other words, social media should provide a place for the elderly to challenge age discrimination and influence public policy discourse [10]. addition, people with different educational backgrounds have different feelings about using social media. This question will be further discussed and studied in this research paper.

In this study, we used the research methods of survey, interview and questionnaire to collect different feelings and reactions of different age groups to the same problem. We are mainly divided into three groups: teenagers, adults and the elderly, focusing on their life feelings about the booming social media and their different reactions to the penetration of social media into their daily life. At the same time, this study is based on the research and analysis of different feedback from different groups to further understand the impact of social media on people's daily life. In order to better study and investigate the pros and cons of social media in today's society, this study made a questionnaire and collected their feedback according to

the age, education, work, time usually using social media and their different feelings of different groups.

### 2. METHOD

In this project, we mainly used a questionnaire to collect data. We received 92 valid questionnaires, among which 20 people (21.74%) were at the age of 0-18, 42 people (45.65%) were at the age of 19-35, 29 people (31.52%) were at the age of 36-60, and the remaining 60+people (1.07%) were very few.

According to the content consumption analysis report of young users in 2021 given by Aurora Big Data, among the content consumption groups, the main users are 10-49 years old, accounting for 70.6%. Among them, 10-39 years old are the primary users, accounting for 51.8%. The proportion of young users on mainstream content platforms is over 70%. Accordingly, the questionnaire collected by the author is roughly the same as the proportion of young players shown by Aurora Big Data, excluding data discrepancies and limitations of the sample distribution and the circle of questionnaire group forwarding and other prior factors.

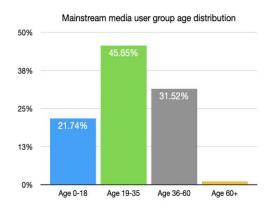


Figure 1 Mainstream media user group age distribution

In the questionnaire, the author used a scaled question, in which the respondents could rate their anxiety value in different situations. At the same time, the author considered that various events bring different levels of anxiety to people. It is not good to make a horizontal comparison. Hence, the author designed the questions to assess whether the anxiety value of the respondents is caused by social media when they see or hear the anxiety value at the same time in social media and real life.

The author asked for more detailed questionnaires based on the preferences of different age groups for social media and the functions of mainstream social media. For example, respondents' anxiety level when seeing negative comments on social media or in real life, respondents' anxiety level when hearing about major social or criminal cases on social media or in real life, etc. The author used



a mean value algorithm to calculate the anxiety values of different age groups for the same time, to compare whether social software has an impact on people's anxiety values, and to explore further the different situations where social media brings positive and negative impacts.

The author also discusses in the further question that different social media software can also cause different anxiety values among people. Because the preference for social media software varies by age group and the age distribution of the main user groups in different software, it is possible that people's psychological state changes when using different social media. At the end of the questionnaire, the author asked respondents about the type of software they use most often and their anxiety value when using this software.

## 3. RESULTS AND DISCUSSION

The mood in different situations Around 84.78% felt a middling sense of annoyance or even complete disinterest toward seeing negative remarks on the Internet. On a scale of one to ten, with one being apathetic and ten being extremely annoyed, most responses centered around five, three, two and one, with only a select few answering ten or nine. By comparison, a small number of people felt more irritated by these remarks in real life. The distribution for seeing people with material advantages on social media followed a similar pattern, but with one being happily content and ten being unhappy, but when asked about real life, the two outliers were three and five while all other options remained consistently low. When hearing of major cases such as crime or corruption, 37/92 ranked around the middle of the scale, with thirty-three leaning towards indifference (1-4) and twenty-two who felt especially provoked (7-10), and a similar if not more exaggerated distribution was seen when people were asked how they felt seeing celebrity promotion or advertisement. More people selected ten; extremely affected when they heard about major social cases in real life, and people would tend to react with more annoyance when recommended celebrities in real life.

Communication habits of people on a scale of one (no discussion whatsoever) and ten (frequent discussion), the majority of twenty-seven participants answered two; they would very seldom discuss sensitive topics (racism, sexism etc.) on social media. People were slightly more inclined to discuss such topics offline, but still did not do so often. On communication in general using social media. Most people were neutral, with some leaning towards feelings of awkwardness or embarrassment and a few feeling quite comfortable. A similar trend was observed when the participants were asked how they felt on communicating face-to-face. In both observing media related to their interests and talking with someone else about their interests, most people ranged from feeling

neutral to happy. However, when asked how they felt the following someone online or meeting people who shared their interests, more participants tended to answer that they felt indifferent. When someone gains followers on a social media app, they felt relatively happy on a scale of one to ten - most of the people answered "two", but if someone paid attention to them in real life their reaction was more muted.

Effect of media on emotions. Thirty-five people felt neutral or slightly discontent when their difficulties could be solved on social media. Forty-seven felt daring degrees of happiness and the remaining ten felt more anxious. In real life, around forty-five people chose between one and three, marking them as overall more satisfied when their problems were solved in reality. When expressing their true feelings on social media, twenty people which were three and twenty-two people chose four. Two people chose four. A similar, less exaggerated trend was seen when people expressed their feelings in real life. Regardless of whether offline or online, most people felt neutral, bordering on happy when they say photos or videos of beautiful things.

Individual demographics 63/92 participants were female, 29/92 male. 45.65% were between nineteen and thirty-five years of age, 31.52% between thirty-six and sixty, 21.74% under eighteen, and 1.09% over sixty. 38/92 had high school education, fifteen in junior college, twenty-seven university undergraduates, and six in middle school and master's degree or above. Younger people may be more content as having grown up in the information age, they are more familiar with recent technology and innovation, but slightly elder people may either feel anxious on social media or avoid social media due to that anxiousness. Level of education could also affect the perception of social media. Whether it is a recreational activity, something to turn to when there is no other option or a complete waste of time, and females and males may make use of social media differently, causing their differing experiences on social media to lead them in different directions.

Types of social media used Ninety out of ninety-two people used WeChat; twenty used QQ, twenty-three each used Weibo and Xiaohongshu (xiaohong book), and under fifteen people each used Douban, Zhihu, or another uncatalogued social media. On WeChat, QQ, and Xiaohongshu people said they felt happy and content for three-quarters of the time spent on the app. On Weibo and Zhihu people only were content sixty-five percent of the time and on Douban only sixty. These could be due to the differences in types of social media. WeChat and QQ, for example, are primarily messaging apps, with functions such as the WeChat Moments or Qzone used on the side. Weibo is considered by some to be the place of online infighting, so while messaging apps may be used more to



interact with friends both Weibo's culture, usage, and user base may contribute to more discomfort in using it.

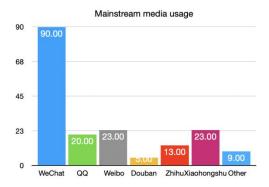


Figure 2 Mainstream media usage

The research of this paper shows that people of different ages have different psychological states for different software. Some of them are in line with the cognition of daily life, while others are not.

The study found that more people aged 19-35 filled in the questionnaire, while the least people aged over 60 filled in the questionnaire. This is consistent with daily cognition. More young people are interested in doing questionnaires, while the elderly are not very interested in these things. This may also be because the elderly are not good at using mobile phones to complete complex questionnaires.

In the questionnaire, there are many sub-lines that measure people's anxiety about social media. For example, the comparison of people's anxiety value when they see bad remarks in reality or in the media. It can be seen from the questionnaire that people's emotional changes of anxiety are more intense in real life than in social life. People trust what they see more than what they see on social media. Children and older people may have more psychological changes, they have higher anxiety about the behavior of bad speech, children tend to think a lot, while older people will think that people should get along with each other, so they feel more anxious or resentful.

People aged 36-60 were more concerned about life, with their anxiety levels significantly higher than other age groups when they were presented with major events, according to the survey.

Between the ages of 19 and 35, there are relatively few emotional changes, and there is not much difference between media and reality, probably because they don't need to care too much at this age, and they have plenty of time to waste.

#### 4. CONCLUSION

This paper mainly analyzes the happiness and anxiety brought by social media through quantitative research methods. Research has found that social media brings people the greatest happiness. Although the sample size of this study is limited, the research conclusion cannot represent everyone. Some people's feelings exist in people's cognition, and some people break it. For example, some people might think that the elderly do not care much about social media, do not use mobile phones to view information, and are not affected by mobile phone information, but the fact is that the elderly care more about this information, and they are more complex and worried than the young.

Therefore, this paper holds that with the development of science and technology and the times, people's feelings will also change greatly and change the previous rigid ideas. So people of all ages have different behaviors, and people are accepting these changes. This paper will be beneficial to the research of social media in daily life, especially to the attention of the elderly.

### REFERENCES

- [1] Reid Chassiakos YL, Radesky J, Christakis D, Moreno MA, Cross C, Children and Adolescents and Digital Media, Pediatrics: Official Publication of the American Academy of Pediatrics, 2016, 138(5), art. no. e20162593-e20162593. DOI: 10.1542/peds.2016-2593.
- [2] Duggan M, Brenner J., The Demographics of Social Media Users 2012, Washington, DC: Pew Research Center, 2013.
- [3] Jones S, Fox S., Generations Online in 2009, Washington DC: Pew Internet & American Life Project, 2009. Retrieved June 13, 2010 from http://www.pewinternet.org/Reports/2009/Generati ons-Online-in-2009.aspx.
- [4] Lenhart A, Fox S., Twitter and status updating, Washington DC: PEW Internet & American Life Project, 2009. Retrieved June 14, 2010 from http://www.pewinternet.org/Reports/2009/Twitterand-status-updating.aspx.
- [5] Lenhart A., Adults and social network Websites. Vol. 2009, Washington DC: Pew Internet & American Life Project, 2009. Retrieved June 13, 2010, from http://pewinternet.org/Reports/2009/Adults-and-Social-Network-Websites.aspx.
- [6] Nahm ES, Resnick B, DeGrezia M, Brotemarkle RNurs Res, 2009, 58(6), pp.419-426.
- [7] McMellon CA, Schiffman LG., Cybersenior empowerment: How some older individuals are



- taking control of their lives, The Journal of Applied Gerontology, 2002, 21(2), pp.157-175.
- [8] Wei Dongping, Liu Shuang, Deng Shangzheng, Yan Xuemei, Wang chunrui, The relationship between social media use and loneliness and social support of the elderly and its intervention methods, Chinese Journal of Gerontology, 2021,41 (20), pp.4584-4587.
- [9] Deng Xianglian, Will social media use improve the subjective well-being of the elderly: An investigation based on the background of positive aging, Library and information knowledge, 2021, 38 (05), pp.77-94. Doi: 10.13366/j.dik.2021.05.077.
- [10] Barry Trentham et al., Social media and senior citizen advocacy: an inclusive tool to resist ageism?, Politics, Groups, and Identities, 2015, 3(3), pp.558-571. DOI: 10.1080/21565503.2015.1050411.