

Spiral of Silence on Chinese Social Media

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### **Abstract**

The result of structural equation model analysis based on a survey ( $N = 246$ ) releases that, firstly, the spiral of silence exists on Chinese social media WeChat (i.e. the fear of isolation can negatively predict the willingness to express) and the expressive behavior is differentiated into post, repost, and comment. Secondly, the willingness to express (post, repost, and comment included) is not related to perceived mass media opinion climate incongruence, perceived reference group opinion climate incongruence, and the network features on WeChat. Thirdly, perceived mass media opinion climate incongruence can strengthen perceived reference group opinion climate incongruence which is consistent with Noelle-Neumann. Finally, the theoretical framework of the spiral of silence is extended by the moderating role of avoidance setting which can weaken the effect of the spiral of silence on social media.

*Keywords:* spiral of silence, Chinese social media, WeChat, post, repost, comment, avoidance setting

### **Spiral of Silence on Chinese Social Media:**

#### **The Weakening Effect of Avoidance Setting of WeChat**

WeChat is one of the most popular social media platform in Mainland China with one billion daily active users and more than 450 billion messages was sent on a daily basis (Iqbal, 2019). As a social media platform, WeChat could meet people's demand for mobile instant messaging and social information sharing, and people use WeChat mainly based on three motivations, entertainment, sociality, and information (Lien & Cao, 2014).

Meanwhile, some research focus on another role of WeChat in citizens' life, the space of social issue discussion and the facilitator of public opinion. Under the context of the development of Chinese internet and information technology, a "digital civil society" has been gradually taking shape, meaning there are more and more people participate in discussions about the public issue via the online channel (Yang, 2009). More specifically, previous research has pointed out that, WeChat has constructed a space allowing Chinese citizens to expose to a public opinion environment with controversial information and some critical discussion voices (Guo, 2017). Not only space and environment could be provided by WeChat, but also it can incubate opinions and issues themselves (Stockmann and Luo, 2017). Hence, WeChat has already been able to reconstruct the public sphere in Mainland China (Shao & Wang, 2017) and worth being given enough attention. For the aim of understanding the pattern and the rule of public opinion affairs on WeChat, here spiral of silence, a classic communication theory, is employed as the theoretical framework of the current research.

#### **Literature Review**

For the case selection, the point is a little bit special in Mainland China. Noelle-Neumann (1974) test the process of spiral of silence under a political topic issue. Then there were several

subsequent research which tried to test the basic hypotheses of spiral of silence distributed in domestic politic related issues, for example, McDonald et al. (2001) and Wang et al. (2017) used U.S. 1948 president election data and 2014 midterm election data respectively to verify and extend the framework of the theory. As for international politic related issues, conflicts and scandals in Iran (Gonzenbach, 1992), the Intifada (Shamir, 1995), and Iraq (Neuwirth, Frederick, & Mayo, 2007) have been studied. However, for Mainland China, under the condition of internet censorship from central government, the opinion expression is limited and controlled (Harwit, 2017), and this will lead to two negative impacts on the research. On the one hand, for the function of “Public Accounts” (i.e. a form of self-media, and the subject of public account can publish media content to their subscribers), too radical opinion or speech would be deleted (Lee, 2018), which may interfere the process of public opinion generation and audience reception. On the other hand, audiences may be afraid of being reported and violating related laws, which could hinder the willingness to express. In fact, these factors of censorship are also worth being paid attention to, but this study only focuses on the general process of SOS and a moderator proposed by researcher, the avoidance setting, which would be discussed in detail later. In summary, this research tries to select a proper topic which could avoid the external social reality confounders.

Based on the criteria of topic selection of Noelle-Neumann (1993), topics involving controversy and moral issue are appropriate for research. Thus, this article uses 996 working systems affair (996) as the case for the research. 996 means working from 9 a.m. to 9 p.m. and 6 days a week which is common in internet companies of Mainland China. Recently, this topic has been hotly discussed. Some people may argue that excessively work overtime is unreasonable and harmful to health. While some others may hold the point that the speed of iteration in the

internet industry is too high to catch the opportunities, so 996 is an effective way of working. This study tries to figure out the pattern of spiral of silence on WeChat based on this case.

According to the theory of spiral of silence proposed by Noelle-Neumann (1974), there are some key variables through the interactive and dynamic process of public opinion formation. Independent variables, perceived opinion climate and fear of isolation. And the dependent variable, willingness to express. When people find their opinions are incongruent with the perceived opinion, due to the psychological mechanism of fear of isolation, people are more possible to refrain from expressing and keep silence. While for those who find their opinions are on the majority side, they are more willing to express. Some specific variables and relationships are also discussed like the dominant opinion of mass communication media can have a positive effect on perceived opinion climate, the perceived future opinion climate can also affect willingness to express. Followed by this, spiral of silence has been verified time and time again. Besides, some new concepts and variables are added to extend the original theoretical framework. Kennamer (1990) explored self-serving as an important factor when people perceive opinions from others. Huang (2005) has taken the cultural context as a significant factor influencing the occurrence of spiral of silence, specifically, the collectivism could positively predict spiral of silence in Taiwan but not for the same case in an individualism context like the United States. Efficacy and communication apprehension has a directly positive and a negative relationship with willingness to express respectively (Neuwirth et al., 2007). Attitude certainty can weaken the negative relationship between perceived opinion climate and willingness to express, basically, people with a higher attitude certainty would be more difficult to be in SOS (Matthes, Morrison, & Schemer, 2010). Up to now, some variables (e.g. efficacy, communication apprehension, and attitude certainty) have been already regarded as key variables

and involved by the original theoretical framework, and some other developments are only get verified under some certain contexts.

### **Fear of isolation and willingness to express on social media**

Spiral of silence has been verified by some credible research several times on Twitter (Miyata, Yamamoto, & Ogawa, 2015), Facebook (Gearhart & Zhang, 2014), Chinese social media Weibo (Lin, 2014), or on the social media as a general level concept and especially for the negative relationship between fear of isolation and willingness to express or the positive relationship between fear of isolation and willingness to self-censor (Chen, 2018). But no clear conclusion for WeChat. Because the discussion of fear of isolation in these research above is adequate, this study doesn't pay more attention to it. However, it is worth mentioning that, with the change of social backgrounds, especially the rapid development of social media, an online context was established giving people more possible space, channels, and forms to express their opinions. Based on this, it is necessary to rethink the concept of willingness to express.

Under the online context, the expressive behavior may differentiate into more specific aspects which are not the same under the offline context, the face to face situation. There were some researchers conceptualizing expressive behavior online as "post" and giving pieces of evidence of spiral of silence by focusing on willingness to post (Nekmat & Gonzenbach, 2013) and Yun and Park (2011) understood the phenomenon of keeping silence from a perspective of selective posting. Similar to express personal opinion but different in the express section, comment is another main expressive behavior on social media which has also been studied in spiral of silence research (Wu & Atkin, 2018). While, as an independent aspect of expressive behavior, repost got less attention than post and comment in literature of spiral of silence. But what couldn't be ignored is that, in online human behavior literature, repost presented as a

challenging problem to understand, cause it is indeed an important expressive behavior on social media but without any active content output (Lu, Yu, Guo, & Zhou, 2013) meaning that it is also an important aspect.

These three expressive behaviors were distinguished not only in the literature of spiral of silence but also in other research filed. For example, social media business marketing on Facebook (post and comment) (Brennick, 2013), the interaction effect of social norms and dissatisfaction (comment) (Y. J. Lee & Ahn, 2017), and honor culture (post) (Günsoy et al., 2015). A similar conclusion was also drawn by Zhao (2018) who concluded 4R as a whole round of human information communication behavior, release (similar to post), reception, relay (similar to repost), and reaction (similar to comment). However, these three behaviors haven't been studied in spiral of silence within a whole model. In summary, this study gave post, repost, and comment independent roles and try to verify spiral of silence on WeChat by using willingness to post, willingness to repost, and willingness to comment. Here, one hypothesis and three sub-hypotheses were proposed:

H<sub>1</sub>: Fear of isolation is negatively associated with willingness to express on WeChat (spiral of silence exists on Chinese social media WeChat).

H<sub>1a</sub>: Fear of isolation is negatively associated with willingness to post on WeChat.

H<sub>1b</sub>: Fear of isolation is negatively associated with willingness to repost on WeChat.

H<sub>1c</sub>: Fear of isolation is negatively associated with willingness to comment on WeChat.

As the rethinking of willingness to express, fear of isolation may also need to take some emerging factors into consideration. For example, some studies gave different conclusions compared with the original spiral of silence theory. Yang and Li (2016) found that fear of isolation is not a significant factor to influence willingness to express on social network sites.

Some possible explanations are that, to a certain degree, the network on SNS is based on offline acquaintance relationship which can weaken fear of isolation. Indeed, fear of isolation would occur more easily in a more heterogeneous social network (Fox & Warber, 2015). And the size of the social network also does matter (Sohn & Geidner, 2016) and generally, the bigger the network, the more fear of isolation people will hold. Hence, two hypotheses were proposed:

H<sub>2</sub>: The network size on WeChat is positively related to fear of isolation.

H<sub>3</sub>: The network heterogeneity on WeChat is positively related to fear of isolation.

### **Perceived opinion incongruence**

Opinion climate has been differentiated into three specifically different types on three distinctive levels, macro level, group level (Moreno-Riaño, 2002), and temporal level, and they may have some internal relationships with each other. One existing study has tested these three different levels of opinion climate, the global opinion climate, the reference group opinion climate, and the future opinion climate, which refer to the opinion distribution of the country and province, the opinion distribution of the group with similar value and close relationship, and the opinion distribution in the future (Lin, 2014). Some other researches got similar conclusions, for instance, when people encounter a controversial environment, he or she will observe the social, political, and economic conditions (macro) as the reference of the opinion climate (Shamir, 1995). Generally, the global opinion climate was mainly derived from macro information channels such as mass media coverage, especially for China where much state mass media is the mouthpiece of the country and the government (Xie & Zhao, 2014).

Moreover, this classification is partly consistent with Noelle-Neumann's (1993) assumption of the source of perceived opinion climate, mass media and interpersonal communication environment which could be seen as macro and group level respectively within



the scope of this study. From the perspective of levels of opinion climate, the current research defines the perceived mass media coverage opinion climate the same as perceived global opinion climate. To operationalize opinion climate conveniently, this study use opinion incongruence to examine the effect of perceived opinion climate. Existing conclusions have given several pieces of evidence that the perception of macro and group opinion can facilitate the perceived mass media opinion incongruence and perceived reference group opinion incongruence, and then have a negative effect on willingness to express (Moreno-Riaño, 2002). Moreover, a more positive perception of opinion climate (i.e. a low level of opinion incongruence) could be formed because of the exposure to favorable mass media coverage content (Gunther, 1998). Here, three hypotheses and six sub-hypotheses were proposed:

H<sub>4</sub>: Perceived mass media coverage opinion incongruence is positively associated with perceived reference group opinion incongruence.

H<sub>5</sub>: Perceived mass media coverage opinion incongruence is negatively associated with willingness to express on WeChat.

H<sub>5a</sub>: Perceived mass media coverage opinion incongruence is negatively associated with willingness to post on WeChat.

H<sub>5b</sub>: Perceived mass media coverage opinion incongruence is negatively associated with willingness to repost on WeChat.

H<sub>5c</sub>: Perceived mass media coverage opinion incongruence is negatively associated with willingness to comment on WeChat.

H<sub>6</sub>: Perceived reference group opinion incongruence is negatively associated with willingness to express on WeChat.

H<sub>6a</sub>: Perceived reference group opinion incongruence is negatively associated with willingness to post on WeChat.

H<sub>6b</sub>: Perceived reference group opinion incongruence is negatively associated with willingness to repost on WeChat.

H<sub>6c</sub>: Perceived reference group opinion incongruence is negatively associated with willingness to comment on WeChat.

According to the definitions of different types of issues (Yeric & Todd, 1989) which has been explained and tested by (Gearhart & Zhang, 2018), transitory issue refers to the issue which won't grab public attention for a long time. For the time being, 996 is a transitory issue, hence this research doesn't pay any attention to the perceived future opinion climate incongruence (temporal level).

### **Avoidance setting as media affordance**

Media affordance, "The properties of computer mediated communication tools that permit people to use different communication strategies" (Fussell, Zhang, & Setlock, 2009). In other words, it refers to the tendency given by a certain media technology which may lead users to use it in a certain way with a certain result (Evans, Pearce, Vitak, & Treem, 2017). From this perspective, the relationship between users and media technology is interactive (Leonardi, 2013). For example, WeChat carries the technology properties of information transferring (messaging function), social connecting (friending function), and content publishing and reception (sharing and reading function). In addition to the properties above, social media as WeChat has another property which is worth being focused on, the property of allowing users to conduct avoidance behavior. On WeChat, there are three functions which can meet people's need for "avoidance", "Share to exclude" (i.e. the selected group won't see the content users post), "3 days are

viewable” (i.e. people can only see what you have posted in 3 days), and “6 months are viewable” (i.e. people can only see what you have posted in 6 months) referring to avoid letting more people see what content is on my social media and reduce the uncontrollability of potential opinion conflict.

In previous literature, on one hand, avoidance was conceptualized as a psychological mechanism, individual style, and personal trait being a negative predictor of willingness to express the opinion publicly (Dalisay, 2012). On the other hand, it was also conceptualized as a behavioral result of hostile opinion climate (i.e. opinion climate incongruence) (Hayes, 2007) and protective motivation (Renner et al., 2004). Wang et al. (2017) put the avoidance on a position of moderator positively affecting the relationship between perceived support and willingness to share. No matter which perspectives or roles of the avoidance, those all refers to avoidance could promote spiral of silence on social media.

However, from a perspective of media affordance, as a property technology, avoidance setting allows people to selectively avoid potential opinion conflict before express on social media (e.g. only post the content to the group of people who you think you won't have any opinion conflict with them by setting “share to exclude”, or present less about your opinion by setting “3 days / 6 months are viewable” to control the possibility of potential opinion conflict). Follow this logic, avoidance setting has already satisfied the need for conflict avoidance before expressing, and people could actively avoid being exposed in opinion incongruence to a certain degree. So the effect of spiral of silence should be weakened by doing avoidance setting.

According to Chen (2018), two media affordance of social media (publicness and political disagreement) has a special moderating effect on the relationship between fear of isolation and willingness to self-censorship which shows the effect of spiral of silence indeed

could be conditionally affected by media affordance. In the part of limitation and future research of the study of Chen (2018), she pointed out that the moderator role of media affordance was to be tested in a specific social media platform rather than a general concept of “social media”.

Hence, in response to this expectation and verified the moderating effect proposed by this study, the moderating effect of avoidance setting would be tested by hypothesis as follow:

H7: The relationship between fear of isolation and willingness to express on WeChat is moderated by avoidance setting. Specifically, the negative effect of fear of isolation on willingness to express would be weakened by avoidance setting. (H7<sub>a</sub> for willingness to post, H7<sub>b</sub> for willingness to repost, and H7<sub>c</sub> for willingness to comment).

To sum up, the study concluded a theoretical research model including all of the hypotheses above and demonstrated the relationship between every two variables using Figure 1.

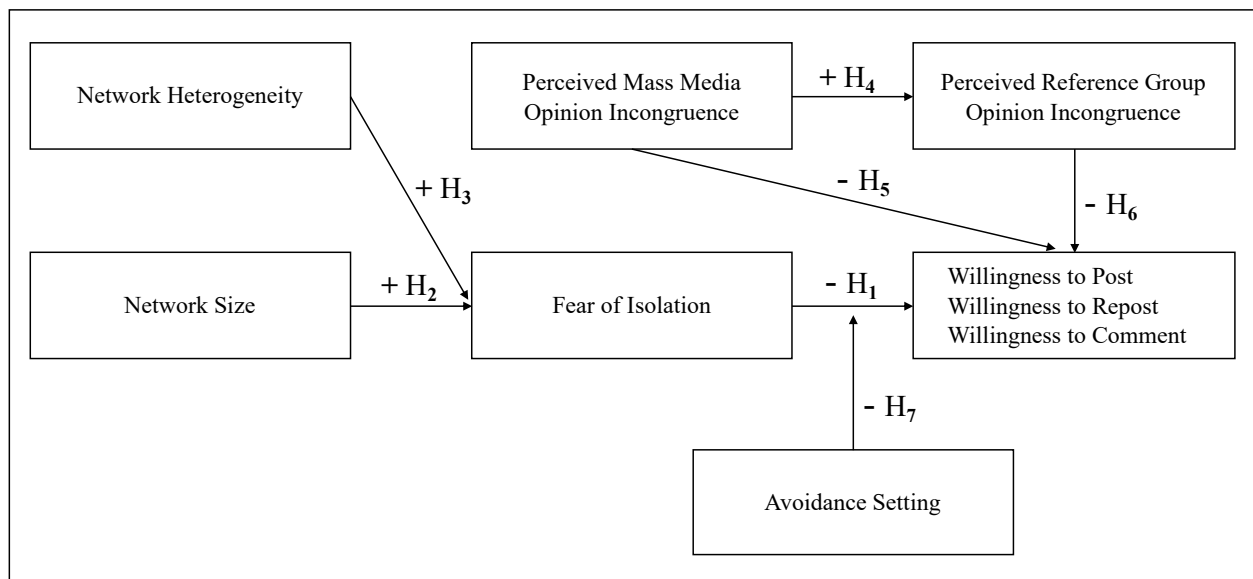


Figure 1. The theoretical research model based on all hypotheses. “+” sign means a positive relationship between two variables and “-” sign means a negative relationship.

## Method

### Sampling

The data of the current research was collected via an online survey based on a snowball sampling method. And it should be pointed out that, cause the discussion about the rationality of the 996 working system were started from programmers and some other staffs who are working in internet industry companies, the researcher distributed the survey questionnaire especially to some staffs in internet companies including Tencent, Baidu, Alibaba, and JD.com and asked them to conduct the snowballing to help this research include both topic related group and general population. After cleaning the data, this study got a sample of 246 respondents. Of course, the limitation of the sampling method should be acknowledged that snowball sampling can hardly ensure the representativeness, but the distribution of questionnaire in the group of internet company staffs could compensate the lack of representativeness to a certain degree.

### Measurement

#### Fear of isolation

Following the classic measurement of fear of isolation from Scheufele, Shanahan, and Lee (2001), respondents were asked to rate the statements from 1 = *strongly disagree* to 7 = *strongly agree*: “Assuming that you are in the discussion about the 996 working system, and to which extent are these statements consistent with you?” (1) “I worry about being isolated if people disagree with me”; (2) “I don’t worry about other people avoiding me”; (3) “I avoid telling other people what I think when there’s a risk they’ll avoid me if they knew my opinion”; (4) “I enjoy avoiding arguments” (5) “Arguing over controversial issues improves my intelligence”; (6) “I enjoy a good argument over a controversial issue”; (7) “I try to avoid getting into arguments”, in which (2), (5),

and (6) were reversed coded and then averaged the 7 items to form the index of fear of isolation ( $M = 3.74$ ,  $SD = .92$ , Cronbach  $\alpha = .64$ ).

### **Willingness to express**

Willingness to express was measured based on Lin (2014) and Scheufele et al. (2001). As defined above, the willingness to express was divided into 3 distinctive dimensions, post, repost, and comment which are measured by (1) “How likely would you post your own opinion about the 996 working system on WeChat?” ( $M = 2.83$ ,  $SD = 1.45$ ), (2) “How likely would you repost the content which is similar to your opinion toward the 996 working system on WeChat?” ( $M = 3.43$ ,  $SD = 1.56$ ), and (3) “How likely would you comment on others’ opinion about the 996 working system on WeChat?” ( $M = 3.44$ ,  $SD = 1.39$ ) respectively within 6 points from 1 = *very unlikely* to 6 = *very likely*.

### **Perceived opinion incongruence**

Firstly, respondents were asked to report their opinions toward 996 within 10 points from 1 = *strongly unreasonable* to 10 = *strongly reasonable*: “To what extent do you think the 996 working system is reasonable?” ( $M = 3.61$ ,  $SD = 2.06$ ). Secondly, respondents were asked to report their perception from 1 to 10: (1) “Please estimate, out of every 10, how many of related mass media coverages do you think show a supportive stand for the 996 working system”; And from 10% to 100%: (2) “Please estimate the percentage of related mass media coverages which show a supportive stand for the 996 working system” (Yun & Park, 2011). The answer of percentage would be divided by 10 and these two items were averaged to measure perceived mass media opinion ( $M = 3.92$ ,  $SD = 1.89$ , Cronbach  $\alpha = .80$ ). Thirdly, the incongruence score ( $M = 1.79$ ,  $SD = 1.47$ ) were derived from perceived mass media opinion minus the opinion of respondent and remain the absolute value of the result (Lin, 2014) which means 2 and -2 are on

the same level of incongruence, and 0 means the opinion of the respondent is totally consistent with the perceived mass media opinion climate. So did the perceived reference group opinion (1) “Please estimate, out of every 10, how many of your WeChat friends do you think support the 996 working system”; and (2) “Please estimate the percentage of your WeChat friends who support the 996 working system” ( $M = 2.57$ ,  $SD = 1.66$ , Cronbach  $\alpha = .88$ ) and its incongruence score ( $M = 1.57$ ,  $SD = 1.34$ ).

### **Network feature**

Network size was measured as the approximate number of WeChat friends by asking “Approximately how many friends do you have on WeChat” (Das & Kramer, 2013). And network heterogeneity was measured by subjective heterogeneity measurement based on Miyata et al. (2015) asking “Are your WeChat friends similar to you in way of thinking and behaving? ” (reversed coded) with answers 1 = *I am hardly similar to any WeChat friend*, 2 = *There are many WeChat friends I am not similar to*, 3 = *The number of WeChat friends I am not similar to is slightly larger*, 4 = *The number of WeChat friends I am similar to is slightly larger*, 5 = *There are many WeChat friends I am similar to*, and 6 = *I am similar to almost every WeChat friends* ( $M = 3.69$ ,  $SD = .94$ ).

### **Avoidance setting**

Respondents were asked to report the situation of using these functions from 1 = *Never*, to 5 = *Always*, “How often do you use the WeChat function as follow?”, (1) “Share to exclude”, (2) “Only 3 days are viewable by my friends”, (3) “Only 6 months are viewable”. And then summed these 3 items to create the index of avoidance setting ( $M = 7.96$ ,  $SD = 2.75$ ).

### Controls

Several control variables were included. Demographics like gender (male = 43.1%, female = 56.9%), age ( $M = 24.94$ ,  $SD = 5.72$ ), education (1 = high school and lower; 5 = doctor,  $M = 3.45$ ,  $SD = .64$ ), personal income per month (1 = lower than CNY5,000; 4 = 15,000 – CNY19,999; 7 = higher than CNY30,000,  $M = 2.00$ ,  $SD = 1.36$ ). Related experience like with internet or computer related work experience (45.1%) and internet or computer education experience (46.7%). And the media use to get the information about the 996 working system and its related discussion including TV, radio, newspaper, magazine, news website, news app, and social media, from 1 = *never* to 5 = *every day* ( $M = 2.55$ ,  $SD = .66$ , Cronbach  $\alpha = .80$ ).

### Result

For the statistical analysis, SPSS 25.0 and AMOS 25.0 were employed to do variables calculation and draw the structural equation model graph.

Figure 2 was the result of structural equation model analysis in a global view which indicated that, perceived mass media opinion incongruence was positively associated with perceived reference group opinion incongruence ( $\beta = .29$ ,  $SE = .06$ ,  $p < .001$ ) meaning H<sub>4</sub> was supported; There is no significant relationship between perceived mass media opinion incongruence and willingness to post ( $\beta = .07$ ,  $SE = .06$ ,  $p = n.s.$ ), willingness to repost ( $\beta = .11$ ,  $SE = .07$ ,  $p = n.s.$ ), and willingness to comment ( $\beta = .10$ ,  $SE = .06$ ,  $p = n.s.$ ), so H<sub>5</sub> and its sub-hypotheses were rejected. There is also no significant relationship between perceived reference group opinion incongruence and willingness to post ( $\beta = -.08$ ,  $SE = .07$ ,  $p = n.s.$ ), willingness to repost ( $\beta = -.03$ ,  $SE = .07$ ,  $p = n.s.$ ), and willingness to comment ( $\beta = -.03$ ,  $SE = .07$ ,  $p = n.s.$ ), so H<sub>6</sub> and its sub-hypotheses were rejected; As for network features, both network size ( $\beta = .10$ ,  $SE$



= .00,  $p = n.s.$ ) and network heterogeneity ( $\beta = .00$ ,  $SE = .06$ ,  $p = n.s.$ ) were not significantly related to fear of isolation, so H<sub>2</sub> and H<sub>3</sub> were not supported.

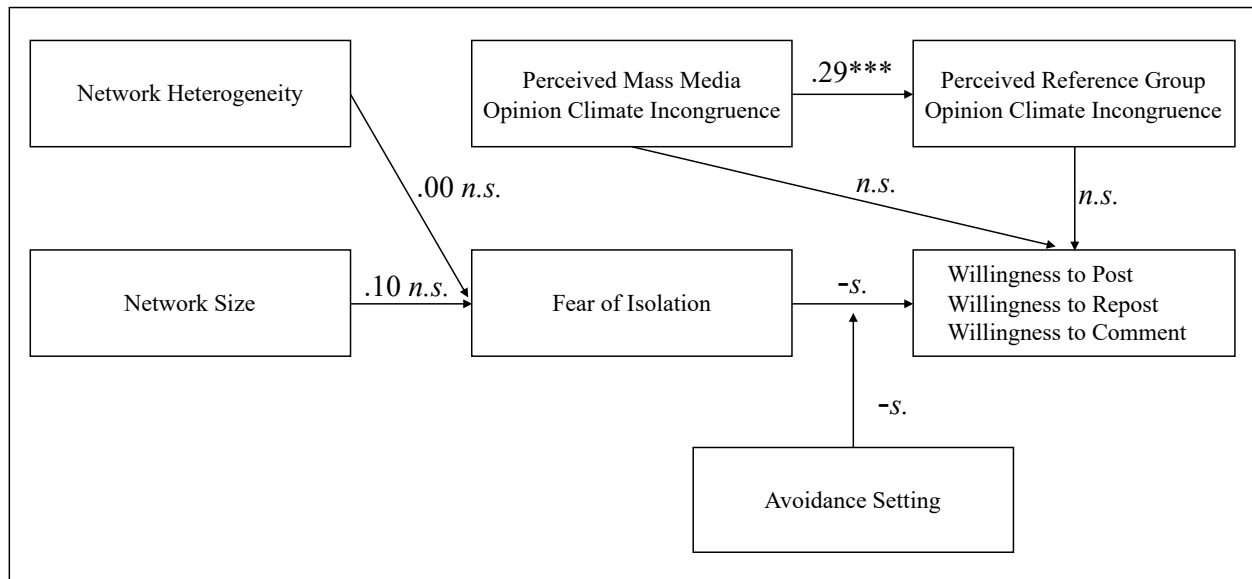


Figure 2. The result of the whole structural equation model where *n.s.* means not significant and *s.* means significant. \* $p < .05$ , \*\* $p < .01$ , \*\*\* $p < .001$ .

Figure 3 presented a local view of structural equation model analysis result releasing that, fear of isolation was negatively related to willingness to post ( $\beta = -.14$ ,  $SE = .10$ ,  $p < .05$ ), willingness to repost ( $\beta = -.15$ ,  $SE = .10$ ,  $p < .05$ ), and willingness to comment ( $\beta = -.20$ ,  $SE = .09$ ,  $p < .001$ ), so H<sub>1</sub> and its sub-hypotheses were supported which means that spiral of silence indeed exists on Chinese social media WeChat. About the moderating role of avoidance setting, results released that, avoidance setting could conditionally affect the relationship between fear of isolation and willingness to post ( $\beta = -.26$ ,  $SE = .01$ ,  $p < .05$ ), fear of isolation and willingness to repost ( $\beta = -.37$ ,  $SE = .01$ ,  $p < .001$ ), but not for fear of isolation and willingness to comment ( $\beta = .02$ ,  $SE = .01$ ,  $p = n.s.$ ). H<sub>7</sub>, H<sub>7a</sub>, and H<sub>7b</sub> were confirmed, but not for H<sub>7c</sub>. In other words,

avoidance setting could weaken the negative relationships between fear of isolation and willingness to post, and fear of isolation and willingness to repost.

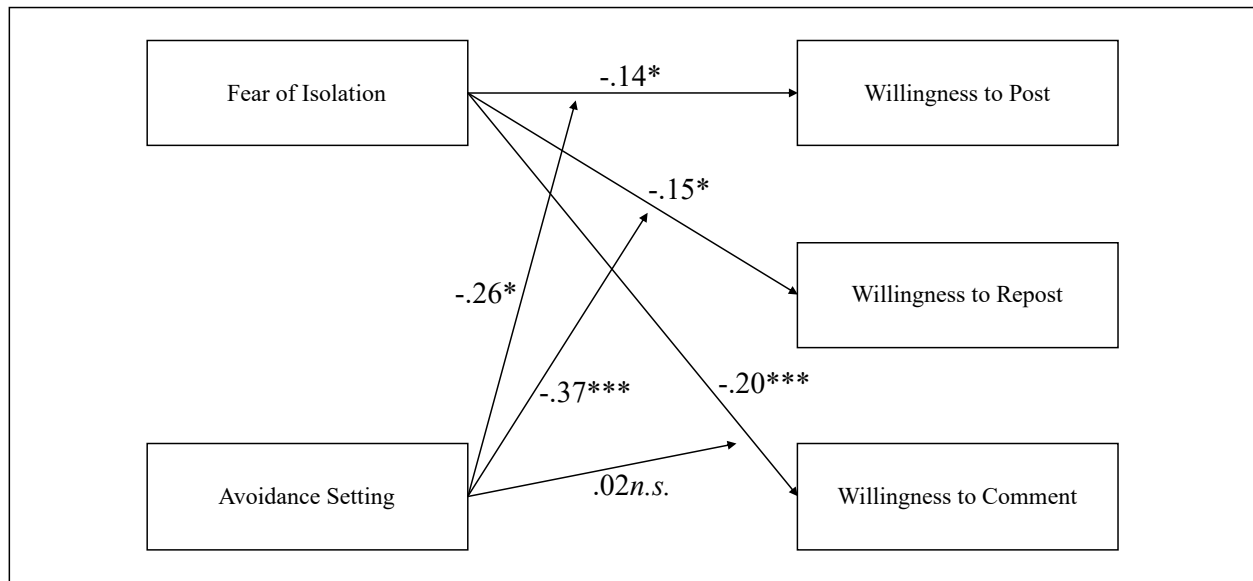


Figure 3. The result of structural equation model focuses on relationships between fear of isolation and willingness to post, willingness to repost, and willingness to comment, and the demonstration of moderating effect of avoidance setting.  $*p < .05$ ,  $**p < .01$ ,  $***p < .001$ .

Control variables were also included in the model where there were also some statistically significance relationships could be found. Gender was positively related to perceived reference group opinion incongruence ( $\beta = .17$ ,  $SE = .17$ ,  $p < .01$ ). Personal monthly income was negatively related to willingness to post ( $\beta = -.15$ ,  $SE = .07$ ,  $p < .05$ ) and willingness to comment ( $\beta = -.15$ ,  $SE = .07$ ,  $p < .05$ ). Media use had a positive relationship with willingness to post ( $\beta = .16$ ,  $SE = .14$ ,  $p < .05$ ) and a negative relationship with perceived reference group opinion incongruence ( $\beta = -.13$ ,  $SE = .12$ ,  $p < .05$ ). But this is only for controlling the model without any focus on these control variables in this study.

Table 1

*Relationships between control variables and endogenous variables in structural equation model*

	<i>Fear of Isolation</i>	<i>Willingness to Express</i>			<i>POCI-RG</i>
		Post	Repost	Comment	
<hr/>					
<i>Demographic</i>					
Gender	-.06	.06	.06	.10	.17**
Age	-.05	.11	.00	.01	-.08
Education	.03	.02	.03	-.07	-.03
Income	-.14	-.15*	-.11	-.15*	.07
<hr/>					
<i>Related Experience</i>					
Work / Intern	-.06	.07	-.01	.03	.10
Education	.07	.05	.00	.05	-.04
<hr/>					
<i>Media Use</i>	-.11	.16*	.06	.11	-.13*

### Discussion and Conclusion

Firstly, this study has confirmed that the spiral of silence could happen on Chinese social media WeChat. In fact, WeChat is a little different from some other mainstream social media platforms having been studied, Twitter, Facebook, and Chinese social media Weibo. Initially, WeChat was invented for instant messaging which is its main targeting function. Though with the development of mobile technology it has become more and more “social” and aiming to “share”, the differences still exist and can’t be ignored. Generally, the more fear of isolation people hold, the less possible they will express, and the post, repost, and comment also follow this pattern. These findings are inconsistent with Lin (2014) who draw the conclusion that “spiral of silence effect exists on Weibo but not on WeChat” using genetically modified foods as the

issue. While, researches using the same issue genetically modified foods in South Korea have confirmed the existence of spiral of silence both in a general environment (Kim, 2012) and an internet environment (Kim, Kim, & Oh, 2014). One possible explanation is that the issue and cultural factors may interact when we study on the spiral of silence, and the different result may be given. Secondly, the spiral of silence is nothing to do with the perceived reference group opinion climate incongruence and the network features. In other words, there is no relationship between the spiral of silence and peers. Dong (2016) pointed out that, WeChat provides a space allowing people to express their personal opinion which is difficult to be expressed physically and people are braver to reveal their inner feelings. This explained why the willingness to express won't be affected by peers and friends. Thirdly, perceived mass media opinion climate incongruence can't explain the decrease of the willingness to express. According to the statistic of media use of this research, social media is the main channel of getting information about the 996 working system, and social media is fragmented which is so different from state mass media. People may not get a macro perception of opinion climate for this reason.

Finally, a higher frequency of using avoidance setting can weaken the spiral of silence effect (the positive relationship between fear of isolation and willingness to express). If people's psychological needs of conflict avoidance could be satisfied in advance, people may not fear of isolation to a certain degree, and there would be a relatively weaker spiral of silence. While the researcher thinks, it still follows the original logic of spiral of silence. Because "conduct conflict avoidance in advance" is also a form of fear of isolation.

This research has both theoretical implication and practical implication. Theoretically, it advances the concept of willingness to express into three dimensions, post, repost, and comment under the online and social media context which may help understand this theory in a more

specific perspective, and it is indeed consistent with the new development and the differentiation of expressive behaviors on social media. The theoretical framework was also extended by the avoidance setting as a media affordance and found that conflict avoidance as a psychological mechanism and behavioral result is different from it as a media affordance (i.e. a psychological satisfaction in advance.). Practically, the findings may help people have a better understanding of the behavior of setting a different degree of avoidance on social media. Of course, the most important implication is that this research was conducted under the context of WeChat, a new research object for the spiral of silence.

Some limitations are also included. For example, this research used cross-sectional data as the sample, while spiral of silence is a dynamic and interactive process on the dimension of time, so panel data is needed. This research didn't pay any attention to two important concepts, "perceived majority" and "perceived minority".

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