

MASTER'S THESIS

An exploratory study on online communication media use and social networking practices among older adults in urban China

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Master of Philosophy

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**An Exploratory Study on Online Communication Media Use and
Social Networking Practices among Older Adults in Urban China**

HE Ranran

A thesis submitted in partial fulfilment of the requirements

for the degree of

Master of Philosophy

Principal Supervisor:

Prof. RUAN Danching (Hong Kong Baptist University)

April 2020

DECLARATION

I hereby declare that this thesis represents my own work which has been done after registration for the degree of MPhil at Hong Kong Baptist University, and has not been previously included in a thesis or dissertation submitted to this or any other institution for a degree, diploma or other qualifications.

I have read the University's current research ethics guidelines, and accept responsibility for the conduct of the procedures in accordance with the University's Research Ethic Committee (REC). I have attempted to identify all the risks related to this research that may arise in conducting this research, obtained the relevant ethical and/or safety approval (where applicable), and acknowledged my obligations and the rights of the participants.

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Date: April 2020

Abstract

The use of online communication media has increased dramatically over recent years, with people from different age groups becoming users of online communication media. Many scholars have become interested in how online communication media influence or even reshape people's social networking practices and social networks. Most existing studies on the impacts of online communication media are based on the observation of online practices of the general population or the younger population, while older adults are rarely taken into consideration. An increasing number of elderly people have become active users of online communication media and they may differ from younger people in many aspects such as networking strategies. Studying the elderly population may therefore enhance our understanding of the utility of online connectivity.

Based on 35 in-depth interviews of elderly WeChat users in urban China, which were conducted between December 2017 and March 2019, this study considers two major questions: (1) How do older adults use online communication media to network with their different social relations? (2) How do the online networking practices of older adults influence their social relations? The analysis focuses on two major issues to answer the second question: accessibility and the relational intimacy of social ties. By considering these two questions, this study aims to determine whether older adults become "networked individuals" or just stay "alone together" when they become active users of online communication media.

My findings show that how elderly people use online communication media to interact with their social ties is different from younger users and their unique networking strategies have different digital impacts on their social relations. Elderly people often lack opportunities to socialise due to their age-related conditions.

Online communication media can reduce their costs of manage social ties and serve an important channel to help many elderly users to (re)connect and develop their social ties, enhancing both the accessibility and relational intimacy of those social ties and help them to become “networked individuals”.

Keywords: online communication media, aging, social network, WeChat

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Chapter 1 Introduction

Our society has experienced a new revolution in social life with the prevalence of online communication media around the world (R. S. Ling, 2008; Rainie & Wellman, 2012). Mediated communication has been integrated into people's networking practices and has influenced and even reshaped how people connect with, maintain and develop their social relationships (Di Gennaro & Dutton, 2007; Licoppe, 2004; Rainie & Wellman, 2012). With nonstop connections in relationships and the continuous presence of interactants, online communication media provides new forms of connectivity in social relationship management. People can thus develop new strategies in their online social networking practices and their social relations can be reshaped during this process (Cui, 2016; Licoppe, 2004; Rainie & Wellman, 2012).

Most existing studies of the use and impacts of online communication media are based on the observation of online practices among the general public or the younger population (Di Gennaro & Dutton, 2007; Ellison et al., 2007; Utz, 2007). Most of these previous studies treat users of online communication media as one homogenous group when discussing digital impacts, and older adults are lumped together with the other age groups in these studies. (Rosales & Fernández-Ardèvol, 2016). Nowadays, people from different age groups all go online (Hill et al., 2015; Wang et al., 2018). According to Loe (2011) and Carstensen (1998), age differences have strong impacts on people's social networks and networking practices. In order

to enhance our understanding of how online communication affects people's social relations, it is of great importance to examine how age and its accompanying factors interact with the use of online communication media in social networking practices (Quan-Haase, Mo, and Wellman, 2017).

There is also a lack of discussion about WeChat, the newly emerging mobile phone-based online communication media. The rapid development of online communication technologies meant that mobile phone based communication media WeChat became popular, especially in greater China. The integration of this new kind of online communication media has the potential to greatly affect the social lives of older adults. It is thus important to pay more attention to the way that WeChat affects the social networks and networking practices of older adults.

This study tries to answer the following research questions. Firstly, how do older adults use WeChat to network with their different social connections? Secondly, how do the online networking practices of older adults affect their social relations? By considering these two questions, this study aims to identify the impact of online communication on the social lives of older adults. Once they become active users of online communication media, do older adults also become "networked individuals"? Do they feel "alone together" on WeChat? In short, this is a study of the digital impact on elderly people's networking practices and social relations.

This study approaches the question of digital impact on social relations by focusing on two major issues: accessibility and the relational intimacy of social ties (Rainie & Wellman, 2012; Turkle, 2017). Existing studies take similar stances on the positive impact of online communication media on relational accessibility, and

there is long-term debate about whether using online communication media could help users to better develop their relational intimacy. In terms of accessibility, Rainie and Wellman (2012, p. 103) argue that with “the possibility of a continuous presence and pervasive awareness of others in the network” provided by online communication media, social relations and the resources embedded with social relations, becomes much more accessible, and at the same time, online connectivity has the potential to create more time and opportunity for people to develop their relational intimacy (Rainie & Wellman, 2012). Some scholars have argued, however, that online connectivity may lead to an increased superficiality and unreliability of social relations, and make it more difficult for people to develop intimate relations (Turkle, 2017). In short, the different possible digital impacts on relational intimacy mean that people may become “networked individuals”, that is, individuals who are embedded with multiple, partial and diverse social networks and could actively mobilise and weave together their social relations (Wang et al., 2018, p. 683); or they may become “alone together”, meaning that they are tethered by an addiction to online communication and find it difficult to develop relational intimacy (Turkle, 2017).

The context of the current study is contemporary urban China. It is an exploration of online social networking practices among elderly Chinese WeChat users. WeChat is one of the most popular online communication media in China and had attracted 50 million active elderly users by 2017(Tencent, 2017). This study uses in-depth interviews with older adults who live in urban China and actively use WeChat for social networking practices. This method enables the researcher to collect detailed accounts of elderly people’s online social networking practices, with different types of ties, and the way that their aging situation affects their online

behaviours, along with their feelings and views regarding online communication media use and the changes brought by online communication media use. Thirty-five in-depth interviews were conducted between December 2017 and March 2019, including 22 female respondents and 13 male respondents.

There are eight chapters in this thesis: Chapter 1 provides a brief introduction of research questions. Chapter 2 offers a review of studies on aging and the social networking practices of older adults. Chapter 3 considers the existing discussion on online connectivity and its impacts on social relations, with a special focus on accessibility and relational intimacy, which provides the analytical framework of this research. Chapter 4 introduces the methodology of this study. Chapter 5, 6 and 7 provide the main findings of this study. Chapter 5 is about the forms and purposes of elderly people's online networking activities. Chapter 6 concerns the way elderly people network with different ties online, and how online communication affects their accessibility and their relational intimacy with these different ties. Chapter 7 provides accounts of the impact of online communication media on individual social life in an aging context. Chapter 8 summarises and discusses the research findings.

Chapter 2 Social Networks and Aging

2.1 Introduction

In this chapter, I discuss the issues of social networks in old age, with a focus on social network changes and social networking practices. Firstly, I shall give a brief review of the definition of social networks and important related concepts in social network analysis, which will serve as an analytical basis for the discussion of social network-related issues. I shall focus on social network changes in old age and analyse the changes in two dimensions: accessibility and relational intimacy. In the latter part of the chapter, I will pay special attention to the networking practices of older adults in developing tie accessibility and relational intimacy and discuss the distinction between primary and non-primary ties in social networking practices.

2.2 Social Networks and Important Concepts in Social Network Analysis

2.2.1 Social Networks and Social Ties

According to Knoke and Yang (2008, p. 8), a social network is a structure composed of a set of actors, who are connected by a set of one or more relationships. Network members are the units that are connected by social ties and these units are most commonly persons or organisations (Marin & Wellman, 2011, p. 11). These social ties including both formal and informal ties, can provide various kinds of social resources for people, such as social support, self-esteem, knowledge and identity (Brown & Harris, 2012; Cohen & Syme, 1985).

Social ties can be categorized in different ways like tie strength, roles and biological relations. When classifying social ties by roles, social ties could include ties with relatives, ties with coworkers, ties with children, etc. Some scholars also categorized social ties into two major groups, primary and non-primary ties. Primary ties are usually close kin ties, which consist of older adults primary source of support, while the other social ties are non-primary ties (Seeman & Berkman, 1988).

2.2.2 Closeness of Social Ties: Relational Intimacy

Personal social networks consist of ties of different degrees of closeness. Social ties with a high degree of closeness can be defined as close ties. Relational intimacy is often used to indicate the closeness of social ties (Burgoon & Hale, 1987; Hian et al., 2004).

Intimacy is defined as “a personal and subjective sense of connectedness” (Park, Jin, & Jin, 2011, p. 1975) and includes various components (Brehm et al., 1992, p. 4). Relationships with a high level of relational intimacy differ from more casual relationships in the following aspects: knowledge, caring, interdependence, mutuality, trust, and commitment (Brehm et al., 1992, p. 5). To be more specific, *knowledge* refers to the situation where people share more personal knowledge, such as their histories, preferences and feelings about their intimate relationships. Intimate partners *care* about each other and feel more affection for each other. *Interdependence* is when people frequently and urgently need their relationships with great intimacy, and *mutuality* means that intimate relations usually recognise themselves as “us” instead of “me”. Intimate relationships usually involve *trust*

with each other, the expectation that they will cause each other undue harm.

Finally, people usually have a high level of *commitment* to their intimate relationships, which means that they invest a great deal of time, effort and resources on their relationship maintenance and development (Brehm et al., 1992, p. 5).

Based on the conceptualisations discussed above, Moore et al (1998) proposed three sub-dimensions to examine relational intimacy: engagement, communication and shared friendships. Engagement refers to the degree to which a person feels connected and attached to their social ties. To be more specific, engagement evaluates whether people feel distant from their social ties or feel lonely when they are with their social ties. Communication means experiencing an open and fluent changes of ideas. In other words, communication as a concept examines whether people's social ties are listening to them when they have needs and can talk with their social ties about an endless number of things. Shared friends, as the final level of intimacy, refers to the extent to which people have shared social ties and participate in social activities with their mutual social ties (Constant et al., 2018).

2.2.3 Utility of Social Networks: Social Support

The term “social support” is often used to explain the utility of social networks,. According to Lin (1986, p. 9), social support is “the perceived or actual instrumental and/or expressive provisions supplied by the community, social networks and confiding partners”. The content of social support can be both tangible and intangible.

Content, direction and subjectivity are three major aspects used to categorise social support (Li et al., 2015). In terms of subjectivity, social support can be perceived and enacted (Barrera, 1986). Perceived social support refers to social support which individuals believe they can turn to others to get, while enacted social support is the actual supportive behaviours or acts (Barrera, 1986). Social support can be both received and provided, as social support is “an exchange of resources between at least two individuals perceived by the provider or the recipient to be intended to enhance the well-being of the recipient” (Shumaker & Brownell, 1984). Social support includes informational support, emotional support, material aid, advice, companionship, and so on. The properties and composition of personal networks largely determine people’s support network structures and the content of the support exchanged (Wellman, 1981).

Social support has the potential to moderate or buffer potentially negative impacts of daily problems or crises, and to improve personal well-being. Studies claim that social support can act as an intermediate variable in dealing with many daily problems like stress, and protect health directly or indirectly by reducing other health risks (Song et al., 2011).¹

The exchange of social support is an important form of networking activity through which people to maintain and develop their social ties (Loe, 2011). People can commit more to their relationships and become more emotionally connected during the process of exchanging social support, as a form of social interaction (House et

¹ It may be noted that the concept of social capital has a similar definition to that of social support. Social capital is defined as “resources embedded in a social structure which are accessed and/or mobilized in purposive actions” (Lin, 2002) and it also could be used to discuss the utility of social ties. As these two concepts overlap in their definitions, I choose to use the term “social support” only in this study.

al., 1988). People who often exchange social support are able to develop more intimate relationships with one another through mutual commitment and increased attachment. (Brehm et al., 1992).

2. 3 Social Networks in the Aging Context

2.3.1. Role of Social Networks in Old Age

As a broad concept, aging includes “physical changes in our bodies over adult life, psychological changes in our minds and in mental capacities, and social changes in how we are viewed, what we can expect or what is expected of us” (Atchley, 1987, p. 7). Accordingly, aging is not one process but many, and can bring about many outcomes which may be negative or positive. There are many different ways to define “old age” in academia. Some apply a chronological definition, using biological age to assign people into age categories, while the functional age definition uses observable individual attributes like appearance, mobility and mental capacity to define “old age” (Atchley, 1987, p. 11). In this study, I shall follow the chronological definition to categorise people into different age groups through their biological age. The terms “elderly”, “older people”, “people in late adulthood” and “people in old age” are used interchangeably to refer to people over 65 years old. As Atchley (1987) has argued, this approach may misclassify some people, but will make the research clearer. It is also more convenient for researchers who need to create summaries.

Social networks are of great importance in the aging process. Many studies have demonstrated the close relationship between social relations and well-being in old

age (Antonucci & Akiyama, 1987; Litwin, 2001; Tomaka et al., 2006). Elderly people with numerous direct ties have more potential routes to meeting their needs for social support, which leads to better health conditions and increased longevity (Berkman & Syme, 1979; Sugisawa et al., 1994). Frequent and high-quality interaction with these ties can further reduce the risk of depression and provide convenient access to immediate support when undesirable events occur (Fiori et al., 2006; Lin et al., 1985; Terhell et al., 2007; Voorpostel & Lippe, 2007). A high level of connectedness among members of personal networks is also positively associated with the well-being of elderly people (Cornwell et al., 2008; Hurlbert et al., 2000). It is argued that a high level of connectedness among network members encourages them to exchange support, share duties and effectively allocate resources, which brings greater access to support and a higher level of social integration for older adults (Hurlbert et al., 2000).

As various social ties are usually embedded with different types of social support (Wellman & Wortley, 1990), many gerontologists try to distinguish the roles of social ties through their relational properties (Litwin & Landau, 2000; Seeman & Berkman, 1988). Family ties, which consist of ties with close family members, including spouse and children, are usually considered one of the major sources of old age care (Connidis & Barnett, 2018). In many countries (especially in Asian countries), the informal support networks of elderly people are mainly centred around familial relations (Sung, 1991). These close kin ties work especially well in providing material aid (Chappell, 1983) and offering immediate support for older adults. Unlike primary ties, the major functions of non-primary ties, such as the ties with friends, neighbours and other same-age peers, include providing emotional and informational support (Chappell, 1983; Seeman & Berkman, 1988; Voorpostel

& Lippe, 2007). When the close kin ties are unavailable, however, or cannot be easily accessed in the case of widowhood or childlessness, elderly people may rely more on their extended network of non-primary ties for material aid (Barker, 2002; Connidis & Barnett, 2018, p. 162). Many studies have emphasised the important role of non-primary ties in the aging process in comparison with primary ties (Cantor, 1979; Chappell, 1983; Steed et al., 2007). According to Fiori and the colleagues (2006), the absence of family in the context of a friend-centred network is less detrimental than the absence of friends in the context of a familial network, from the perspective of the mental health of elderly people.

2.3.2 Changes in Social Networks in Old Age

Most current studies argue that the aging process goes hand in hand with instability, and a reduction in social networks, especially non-primary ties (Antonucci & Akiyama, 1987; Cornwell et al., 2008; Magai et al., 2003). According to Cornwell and the colleagues (2008), increasing age is related to smaller networks, less closeness with network members and fewer non-primary ties. This means that elderly people usually experience a decrease in both the accessibility and relational intimacy of social ties. It does not mean, however, that the aging process has a universally negative effect on social relations. Elderly people's increased emphasis on relational intimacy may lead them to pay more attention to the relational intimacy of some specific close ties (Carstensen et al., 1999). In general, decreased physical mobility, changes in social roles, increasing selectivity in social relations and the ability for support exchange works together, leading to social network changes in tie accessibility and relational intimacy in late adulthood.

Changes in the Accessibility of Social Ties

Elderly people may experience a decrease in accessibility to social ties, especially non-primary ties in their old age. According to Antonucci and Akiyama (1987), most elderly people are able to maintain stable ties with primary ties. Non-primary ties, however, are hard to maintain when people get old. Many elderly people lose contact with their non-primary ties, which are based on specific social settings, such as ties with work colleagues.

Scholars argue that changes to the accessibility of social ties in old age are due to physical limitations and role loss. People may face decreased physical mobility, chronic illness and physical impairment in their late adulthood, which greatly reduce their chances to participate in many networking activities and interact with their social ties (Magai et al., 2003). At the same time, physical limitations such as a decrease in mobility, and life events changes such as retirement, mean that people may no longer take on some roles or are unable to fulfil a role requirement, which leads to a decrease in tie accessibility (Wrzus et al., 2013).

Changes in Relational Intimacy

Elderly people usually pay more attention to relational intimacy than the quantity of social ties, although they also face difficulties in developing intimate relations. Studies have indicated that people place much more emphasis on relational intimacy in their close ties in their late adulthood. They focus more on the quality rather than the quantity of social ties (Lang et al., 1998). At the same time, however, they need to overcome many limitations in developing relational intimacy with their

social ties (Wrzus et al., 2013).

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Difficulties in developing relational intimacy are due to the inability in participate in social networking activities and exchange social support with many social ties. As mentioned above, physical limitations and role loss mean that elderly people often find it difficult to participate in many networking activities and interact with social ties (Magai et al., 2003). They thus lack opportunities to build trust and develop affection with their social ties. Social exchange theory assumes that people may constantly evaluate their ties by comparing the support given and received (Blau, 2017; Thomése et al., 2005). Under this notion, the reciprocity of relationships determines the future of the relationship. Older adults may face difficulties in maintaining the balance of their relationships because their decreasing physical mobility and worsening health conditions may hinder them from providing support for others (van Tilburg, 1998). It is thus difficult for older adults to develop relational intimacy in their social ties. It is also worth noting that in this imbalanced exchange in people's old age, close kin ties are more stable than non-primary ties, because these primary ties might be over-benefited from the elderly people when they are younger while the relational intimacy of non-primary

ties might be hard to maintain and develop when the reciprocal exchange ends, due to the lack of opportunities or capacity to exchange support(Ikkink & van Tilburg, 1998).

2.3.3 Elderly People's Social Networking Activities

Although people often face restrictions to networking with others in old age, this does not mean that they only experience social network changes passively. According to Cook(2018), the ways that older people construct, maintain and enrich their social networks are not simply defined by “old age”, but as “part of their life-long, ongoing aging process”. In other words, old age is a period of time where older adults face both changes and new possibilities in their social networking activities. On this basis, I will discuss several typical networking activities in which elderly people participate to enhance their accessibility and intimacy of their social ties.

Many researchers have directed their efforts to exploring the practices adopted by older adults to enhance the accessibility and intimacy of their social ties. In addition to the most common networking practice, one-to-one interaction, scholars identified group-based activities as an important form of social networking activities. Group-based activity is demonstrated as beneficial in helping elderly people maintain and extend the accessibility of social networks(Hagan et al., 2014; Pettigrew & Roberts, 2008). It can be roughly divided into two categories, group gathering and community engagement. Group gathering is usually informal gathering. It usually takes the forms of a lunch, dinner or meeting of a group of peers or friends. These social networking activities are often held in the public

establishments such as restaurants and coffee shops (Loe, 2011). Community engagement can involve both non-religious communities, such as reading clubs and religious communities (Loe, 2011; Pettigrew & Roberts, 2008).

In addition, some scholars categorized social networking activities by their contents (e.g. business networking activities, support exchange activities, etc.) and identified support exchange activities as older adults' most important social networking activities (H.-K. Kim et al., 2000). Support exchange activities refer to receiving and providing support with social ties and it could happen in both group setting or one-to-one interaction. During this process, elderly people can strengthen their bonds with their social ties (Loe, 2011, p. 197). For older adults, they are in a strong need for social support, as they face decreased mobility and physical setbacks (Chappell, 1983; Golden et al., 2009). Thus, older adults preferred networking with each other by exchanging support (Kim et al., 2000).

2.3.4 Elderly People's Networking Practices with Different Ties

The way that elderly people maintain and enhance their tie accessibility and relational intimacy with primary or non-primary ties differs due to their different expectations of relationships. As the theory of socio-emotional selectivity argues, elderly people emphasise the importance of relational intimacy when managing their social relationships with both primary and non-primary ties (Carstensen et al., 1999), however they have different social expectations of these ties, which leads to the adoption of different practices.

For older adults, the accessibility of primary ties is more stable than other social

bonds, although there are still face some challenges. Elderly people's primary ties, namely ties with close family members are usually embedded with a sense of obligation and the tradition of filial piety, especially in the Asian context(Sung, 1991). Elderly people's accessibility to their primary ties may thus be relatively easy to maintain. Maintaining primary ties can also be difficult, however, particularly in the context of neglect and family tension. It also can be challenging for elderly people who face decreased mobility to offer assistance to their younger family members(Loe, 2011, p. 183). At the same time, there are variations in their expectations of primary ties due to different family structures (Townsend, 1963, p. 93), class, social structure, and so on.(Swartz, 2009).

Most older people look forward to establishing a balance between tie closeness and independent living (Loe, 2011; Swartz, 2009). This means that in the most cases, elderly people expect to have a "family-centered, intergenerational" social life (Loe, 2011, p. 183); so they actually give priority to maintaining their intimate relations with their primary ties and put effort into connecting with their children and spouses. At the same time, some older adults insists on keeping their own independence and avoiding a purely care recipient role, as per a classic sociology study on the family life of old people, which argues that what elderly people expect is "intimacy at a distance" (Townsend, 1963) .

Elderly people want to spend time with their primary ties on a regular basis. As some older adults do not live with their children, they may seek regular social engagement with family members, such as regular dinner dates and visits to each other's home; these visits and dinners are opportunities for them to catch up with the health and well-being of their primary ties (Loe, 2011, p. 184). When their close

kin ties do not live in the same city as they do, elderly people may use the various forms of communication media to create a sense of co-presence, in order to maintain the close bonds and keep up to date with each other (Baldassar, 2008). Elderly people may also try to avoid overly frequent communication and interaction with their children because they are afraid of bothering their “busy children” (Loe, 2011).

Another way that that elderly people often use to maintain and increase relational intimacy with primary ties is providing assistance socially, financially and emotionally, for their primary ties (Loe, 2011, p. 185). They voluntarily and willingly seek the chance to offer assistance to their primary ties (Aldous, 1987), according to the vast literature on the flows of care from the elderly to the younger generation through familial ties (Aldous, 1987; Swartz, 2009). Caring for grandchildren and running errands for their primary ties are two common means that many elderly people use to maintain their primary ties through offering help. Offering to care for grandchildren is a chance for elderly people to have more communication with their children and also build strong emotional bonds with their grandchildren. Running errands for their primary ties, including various services such as delivering documents, cooking food and helping with transport, can help elderly people achieve “intimacy at a distance”, which means elderly people are emotionally closer to their primary ties by meeting them and helping them (Loe, 2011, p. 190).

Maintaining and increasing the accessibility of non-primary ties can be more difficult and complicated than for primary ties. As non-primary ties are usually not embedded in strong biological bonds and role obligation, there are usually neither

strong formal nor informal rules that govern whether these relations are expected to continue or to end. The future of non-primary ties is thus ambiguous for the elderly (Matthews, 1986, p. 59).

Elderly people's expectations of non-primary relational intimacy may be varied. Some maintain or enrich their social networks only in order to fulfil their need to connect with the outside world, while some tend to develop much more intimate or even quasi-kinship relations to obtain long-term companionship and exchange emotional support (Loe, 2011). As there are many sub-types under the categories of non-primary ties, such as relative ties, ties with co-workers and ties with former schoolmates, the strategies that elderly people use may also be different.

Older adults maintain and increase the accessibility and relational intimacy of non-primary ties in two major ways. Some older adults choose to make a commitment to particular ties and act over the long term to ensure their survival (Matthews, 1986, p. 60). These commitments include regular visits, support exchange and extensive contact through communication media. Older adults may also sometimes rely on favourable social contingencies to maintain and enrich their ties. This requires less commitment. Social contingencies include the various forms of group-based activities, the same choice of retirement home, the creation of old schoolmates organisation, and so on (Matthews, 1986, p. 62) These two tactics are not exclusive, and usually strengthen each other (Matthews, 1986, p. 60).

The different expectations that older adults have of relational intimacy explains their different practices and degrees of commitment. When elderly people reach out to their non-primary ties mainly to stay connected with the outside world and deal

with loneliness, rather than to develop intimate relationships, they often try to gain or strengthen their group membership and rely on these group contingencies to facilitate their social networking practices (Hutchinson et al., 2008; Loe, 2011, p. 132). These activities can ensure their greater accessibility to social ties. They are able to make new friends, keep in touch with the existing ties, and also reactivate the old ties. For example, joining groups of old schoolmates and attending alumni activities can help older adults to reconnect with many old friends and strengthen their emotional bonds with existing ties (Matthews, 1986, p. 64). Some elderly people may also expect to maintain or develop a more intimate or even quasi-kin relationships which can stably provide companionship and support (Loe, 2011, p. 193). These expectations require a higher degree of commitment in networking activities and more one-to-one contacts. For example, in the group-based activities, they need to commit more to the group. They may serve as the “pillar” of these groups or communities, have more personal contacts with group members or actively organise group activities (Matthews, 1986, p. 65). Older adults may also devote more time to building emotional connections using methods such as extensive story sharing (Heliker, 2009), frequent communication and care exchange (Barker, 2002; Matthews, 1986, p. 61).

In summary, older adults adapt in different ways to maintain and develop their accessibility to, and relational intimacy with, their primary and non-primary ties. Most older adults can easily access their primary ties, and they usually spend time with them regularly and provide assistance to their primary ties in order to develop relational intimacy. Maintaining and increasing accessibility and relational intimacy with non-primary ties, however, is more challenging. They may need to make long-term commitments to their social ties or rely on

favourable social contingencies such as group occasions. Their choices of social networking activities are based on their expectations of these non-primary ties. When they simply want to stay connected with the outside world and deal with loneliness, they usually rely on group contingencies, but when they expect to develop a more intimate relationship, they usually commit more to networking activities and devote more time to building emotional connections.

2.4 Conclusion

This chapter has introduced the basic concepts of social networks and social support, shown how personal social networks change in old age and how older adults network with different ties in the offline environment. Studies on the social networks of elderly people demonstrate that age and its accompanying factors reshape elderly people's social ties and change their offline networking practices. Elderly people need to deal with many difficulties in maintaining and developing tie accessibility and relational intimacy in old age. Their choices of networking strategies vary according to the characteristics of these social ties and their social expectations of these ties.

There are several major factors which affect the tie accessibility and relational intimacy in elderly people's social networks: decreased physical mobility, changing social roles, support exchange and increased selectivity (Carstensen et al., 1999; Loe, 2011; Magai et al., 2003). Decreased physical mobility and loss of social roles reduced the opportunity for elderly people to have substantive interaction with their social ties, which may lead to the decreased accessibility of social ties and also

bring difficulties in developing relational intimacy. Increased difficulty exchanging support may hinder older adults from developing intimate relationships, while increased emotional selectivity means that elderly people put more emphasis on relational intimacy.

Elderly people develop their own ways to network with their social ties according to their ageing situation. In addition to one-to-one interaction, elderly people usually adopt group-based activities to maintain the accessibility and relational intimacy of their social ties in an efficient way. On the other side, participating in support exchange activities can satisfy elderly people's needs for social support.

It is worth noting that elderly people's social networking practices with various ties differ according to the characteristics of and expectations for these ties. Elderly people expect to have an intimate and intergenerational bond with their primary ties. At the same time, they want a balance between closeness and independent living (Loe, 2011; Swartz, 2009; Townsend, 1963). Elderly people thus tend to spend time with their primary ties on a regular basis through family dinners or visits, but in most cases they do not want to bother their close kin ties to any great extent (Loe, 2011, p. 184). Conditions for the maintenance and development of social networks with non-primary ties differ according to social expectations. In some cases, elderly people just want to maintain their access to non-primary ties, while in other cases, they expect to build intimate or even quasi-kin relationships. When elderly people reach out to non-primary ties to stay connected with the outside world and deal with loneliness, rather than to develop a high level of relational intimacy, they often try to gain or strengthen their group membership and rely on these group activities to maintain social connections (Hutchinson et al., 2008; Loe,

2011, p. 132). When elderly people expect a more intimate relationship with non-primary ties, they may apply methods such as extensive story sharing (Heliker, 2009), frequent one-to-one communication and intensive care exchange (Barker, 2002; Matthews, 1986, p. 61) in order to develop relational intimacy.

Chapter 3 Online Communication Media Use, Social Network and Aging

3.1 Introduction

In this chapter, I shall focus on the way that online communication media affects social networking activities, social relations and individual social lives. After a brief introduction of basic definitions and current mainstream online communication media, I shall talk about online connectivity and how it constructs people's online networking activities. I shall then review the long-time discussion on how online communication media affect people's social relations. The discussion will focus on two issues, the accessibility and relational intimacy of people's social ties. I will then extend the discussion to the individual level, exploring how digital impacts on social networks relate to individual social lives, and specifically whether the use of online communication media reshapes people's personal lives by turning them into "networked individuals" or making them "alone together". Lastly, I shall review studies on the adaption and use of online communication media in old age.

3.2 The Definition of (Online) Communication Media in ICT Studies

Information communication technology (ICT) is an umbrella term that includes all kinds of communication devices and applications, and encompassing various communication technologies, such as radio, cellular phones, and computer-mediated technologies (Rouse, 2005). ICT studies thus cover a wide range of topics related to a variety of information technologies.

The term “communication media” specifically refers to the tools mainly used for interpersonal communication. As a type of ICT, communication media is defined as the means of delivering and receiving data or information and interpersonal communication (Janssen, 2013). It includes traditional communication media such as letters, landline phones, and text messages, and online communication media such as instant messaging tools. The development of communication media has added new channels for interpersonal communication and made people increasingly connected (Rainie & Wellman, 2012, p. 145).

Over the past two decades, our society has experienced a revolution in social life due to emerging forms of online communication media (Ling, 2008; Rainie & Wellman, 2012). Online communication media, or internet communication media, are based on an internet connection. Media for online communication includes e-mail, chatrooms, and instant messaging tools such as WeChat and WhatsApp, and Skype. The prevalence of smart phones over recent years (Humphreys, 2013; Turkle, 2017) means that online communication media is no longer based only on computer-mediated technologies. Mobile-phone based online communication media, especially instant messaging applications, have become one of the mainstream communication media in current society (H. Kim et al., 2007; Turkle, 2017). Mobile-based online communication media such as WeChat and WhatsApp enables users to send and receive images, videos and audio messages in real-time to individuals or groups. This new type of online communication media, in comparison with traditional offline mobile communication media such as text messages, is more conversational and reconstructs the space and time of communication (Church & de Oliveira, 2013; Ling, 2017). The increasing mobility and real-time interaction that is provided by the mobile device should be taken into

consideration when it comes to online communication media in current society.

3.3 Online Connectivity and Online Networking Practices

3.3.1 Online Connectivity

A review of the current literature in communication media studies shows that online communication media introduces a new type of connectivity, which reshapes people's social networking practices (Cui, 2016; Haythornthwaite, 2005; Licoppe, 2004; Rainie & Wellman, 2012). Scholars have termed this new connectivity "perpetual connectedness" (Rainie & Wellman, 2012, p. 100) or "connected presence" (Licoppe, 2004, p. 18). Although termed slightly differently, these new concepts both argue that the use of mobile-phone-based online communication devices enables the prolonged and elaborated presence of its users (Christensen, 2009; Licoppe, 2004; Rainie & Wellman, 2012). "Perpetual connectivity" emphasises the instant accessibility of social ties (Rainie & Wellman, 2012), while "connected presence" stresses constant connectivity, which allows prolonged and frequent conversation (Cui, 2016; Licoppe, 2004). These two terms, although they have different emphases, involve similar descriptions of online connectivity.

Online connectivity also causes "pervasive awareness" (Hampton et al., 2011, p. 121). When people are on the same media platform, they may have more awareness of their online friends' activities and interests through their posts or messages in group chats. The idea of "pervasive awareness" further underpins the content of online connectivity by indicating the functions of posting and group chats on online communication media (Hampton et al., 2011; Quan-Haase, 2007). Hampton (2011)

points out that online groups and networking sites provide “pervasive awareness” for the members of networks: when people are on the same media platforms, they may have more awareness of their online friends’ activities and interests through their posts or messages in group chats. The use of online communication media can thus enhance people’s relationships by providing more information about each other. The idea of “pervasive awareness” further develops online connectivity by observing that it doesn’t only take place through one-to-one online interactions, but also can be found in group discussion and posting.

3.3.2 Mediated Social Networking Activities

Social networking activities like one-to-one interaction, group activities and support exchange activities could be mediated by online communication media (Loe, 2011). With the use of online communication media, these social activities are no longer restricted by offline distance, for instead, these activities could turn to online version or facilitate the coordination of offline activities.

The introduction of online connectivity reshapes one-to-one interaction. With the use of online communication media, people could have one-to-one private talks with their social ties anytime they want and their interaction go beyond the limitations of geographical distance. Also, scholars mentioned that comparing with traditional communication media, online communication media allows short but continuous and frequent interaction, where people more often express their states or emotions with each other (Axelsson, 2010; Licoppe, 2004).

As well as one-to-one interaction, group-based activities may be no longer be confined to offline face-to-face interaction among people in close proximity. Online

communication media, such as instant messaging applications, usually have grouping functions which allow people to gather together and interact in online groups. A new mode of group gathering has emerged through this function, where people need not to be at a precise place at a precise time (Ling, 2017; Rainie & Wellman, 2012, p. 107). Online interaction can also help group members to coordinate offline gatherings. Online communication media enables group members to have multiple channels with which to frequently interact and communicate with each other. When relationships can be maintained both online and offline, a group member's closeness to the online community as a whole will be greatly enhanced (Sessions, 2010).

Online communication media also facilitate support exchange activity among social ties (Ellison et al., 2014; Stefanone et al., 2012). The "perpetual connectivity" provided by the internet and mobile phones means that people can more effectively organise support exchange activities, and exchange informational, emotional and material support with their social ties (Hampton & Wellman, 2003). The users of online communication media may form a new "social neighbourhood" online based on their personal networks and online connections, which can function as a physical neighbourhood in seeking and providing help and information when emergencies arise. This online "social neighbourhood" can enable people to reach out to many social ties for support in a short period of time (Rainie & Wellman, 2012, p. 145).

3.4 The Impacts of Online Connectivity on Social Relations

The interplay between online connectivity and changes in social relationships has

triggered long-term discussion among scholars in media studies. Their analysis mainly focuses on two aspects: tie accessibility and relational intimacy. Most scholars share similar views on the impacts of online communication on tie accessibility (Hampton et al., 2011; Licoppe, 2004; Rainie & Wellman, 2012), however some scholars argue that online communication media can help people to build intimate relationships (Rainie & Wellman, 2012), while some other scholars think online communication media use will have negative impacts on relational intimacy (Turkle, 2017).

3.4.1 Impacts of Online Connectivity on the Accessibility of Social Ties

Most scholars have argued that this new connectivity will reduce costs for people maintaining contact with their social ties (Chen, 2013; Cui, 2016; Hampton et al., 2011; Rainie & Wellman, 2012), and with distant or new ties (Quan-Haase, 2007). Without the use of online communication media, maintaining access to non-primary ties requires great commitment to offline activities such as frequent face-to-face interaction (Matthews, 1986), which entails a great deal of time and effort. The use of online communication media can greatly reduce the time required for people to maintain connections with their relationships, as online connectivity can help people interact with their ties through only a few taps on the mobile phone (Hampton et al., 2011; Rainie & Wellman, 2012). People can also continuously reach out to their social ties through online encounters, so physical distance is no longer a huge barrier to people gaining access to their social ties (Rainie & Wellman, 2012).

With the help of online communication media, people can also conveniently access

and mobilise their large and multiple-layered networks. There are different groups of people (e.g. colleagues, families, people with shared interests) in different layers of networks, to interact and communicate with. Before the integration of online communication media, these multiple layers of networks existed but were related to much more offline commitment, and efforts to maintain these social layers. The use of online communication media reduces the cost of maintaining these multiple network layers. People can then conveniently activate these layers when the needs arise (Hampton et al., 2011; Rainie & Wellman, 2012).

People's addiction to online communication media may hinder them from gaining access to social ties which do not migrate to online communication media. The long-term use of online communication media may reduce the time people spend on more substantial interaction. According to Nie and colleagues (2002), nonstop online interaction may distract people from engaging in other forms of interaction, such as face-to-face interaction. When people spend a great deal of time in online interaction, they thus may lack opportunities to reach out to offline social ties.

3.4.2 The Impacts of Online Connectivity on Relational Intimacy

Scholars have differing opinions on whether the use of online communication media can help people build intimate relationships. With the prevalence of online communication media, some scholars argue that people can conveniently develop close and intimate social ties through online co-presence (Huan et al., 2004; Rainie & Wellman, 2012), while some researchers worry about the decreased relational intimacy caused by a long-term virtual presence on online communication media

and people becoming “alone together” in the online environment (Turkle, 2017).

Some studies have argued that the use of online communication media can help people to build intimate relationships (Hian et al., 2004; Park et al., 2011; Rainie & Wellman, 2012). They point out that the increased accessibility to social ties may also lead to an increase in relational intimacy. The use of online communication media can provide easy access to social ties, and people can continually reinforce their relationships with those they have encountered, despite the physical distance (Rainie & Wellman, 2012).

It is also argued that online communication media allows individuals to develop relational intimacy by constructing an ideal self. According to Walther (1996), people may select networking behaviours that are more stereotypically desirable in achieving social goals and transmit messages free of the “noise” of appearance or behaviour features, so that they can create more a desirable self and may also assign magnified positive values to their online ties. People can develop a sense of closeness and rapport through long-term online interaction based on the interplay of idealisation and self-presentation (Hian et al., 2004; Walther, 1996).

Some researchers take a somewhat negative stance towards digital impacts on relational intimacy (Nie et al., 2002; Turkle, 2017). Their reasons are twofold. Firstly, ties maintained and developed online may have a high level of fragility. As online communication lacks ways to guarantee the long-term maintenance of connections, people can easily stop their online interaction with online friends or groups simply by remaining silent or quitting groups. They also cannot rely on distant online ties for instant help (Nardi, 2010; Rainie & Wellman, 2012, p. 130). Secondly, these scholars have a different understanding of selective representation

in online communication media. Turkle (2017, p. 16) argues that online communication media prompts users to keep responses short, and to present a “second self” which is far better than their real self, which makes online connections less reliable. Turkle (Turkle, 2017) worried that online ties will become superficial, because it is hard to for people to have a comprehensive understanding of their social ties during ta process of short and selective interaction. Although being online enables users to maintain active contacts with sizeable networks of social ties, online communication media does not have the advantages of developing intimate and reliable personal networks. These concerns, scholars argue, mean that online communication media use does not have the advantage of developing an intimate and closely connected personal networks. Although people are online together, they are still isolated.

This debate offers two kinds of understandings of online interaction, with divergent views on whether online interaction is useful for improving relational intimacy. Some scholars believe that the instant and prolonged connectivity provided by online communication media can help develop intimacy, while some other scholars doubt that online communication can guarantee the long-term maintenance of intimate relations, as it enables people to stop interaction whenever they want. They also have different explanations for the results of selected self-representation in the online environment. One side consider it a good way to create a desirable self-image and build close online relationships, while the other side argue that this selected self-representation reduces the reliability of social connections.

3.5 To Be a “Networked Individual” or “Along together”

These divergent arguments about how the use of online communication media reshape social relations, and especially the development of relational intimacy, lead to further discussion about the way online communication media reshape individual social lives. Scholars have noted two possible impacts of the integration of online communication media in individual life. Online communication media can help people to become “networked individuals”, and intensive online communication media may lead people to remain “alone together” in the online world.

Some scholars point out that the active use of online communication media can help people become “networked individuals”. A “networked individuals” are people who “have multiple, partial and diverse social networks where the fluid connections afford them the ability to navigate through their everyday activities with different people for different purposes” (Wang et al., 2018, p. 683). Some scholars argue that the use of online communication media can help people to develop both access to ties and relational intimacy, that people are able to have many and diversified personal networks, and are more intimate with their social relations. with Communication media enables people to reach out to interact and exchange resources with numerous and diverse others, simultaneously. (Rainie & Wellman, 2012). The active use of online communication media may thus reshape an individual’s life by turning them into a “networked individual”.

Some scholars have argued that other possible impact of online communication media adoption is that people may become “alone together” after the active use of

online communication media, and that their lives may become tethered by online connections (Turkle, 2017). Turkle (2017) uses the term “alone together” to depict individuals in the digital era who spend most of their time in online interaction and are not able develop intimacy with social ties. It is difficult for people to generate intimacy with others through online communication media due to the fragility and unreliability of online connections. When they spend a great deal of time on interacting with online ties, people have less substantive offline interactions and fewer intimate and reliable relationships. Although it seems that people can easily reach out to many ties in the online environment, they are still alone and their level of insecurity and anxiety about social isolation may even increase.

3.6 Online Communication Media and Social Relations in the Old Age

As online communication media proliferate in people’s everyday lives, older adults also have more available communication methods in addition to the traditional communication media (Yuan et al., 2016). Although researchers of the digital divide argue that older adults continue to lag behind the younger generation in the adoption of newly emerging online communication media (Rainie, 2016), it is hard to ignore the fact that increasing numbers of elderly people are going online and engaging in online social activities (Nimrod, 2010). According to the statistics, older adults show the highest growth rate for mobile ICT adoption (Smith, 2014). The gap in terms of the penetration rate for younger and older users is predicted to keep narrowing (Lee et al., 2014, p. 55). Some scholars have started to pay attention to the online practices of elderly users, and these studies have considered elderly people’s online network patterns and the impacts of online use on social life (McMellon & Schiffman, 2002; Quan-Haase et al., 2017; Wang et al., 2018; Yuan

et al., 2016).

Older people have different social network patterns to younger users. Younger adults have more active connections than elderly users because of their heavier use of online communication media. They send more messages to their online ties, whereas text messages are not common among older users (Axelsson, 2010). Pfeil and associates (2009) studied the group characteristics of online friends on social networking site MySpace, and argued that young people's online friend networks are usually larger than those of older users, while older users have more diversified networks in terms of the age distribution of their online friends. We can thus argue that different life stages play an important role in shaping people's online social networks.

Some scholars have discussed the way that online communication media influence the social relationships of older adults. As found in studies of the general population, elderly users consider online communication media to be a handy and low-cost way of maintaining and strengthening relations through "connected presence" (Quan-Haase et al., 2017). Online communication media work especially well in enhancing elderly people's accessibility to social ties through the use of online groups (Quan-Haase et al., 2016; Wang et al., 2018). This kind of online interaction within groups allows elderly people to arrange events and get-togethers with group members (Wang et al., 2018). Online communication media use has the potential to enhance the relational intimacy of older adults'. Kanayama's (2003) study of the use of online forums found that elderly people have the opportunity to create a sense of emotional propinquity with online friends by sharing stories and memories online. Wang and colleagues' (2018) also note that the use of online communication

media can further strengthen older adults' existing social networks.

Most studies have only indicated these differences, however, without building a link between aging and online networking practices, and rarely pay attention to how older adults network with their different social ties. In other words, aging is usually related to many changes in social life, such as a decrease in physical mobility, increased selectivity in social ties, the reduction of social networks, and so on, but studies have not talked about how these changes to social life in late adulthood interact with the online communication media use of elderly users (Rosales & Fernández-Ardèvol, 2016). Even when they discuss the digital impacts of online communication media on older adults' networking practices, they do not focus on the process of their networking practices or distinguish different ties.

3.7 Other Influential Factors: Gender and Socioeconomic Status

In addition to age, gender and socio-economic status (SES) can also influence people's online communication media use and their online networking activities. Many studies identify gaps and differences between online communication media users of different gender and SES status.

There are many studies of the gender gap in the use of online communication media. a branch of studies examines gender differences in online communication media participation rates. Most studies note that women have significantly lower online communication participation rates than men (Antonio & Tuffley, 2014; Robinson et al., 2015). This is a result of entrenched socio-cultural attitudes about women's role in society, especially in developing countries (Antonio & Tuffley, 2014). In

terms of user habits, studies note that compared to male users, female users have a lower intensity of online communication media (Hargittai, 2010) and a narrower range of online activities (Haight et al., 2014). Women are more likely to use online communication media for interpersonal interaction and social support, however (Cotten & Jelenewicz, 2006). They place a greater emphasis on forging connections with others and building a sense of community during their online communication media use (Correa et al., 2010)

The integration of online communication is also reported to affect people with different socio-economic status differently. In most cases, people with higher SES have higher-level online communication media use skills than their lower SES counterparts. They are also more likely to use online communication media for diverse types of activities (Hargittai & Dobransky, 2017). People with higher SES status increasingly gain access to more information through online communication media than their lower status counterparts (van Deursen & van Dijk, 2014). A study of undergraduate students of different SES status found that although SES is not related to more opportunities for social networking practices, those students with higher SES could obtain more resources through online networking practices (Brooks et al., 2011).

In summary, the above studies demonstrate that gender and SES play important roles in people's online communication media use. Differences in gender and SES status can lead to different levels of online communication media integration in individual social lives. The investigation of online communication media and its impact on social networks thus need to take users' gender and SES into

consideration.

3.7 Summary

In summary, the digital impacts on individual networking practices, social networks (accessibility and relational intimacy of social ties) and individual social life has been discussed in the literature.

Online communication media reshapes people's practices in relationship management by introducing a new type of connectivity (Cui, 2016; Haythornthwaite, 2005; Licoppe, 2004; Rainie & Wellman, 2012). Online connectivity provides nonstop and prolonged connections for individuals (termed "perpetual connectivity" or "connected presence") and also a "pervasive awareness" of their online ties, through reading online posts and participating in group chats.

The discussion of the impact of online communication media mainly about involves two aspects, accessibility and the relational intimacy of social ties. It is widely agreed that online communication media can enhance the ability to reach out to multiple social ties and effectively manage and mobilise social ties and resources (Chen, 2013; Wang & Wellman, 2010). Scholars have divergent views, however, on whether online communication media can help people to effectively enhance their level of intimacy of social ties. Scholars with optimistic views see a connection between the increased accessibility of social ties and relational intimacy, and also view online interaction as a place for lightweight interaction and to present a better "self", which facilitates the development of relational intimacy (Hian et al., 2004; Rainie & Wellman, 2012). Other scholars emphasise the fragility and unreliability of online connections and argue that online connections are superficial (Turkle, 2017).

Scholars have indicated different possible results regarding the way online communication reshapes individual social lives. Some studies argue that the prevalence of online communication media can help turn individuals become “networked individuals”, who are autonomous and embedded in large, multiple-layered and diversified social networks and intimate relationships (Rainie & Wellman, 2012). Some scholars, however, use the term “alone together” to depict individual life in the digital era, and people who rely on online communication media for networking and are unable to develop relational intimacy (Turkle, 2017). Some newly emerging studies have started to shed light on the elderly users of online communication media (Quan-Haase et al., 2016, 2017). They found that elderly people have different online networking patterns than younger users. The use of online communication media may also reshape elderly people’s social lives by changing the accessibility and relational intimacy of social ties (Quan-Haase et al., 2016; Wang et al., 2018).

3.8 Analytical Framework

This study is mainly about how elderly people use online communication media to network with their social ties and how their online networking practices affect their social relations. The discussion of these two questions may also respond to long-term sociological discussion on the impacts of online connectivity, and how online communication media influences people’s tie accessibility and relational intimacy. In the ongoing debate on this topic, scholars from both sides agree that the internet creates easy and effective access to a relatively large number of people. Most disagreements are about the digital impact on relational intimacy.

Discussing the aging process may be beneficial for the further exploration of this discussion on digital impacts. People from different age cohorts may have different social expectations and mobility in their networking practices (Brooks et al., 2011), which may lead to different influences in their social life. To gain a better understanding of digital impacts, age and its accompanying factors should thus be taken into consideration. Several important factors in ageing lead to unique modes of social networking activities and social network changes in the old age. These factors include the decline in physical mobility, loss of social roles, increased inability to exchange support, changing social expectations and increased selectivity in social ties (Antonucci & Akiyama, 1987; Carstensen, 1991; Loe, 2011). These factors may affect elderly people's formation of online social networks and online networking activities and also have different digital impacts on social relations and individual social lives.

Although there is growing interest in the online social networking practices of older adults, most studies have only indicated age differences in online communication media use and digital impacts without a detailed exploration of the "how questions". To be more specific, the process of how online communication media use affects the networking practices of older adults regarding their different social ties, how the online networking practices of older adults in online communication media reshape their social networks and how aging interacts with digital impacts on the individual lives of older adults remain unknown. There is also a lack of discussion about older adults' adoption of newly emerging mobile phone-based online communication media WeChat. As it is able to build links with for almost all kinds of social relationships and cross online-offline boundaries, it is important to discuss its effects on older adults' online networking practices and social networks.

I distinguish online communication media as a new social space where new connectivity brings new possibilities for people's social networking practices. Licoppe's (2004) concept of 'connected presence', which emphasises the prolonged and nonstop interaction enabled by online communication media serves as the basis for understanding online connectivity in networking practices. When older adults become active users of online communication media, it is expected that they are embedded in continuous conversations with their online ties, and that their online social networking practices may become a "connected management" of social ties. Their online interaction with social ties may take two forms; a prolonged and ritualised communication where spending time is a sign of commitment in relationships, similar to that in conventional communication media; or a frequent recurring and pervasive interpersonal communication, where presence can be realised by short and frequent expressions (Licoppe, 2004). These two forms of online interaction may have different influences on the networking practices and social relations of older adults.

Online social networking activities and online interaction patterns with different ties are two major parts of the online networking practices of older adults. Online social networking activities involves how different forms of online networking activities are mediated on WeChat. As online communication media introduces new forms of interaction, how are people's networking activities transformed on online communication media? The other part considers the differences between social ties in networking practices, in order to distinguish the influences of online connectivity on networking practices with different ties. As primary and non-primary ties play different roles in late adulthood and older adults usually use different strategies when networking with these different ties, it is assumed that online networking

practices with these different ties will also be different, as well as their roles in the online social networks of older adults.

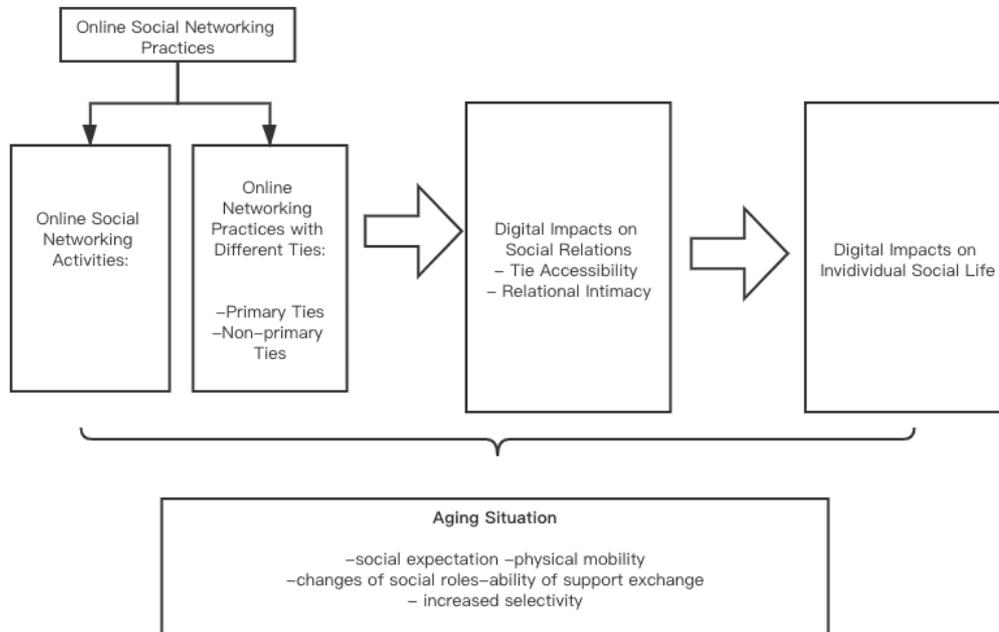
Based on the discussion of online social networking practices, this study will consider the effects of online communication media on personal social relationships. According to previous discussion on digital impacts on personal social life, accessibility and relational intimacy of social ties are two major concerns. In order to evaluate digital impacts on the accessibility of social ties, we will focus on whether WeChat helps elderly people to have better access to their different social ties. The current debate on digital impacts focuses on the reliability and continuity of online ties when analysing the effects on relational intimacy, however, in addition to these two aspects, support exchange can also be an important way to develop relational intimacy (Brehm et al., 1992) and is widely used by older adults (Loe, 2011). It is therefore expected that support exchange among online ties may be a new analytical dimension in examining digital impacts on relational intimacy, especially for older adults.

This study will then address the issue of digital impacts on individual life. Scholars, such as Ranie and Wellman (2012), depict a somewhat utopian picture of “networked” individual life, where separate individuals can be more inherently connected and closely united, whereas scholars such as Turkle (2017) depict their individual lives as “tethered” and “alone together”. Compared with the younger population, older adults have more difficulties participating in networking activities and making commitments in social relationships, which leads to a decrease in their social networks, and to loneliness (Fiori et al., 2006). By examining the social network changes of older adults after the use of online communication media, this

study thus intends to explore whether online communication media can help older adults overcome the difficulties of enriching their social life. The way that gender and socio-economic status affects the process of integration of online communication media in individual social life will also be discussed in this section.

In general, I propose an analytical framework for this study (Figure 3.1) which includes three main sub-structures: 1. Older adults' online social networking activities; 2. Impacts of online networking practices on older adults' social networks; 3. Impacts of social network changes on individual lives. The analysis of older adults' online social networking practices places special focus on the social networking activities in which they participate, such as one-to-one interaction, group-based activities and support exchange activities, and how their networking patterns differ according to tie traits. After discussing these issues, this study will explore how these online social networking activities affect different social relations in two major ways, tie accessibility and relational intimacy. Finally, the study will explore how these influences on social relations lead to changes in elderly people's individual social lives, and whether the use of online communication media helps people become "networked individual" or means that they are "alone together".

Figure 3.1 Analytical Framework



Chapter 4 Methodology and Data Collection

4.1 Introduction

The current research is carried out in the context of today's China, where an increasing aging population and insufficient elderly care have created urgent social problems, and where the use of online communication media such as WeChat has started to transform people's lives. This Chinese context provides an appropriate site for observing the interplay among WeChat use, the aging process and social network changes. By examining the online social networking practices of elderly users with different ties, this study tries to understand the integration of online communication media in social network management under the context of aging. A qualitative approach for this study was found to be important, as this study explores the complicated mechanism of interaction between online networking practices and the aging condition.

I will explain the connection between research methods and the analytical framework for this study. I will introduce the research setting, then the data collection process will be described, including the sampling method, process of recruiting interviewees, and interview arrangement. At last, I will introduce the data analysis plan.

4.2 Research Setting

4.2.1 Aging and Social Networks in a Chinese Context

China is an aging society. According to statistics, in 2015 elderly people made up 9.1% of the overall population and the number is predicted to double in 15-20 years. This great demographic transformation in China is to the result of three major reasons: a low mortality rate, increasing longevity and China's one-child policy from 1978 to 2015 (Mui, 2010; Nakashima et al., 2009).

China faces a more urgent and challenging situation than other aging societies because China is aging in the midst of modernisation and the one-child policy (Bartlett & Phillips, 1997). Other aging societies, such as Japan, became developed countries with a relatively well-developed welfare system before they faced the age wave, whereas China, even with blistering economic growth after the "Open-door" programme of economic reform in 1978, is still a developing country with low average income (Flaherty et al., 2007). The institutional and policy support to prepare for an aging population is thus still inadequate in China (Leung, 2001).

Familial ties usually play a pivotal role in Chinese the social networks of older adults, compared to other types of social ties (Lee et al., 2005; Leung, 2001). For centuries, there has been a long tradition of filial piety in China, and Chinese people have a strong sense of filial obligation, to respect and care for their older family members. Chinese parents used to live with their children and relied on their children as their major source of old age support (Logan & Bian, 1999).

Despite the importance of kin ties in elderly people's social networks, Chinese older adults now face changes in the availability of family ties and non-primary ties are becoming increasingly important under this situation. Adult children have increasingly become unavailable for elderly support. Increased geographic mobility and reduced family size after the economic reform mean that many children now live separately from their aging parents and grandparents. The phenomenon of elderly people living only with their spouses has thus become very common in Chinese urban areas. Under these circumstances, adult children have been unable to provide sufficient instrumental and emotional support to elderly people (Zhang & Goza, 2006). This situation may bring more difficulties for elderly people in managing their daily living. Despite this decline in family co-residence, staying in their own home is still the preference of most Chinese elderly people. According to previous research, 94.16% of Chinese elderly still choose to live at home (Du, Sun, & Zhang, 2016). Among these elderly people, 56.76% live alone or only with their spouse (Du, Sun, & Zhang, 2016). These elderly people who live without their children need to mobilise the resources from their networks to obtain social support (Liu et al., 2015). Some turn to the local community and engage in community activities, and others rely more on the help of ties with family relatives or their work unit (Au et al., 2013; Leung, 2001).

Elderly Chinese people attach great importance to maintaining close familial relations, while lacking enough channels to network with non-primary ties. With their high level of emphasis on family bonds, Chinese elderly people make much effort to exchange support with primary ties. Grandparenting is commonly used to build close bonds with family members (Xie & Xia, 2011). They also rely on their children as the major source for most kinds of social support (Jiang, 1995). Chinese

elderly people also do not have sufficient channels or opportunities for networking with non-primary ties because they may devote most of their time to their grandchildren and also because there are not many group activities available for elderly people to participate in (Zhang & Goza, 2006).

4.2.2 Online Communication Media in China

China's online environment is the most active in the world (Chiu et al., 2012). According to statistics from the China Internet Network Information Center, there are 731 million internet users in China and among these internet users, the number of mobile internet users reached 695 million by December 2016. Mobile internet users account for 95.1% of the whole population of internet users (CNNIC, 2017). With online communication applications permeating Chinese people's life, interacting with people online has become a daily practice for Chinese internet users (Wu & Wan, 2014). WeChat, as one of the popular online communication applications, has quickly become a dominant player in the market of online communication media in greater China, and has permeated Chinese people's life since it launched in 2011.

WeChat is a "super application" primarily based on mobile devices, and its web application is secondary to its mobile phone application. It combines various social features such as one-to-one conversations, group conversations, Moment (which can be used for sharing various kinds of media products including texts, pictures, article and videos with online friends), online video/voice call, online payment, and so on, into one application.

In terms of the online connectivity provided by WeChat, studies note that WeChat can offer a mediated space where multimodal interactions are allowed and boundaries between offline life and the online community have been blurred. WeChat is an online communication media application combining the basic features of Facebook, WhatsApp and Instagram in one platform. WeChat users can interact with their social ties through multimodal social interactions. In other word, people can connect with others through different types of interaction, such as text messages, voice messages, photo sharing, article sharing, and so on. Due to its combination of many social features, WeChat is also able to facilitate communication with all kinds of social relations within one application. According to Wu and Wan (2014), compared with other media applications with WeChat, WeChat provides comprehensive online-offline social links. Unlike the previous messenger applications in China, such as QQ which is largely built upon virtual name networks, people often add many real-name contacts in offline social circles to WeChat and move offline connections to the online world.

There are some emerging studies which talk about the impacts of WeChat use on social relations. Some studies argue that WeChat is able to further facilitate the develop of interpersonal relationships, for two reasons. Cui's (2016) study of WeChat use among Chinese urban youth argued that multimodal communication on WeChat is able to help people maintain close relationships by making users feel constantly attended to or accompanied by others. for some specific groups of users such as migrants, WeChat can also help specific groups of users, such as migrants, to reach out to many new ties through online grouping and online support exchanges. Users build and extend their social networks and develop their community through online interaction (Ju et al., 2019). Some scholars have

doubted whether WeChat use can solve the problems of increased superficiality of social relations. They call the networks of WeChat contacts “acquaintance networks”, which suggests that people add many social ties which may be even less intimate than friendship among their WeChat contacts. Although WeChat offers easy access to these acquaintances, in most cases, people lack opportunities to interact with these acquaintances in their friend list, and so they cannot develop relational intimacy with these acquaintances (Kong, 2015).

There is a growing number of elderly active users on WeChat, and they have demonstrated their active presence in networking with social ties online. According to the Tencent Annual Report (2017), by 2017, there were 50 million active elderly users on WeChat and they sent an average of 44 WeChat messages every day. WeChat use may provide elderly users with a new space for networking. They can connect and interact with different ties online. According to Li (2017), elderly WeChat users form their own online community and their online presence and discussion on WeChat have started to exert influence on the wider media environment by distributing the online articles and messages.

As Chinese elderly people show a high level of active presence on WeChat, the exploration of WeChat use among elderly people in urban China would be fruitful in observing the potential of this newly emerging online communication media in developing the accessibility and relational intimacy of social ties. As they may experience a lack of in old age support and lack of channels for networking, WeChat could be a new potential tool for elderly Chinese users to manage their social ties and exchange social support with their online friends, which is worth further exploration.

4.3. Research Methods: In-Depth Interview

The main method of this study is the in-depth interview. This method is widely used in social science as it helps researchers to obtain detailed data on experiences, feelings, and practices, and also to disclose the meanings behind people's practices (Hammersley & Atkinson, 2007). In this study, this method enables the researcher to collect detailed accounts of elderly people's online social networking practices with different types of ties, the impacts of online communication media on their accessibility and relational intimacy of social ties, how their aging experience affects their online behaviours, along with their feelings and views towards online communication media during their online interaction.

The interview questions are closely related to the analytical framework of this study and they are divided into three parts. The first part relates to the experience of aging and offline networking activities. The second part concerns the experience of using online communication media, their online networking practices and the reasons for these networking practices. The third part is about how elderly people perceive the changes in their social life after using online communication media. In all three sub-parts, the distinction between different types of social ties are emphasised.

4.4 Data Collection

4.4.1 Research Site-Nanjing

Nanjing was chosen as the research site because it is a typical Chinese urban area

with both an aging population and an average level of internet penetration. Nanjing is the provincial capital of Jiangsu Province, located in south-east China with a population of 6.67 million and GDP per capita of CNY118, 171. The internet penetration rate for Nanjing is 62.7% (Jiangsu Communications Administration, 2016) which is close to the internet penetration rate in Chinese urban areas (67.3%) (CNNIC, 2016). It is also different from municipal cities, such as Beijing and Shanghai, where the internet penetration rates are 77.8% and 74.1% respectively, much higher than other urban areas (CNNIC, 2016). Nanjing is also one of the most aging areas in China. In 2016, the aging population in Nanjing was 1.34 million, which accounts for 20.65% of the whole population (Nanjing Municipal Statistics Bureau, 2017). Collecting data in Nanjing helped us to obtain the ‘average’ experience of online communication media use and aging conditions in urban China.

4.4.2 Study Participants

The sample consists of 35 older adult participants, who lived in Nanjing, China and used WeChat on a daily basis (background information about respondents is shown in Table 4.1). Their ages ranged from 65 to 86 years old ($M=72$, $SD=5.41$, $Median=70$): there were 10 respondents aged between 65 and 70 (28%), 18 respondents in their 70s (51%) and 5 respondents in their 80s (14%). Twenty two were female (62.8%) and 13 were male (37.2%); all the participants were born in China. Two had a graduate degree (5%), seven had a college diploma (20%), 14 had high school qualifications or same-level vocational training certificates (40%), ten had a secondary school qualification or same-level vocational training certificates (28%), and two had only finished primary school (5%). One of the respondents still worked, but the others were retired from paid jobs. The occupation

backgrounds of the study participants were varied, including a former state cadre, college professors, technician, nurse, factory workers, etc.

4.4.3 Recruiting Strategies and Criteria

Some respondents were recruited through my personal connections or snowball sampling, while others were recruited in three senior-citizen activity centres located in different districts of Nanjing. I first approached several active elderly WeChat users through my personal connections. I then asked these respondents if they had friends, relatives or acquaintances who were also active WeChat users and could be introduced to me. Fortunately, most of my respondents were very helpful. They introduced many appropriate respondents and even helped me contact them. In order to add more diversity to my sample, I also visited three senior-citizen activity centres located in different districts of the city to recruit more respondents. I chose to visit local senior-citizen activity centres because elderly people living in urban areas usually gathered there to chat, use the computers and exercise. Elderly people there usually have free time and are willing to talk with strangers, and so it was relatively easy for me to reach out to suitable respondents there.

Using the criteria for older adults from the United Nations (United Nations, 2016), respondents should be 65 years old or above and currently live in urban China. They also need to be an active WeChat user. I chose to use the criteria for a daily active user (DAU) which is usually used for measuring the number of users of social networking applications. Active users are users who visit the application on an everyday basis.

As there are significant gender differences in the use of online communication media (e.g., Correa et al., 2010; Gefen & Straub, 1997), this study pays special attention to elderly female users. Women usually place greater emphasis on forging connections with others (Correa et al., 2010) and Chinese elderly women also participate in online communication media and online social activities more actively (Li, 2017). This study will emphasise female users but also investigate male users in order to obtain a more comprehensive view of social networking practices among elderly users. As a result, this sample includes 22 female elderly users and 13 male elderly users.

I also paid attention to the diversity of respondents in the process of sampling, and tried to include respondents of different socioeconomic status, ages and job background in order to increase the generalisability of this study (Table 4.1).

4.4.4 Interview Arrangement

Interviews were conducted from December 2017 to March 2019 and most of were arranged in the respondent's home. Only five interviews were conducted in public spaces, which included restaurants, a public park and senior-citizen activity centres, as these five respondents said that they felt more comfortable talking with me outside their home. All the interviews were conducted in the form of one-to-one conversations, and the respondent's other family members did not stay in the same room during the period of interview. Family members did sometimes interrupt our conversations to offer food or drinks. Some joined in with the conversation and expressed their views and feelings on some interviews questions.

The interviews with each respondent were between 40 minutes and 70 minutes long. All these interviews were recorded by mobile phone with the permission of the respondents and transcribed verbatim. Any information which could reveal the identity of the respondents will not be divulged in this study and all the names given in the thesis were changed to maintain the anonymity of the respondents in this project.

4.5 Data Analysis

The data analysis follows the grounded theory promoted by Glaser, Strauss and Strutzel (1968). This theory suggests that previously identified concepts and theories can provide insight and direction as a starting point for developing new concepts and expanding old ones (Corbin et al., 2014). In this study, my analysis was based on previous studies of online connectivity and applied widely accepted concepts such as “connected presence” and “networked individualism”. From this starting point in data analysis, I explored whether these concepts could fully explain the elderly people’s online networking practices, and the impacts of online communication media on the accessibility and relational intimacy of social ties.

Thematic analysis is used to analyse the interview data. Based on previous studies of online connections and interaction (Licoppe, 2004; Wang et al., 2018), I identified three major themes for coding: (1) modes of online networking practices; (2) online interaction with different types of ties; and (3) the role of online communication media in influencing accessibility and the relational intimacy of social ties. As this study is based on a sample of the aging population, a fourth

theme, the role of aging in online networking practices, was added. Analysing data in these four themes can help us to identify elderly people's practices in online relationship management and the impacts of online communication media on their sociability.

The two major analytical aspects of social relations, accessibility and the relational intimacy of social ties, are examined separately in this study. The accessibility of social ties is analysed according to how people access their social ties and how many social ties they can access. Relational intimacy is evaluated in three dimensions, immediacy/affection, similarity/depth and receptivity/trust (Burgoon & Hale, 1987). Immediacy can be evaluated according to whether someone is intensely involved in interactions with their ties and whether there is a sense of distance. Similarity is evaluated by whether people feel similar to their ties. Receptivity represents the willingness or readiness to receive ideas from others (Burgoon & Hale, 1987).

4.6 Limitations

Admittedly, several methodological limitations of this study need to be indicated. Firstly, although WeChat is very popular in the Chinese market, it cannot represent all the online communication media. More comparison and exploration of different communication applications is needed to gain a comprehensive understanding of the role of online communication media in the social lives of elderly users. Secondly, the samples in this qualitative research is not a representative one. Most of my respondents are relatively high in socio-economic status. Further research could be more balanced as regards the socio-economic status of respondents and draw a more

detailed picture of the relationships between different socio-economic status and older adults' social networking practices in online communication media.

Table 4.1 Background Information about Respondents²

Code	Name	Gender	Age	Occupation (Before Retirement)	Educational Level
1	Guang	Male	70	State cadre	College
2	Wang	Female	76	Accountant	College
3	Tang	Female	78	Laboratory Technician	Middle School
4	Ling	Female	78	Factory Worker	Middle School
5	Cheng	Female	67	Senior doctor	High School
6	Shen	Female	72	Factory Worker	Primary School
7	Zhang	Male	86	College Professor	Graduate
8	Yao	Female	82	Researcher	College
9	Ding	Male	80	Factory Technician	High School
10	Tian	Female	75	Factory Technician	Middle School
11	Ting	Female	70	Factory Worker	Middle School
12	Zhu	Female	75	Factory Cadre	College
13	Ping	Female	70	Kindergarten Principal	College
14	Xing	Female	72	Nurse	Middle School
15	Chou	Male	72	Technician	Middle School
16	Ye	Female	70	Housewife	High School
17	Jin	Female	68	University Staff	College
18	Qiang	male	75	Office Clerk	High School
19	Tuan	Female	70	Office Clerk	Middle School
20	Yang	Female	67	Factory Director	High School
21	Qi	Female	68	Office Clerk	High School
22	Qinyao	Male	69	Technician	Middle School
23	Jing	Male	65	Factory Technician	Middle School
24	Jiangyu	Female	70	High School Teacher	College
25	Chenya	Female	68	Primary School Teacher	High School
26	Yexing	Male	70	Office Director	High School
27	Xiwang	Male	65	Technician	High School
28	Shen	Male	67	Office Director	High School
29	Chenji	Male	70	Factory Worker	Primary School
30	Keyan	Male	80	College Professor	Graduate
31	Dai	Female	71	Primary School Teacher	High School
32	Huju	Female	72	Doctor	High School
33	Ho	Female	67	Factory Office Clerk	High School
34	Chen	Male	65	Skilled Worker	High School
35	Zhu	Female	83	Technician	Middle School

² All names of respondents have been changed to protect their privacy.

Chapter 5 The Online Social Networking Activities of Elderly People

5.1 Introduction

This chapter will discuss different forms of online networking activities among elderly users. These networking activities includes one-to-one interaction, group-based activities and support exchange activities. The analysis will pay attention to how online communication media are incorporated into online networking activities and how aging affects their choices of online networking activities.

5.2 One-to-One Chat

One-to-one chat is a common online networking activity in online communication media. All my respondents in the interviews noted that they used one-to-one chat to connect with other online friends. Three out of 35 respondents said one-to-one chat was their favourite form of online interaction.

The two major forms of one-to-one interaction on WeChat are spontaneous conversation and video conversation. According to my respondents, elderly users often have spontaneous conversations, such as greetings, expressing feelings, sharing information, and so on, in one-to-one interaction using voice messages or text messages. As these conversations are usually light-weight and agenda-free, elderly people did not need to prepare conversation topics and could say whatever they like. My respondent Tang noted that she contacted her friends more frequently than before because she used frequent and short conversations to talk with them.

“Before using WeChat, we always used phone calls to contact friends. However, our contacts were not that frequent because we would use a phone call only if we had something important to say. WeChat is different. We can talk about many trivial things. Now we talk with each other every day.”

Video calls, as a better substitute for phone calls, is also favoured by elderly users, as it can help them maintain intimate relations with close ties at a relatively low cost. Many respondents did not live with their close ties, and so they used video calls to create a sense of co-presence. For instance, my respondent Ping (female, 70, former kindergarten principal), whose daughter and grandson live in Australia, said that online communication media provided a cheap way for them to maintain contact.

“Before using WeChat, we had to use long distance calls to contact my daughter. It cost a lot. But now I just need to have WiFi to contact them. We can talk for a very long time without worrying about the high expenses. We can now also see them through the video call.”

In comparison with group chats, one-to-one chats had advantages in exchanging private information and personal issues. One-to-one chat enables people to talk and share private issues, without this being seen by other group members. One of my respondents, Guang (male, 70, former state cadre) emphasised the importance of private chats for sharing personal information and issues:

“I like group chat very much. But not all the issues can be discussed in

group chats. People always have secrets. So, I do not like to talk about them with other group members watching. Thus, one-to-one chat is important for us to share some private issues and information.”

As a special form of one-to-one chat, video calling is easy for elderly users to learn and undertake. Using a video call does not require Pinyin knowledge or other complex operations on a mobile phone. Many of my respondents reported that they liked to use video calls when they had many stories to tell or needed to discuss important issues.

“Using a video call is easier than typing...It takes me a lot of time to type...So when I have some important things to talk about with my daughter, I definitely choose video calls.” (Ping, female, 70, former kindergarten principal).

One-to-one chat also has two disadvantages for elderly users, however. They often have difficulty typing messages on a mobile phone. One of my respondents, Cheng (female, 67, doctor), thought typing was troublesome for elderly users.

“We did not learn Pinyin at an early age so we can only use handwriting to input messages, which takes a lot of time. Also, our eyesight is not very good, so it is difficult to type long sentences or send messages very frequently. Sometimes I use voice messages instead.”

Reduced physical mobility, to some extent, thus limits the length and frequency of

one-to-one conversation.

Elderly people also felt that sending many messages in one-to-one interaction may bother their online friends by pressuring them to reply. In my interviews, elderly users had strong concerns about whether they “bothering others too much. They usually hesitated when they wanted to express their feelings and share information with others in one-to-one chats.

“Most of the time, I do not have important things to say. I just want to send some articles or greetings to them. But if I send them on one-to-one chats, it may bother my friends. Because when my friends send me anything in one-to-one chats, I am nervous and feel I need to reply to them carefully and promptly. I do not want to put this pressure on my friends.” (Chen, male, 65, former skilled worker)

For these two reasons, although all the respondents used one-to-one interaction, it was not a favourite type of interaction among elderly people.

5.3 Group-based Activities

Elderly WeChat users have shown a strong preference for using online group chat for online interaction. 32 out of 35 respondents said that group chat was their favourite form of online interaction. The number of WeChat groups among the 35 respondents ranged from three to 12. Their average number of online groups was 5.5 and the median was 5. Most elderly users had therefore joined more than five WeChat groups.

Most online interactions in online groups took the form of spontaneous conversations, including greetings, expressing feelings, sharing articles, jokes or emoji. Every morning and evening, they would send a “good morning” and “good night” to group members. When they went to important or interesting events, they would send photos or messages to share their feelings with the group members. When they found interesting or useful articles, emoji or jokes, they would share them with the groups. According to my respondent Ho (female, 67 years old, former factory worker), greeting and sharing is the most common content in group chat between elderly users.

“In the group chat, they send lots of morning and evening greetings. They would also report what they are doing today...You can see these photos (showing photos in the group chat to the interviewer) ... I do not like sending greetings but if I have some jokes or news articles, I will forward them to the group chat.”

Another respondent, Huju (female, 72, doctor), explained that they liked sharing emojis and articles because typing on a mobile phone is “tiring” for elderly users who might have decreased eyesight, so sharing was much easier for elderly users.

“I have more than one hundred emoji on WeChat. I like to share them with my group members to express our feelings. I also like to share articles with them. It is all because using typing is so tiring. My eyesight is not that good. Thus, I prefer to share emoji to express my feelings.”

In addition to spontaneous conversation, purposive conversation is also a part of online interaction in group chat between elderly users. Although some of the respondents admitted that a phone call is still their first choice for urgent issues, they had started to discuss less urgent issues with online group members in order to

seek suggestions. For example, one of my respondents, Chen (male, 65, former skilled worker), was interested in investing in the stock market. He had a WeChat group which consisted of his friends who are also investors. They exchanged information on stock movements in the group chat, and discussed the trends of specific stocks.

“I have a group with people who love investment. Each group member invited their friends who have similar interests into our group... We talk a lot about stock investment and share financial news every day. It is interesting to talk with them. Before joining the group, I could only talk with one or two close friends about stocks.” (Chen, male, 65, former skilled worker).

Sending “Lucky Money” is also a special mode of purposive interaction in WeChat groups. The “Lucky Money” feature allows users to post a digital envelope with cash in specific groups. The sender of “Lucky Money” can specify the number of recipients and the total amount of money. The recipients will receive a randomised share of the money, which turns such money gifting into a game-like online activity (Wu & Ma, 2017). Most of my respondents reported that they often saw these activities in their group chat, especially during the period of Chinese New Year. Although elderly people found exchanging “Lucky Money” exciting, only five out of 35 respondents knew how to send “Lucky Money”. Some refused to make any money exchange online. My respondent Cheng (67, female, senior doctor), who still worked in the hospital as a senior doctor, noted that she felt that it was too complicated to add her bank account details to her WeChat. She also doubted the reliability of online platforms in money exchange:

“During Chinese New Year, people sent lots of ‘Lucky Money’ to group

chats. It looked fun. But I did not participate in these activities, because I did not know how to add money to my WeChat Wallet. My son told me but it sounded very complicated. I was also afraid of having a cash exchange online. I worried that I might select the wrong option and then all my money would disappear.” (Cheng, female, 67, senior doctor)

A few older adults actively participated in exchanging “Lucky Money”. One of respondent Zhang (male, 87, former college professor), although in his 80s, was familiar with sending “Lucky Money” in WeChat group chat. He found that though he needed to spend some time learning how to use “Lucky Money”. After learning about it, it was fun to celebrate Chinese New Year by sending “Lucky money”. The “Lucky Money” exchange can enhance group members’ attentiveness in online groups.

“I learnt how to attach my bank account details to my WeChat with my daughter’s help...It was not that easy. But once I learnt it, it was very convenient... I sent red packets to my relatives and friends. I also received some from other group members. It was interesting. Sometimes, nobody talks in the group. But after sending Lucky Money, the group members appear and started to chat.” (Zhang, male, 87, former college professor)

Group activities among elderly users in WeChat groups are not always confined to the online environment, but can take the form of offline group activities. Many of my respondents reported that when they started to use WeChat, they found that it was a better platform for organising offline activities than a phone call. My respondent Chen (male, 65, former skilled worker) felt that it was more convenient to organise a gathering of related family members through online groups, as all the group members could be informed with one message and the time coordinated

across the whole group.

“Our relative group has more than 30 group members. If one of our group members is going to celebrate their birthday this month, we will decide where and when we will have their birthday party through online groups... Now we no longer use phone calls because you need to call more than 30 people. That is quite troublesome.”

Ping (female, 70, former kindergarten principal), as the group leader of many WeChat groups, used online groups to arrange several offline meetups for her group members. With her arrangement and group members' active participation, she had held six offline meet-ups with her group members in the past 12 months. Before using WeChat, they usually only had 1-3 meetups a year.

“When I feel that it has been a while that we have not met with each other, I will send a message in the group to say, ‘shall we have a gathering’. Then group members will reply and we settle a time. It is really convenient.”

In Ping's case, the WeChat group could even be used by elderly users to raise funds online to increase the quality of future group activities.

“We established a fund for our group activities. One active group member is in charge of this fund. He will report how much money has been spent on each activity through group chat. When he finds that the money left is not enough, he will inform the group members online. Some of our colleagues will give money in group chat. Some of those who do not know how to use online payments will give their money in the offline meeting. With this fund, we can prepare better food and rent a minibus.”

There are three advantages of using group chats to connect with their social ties for

elderly users. Firstly, online groups are more convenient for connecting with multiple ties. Many noted that they loved the convenience of sending messages to numerous social ties through group chat. Compared with one-to-one chat, it takes less time and effort. As all the group members can see the group chat, their interaction can also include more topics.

“I have many WeChat groups and I use group chat most frequently, because it is so convenient. My friends, my colleagues and my family are in different groups. If I want to talk with them, I can just go to their group chat and send messages. Then all the group members get the messages...If I want to discuss anything, I will also go to the group. Then anyone interested in this issue will come online and chat with me in the group.” (Cheng, female, 67, doctor)

Group interaction can also reduce elderly people’s worries about adding pressure to message recipients. As more than two people are involved in group interactions, the people sending the messages in the group chats do not usually expect an instant reply from a specific person. Elderly users thus thought it was more relaxed to talk with others in group chats, compared to one-to-one chats.

Thirdly, elderly users can use online groups for virtual reunions, when decreased mobility may hinder them from organising and attending offline gatherings. This has been especially important for those who have moved to other cities or experienced physical illness. For example, Huju (female, 72, former doctor) noted that it was hard to gather their old classmates together because of illness and physical separation, so an online group was the only way for them to reunion.

“You (young people) cannot understand. It is really hard for us to have an (offline) gathering. We are not young enough to attend a gathering. For example, our old monitor just had a stroke... It [having an offline gathering] will become harder and harder as we grow old. An online group is almost the one last way for us to talk with each other.”

It is worth noting that the formation of online groups among elderly users is mostly based on their existing social networks. These online groups include groups of relatives, groups of friends, groups of co-workers, groups of schoolmates, and so on. Most of the interviewees refused to join or organise online groups where the members were unknown to them.

“I did not want to join those groups where all the other members are strangers. I feel these people are unreliable. I just like sharing things in the groups of my friends or family.” (Shen, Female, 72, former factory worker)

Elderly users have also shown great enthusiasm for organising online groups, although most are novice WeChat users. Ping (female, 67) was a former kindergarten principal. She had 12 WeChat groups and most of these groups were very active. She is also an organiser of two WeChat groups. One of the groups she organised is a group of her retired colleagues. After she had joined some WeChat groups, she found that there was no group for her retired former colleagues in the kindergarten. She felt a WeChat group was necessary for retired colleagues to communicate about their lives and share useful information, so she decided to organise a group.

“After joining some (WeChat) groups, I felt it was useful and convenient, but I did not find a group of our retired colleagues in kindergarten. I

thought we should have a group, so I decided to be the organiser. I did not know how to use the group function but one of my former colleagues taught me.”

5.4 Support Exchange as a Networking Activity

Many elderly people use support exchange activities to network with social ties in the online environment. All respondents reported that they exchanged support through online communication media. They saw online communication media as an efficient channel for exchanging informational and emotional support, as well as for coordinating instrumental support.

5.4.1 Informational Support

Content of Informational Support

Informational support exchange among elderly people is largely facilitated by the use of online communication media. All the respondents reported that they had much experience of exchanging information with their online ties in WeChat. One of the main activities in WeChat is information sharing. Before using WeChat, elderly people relied on phone calls and face-to-face conversations for the exchange of informational support., A phone call was almost the only way for elderly people who were homebound and did not live near their ties to exchange information, but with the integration of online communication media, elderly users can share and receive useful information with their online ties with a few taps on their mobile

phone.

“In my group chats, our group members and I shared lots of health articles and news every day. Before using WeChat, we did not have as many chances to exchange this information.” (Ting, female, 70, former factory worker)

The sharing of information among elderly users can include a variety of topics, such as health, news, news commentary, and political stories. According to my interviews, they shared all kinds of articles and messages that they considered worth sharing.

“If I find these articles are useful or interesting, I will send them to my friends through group chat or one-to-one chat. I send a lot of these kinds of messages every day.”

Exchanging health information is the most common practice within informational support exchange. As many elderly people worry about their health situation and have begun to experience more illness, sharing health information online can equip elderly people with knowledge about old age self-care. My respondent, Tang found that her blood glucose was a little higher than the normal level three years ago. She read many articles shared by her contacts and WeChat group members talking about the appropriate prevention of diabetes which were very useful:

“These articles on WeChat are very good for us (elderly people). Most elderly people are concerned about these (health) issues. Now we have WeChat and the WeChat group, we can share this information with each other.”

Sharing instant and updated information on recent news is also common in elderly

people's online chats. One of my respondents Ho (female, 67, former factory office clerk) said that she relied on WeChat for instant and up-to-date information:

“I used to read the newspaper and watch the television news. But they cannot provide the latest news. WeChat is able to provide these up-to-date news reports. I found it is useful and very convenient.” (Ho, female, 67, former factory office clerk)

When elderly people encounter difficulties or undesirable events in their life, they can also mobilise their online social networks to seek specific types of informational support, even from distant ties. One of my respondents, 68-year-old Chenya, broke her arm three weeks before I conducted the interviews, and she talked about her experience of using WeChat when she was suffering from pain. She reported that she was in a great deal of pain during her treatment, so she contacted her former schoolmate who used to work in a Chinese medicine clinic on WeChat and asked for information about Chinese medicine treatment to relieve the pain. Although Chenya had not met her schoolmates for many years, he offered her a great deal of advice through WeChat. Chenya was very grateful:

“I had not seen him for so many years. It was so nice that I could meet him again on WeChat and he was very willing to give me lots of professional information.” (Chenya, female, 68, former primary school teacher)

It is also worth noting, however, that older adults may unintentionally exchange false information with their social ties. As anyone registered with WeChat can write WeChat articles and spread them, much false information is spread on WeChat. Most elderly people are newcomers to the digital world, and so many are unable to easily identify a reliable information source and may spread a lot of

false information in their WeChat group. For example, my respondent Yao, although she used to be a senior researcher in a research institute and had a Bachelor's degree, still had the experience of forwarding false information to other group members.

“One day I read a story about a mobile phone that exploded in the sun. I was so shocked so I forwarded this information to all the groups I have. Later I figured out that it was a rumor. It is not very easy for us to identify when something is just a rumor.” (Yao, female, 82, former researcher)

Gender differences affect the preferences of elderly users regarding the content of informational support. Most male respondents were interested in sharing information on news and financial information, which provides elderly adults with a connection to the outside world. On the other hand, older female adults usually liked exchanging health information.

Who Exchanges Informational Support

Elderly people receive online information support mainly from ties with relatives (not family members) and ties with non-kin peers. Among my interviewees, former schoolmate groups, relative groups and one-to-one sharing were the major sources of online information. Sometimes, elderly users also shared health articles and news with their children, but their children mostly do not like these articles. My respondent Tang (female, 78, laboratory technician) sometimes shared health knowledge with her son and granddaughter but they did not want to read it:

“Young people are not really interested in it. I send some articles to my son and granddaughter about the negative impacts of staying up late and eating junk food. But sometimes they do not even read them.” (Tang,

female, 78, laboratory technician)

5.4.2 Emotional Support and Companionship

Content of Emotional Support Exchanges

The major form of online interaction for elderly people is spontaneous conversation, and this leads to the question of whether online social networking activities only provide information support and fail to provide strong emotional support and allow development of relational intimacy in a relationship. Older adults actually considered the main function of these spontaneous conversations to be exchanging emotional support. Emotional support is mainly exchanged in three ways: through co-presence, by information sharing and by crossing online-offline boundaries.

Co-presence with social ties in WeChat groups can provide elderly people with companionship and reduce their loneliness by creating a sense of belonging. My respondent, Tian (female, 75, former factory technician) was very surprised and pleased when she had reunion with her old friends and classmates online, as she said, “The feeling of being together again itself is already very good. I like to be with them (former schoolmates) and this makes me feel I have another family online.” Elderly people may also experience a reduction in loneliness as a result of digital co-presence over time. Zhu, who used to be a factory cadre in Nanjing, reported that this kind of online co-presence with her former colleagues and schoolmates reduced her feeling of loneliness to some extent:

“When you get old and stay at home for a long time, you easily get bored of family life. Ha-ha, I have already had ‘enough’ facing my husband

every day. But now I am not that alone because I can meet these old schoolmates online. I am with them online.”

As elderly people are often not good at typing, information sharing serves as a substitute in online chats, so as to express their concern and emotional support for each other, as Ping said: “We cannot chat a lot like young people. But sometimes I share my favourite articles with my friends. It is our way to express concern.” Another respondent, Tang (female, 78, former laboratory technician) frequently received shared articles on diabetes from her friends and former classmates, as they knew that she was quite worried about it. “I felt really warm when I received these messages. They cared about me. This feeling is very good,” she said.

Thirdly, online communication media also helps elderly users to exchange offline emotional support. When group members have difficulties or get sick, the other online group members may also provide them with emotional support through online and offline visits. For instance, my respondent Jin (female, 68, former university staff) told a story about providing offline emotional support to a group member in her former schoolmates group. The group member, Yang, used to be a very active group member and organised many group offline gatherings. One day, Jin and her other group members realised that they had not seen Yang sending messages on WeChat for almost a month and felt it was very strange. They contacted Yang through WeChat and Yang told them that he had been diagnosed with cancer and was now hospitalised. Once they knew that, Ho and other group members decided to go to the hospital where Yang lived to express their concerns. As Jin did not live in the same city as Yang, she even travelled to his city to pay a visit to his hospital. Jin said,

“I knew I was unable to provide much material aid, but I just wanted to show my support to Yang to make him feel better. I know the treatment is really painful so I really wanted to express my concern for him.” (Jin, female, 68, former university staff)

In this story, emotional support exchange transcends online-offline boundaries with the integration of online communication media. According to Jin, getting sick or facing difficulties is very common for all elderly people, and the emotional support exchanges among their group members were very important at those times. Some people were unwilling to tell others about their problems and difficulties, however, but still needed support. In this situation, online connectivity can facilitate communication and emotional exchanges in both the offline and online environments:

“When you get old, you always experience these things (getting ill) and someday you will also get sick and meet difficulties. You really need support, but sometimes people just intentionally do not like to talk about these painful things and we might not have heard about them before using WeChat. But now it is much easier for us to notice them. Then we can provide support as best we can.” (Jin, female, 68, former university staff)

Who Exchanges Emotional Support

Online emotional support exchange usually took place between non-primary ties. Most of my respondents reported that they received emotional support from chatting with their ties among relatives, old classmates and former colleagues. For example, my respondent Xing (female, 72, nurse) reported that she felt WeChat made her feel that she was supported by many distant ties, especially ties with former schoolmates. Despite physical distance, the daily active interaction in this

the group provided her with a sense of belonging, and reduced her loneliness.

A few respondents noted that they also exchanged emotional support with their close familial ties, especially those who had children living in other cities. Ye, a respondent, used WeChat to express concern for her son, who lived in the United States. She noted that WeChat helped her exchange emotional support with her son much more frequently. Some respondents, however, said that they felt WeChat was only a tool for coordinating things each day with their close family members, and that online emotional support exchange was relatively rare.

5.4.3 Instrumental Support

Content of Instrument Support Exchanges

Compared with emotional support and informational support, online exchanges of instrumental support are less common among elderly users, however, online communication media also provided benefits via instrumental support exchange, mainly by moderating support exchange and offering more ties with whom to share support.

Elderly people use group chats on online communication media to coordinate exchanges of instrumental support, which, to some extent, transforms their traditional ways of seeking instrumental support and extends their support networks. Xing, and her friends started to seek instrumental help with a group of people, rather than individual people. These help-seeking practices are more efficient.

“Before we called on each other to seek help but we could not usually reach out to many people. Now if something happens, we do not need to send messages one-to-one. We can use WeChat. If someone meets with difficulties, we will talk about it in the group chat, then a group member who can offer help will say so in the group.” (Xing, female, 72, former nurse)

Elderly people’s online instrumental support exchange includes offering helping hands and satisfying material needs. During the process of exchange support, online communication media play the role of moderator. For instance, Cheng (female, 67, senior doctor), who was a senior doctor and still worked at a hospital, used online communication media to help her former patients. One day, Cheng received a WeChat message from a former patient, who was an elderly woman who did not live in Nanjing. Her patient asked Cheng to help her get some medicine which could only be obtained on prescription. Cheng agreed and gave her the prescription when she passed through Nanjing. In that case, WeChat substituted for the traditional forms of communication media to moderate the process of providing social support.

Who Exchanges Instrumental Support

In most cases, elderly users exchange instrumental support on online communication media with close familial ties. Many respondents reported that they use online communication media to provide or receive instrumental support in the groups of close kin ties. For example, Zhang (male, 86, college professor) reported that he exchanged instrumental support mainly in family groups. In group chats, he coordinated the family chores and asked his daughter for help, such as picking up medicine from the pharmacy.

Although most instrumental support exchanges take place among close family ties, however, the use of online communication media may also help elderly users to exchange instrumental support with some of their non-primary ties. As online groups help them to connect or reconnect with distant, weak or old ties, elderly people found that they have more people with whom to exchange material aid. It is worth noting that online communication is even more important in elderly people's instrumental help seeking with non-primary ties than it is for younger people. Some elderly people noted that online communication media were almost their only way to connect with some distant and weak ties.

“If we did not have WeChat, we would not even know if someone was ill or even passed away. For example, one of my friends, Xia, who lived in Suzhou. Her husband passed away last year but we did not know until she talked about it with her friends in the group. After we knew we asked if we could help and then offered some help, like helping her arrange her husband's funeral.” (Yang, female, 67, former factory director)

5.5 Summary and Discussion

Elderly people use one-to-one interaction and group activities to network with their social ties, and during the process of one-to-one and group interaction people also use support exchange activities to strengthen their social ties. These online networking activities are all very common in elderly people's networking practices, although the forms, purposes and objects of these networking practices are different.

Table 5.1 shows how elderly people use different forms of online interaction to

network with others. Most elderly people prefer group activities to one-to-one interaction. The major forms of interaction in one-to-one chat are spontaneous chat and video conversation, and the objects of one-to-one chats are usually close ties. The major interaction in group chat mainly takes the forms of spontaneous and purposive interaction and the objects of group chats can include all types of social ties. One-to-one interaction is convenient for strengthening single ties, and can protect people's privacy. Video chat is also easy for elderly people to use as a form of one-to-one interaction. The advantages of group interaction include its efficiency in maintaining and developing the relational intimacy of multiple ties, its ability to reduce worries about adding pressure to message receivers, and its ability to provide opportunities for virtual reunion. Support exchange activities include instrumental support exchange, emotional support exchange, and instrumental support exchange, and online communication media is an efficient alternative channel for support exchange among elderly people, who are able to exchange support with almost all kinds of social ties.

Table 5.2 further explains three types of support exchange activities in online communication media. Informational support exchange activities are usually in the form of online sharing, while emotional support is in the forms of co-presence, information sharing and offline activities like visits or gatherings. Elderly people also use online groups to coordinate instrumental support exchange. Informational and emotional support exchange activities mainly take place among non-primary ties, while instrumental support exchange is mainly with primary ties.

It is worth noting that in addition to serving as a complement to offline support exchange activities, online connectivity creates new forms of emotional support

exchange, which are based on information sharing and online co-presence. Elderly people organised online groups and shared considerable information through chats. They sent messages not only to convey information, but also for emotional support and companionship. Very often, when elderly users received and sent messages of useful information, the emotional values assumed primacy. The convenience of information sharing thus allowed elderly users to frequently exchange emotional support with their ties and create a prolonged atmosphere of virtual companionship.

Table 5.1 Typical Networking Practices of Elderly People

Types of Networking Activities	One-to-One interaction	Group-based Activities	Support Exchange
Elderly users' Preferences	Favourite form of online interaction for several elderly users	Favourite form of online interaction of most elderly users	³
Major Forms of Networking Activities	Spontaneous conversation and video conversation	Spontaneous conversation and purposive interaction	Instrumental support exchange, emotional support exchange, and instrumental support exchange
Advantages of Participating in Networking Activities	Privacy; (voice call) easy to handle	Efficient for maintaining and strengthening multiple ties; virtual reunion;	Efficient to exchanging more social support with different contents
Objects of Networking Activities	Mainly close ties	All types of ties	All types of ties

Table 5.2 Online Support Exchange of Elderly People

Types of Social Support	Informational Support Exchange	Emotional Support	Instrumental Support
Major Forms of Social Support Exchange	Online sharing	Online co-presence (companionship), information sharing, offline visits or gathering	Online coordination
Whom to exchange support with	Mainly non-primary ties	Mainly non-primary ties	Mainly primary ties

³ Support exchange occurs during one-to-one interaction and group-based activities.

The stories of how elderly people use online communication media indicate that elderly people's online networking activities have their own characteristics. The online social networks of older adults are largely based on existing social relations. Elderly WeChat users show a strong preference for using online group chat for online interaction. Online groups serve as the main medium with which to connect with their online ties, rather than one-to-one chat. Thirdly, they prefer the form of short and frequent communication rather than purposive interaction. They even used information sharing as one of the major ways to express their concern and provide companionship to their group members. Last but not least, they attached great emotional value to spontaneous interaction, as they saw sharing information and greetings as a form of emotional support exchange.

These characteristics of elderly people's networking practices can be given three major reasons. Elderly people have needs for companionship and the development of emotional bonds with their existing social ties, so they attach great emotional value to online interaction. Their distrust of online strangers means that their online social networks are mainly based on existing networks. The last reason is their difficulty using mobile phone and online communication media. For example, difficulties in typing can limit their ability to have prolonged and in-depth conversations on WeChat. The easy operation of forwarding articles encourages their frequent information sharing behaviours in online chats. These difficulties could explain why elderly people prefer group chats and short and frequent communication.

In general, the stories of my respondents demonstrate that online communication media provide them with a new and useful channel for one-to-one interaction, group activities and support exchange. This new channel brings new connectivity to elderly users who have more opportunities to participate in social networking activities through one-to-one interaction, group-based activities and support exchange, at relatively low cost. Online communication media can help elderly users to overcome the difficulties of decreased mobility and physical distance in participating in networking activities.

Chapter 6 Online Relationship Management with Different Ties

6.1 Introduction

Elderly users of WeChat use online communication media to connect with different social ties. According to the interview data, their WeChat contacts include family members, relatives, co-workers, old schoolmates, neighbours, and so on. As elderly people adopt different strategies when managing different relationships, their online activities with these ties can also be different. Bearing this in mind, this chapter examines how elderly people use WeChat to network with their different ties. It describes the different strategies elderly people use in their interaction with different ties and how online interaction affects tie accessibility and relational intimacy. Explanations for the differences in networking strategies with different types of social ties are also explored.

6.2 Primary Ties

6.2.1 Spouse

Networking Practices

Elderly users of WeChat rarely use online communication media to interact with their spouse. As most of my respondents lived with their spouse, they did not feel that there was a strong need to interact with them online. They only contacted their spouse through WeChat when they were not in the same place. One of my respondents, Chou (male, 72, former technician) noted that he only contacted his

spouse on WeChat when she went on a trip to another city.

When they did use WeChat to contact their spouse, it was a new and better substitute for traditional communication media such as the phone to contact their spouse. They used it to connect with their spouse as they felt it was more convenient and less intrusive. According to my respondent Zhang (male 86, former college professor), he thought sending WeChat messages was sometimes better than making a phone call because it would not cause his spouse as much interruption.

“When she went out meeting her friends, I sometimes sent messages to ask her when she would be back home. It was better than making a phone call because making a phone call may interrupt her interaction with her friends.”

Although many of them belong to the same online groups as their spouse, such as family groups and relative groups, they did not interact with their spouse very often in the group chats, either.

Impacts on Ties with Spouse

It appears that online communication media can enhance the accessibility of ties with a spouse. Online communication media can help elderly users easily contact their spouse when they are separated. As most of my respondents only considered online communication media as a substitute for a phone call, however, the frequency and depth of interactions with their spouse did not change. The use of online communication media has little effect on elderly people's relational intimacy with their spousal ties.

6.2.2 Children

Networking Practices

Elderly users spend more time interacting with their children than their spouse through online communication media. Online communication media serves as a new alternative platform for older adults to social network with their children, supplementing their daily communication.

Elderly users usually engage in online interaction with their children through online family group chats. Almost every respondent reported that they had a family WeChat group and interacted with their children mainly in this group. In the group chats, they shared information and articles, and talked about their daily issues. My respondent Xing (female, 72, former nurse) did not live in the same city as her son and daughter. She and her husband used WeChat to maintain connections with their children through WeChat. They shared useful articles in the group chats and their children would also report on things related to their life such as the weather, their grandchildren's studies, children's work, and so on.

“My son usually stays up late for work. It is not very healthy, so I will send articles in the group chat which talk about how staying up late harms the organs of his body. Then I will @ him so that he can see it. My daughter can also see it. Sometimes I will also send weather information for their city. They sometimes also report on how they are doing, especially our grandchildren's study situation.” (Xing, female, 72, former nurse)

Elderly people, especially those living away from their children, use online

communication media to maintain frequent contact with their children. One of my respondents, Ye, was 70 years old and had been a housewife since she gave birth to her son. Her son now worked in the United States as a programmer. Before she started to use WeChat, she contacted her son once a week by Skype. Now with the use of WeChat, she receives messages from her son almost every day.

“Before using WeChat, we did not have contact very frequently because he is very busy so did not have so much time for talking in front of the computer. Whenever we used Skype for a video talk, we only talked for several minutes. WeChat is more convenient because we can talk to each other more frequently with text messages. He does not need to sit in front of a computer to talk with me. We can talk during any spare moments.”
(Ye, female, 70, housewife)

Online communication media are also used for coordinating household tasks, and especially caring for grandchildren. Many elderly people in urban China, need to take care of grandchildren. Many of my respondents had offered to help their children. One of my respondents, Jin, has a grandson who started kindergarten two years ago. Jin undertook the job of taking and collecting her grandson because her son and her son’s wife both needed to be at work at that time. Her son was in the WeChat group for the kindergarten parents where the teacher sent messages asking if they could come to pick up their children. Her son usually forwarded these messages to their family group and Jin would check the information in the family group to pick up her grandson on time. When her son needed other kinds of help, such as cooking dinner for her grandson, he also sent messages in WeChat and then Jin would come to their apartment to help.

Online communication media also serve as an alternative channel for elderly people

to ask for support from their children. Most of the respondents considered their children their primary source of instrumental support. When they faced emergencies, they would seek help from their children. Before they started to use WeChat, they mainly used mobile phone calls. They find WeChat more useful, as they can not only send messages, but also make online calls and send photos. Ding (male, 80, former factory technician) noted in the interviews that when he lost his way on the street, he immediately made a WeChat call to his son. After talking on a WeChat call, he followed his son's instructions, took a photo and sent it to his son. Then his son gave him instructions and he finally found the right way.

“WeChat is obviously more useful for contacting them when I need their help. I can make a phone call, send photos, videos, voice messages and text messages to seek help from my children. When I could not find my colleague's home and got lost in the street, WeChat really helped a lot.”
(Ding, male, 80, former factory technician)

Although the use of online communication media can facilitate their interaction with their children, most respondents reported that they did not interact very frequently with their children online, compared with non-primary ties. They felt that their online interaction with their children did not go very smoothly. Sometimes, they sent messages to their children but received no reply.

“My daughter used WeChat very frequently, but when I sent messages or shared articles with her, she rarely replied or only replied with a few words, such as ‘I know’, ‘ok’. We did not really chat.” (Tang, female, 78, former laboratory technician)

Another respondent, Tuan, and her daughter decided to make a WeChat call once a week, however, her daughter always forgot.

“She did not send many WeChat messages to me. We said we should talk at least once a week. But she forgot a lot. I need to remind her. Sometimes she was outside, so we could not have a WeChat call.” (Tuan, female, 70, former office clerk)

My informants gave several reasons in the interviews for their limited online interaction with family members, including closeness in offline life and the generational gap. For some informants, the lack of online communication with their close family members was because of their closeness in offline life. As some respondents lived with both their children and spouse, they had many opportunities to meet and interact with their family members in the offline environment, so they felt that there was no need to intensively interact with them on WeChat. On the other hand, of the elderly people who had children or grandchildren living in other cities or countries, although they had a strong need to interact with them, most found intergenerational communication online less smooth, because of the gap in interests and differences in ways of online interaction between the elderly people and their young children or grandchildren. For example, Tang (Female, 78, Former Laboratory Technician) noted that her daughter did not like reading the articles about health or news which she shared, because she had no interests in learning about this information.

Impacts on Ties with Children

According to my respondents' stories, online communication media can improve elderly people's accessibility to their ties with children, especially for those who live separately from their children. The use of online communication media can also improve their abilities to develop more intimate relationships with their

children, however, the effect of communication media in improving their relational intimacy with their children was relatively limited.

Although the online interaction that elderly people had with their family members was not very frequent, the elderly people I interviewed still thought that the use of online communication media enabled them to maintain their networks with their children by offering a convenient channel for chatting without bothering them too much. In Ye's (female, 70, housewife) story, the use of online communication greatly enhanced access to her son, who lives in a foreign country, by removing the restriction of physical location. as online interaction is usually casual, elderly people can maintain connections with their children without worrying about bothering them too much, just as my respondent Jiangyu (female, 70, former high school teacher) said:

“I do not live with my son and granddaughter. Sometimes I do not know if they are busy and I do not want to interrupt them by making phone call directly. Now I can send them a message on WeChat. They can reply to me when they are not busy.” (Jiangyu, female, 70, former high school teacher)

Online communication media are able to help elderly people become more intimate with their children by enhancing their level of engagement in their children's life. Online communication media can create a sense of co-presence for all family members, which reduces the sense of distance between them and encourages more intensive involvement. For example, my respondent Ye (female, 70, housewife) said that when her son decided to change his job last year, he discussed this issue with her and asked her for advice on WeChat. Ye was very happy about that because she thinks it may not have happened before they interacted with each other online.

“Last time, he sent messages and asked me for advice on changing jobs. Before he seldom talked about it with me. I did not even know how he got his first job in the US.” (Ye, female, 70, housewife)

Having an online co-presence may help elderly people feel that they are more able to participate in the lives of their children and even grandchildren. Online communication can thus improve immediacy among family members. Elderly people did not report frequent interaction with their children, however, and online communication is mostly still an alternative channel for traditional communication media. The generational gap in the use of online communication media also prevents their children from receiving ideas from them. Online communication media thus mostly does not really help elderly people to maintain an open and fluent exchanges of ideas, nor have more shared social ties.

6.3 Non-primary Ties

6.3.1 Ties with Relatives

Networking Practices

Ties with relatives are commonly maintained by elderly people through the use of WeChat groups. Older users demonstrate high levels of emotional commitment in their online interaction with relatives. The re-emergence of the traditional big family can also be observed through frequent online interactions in online communication media.

Elderly people demonstrate an active presence in their relative groups. Relative groups connected elderly people with their relatives, and even with some distant relatives. According to the interview data, most of the respondents had more than one relative group. For example, my respondent Ye had three relative groups: her extended family group, her husband's extended family group and her brother and sister group. Such relative groups usually consist of 10 to 30 group members. Extended family groups usually include their brothers, sisters, cousins and their spouse. They will also have smaller relative groups which only consist of their brothers and sisters. They interacted with their relatives in the online groups every day mainly through spontaneous conversations.

Compared with other groups of non-primary ties, elderly people exchange more emotional support in their online interaction with relative ties. Although the frequency of interaction in relative groups is not as high as in schoolmate groups, elderly people share more personal stories and feelings online, as my respondent Chenji (male, 70, former factory worker) told me:

“I pay more attention to the relative groups. Because some group members are more closely related to me. If you want to talk about some personal stuff, it is much more suitable to talk about them in the relative group. Then you may get an immediate response and you do not need to worry that some people will judge you.” (Chenji, male, 70, former factory worker)

When undesirable events took place, elderly people and their relatives used online communication media to support each other in the group. Yang's (female, 67, former factory director)'s daughter was diagnosed with cancer and had many highly risky operations. As the members of Yang's relative group, consisting of her sisters,

brothers and cousins, all knew about this situation, they expressed their concern in the online group during the treatment period. Yang also reported her daughter's situation to the group almost every day., The other group members provided much support for their family through this process. Yang felt that she and her family were surrounded by their close relatives, who were very concerned about them, which made her feel warm and reduced her stress.

“This WeChat group is a place for me to express my feelings with my sisters and brothers. Sometimes we did not talk a lot. I just reported my daughter's condition and they just said, ‘everything will get better’. I felt very warm. It was a very hard time for my family. But they made me feel better.”

Elderly people also use online communication media to facilitate the organisation and coordination of offline networking activities, even with remote relative ties. Many respondents reported that the use of online communication media helped and even encouraged them to organise offline activities with their relatives. My respondent Qiang (male, 75, former office clerk) said that compared to other types of non-primary ties, it was relatively easy to engage in offline activities with relatives, as they may live closer to each other and know more about each other's lives. Organising offline gatherings with online communication media was also convenient for them. Sometimes one group member might say “I found a new restaurant”. Other group members might immediately say “let's go” and settle on a time in the group chats. In this way they would have a gathering.

Impacts on Ties with Relatives

The use of online communication media can greatly enhance the access that elderly

people have to their relatives by overcoming their physical limitations and facilitating both online and offline activities. Elderly people can also have a higher level of engagement in their family's life through the emotional support exchanged online, and have more fluent exchanges of ideas, which indicates a high level of relational intimacy. Elderly people can also experience the re-emergence of the traditional big family through this process.

Interacting with each other on WeChat is one of the most important ways for elderly people to maintain their access to relative ties, and WeChat could even help some nonagenarians to overcome their physical limitations and network with others. For example, my respondent Ling (female, 78, former factory worker) reported that she had a relative, Lei, who was 93 years old and lived in another city. Because Lei could not walk and Ling was also not in good health, they could not meet in person. Lei also had poor hearing, so she could not make phone calls. Fortunately, Lei had started to use WeChat and sent messages or photos every day in the relative group chat. Now WeChat is their only channel to talk with Lei. Ling said that Lei's messages in the group chats reassured her that Lei was still well. If she had not received messages from Lei for several days, she started to worry about her.

“Lei cannot hear, so she cannot answer the phone. Now she can use an iPad to chat with me on WeChat. It is much more convenient for us to maintain connection. I asked her to send photos to us. When she went outside, she sent photos. Sometimes when the weather is good, she also sent photos to us. Then I know that she is doing well.”

As elderly people are willing to exchange support, especially emotional support, with their relatives, they can easily develop closer relationships. My respondent Chenji (male, 70, former factory worker) discussed the way that,

as they shared many personal stories and feelings in relative groups, they felt more connected and attached to their relative ties, and became more engaged.

“As we shared our feelings on the news, articles and daily issues in relative groups every day, I felt that our relationships got better. We older adults share lots of similar opinions on these things, which makes me feel closer to them. I also rely on them more when I meet difficulties. For example, last time I asked them for suggestions about getting health examinations, as I did not have much knowledge about this.” (Chenji, male, 70, former factory worker)

With the improvement in accessibility and relational intimacy among relative ties, there has been a re-emergence of the traditional big family. The process of modernisation has meant that the traditional big Chinese family was rarely seen in urban cities, and ties with extended kin were weakening (Zhang & Goza, 2006). Elderly people still valued extended families, however, establishing or joining many online groups, which connected them with extended kin ties. After retirement, they had more time to maintain and develop these ties. As levels of relational intimacy among extended kin greatly improved, the traditional extended family returned to elderly people’s social lives:

“Before we did not have a chance to maintain these relationships with our big family, now it is easier. I also have more time, so we chat a lot.” (Qi, female, 68, former office clerk)

“Some of those extended kin, we did not maintain very good relations before, because of lots of reasons, like we were all busy and we had some small conflicts. We did not talk a lot. Now there is a group to gather us

together... I felt we got closer and it was nice.” (Qinyao, male, 69, former technician)

6.3.2 Ties with Coworkers

Networking Practices

Elderly people value their connections with work units, as they consider the work unit an important source of support in their old age. WeChat allows them to actively participate in online groups of their former co-workers and rebuild their connections with them, however, how much they commit to these online groups depends on their previous work experience.

Ties with the workplace and former co-workers are of great importance for many older adults. The workplace in China is less of an economic enterprise for this current generation of elderly people (born in 1930-1950) than a social institution which provided essential services and goods for their everyday life, and so ties with co-workers play an important role in their social networks (Bray, 2005; Ruan, 1993). Before retirement, people have very close relationships with their co-workers, because they spent many years working and even living together. Once they retired, most of an elderly person's welfare, including their old-age pension, comes from their work units. State-owned work units even have an Office for Retired Employees, which is in charge of providing welfare and organising activities for retired employees (Flaherty et al., 2007). Older adults thus consider their ties with co-workers and their work unit important sources of social support.

Elderly people would generally like to maintain their contact and exchange support

with their former co-workers, but it becomes harder for them to maintain these ties. My respondent Yao (female, 82, former researcher), who used to work in a provincial-level research institute, reported that she and her co-workers, although retired, still felt that they belonged to their work unit. They described their work unit as “a second home” where the retired co-workers all supported each other. One of her former co-workers had a serious physical inability and lived alone. When he became ill, he sought help from the Office for Retired Employees and most of her former co-workers were willing to help. They even helped him find a good home-care worker. Other respondents who had retired from state-owned work unit also reported that their work unit had an Office for Retired Employees which organised activities and solved problems for retired employees, but they still felt that they lacked enough opportunities to maintain their connections with co-workers after retirement.

“[Before starting to use WeChat] I felt that I had lost the connections with most of my former co-workers, because I moved out of the district where most of my co-workers lived.” (Jin, female, 68, former university staff)

WeChat enabled elderly users to build or rebuild connections with their co-workers and their work units, mainly through group chats. According to my respondents, they established their own groups for retired employees and also participated in the groups organised by the staff of their work unit or younger employees. Sometimes, they also used one-to-one chat to contact close friends from their work unit. Mostly they preferred group chats, as they could conveniently exchange information with many co-workers.

Although their online interactions are not as frequent as those with old schoolmates

or relatives, most of the respondents attached great importance to their online ties with their former co-workers. My retired respondent Yao reported that she devoted a lot of time to interacting with her former colleagues in WeChat groups, as she found her former co-workers shared much useful information, and they exchanged help there. Most of their online interaction with co-workers was information exchange, including activities organised by work units, sources of health services, discount information for local supermarkets, and so on. Some group members would also ask for help in group chats. For instance, one of Yao's former colleagues fractured their foot, and he asked group members to introduce good specialist doctors in the provincial hospital. In most cases, the online networking practices in groups of co-workers involve a social support exchange.

Those respondents who did not work in a state-owned work unit, however, did not have an active presence in their co-workers' group. For example, my respondent Jing (male, 65, former factory technician), who worked in a private factory as a technician, reported that their factory did not have an Office for Retired Employees. Although his former colleague established a WeChat group, they did not chat very much in the group. Because he was less familiar with most of the co-workers in the groups, he was only in monthly contact with close friends from the factory on WeChat.

“Our private factory did not have many collective activities so our interaction with other co-workers was limited. I did not know many other co-workers in this big group...I had a small group with my close friends. They were also my co-workers. We worked closely.” (Jing, male, 65, former factory technician)

In general, the use of online communication can greatly increase the opportunities for elderly people to connect with their former co-workers, and encourage social support exchange. To some extent, their relational intimacy can also be re-developed during this process. As most of their interaction is about support exchange, however, the depth of their communication is relatively low. Online interaction facilitates the reunion of former colleagues and reduces the feelings of hierarchy among them.

With the help of online communication media, elderly people can easily reach out to their former co-workers and rebuild their co-worker networks. Before the use of online communication media, elderly people reported difficulties remaining in frequent contact with former colleagues after retirement. Online communication media helps them overcome these difficulties by reducing the effects of physical distance and physical mobility. Elderly people are able to reach out to their colleagues with a few taps on a mobile phone. The use of online group chat also allows virtual reunion with their former colleagues, which brings back memories of working together in work units for older adults.

“The group with other retired staff from our department is really good. We worked together for more than 40 years. Now some of them have moved to another city but the online group brings us together.” (Tuan, female, 70, former office clerk)

It was also noted that elderly people are in favour of this kind of online reunion in the group chats because it can enhance their access to former co-workers without bothering those who were still at work.

“Some younger co-workers were still at work. We wanted to know if they are still doing well but did not really want to interrupt them too much. Group chat is a good way to communicate with these young people.”

(Ding, male, 80, former factory technician)

Online communication media can also help elderly people to build intimate relationships by enhancing their level of engagement, although its effect on relational intimacy is still somewhat limited. As online groups of work units allow people to become intensively involved in interaction with co-workers, many respondents noted that they became more connected with their co-workers, and knew more about each other's lives after retirement, however, they did not exchange ideas freely and openly in these group chats. According to Ding, most of their interaction is about sources of hospital care and activities. They did not share many personal stories or their feelings in group chats, as he felt that “it was not appropriate to talk about many personal issues in front of former leaders or subordinates. This reserved attitude in talking about personal life in group chats limits the digital impact on the relational intimacy of ties with co-workers.

It is noteworthy that online interaction has demonstrated the ability to reduce the hierarchical environment among co-workers. For example, my respondent Ping, who is a former kindergarten principal, reported that after the establishment of the group with her co-workers, as most of the group members used an internet name, they would call each other by their internet name rather than their title, so she felt that the relationships among co-workers in different positions were more equal than before.

“In the online groups, we call someone by their internet name, like Little Mouse. In the offline environment, we needed to call them by their title. In the online space, there is no need to do that. We call you ‘Little Mouse’ or your real name even if you are a principal or a director. That is much better than before. We are in an equal position in the online groups.”

The hierarchy does not disappear completely in online interactions, however, especially when talking with younger co-workers. My respondent Guang was a former state cadre. He was invited to several groups with younger co-workers, as these younger people invited him to provide suggestions and guidance on their work. In these online conversations, Guang felt that although the use of online communication media can shorten the distance to some extent, the younger co-workers still called him by his previous title and behaved cautiously.

“I am no longer in that position. But they still call me using that title. Sometimes they showed me their work in progress and I could comment on their work. They were very cautious in talking with me. I could feel it.” (Guang male, 70, state cadre)

6.3.3 Ties with Old Schoolmates

Networking Practices

Ties with old schoolmates are not usually considered close ties in elderly people’s social networks because they may have lost contact with them for several decades. When elderly users entered WeChat and organised WeChat groups, however, most

(re)connected with these ties. Interaction with these ties also became an integral part of their online networking activities.

Ties with former schoolmates are usually distant in personal networks (Antonucci & Akiyama, 1987), especially for elderly people who graduated from school many decades ago. When I asked the respondents if they had remained in contact with their former schoolmates before, most of the respondents told me that they had remained in contact with fewer than five people in the groups. They did not have contact with most of their schoolmates for many years. Tang (female, 78, laboratory technician) explained that she only maintained connections with two old classmates from her professional school because after their graduation they were assigned to the same work unit and worked together for several years. She might hear news about the rest of her schoolmates from her closer friends, such as about their marriage, but they did not contact each other.

Surprisingly, ties with old schoolmates are a substantial part of most elderly people's online social networking activities. Twenty eight out of my 35 respondents reported that they spent more time interacting with their old schoolmates compared with other ties. One of my respondents, Jiangyu (female, 70, former high school teacher) showed me a WeChat group which consisted of her high school classmates. She said there were always many new messages in the group chat every day. Although she had not met some of her classmates for more than 40 years, all the group members interacted with each other very intensively. When I asked how they usually interacted with each other in this group, she said,

“Sometimes we just have casual conversations and daily greetings about

what is happening lately in our life. Sometimes some of my group members share articles about health, food and news. I would read them. I like to share classical music in the group. Every time I share it, the other group members will comment on it a little bit and then we talk a little bit.”

Although ties with old schoolmates are rarely considered a reliable source for social support, it was also observed that elderly people in the former schoolmate groups exchanged social support online. For instance, my respondent Chou (male, 72, former technician) told a story about providing offline emotional support to his group member Yangyang, in their group of former schoolmates. Yangyang used to be an active member in the group chats and helped to organise many offline activities. One day, Yangyang said in the group chats that he was diagnosed with cancer and was hospitalised. After seeing the messages, Chou and other group members decided to go to Yangyang’s hospital to show their support. In addition to bringing flowers and fruits to Yangyang, they even took turns to visit him and chatted with him to keep him happy. Emotional bonds among group members are strengthened to a large extent through these processes.

Despite the difficulties of offline gatherings or meetings with their old schoolmates, older adults try to use online communication media to organise offline gatherings with their older schoolmates. According to my respondent Chen, the monitor of his class in primary school missed their classmates and decided to gather them together, both online and offline. When an online classmate group was established, they used online communication media to organise an offline reunion. Influenced by the atmosphere of reminiscence, many classmates travelled from other cities to the offline reunion. Having graduated from their primary school fifty years earlier, they held an offline gathering in Nanjing.

“When we had the gathering, most of our classmates came. Some even travelled from Sichuan or Wuhan to Nanjing to see us. In the gathering, we gave a round of applause together for our monitor and other classmates...because they tried very hard to make this reunion possible. After 50 years, we were still like a family.” (Chen, male, 65, former skilled worker)

Another respondent, Xing, also travelled from Nanjing to Suzhou to participate in their offline gathering. Her classmates in her professional primary school announced their plan for an offline reunion in Suzhou on WeChat. After finding out about it, Xing asked if she could come, and told the organisers her available time in the group. Over three-quarters of her classmates came to this offline gathering. One of her classmates even came from Hong Kong to join the reunion with their classmates. After the offline gathering, they shared many photos taken in the group chats and they also interacted more frequently than before.

“I was surprised to see so many old friends at the gathering. I was very happy that day. We chatted, ate together and even sang some old songs. It was a good memory for me. [Shows photos of the gathering to the interviewer.] After that gathering, we kept in contact online. We became closer.” (Xing, female, 72, former nurse)

There are three reasons for elderly people’s active interaction with old schoolmate ties. When they are retired, older adults have more time for social networking activities, such as my respondent Ting (female, 70, former factory worker) who said, “We have more time to interact with other people now. When I was at work, we did

not have as much time for networking”. Elderly people are usually the same age as their schoolmates, and are likely to be at the same life stages. They may therefore have a more common language than between parents and children, as they all face decreasing mobility, illness and increasing time for social networking, as did Tuan (female, 70, former office clerk) who said, “I share some common interests and needs with my old schoolmates, such as the need for health information. We also do not have an age gap.” This phenomenon corresponds with the theory of homophily (Kossinets & Watts, 2009) which indicates that there is an observed tendency for people to associate and build social relations with similar people. Compared with other groups of same-age peers, such as co-workers, there were no hierarchical relationships among old schoolmates, which may make elderly people feel more comfortable interacting with them. My respondent Yexing, who used to be an office director in a local state-owned factory, admitted that he felt more relaxed when interacting with old classmates:

“You still felt that you need to be careful when you interacted with those old leaders, but when you interacted with your classmates, you did not need to worry that much. We also worked in similar fields and had shared memories. We have a lot to talk about.” (Yexing, male, 70, former office director)

Nostalgia is also an important reason for frequent interaction across the online and offline environments. Some of my respondents reported that they had become more interested in reunions with their old friends and classmates since growing old. Increasing free time since retirement and online connection also allowed this kind of reunion. For example, Tian said that she was less enthusiastic about reunion

before retirement, because she was busy with taking care of both her jobs and family. Once she retired, she felt she had more time to rebuild the connections with these old friends. Luckily, online communication media provided this chance for her to re-establish these connections. She was also influenced by the atmosphere of her old schoolmates group, and participated in online chats and offline gatherings.

“It was nice to recall those memories. It was also heartwarming to see we were still together and supported each other after fifty years.” (Tian, female, 75, former factory technician)

Impacts on Ties with Old Schoolmates

The intensive interaction in groups of old schoolmates enables elderly people to develop the accessibility and relational intimacy of their ties with old schoolmates. Group interaction, support exchange and offline activities can help elderly people to build close emotional bonds with old schoolmates and satisfy their shared social needs.

There are two aspects of the impact that online interaction with old schoolmates has on accessibility: the accessibility of social ties and social resources. Elderly people reported that they had lost contact with most of their old schoolmates before using WeChat, and it is observed that elderly people lacked efficient and convenient channels to build connections with these ties. Online communication media allowed them to rebuild these connections and provided them with new opportunities to interact with these, ties both online and offline. As online communication encourages different forms of support

exchange, elderly people are also able to exchange social support with old schoolmates.

In addition to providing access to social ties, using WeChat can also greatly strengthen relational intimacy among group members in engagement, communication and shared friendships. My respondent Ling reconnected with her high school classmates through online groups. Spontaneous conversations over a long time meant that she felt that she no longer had a sense of distance from these old classmates and became more engaged. She exchanges ideas every day, fluently and openly with other group members, about their interests, daily life and feelings. She and her old classmates, even those she did not know very well before, became close friends and shared many interests such as literature. For example, one of her classmates often shared his poems in the group chat. It was the first time for Ling (female, 78, former factory worker) realised that her classmate was so good at writing poems. As Ling has similar interests in poetry, they became close friends online and often interacted with each other. When this classmate said in the group chat that he had fallen ill, Ling visited his home. They talked more about poems and shared life stories. From her classmate's introduction, Ling also built more ties with people who are interested in writing poems.

“When we were in high school, we were only interested in playing. I did not even know that he was so talented at writing poems and his poems even won several awards. He is also a very nice person. I like talking with him. Last time he was ill, I went to his home, we talked a lot about ourselves and poems. He also introduced more poet friends to me. They are also interesting people.”

Ling's experience of turning old schoolmate ties into very close ties is common among my respondents. The use of online communication media helps elderly people to develop their relational intimacy with their social ties. They become more connected and attached, exchange ideas openly and fluently with them and have more shared friendships with their old schoolmates.

6.3.4 Other Non-Primary Ties

In this part, I would like to talk about some other types of non-primary ties mentioned in the interviews, as well as how elderly people use online communication media to manage the ties and impacts of these networking practices on the accessibility and relational intimacy of social ties. Online communication media provide many new opportunities for elderly people to develop and expand their social networks within local communities, interest groups, and so on. Elderly people can actively reach out to these different types of social ties and gain relational autonomy through online networking activities such as group activities and support exchange.

Elderly people manage their connections with local community using WeChat groups. Some of my respondents reported that they had joined local community groups online. The functions of these online groups were mainly sharing local information, exchanging support and planning outdoor activities. Embedded in physical proximity, elderly people can greatly enrich both their online and offline social life by joining group chats. According to my respondent Wang (female, 76, accountant), she exchanged information with her neighbours in her WeChat group, which consisted of people living in the same area, such as discount information for

the local market and offered help when group members needed it. She also added some of her neighbours as WeChat friends. In addition to sharing information, Wang sometimes went to exercises in the nearby park with her neighbours.

“I would ask them if they wanted to go outside today on WeChat. If they said yes, we would go together. During exercises, we talked about our family, children, local news, and so on. We sometimes also shared these on WeChat.” (Wang, female, 76, accountant)

It seems, however, that only local communities which were located in the dormitory districts of work units could attract the active presence of elderly people. The respondents who considered local community groups important in their online social networks all lived in the dormitory districts of work units and most of their online group members were from the same work unit. Some of my respondents had moved to a new neighbourhood and they all said that they did not have an online connection with local communities. Some did not even know their neighbours, as my respondent Xiwang (male, 65, former technician) said, “I used to know my neighbours, because most of us were from the same work unit and friendly with each other, but now I live in a new neighbourhood. It was too hard to meet people. Most of my neighbours were younger people. They do not like to talk to me.”

In addition to ties within neighbourhood communities, some of the elderly people were taking courses at local universities for the elderly, and they may also establish ties with their new classmates. Local university for the elderly was a place for elderly people to meet new friends and develop new ties. My respondent Yao (female, 82, former researcher), took three courses at the local university for the

elderly. She met three new friends during classes there. They then established a WeChat group to discuss course content and plan offline meetings. WeChat was the platform they used for convenient access between themselves. WeChat facilitated their discussion, helping them to quickly develop friendships in their old age.

“We always discuss where we will meet before the class on WeChat. We usually meet first before the class begins and we will have some coffee or desert together. We soon became close friends.” (Yao, female, 82, former researcher)

Some elderly people also committed to online interest groups to build new ties and develop relational intimacy with these ties. My respondent Dai (female, 71, former teacher) was really interested in learning computer software, such as PowerPoint and Photoshop. She took courses at the university for the elderly and joined the WeChat groups, which mainly consisted of elderly computer learners. She made PowerPoints and used memory tricks to teach elderly people in the groups how to remember the complicated operations of the software. If she met problems in using the software, she also asked for help in the WeChat groups. During this process, she strengthened the ties she had built at universities of the elderly and developed new ties with other group members. She found it was comfortable to chat with these friends because the main topics in the group were about learning to use software, which she was really interested in. She did not need to talk about private issues and household chores, as she said, “It is really interesting to talk about computer software and learn from each other. We became closer through this learning process. But [in WeChat] we do not need to talk about ourselves a lot and can just share what we like.”

When it comes to managing these special types of ties through online communication media, it was observed that elderly people’s socioeconomic status played an important role. The respondents who attended university for the elderly and had an active presence in the local community were mostly retired from state-owned work units and had a higher educational level. My respondents who had secondary school or a lower education level did not mention these online ties during their interviews.

6.3.5 Summary and Discussion

This chapter delineated elderly people’s networking practices with different ties and the impact of these networking practices. Online communication media offer new connectivity among older adults so that they are able to co-present with their various social ties online (Cui, 2016; Licoppe, 2004). These elderly users who faced physical limitations and had increased social needs actively used online communication media as a tool to maintain and expand their social networks. The way that they use online connectivity to manage their relationships, however, differs according to the type of social tie.

Table 6.1 Patterns of online networking practices with different ties and their impacts on social ties

Types of Social Tie	Ties with Spouse	Ties with Children	Ties with Relatives	Ties with Co-workers	Ties with old schoolmates
Frequency of Networking Practices	Not very frequent	Not very frequent	Very frequent	Frequent	Most frequent

Major Forms of Networking Practices	One-to-one interaction	Family groups	Relative groups	Groups of former co-workers	Groups of former schoolmates
Major Content of Networking Activities	Coordination of household chores	Online sharing, daily chats, coordination of housework; support exchange	Emotional support exchange (mainly), support exchange for undesirable events, coordination of offline networking activities	Social support exchange, reunion	Online sharing, daily chats, different forms of support exchange, reunion, coordination of offline networking activities
Impact on Accessibility	Enhanced	Enhanced	Largely enhanced	Largely enhanced	Largely enhanced
Impact on Relational Intimacy	Little influence	Limited influence	Strong influence	Relative influence	Strong influence

As shown in Table 6.1, we have observed that online communication media can serve as a new space which helps relationship management with non-primary ties. Ties such as ties with old schoolmates, which used to be rarely accessed in offline social networking activities due to the physical distance and decreased mobility in old age, became the centre of online social networks. Online communication media creates opportunities to improve the level of intimacy among network members for relatively close ties such as ties with relatives. It also helps elderly people connect with their former co-workers and work units in a much more convenient way for support exchange. When it comes to very close primary ties, however, the use of online communication media only serves as an alternative communication channel, supplementing offline networking practices.

Aging does not always hinder older adults from managing their online networks and developing intimate relationships, rather, in online environments, aging can encourage elderly people's active online social networking process with social ties. Elderly people's increasing free time after retirement leads them to join many online groups, such as groups with old schoolmates and co-workers, and to participate in many group activities. Their limited physical capacity can also encourage them to use online communication media more frequently as WeChat is probably their only channel to maintain connections with some ties.

Chapter 7 Impacts of Online Connectivity on Individual Life in Late Adulthood

7.1 Introduction

After discussing the impacts of online communication media on older adults' networking practices and social relations, this chapter will focus on individual life: how online connectivity reshapes elderly people's social life. Answering this question can help us obtain better understanding about whether the use of online communication media has the potential to make elderly people become "networked individuals" or "alone together". The analysis will be divided into the following three sub-questions: (1) Do older adults have more diverse social networks and exchange more resources with their social ties? (2) Do older adults feel insecure and anxious about their online relations? (3) Do older adults gain more autonomy? We will consider whether there are differences in the digital impacts on older adults according to different genders and socio-economic status.

7.2 Impacts on Networks and Resources

As old age usually relates to physical setbacks and a lack of networking opportunities, most of my respondents reported a reduction in social networks in their old age before going online. For example, my respondent Zhang is in his 80s. He is a former college professor in one of the local universities in Nanjing and lived with his spouse. Most of his social ties are also in their 70s or 80s and they experienced different kinds of physical setbacks and live in different cities.

Although he still liked networking with his social ties and learning digital technologies, he did not have many networking activities and spent most of his time with his spouse. In order to maintain social networks, Zhang made phone calls to his relatives and former co-workers when he felt it had been a while since their last interaction. As most of his co-workers had also experienced a decrease in physical mobility and some were in poor health, he rarely had the chance to meet them or chat with them about their recent situations. He felt that their relationships were not as close since their retirement. He noted that he did not know that the wife of one of his colleagues has passed away until he asked his colleague if his wife was doing well in a phone call:

“It was too hard to maintain these relationships. I moved to a new apartment and did not live close to them. I also felt it was not appropriate to make phone calls with them very frequently.”

Another respondent, Wang, is 76 years old. She was an accountant at a local university. She felt that her social networks became smaller after her husband was diagnosed with cancer two years ago. Wang said that she had to take care of her husband since then and spent most of her time at home or in the hospital, so she rarely contacted her other non-primary ties.

The integration of WeChat in their social life helps older adults to re-develop their social networks in their old age. Once Zhang began to use WeChat, he was invited into WeChat groups with his former colleagues. He found that it was not disruptive to send messages in the group chats and that it was fun to share information and express feelings on WeChat. He started to send many messages in online groups in

order to re-develop his close connections with these ties. Zhang was also invited into a group made up of his old friends who had met in the countryside of Yunnan Province during the Cultural Revolution. As a “sent-down youth”⁴, Zhang spent eight years in the countryside because of the Campaign to Send Youth to the Countryside in the 1970s. After they left the countryside, he and his old friends went to different parts of China and he lost contact with most of them, however online groups brought them together again. In the group chat, they recalled the old times and talked about their current lives. When I interviewed Zhang, he has used WeChat for over a year and reported that now his social life was enriched by reconnection with his former colleagues and other “sent down youth”.

Many respondents reported that they were able to mobilise and exchange more social resources. WeChat provided Wang with a suitable channel for exchanging useful health information. Wang has a strong need for health information because of her spouse’s declining situation.

“Because of my husband’s illness, I realised that health was the most important thing for us elderly people. My health was not that good. Life became hard. Some health articles are useful for me.”

She enjoyed the atmosphere in online groups, where many group members shared health articles. If she read good health articles from one group, she would also forward them to other groups. Wang thought she received much more information than before through this process. Additionally, when undesirable events took place,

⁴ “Sent-down youth” are the young people who left the urban districts of China to live and work in rural areas as part of the “Campaign to Send Youth to the Countryside”, which began in the 1950s and ended in the 1970s (Rene, 2013).

online communication media also helped older adults to seek help from multiple layers of their social networks. My respondent Ho, who was secondary school educated and used to work in the local state-owned factory as an office clerk, explained that the use of online communication media brought more resources for her use when she was injured and had to stay at home for more than three months. When she noted her injury in her WeChat groups, one of her relatives who lived in Shanghai and used to be a doctor gave her much useful advice on recovery training. One of her old schoolmates introduced a good doctor for her. When she felt very depressed about her injury, online companionship from her friends was important to her: “I can do anything but stay in bed so I had to play with my mobile phone. My friends and schoolmates spent time with me and encouraged me a lot online.” Some of her schoolmates also came by and visited her, which made her feel warm. Social networks on online communication media offered Ho opportunities to mobilise various kinds of resources from multiple layers of social networks, and she had not been able to access most of these resources before she went online on WeChat.

7.3 Impacts on the Fragility of Social Relations

Most of my respondents did not report that the relationships they developed online were fragile and superficial. Conversely, many noted that as they were able to develop stable and intimate relationships with non-primary ties, online communication media reduced their loneliness.

Most of the respondents only interacted with their existing ties online, so they did not worry about the reliability and fragility of these ties and were willing to

exchange support with these online ties. Most respondents reported trusting their online ties because they had known each other for many years, which makes older adults feel more secure about their online relationships. My respondent Chen, who was a 65-year-old retired skilled worker, explained that he and his group members trust each other so they all readily exchange support.

“We had all known each other for many decades. Although we did not have opportunities to meet very often in the offline environment, we trust and help each other.”

Although the intensive use of online communication might reduce elderly people’s time spent interacting substantively with their close family members in the offline environment, the effects of digital use on the relational intimacy of family ties are limited. Zhang’s spouse was also an active user of WeChat, so they helped each other in learning how to use it. Playing with a mobile phone has become part of their family life. Zhang and his wife liked chatting about the content they saw on WeChat. “Sometimes we gossiped about my online friends. It was fun.” In this case, the use of online communication media did not have negative effects on his relationship with his spouse, instead it helped them the relationship to develop.

I did receive some complaints from their families about my respondents’ intensive use of mobile phones. For example, after the interview with my respondent Ho, her husband came and talked to me, “She (Ho) uses WeChat too frequently. Every time I see her, she is always playing with her mobile phone.” When I asked if the overuse of her mobile phone had a negative impact on their family life, he denied it: “No serious negative impacts. I still interact with her a lot every day. But sometimes she does not listen to what I am talking about.” Ho laughed and said to me, “I get bored

with him. He is not interesting at all, so I talk to my online friends. Ha-ha. “In this case, Ho’s intensive use of online communication media seems to prompt complaints from her spouse, but the effects on their family relationship are not serious. Long-term family-bounded life in old age may give people enough time to interact substantially with their spouse, so the integration of online communication media will not affect this situation greatly.

7.4 Impacts on Autonomy

As all my respondents chose to “age in place”, most lived in a family-bounded life. In this situation, online communication media helped them to gain more autonomy in developing their own interests, and, in some cases, gaining opportunities to enrich their life by temporarily escaping from family life.

Some of my respondents further developed their own interests through the use of online communication media. For example, my respondent Dai used a WeChat group for teaching and sharing knowledge of computer skills with other group members. She has reported that teaching and sharing knowledge with others online gave her a sense of accomplishment and enriched her social life after retirement. Before using WeChat, my respondent Ho did not have many opportunities to share her favourite classic music, “My husband was not interested in music at all.” Online sharing helps her to develop her interests in classical music, “In the group with my old schoolmates, my old friend would always discuss music with me. That was nice and encouraged me to learn more about music.”

Online communication media helps elderly people to escape from home-bounded life. One respondent, Chou (male, 72, former technician), used WeChat to hold a reunion with his high school classmates in group chats. They organised many offline activities such as trips and gatherings. Chou participated in these activities and travelled to Shandong and Jiangxi Provinces with his old friends, with whom he had reconnected online. Chou noted that it had been several decades since he had travelled with friends rather than family.

“To get rid of home-bounded life temporarily is nice, because our elderly people have relied on our family for so many years. Going travelling with friends made me feel free and independent.”

When dealing with family conflict, online communication media offers alternative channels to express sentiment and seek emotional support. My respondent Tang noted that when she had conflicts with her husband, she immediately talked with her online friends, which helped her to calm down. “Before using WeChat, I could not do that. Because if I made a phone call, my husband would hear it. Now I can type and my friends will comfort me and give me advice.” Tang explained that this escape was necessary, because it made her feel that she was supported and was able to deal with these family conflicts.

7.5 The Role of Gender and Socioeconomic Status

This study demonstrates that older adults of different gender and socio-economic status have many shared practices and habits in terms of using WeChat. They also

reported the positive impact of WeChat on older adults' individual lives in terms of their networks, resources, relational insecurity and autonomy. Gender and socio-economic status still affects their online networking practices and their level of participation in online interaction. How much using WeChat reshapes the social life of an elderly user thus varies.

Gender affects the online networking practices of elderly users. Both male and female respondents noted group reunions as one of their main purposes of online interaction, but male users also considered exchanging information as their main reason for interacting with their social ties, while female users emphasised both informational and emotional needs. For example, one of my male respondents, Chen (male, 65, former skilled worker), noted that his favourite group involved his co-workers who invested in the stock market, because they shared much useful information on investment. Another respondent, Qiang (male, 75, former office clerk), spent most of his online time reading and sharing articles from group chats, but rarely talked about his life situation on WeChat, "I do not like to talk about myself and my life too much because I think it is private. But I like to exchange information because we can all learn a lot." Female respondents also enjoy exchanging information, but they usually spent more time on groups which not only exchanged information but also shared more personal stories and feelings. My respondent Zhu was in her 80s, but still participated actively in group chats by sending voice messages. She noted that although she liked reading articles she preferred those groups where she could express her feelings and listen to other people's stories.

“I think WeChat is not just a tool for information. It is also a place for us to share stories. I enjoyed the times that we exchanged ideas about the kinds of difficulties we faced and expressed our feelings about our everyday lives through voice messages. It made me feel emotionally connected to my relatives and friends.”

Socio-economic status affects the level of participation in online interaction. Although most of my respondents had more than five WeChat groups, the number of groups which people with higher socio-economic status join is usually higher than for people with lower socio-economic status. For example, my respondent Ping, a retired kindergarten principal, and Guang, a retired state cadre, have the most online groups among all my respondents, 14 and 15 respectively. Older adults with high socio-economic status are more likely to participate actively in group chats. For example, Ping has organised many online groups and she often led the discussion on news in her WeChat groups. By contrast, Ting as a retired factory worker, said that though she also connected with many ties and read health articles in group chats, she did not participate in group chats a lot. “Most of the time, I just like to read articles they share and send greetings. It is enough for me, I do not like to lead the discussion. Sometimes other group members say I always disappear.” In comparison with Tang, it is more difficult for Ting to develop intimate relationships and extend her social networks through online interaction.

Due to these differences among older adults of different gender and SES, the impacts of online communication media use on their social life also differ. As female users attach importance to both information and emotional needs, they may use different kinds of resources online, develop more intimate relationships and

reduce loneliness. Male users may gain more information but are less emotionally connected with their social ties. People with higher socio-economic status were usually embedded with more social ties online, and participate more actively in networking activities. It may help them become more like a “networked individual” than those of relatively low SES.

7.5 Summary

The use of online communication media helps elderly people to become more like “networked individuals”. Firstly, online communication media helps them become embedded in more heterogeneous and intimate social networks. Secondly, when older adults are in need of social support, they can mobilise more social ties in their social networks. Thirdly, they gain more autonomy by developing their interests and escaping from home-bound life.

It can also be argued that older adults are not “alone together” once they enter online communication media. Most older adults have trust in their online relations because they are based on long-term offline relations. Although there are complaints from family members about an older adult’s intensive use of online communication, the negative effects of digital use on the relational intimacy of family ties are limited. During my interviews, no one reported a significant decline in relational intimacy in close family ties. In Zhang’s case, online interaction even enriched family life by becoming part of their conversation.

Gender and SES play important roles in the way that WeChat is reshaping older adults’ social life. Female users are more likely to attach multiple meanings to their

online networking practices, including group reunion, information exchange and emotion communication, while most elderly male users network with their social ties for information exchange and group reunion. People with high SES also have advantages in developing large and intimate online networks.

The analysis of these respondents cannot represent all situations, however. These stories only show one possibility for online connectivity in the individual lives of elderly people, where older adults become more like “networked individuals”, rather than “alone together”.

Chapter 8 Conclusion and Discussion

8.1 Introduction

This study analysed the impact of online communication media on the networking practices and social ties of elderly Chinese users of WeChat. The analysis revealed WeChat's compatibility with aging and the differences in older adults' online networking strategies among diverse social ties, which have rarely been examined in the literature. The introduction of online connectivity in late adulthood encourages older adults to build their online social networks and enables online communication media to affect the accessibility and relational intimacy of social ties for elderly users and to reshape their individual lives. This chapter summarises and discusses the main research findings of this study.

8.2 Elderly People's Online Networking Practices and Aging Condition

By conceptualising elderly people as agents, this study describes the way that elderly people engage in online networking activities, establishing their own social networks and exchanging social support. Their networking experience with online communication media provides new insights in understanding the conceptualization of digital divide.

With the introduction of online connectivity, elderly people's networking practices have been reshaped in two dimensions. The first dimension is the transformation of networking activities. In the online version of one-to-one interaction, group-based activities and support exchange activities, older adults are not restricted by settings

such as a meeting or in-home visits at a certain time (Loe, 2011). These networking activities can fit into the daily lives of retired people and various forms of social support can be more efficiently exchanged, including informational support, emotional support and fundamental support. Secondly, older adults adopt different networking strategies in their online management of different social ties. Consistent with the theory of “connected management”(Licoppe, 2004), older adults are able to hold continuous conversations with their various social ties online, even some old and distant ties. The frequency and contents of their networking practices differ by tie traits, however.

The way that elderly people use online communication media to interact with their ties is very different to that of younger users. Elderly users of WeChat prefer using online groups to connect with their social ties, while younger users usually use both one-to-one interaction and group chats to contact (Shen & Gong, 2018). Elderly users’ online social networks are centred on non-primary ties, such as ties with former schoolmates, while most frequent online contacts of younger users are usually close ties (Sheer, 2011). In addition, unlike many younger users who develop many new social ties through the use of online communication media (Di Gennaro & Dutton, 2007), elderly users build online social networks mostly with their existing ties, and most are unwilling to make new friends in an online environment, and consider such new ties unreliable.

This unique use pattern of elderly users is not only attributed to the social expectations of older adults; some other influential factors also play important roles. Firstly, the ability of elderly users to use different features on WeChat affects their online interaction. For example, elderly users reported that they could not write

long text messages because it was difficult for them to type a large number of words. For instead, they prefer to use online sharing, voice messages, and to write short messages. Secondly, older adults' interests in online content may influence their online social networks. Elderly people demonstrate more similar interests in online content with their non-primary ties, such as their interest in health articles, and the generational gap in interests hinders them from exchanging these contents with their children. The younger generation usually does not have strong interests in health articles. Older adults may thus have more online interaction with their same-age peers. Thirdly, relationships that elderly users have with their close family ties affect their online interaction patterns. Some elderly people have frequent offline interaction with their primary ties. Online communication media are thus only used when they are separated. Some older adults who have experienced family conflicts or become tired with household chores. They spend more time interacting with their online friends and try to temporarily escape from their family life. Lastly, institutional arrangement also plays an important role in the online networking practices of elderly users. The current generation of elderly people, especially those retired from a state-owned work unit, choose to maintain their connections with their former co-workers and work units online and seek help from them.

This study challenges the idea that elders usually lag behind in the development of communication media and experience the changes in technologies passively (Hill et al., 2015; Yu et al., 2016). Literature about digital divide used to describe the differences in accessibility to internet services between young people and older adults (Rainie, 2016; Yu et al., 2016). Older adults usually lag behind in the adoption of online communication media, so they are in danger of being marginalized (Yu et al., 2016). This study shows that nowadays, far from passively

facing the permeation of online communication media in their social life, elderly people are responding actively in learning the use of online communication media and networking with others. Although most of them still lag behind younger users in terms of digital skills, they are able to have different forms of online interaction with their online ties and the aging process is no longer a serious constraint for them to maintaining and developing their networks. Elderly people who face reduced mobility and narrowed social networks can use online communication media as a tool to re-develop their social ties and exchange social support, as well as to enrich their social life by participating in online and offline networking activities with their online ties.

However, elderly people's active presence on online communication media does not mean the disappearance of digital divide. Online interaction of elderly users is mostly with same-age non-primary ties (e.g. ties with former schoolmates), while intergenerational communication mostly takes place among elderly people and their children and the contents of intergenerational interaction is mainly about fundamental support exchange and coordination of daily tasks. Most of the elderly users reported difficulties in online intergenerational communication and did not have frequent connections with younger ties. It may indicate that the digital divide between elderly people and the younger population still exists. But this time, older adults may not be lagging behind, but have developed their own separate online social world. In their online world, they exchange information, spread stories and have discussion on topics only with their peers and younger generations can hardly participate in their online discussion and information circulation.

8.3 Impacts of Online Communication Media Use on Social Relations

8.3.1 Accessibility of Social Ties

This study's findings about how online communication media affects people's access to social ties mostly supports previous studies on online connectivity. Online communication media has introduced the "connected presence" (Licoppe, 2004) to elderly users. Compared to traditional communication media, online communication media have advantages in providing costless channels for frequent and high quality connections, transcending limitations of time and space (Licoppe, 2004; Rainie & Wellman, 2012). With these advantages, elderly people can obtain easy and efficient access to their social ties, including all types of social ties, from close kin ties to more distant ties.

In dialogue with the literature on online communication applications, the study found that WeChat not only enhances people's access to individual ties (Licoppe, 2004) by offering online-offline connections (Chen, 2017; Cui, 2016), but more importantly, it helps older adults to reach out to different online groups. The accessibility provided by online communication media is not only used to create co-presence, but also for virtual reconnections and reunions with some groups. By providing access to numerous ties through group chats, online communication media encourages reconnection and virtual reunion with a group of people. Elderly people attach great importance to this kind of reconnection and virtual reunion online, as it can help them to reach out to many more old and distant ties and also recall their collective memory. As WeChat allows multimodal communication in

group chats, such as article sharing, voice messages, and photo sharing, older adults can obtain easy access to various kinds of social support.

In comparison with younger users, according to various studies (Quan-Haase, 2007), online communication media makes a great difference to the accessibility of social ties for most elderly people who experience physical setbacks. The younger population use online communication media to hold multimedia and instant conversations, which supplements their offline networking activities (Baym et al., 2004) and helps them contact with distant ties (Quan-Haase, 2007; Utz, 2007). Elderly people who face the challenges of declining social circles, chronic conditions, limited mobility and physical impairment, are usually in a disadvantaged situation as regards participating in networking activities and maintaining connections with existing ties, including both local and distant ties. Online communication media may even be their only access to some social ties. Accordingly, the impact of online communication media on maintaining and developing the accessibility of social ties is even greater for elderly people.

8.3.2 Relational Intimacy of Ties

There is a debate about whether online communication media can help people to become more intimate with each other, and the stories of elderly WeChat users in urban China demonstrate that, as elderly people lack sufficient opportunities for substantive interaction with their social ties, the active use of online communication media can enhance their relational intimacy. How much the use of online communication media affects relational intimacy, however, depends on the different types of social ties.

Although the literature has identified several disadvantages of online communication media in developing intimate relationships (Nie et al., 2002; Turkle, 2017), the effect of these disadvantages on elderly users is limited. The literature discusses the concern that online relationships are fragile and unreliable (Turkle, 2017), however, as most of elderly people's online relationships are based on their existing networks, their online ties are relatively stable, and elderly people demonstrate high levels of trust in these online ties. Elderly people also have many support exchange activities with their online ties, and so they are able to build trust, shorten distance and develop similarity with their social ties. In other words, older adults' frequent support exchange can help them to develop intimate relations through the use of online communication media. In terms of the argument that online communication may distract people from more substantive forms of interaction (Nie et al., 2002; Turkle, 2017), elderly people's stories show that as physical mobility and distance hinder them from participating in many substantive interactions, the use of online communication media does not distract them from offline life. In contrast, the online coordination of offline activities in group chats even facilitates their offline networking activities.

Although the use of online communication media can enhance people's ability to develop relational intimacy, the degree of influence varies. Online communication media can serve as a new space to reactivate and develop distant or former ties such as ties with old schoolmates who might be inaccessible in offline social networking activities for older adults. Online interaction greatly enhances their relational intimacy with these ties in the aspects of engagement, communication and shared friendships (Moore et al., 1998). The level of relational intimacy may also increase because of their exchange of social support for ties with former co-workers. For

relatively close ties such as ties with relatives, online communication media offers more opportunities to improve the level of intimacy through constant online conversations, support exchange and offline interaction which is coordinated in group chats. For primary ties such as close kin ties, however, the use of online communication media only serves as an alternative communication channel, supplementing offline networking practices.

8.4 “Networked Individual” or “Alone Together”?

The reader may wonder whether the use of online communication media makes these older users more like a “networked individuals” (González-Bailón, 2015) or whether they are still “alone together” and “tethered” by technologies (Turkle, 2017). As elderly people face physical limitations in attending offline networking activities, most lack opportunities for substantive interaction with non-familial ties. Before the use of online communication media, they faced many difficulties in developing diverse and intimate social networks. Online communication media can help them to gather with or develop these distant ties and enrich their social life. They can have intensive online conversations and support exchange with their online ties, especially distant ties, which help them to build close and heterogeneous social networks. In that sense, these elderly users of WeChat have the potential to become “networked elders”, who are embedded in high-quality and heterogeneous social networks as well as maintaining a high level of relational autonomy. The use of online communication media can also reduce older adults’ feelings of loneliness by (re)activating existing ties so people are not “alone together”.

The current study provides a relatively optimistic picture of the integration of online

communication media in aging life. Here, elders are not “tethered” by the use of online communication media but exert more control in their personal social life. Of course, this study is limited in scope and cannot draw a definite conclusion about how the use of online communication media changes the personal social lives of older adult.

8.5 Research Implications

By investigating online networking practices of older adults and the digital impacts on their social relationships, this study acts in dialogue with the literature in ICT studies, especially those concerning mobile-phone based online communication media. The main research implication of this study is about online communication media’s utility in tie re-activation and re-development.

Drawing a picture of older adults’ online social networks and how they build and develop their online network, this study demonstrates that online communication media has a strong ability of re-activation and re-development of existing ties. Although older users have just go online and have limited skills in using WeChat, online communication media allow them to re-connect with many distant and old ties and turn these distant ties into intimate relationships. Most of WeChat users in this study only use limited features in WeChat and can hardly type long sentences with mobile phone, but they could develop relational intimacy with social ties through online sharing and short messages.

The re-development of relational intimacy with distant and old ties on online communication media is related with following important elements: firstly, organization and active participation in online groups; secondly, various forms of

online support exchange activities; thirdly, satisfaction of social needs, which could hardly be fulfilled by close family ties. For example, some older users want to share and discuss about health or investment and they seek for same-age peers in old schoolmate group to talk with, while their close family members did not have interests. Also, some respondents tried to have a temporary escape from their home-bound retired life. As the previous literature on relational intimacy have mentioned three sub-dimensions: engagement, communication and shared friendships(Moore et al., 1998), online communication media demonstrates its capacity in developing relational intimacy with distant non-primary ties in these three dimensions by providing space for group interaction, support exchange and fulfilling social needs which can hardly satisfied by offline primary networks.

With its utility of tie re-activation and re-development, online communication media is able to help users to build close-knit online community and become “networked individuals”. Elderly people who face declined physical mobility, used to be difficult to connect with their non-primary ties, let alone establish community with non-primary ties. Online groups allow them to re-union, become closely related with each other and build online communities with their peers, where they have frequent exchange of ideas and supports. During its process, users of online communication media are able to turn to “networked individuals”, who have multiple layers of social networks to mobilize resources and high level of autonomy.

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