<table>
<thead>
<tr>
<th>項目</th>
<th>内容</th>
</tr>
</thead>
<tbody>
<tr>
<td>タイトル</td>
<td>日本における高齢化とその社会構造との関係を分析する 京都大学の研究報告書</td>
</tr>
<tr>
<td>作者</td>
<td>Ichimura, Hidehiko; Hashimoto, Hideki; Shimizutani, Satoshi</td>
</tr>
<tr>
<td>引用</td>
<td></td>
</tr>
<tr>
<td>発行日</td>
<td>2009-08</td>
</tr>
<tr>
<td>タイプ</td>
<td>技術リポート</td>
</tr>
<tr>
<td>出版版</td>
<td></td>
</tr>
<tr>
<td>URL</td>
<td><a href="http://hdl.handle.net/10086/17556">http://hdl.handle.net/10086/17556</a></td>
</tr>
</tbody>
</table>
Chapter 3
Social and Family Context
Chapter 3

3 Social and Family Context

3.1 Housing and Living Arrangements ........................................... 145
3.2 The Number of Living Children ............................................. 152
3.3 Family Structure, Proximity, and Contact ............................ 160
3.4 Family Support ................................................................. 172
3.5 Financial Transfers ........................................................... 180
3.6 Quality of Employment and Well-Being ............................... 192
3.7 Quality of Life and Well-Being ............................................. 199

References ............................................................................... 200
3.1 Housing and Living Arrangements

3.1.1 Introduction

Housing and living arrangements are basic needs for all households and individuals and are indispensable to daily life along with food and clothing. We examine two important aspects of housing, as a place to live, and as an important component of nonfinancial wealth.

First, housing and living arrangements are closely related with the well-being of people. People spend most of their time in their houses, especially in the case when they are retired, and comfortable housing and living arrangements enhance living standards and happiness in life. Housing also provides a place where family members, friends, and acquaintances gather and serves as a center for family relationships and social networks. This is especially the case for family members if the house was inherited from ancestors and is to be handed over to descendants. In this case, a house is a symbol of the family and related members.

At the same time, housing and living arrangements form an essential component of the nonfinancial wealth position. This is especially the case for homeowners. For most people housing is the most expensive purchase in their lives and the most valuable asset in their wealth, which affects their well-being throughout their life courses. The timing of buying and selling a house or that to inherit from the previous generation and leave bequests to the next generation is critical for wealth accumulation.

We should keep in mind that essential components of housing and living arrangements vary across life stages, and, in general, they play a more important role for older generations. First, older people are more likely to spend more of their time at home. Older people are less likely to have a regular job and thus spend more time in their houses and are more likely to be physically impaired and therefore forced to stay at home. Second, housing assets tend to gain more significance as a primary source of wealth of older people without labor income. This can be avoided of course by using reverse mortgage, for example, but people tend not to use these instruments. A lifecycle model describes older people as dis-savers and their wealth plays a larger role to determine consumption and living standard after retirement, and the value of housing is, in most cases, the most dominant element among the wealth of the elderly. On the flipside of the coin, loss of a house is a risk for these people, since it means loss of independence, which motivates them to keep the house as long as possible unless they have alternatives, as is described in the SHARE book.

These aspects are also related to a decision of living arrangements. Older people may spend happier time if they live close to their children or grandchildren but cohabitation may be the only feasible arrangement to live in close proximity. In particular, those people with difficulty in physical and mental functioning may find it easier to live if their children are nearby to offer help if necessary. A decision of where to live is affected also by the bequest motives. A high value of housing and land attracts children and encourages them to live together with their parents or to provide care. All in all, housing and living arrangements affect a variety of aspects of elderly lives including economic well-being, health, family/social networks, and remain main factors to determine the well-being of the elderly.
JSTAR provides information related to housing and living arrangements to explore a variety of issues including their determinants and effects on living standards of middle-aged and older people. While the basic feature of the JSTAR questionnaire resembles that of SHARE and is internationally comparable in the aspects of wealth, some questions on housing and living arrangements that are contained in SHARE are not included in JSTAR.

First, JSTAR does not ask the respondents about the number of rooms for personal use per household member including bedrooms, while SHARE does. The SHARE book found that the size of the accommodation per person increases with age in all countries.

Second, JSTAR does not ask the respondents about quality of equipment while SHARE asks them regarding availability of special provisions to assist persons with physical impairment. SHARE asked the respondents about the general impression of such equipment and the prevalence of some specific equipment (e.g., an indoor bath) as well as the quality of intermediate environment (e.g., public transport). The major reason that JSTAR does not include these questions about quality of equipment is the difference in the age group between JSTAR and SHARE. The oldest individual in JSTAR is 75 and those persons in the first half of their 70s are still less likely to need special arrangements at home. This fact will be confirmed immediately below.

Third, JSTAR does not include a question on residential mobility. SHARE measured by asking the respondents for the number of years spent in the present accommodation. Instead, JSTAR asks the respondent how many years had passed since the present accommodation was built.

In this subsection, we will focus on home ownership and years of accommodation. Before exploring these issues, we examine physical functioning along with age. The aspect of housing as nonfinancial wealth will be examined in Chapter 5.

### 3.1.2 Physical Functioning Along with Age

First, we preview physical functioning along with age using the first wave of JSTAR. We should keep in mind that the findings below are based on cross-sectional data and the difference in age includes both age and cohort effects. Only after the second wave will we be able to distinguish those two effects.

It is natural that physical limitations increase with age. Among a variety of measurement of health status, we use ADL (activity of daily living) as measure of disability since this is closely related with needs for housing and living arrangements. In contrast to the SHARE book, we focus on ADL only because it is directly associated with living arrangement. Instrumental Activity of Daily Living (IADL) does not decline in the first half of the 70s.

Figures 3-1-1 and 3-1-2 report the proportions of the respondents depending on the number of ADL scale limitations. We count the number of items in which a respondent reported to have limitation. While the proportion of those respondents without any limitation declined slightly along with age for both males and females, the share of no limitation exceeds 90% even for respondents aged between 70 and 75, though the figure is slightly lower for males with a larger decline for females. These observations
are comparable to those in the SHARE book. The SHARE book shows an accelerated decline in the proportion of the respondents without any limitations in those aged 80 and over, especially for females, but the baseline sample of JSTAR does not include those “oldest old” in the sample.

The remaining figures report the shares of the respondents depending on the number of limitations by sex and municipality. For males, the pattern in Kanazawa and Shirakawa tracks the overall pattern with a slight decline along with age. The proportion of respondents without any limitations is higher in those municipalities than others. In Sendai, the share declines from those in their 50s to 60s but it slightly increases for those in their 70s, and in Takikawa, the share is below 90% for both those aged in their 60s and 70s. Adachi has a slightly different pattern: the proportion of the respondents with no limitation is unchanged with age. In the case of females, again Sendai, Kanazawa, and Shirakawa have a common declining gradient though the proportion of the respondents with no limitation is slightly lower in Sendai for all age groups. Takikawa also has a similar trend with a larger decline to 85% for those aged in their 70s. Adachi does not have a declining gradient along with age.

In sum, the proportion of people with physical limitations in their daily lives is more likely to increase with age but only slightly up to 75. In general, the proportion of those with any limitation is at most 10%, even in the first half of the 70s.
3.1.3 Variation of Home Ownership across Age and Municipality

As the SHARE book discusses, home ownership has many advantages for the elderly in terms of better equipment, economic and emotional security, a person’s stake in his or her community, and the possibility of transferring their property to their descendants. Moreover, in Europe, home ownership is discussed in relation with the social security regime and social inequality. Some of these elements may be the case for Japan, too, and home ownership can be one of the measures of economic well-being of the elderly.

JSTAR asks the respondents to choose their tenancy status from the following categories: homeowner and land owner, home owner but land renter, or renter (both home and land). Further, JSTAR asks the home owners the value of housing (and land) and that of the mortgage and asks the renters how much the monthly rent is.

Figure 3-1-3 represents the proportion of home owners across age and municipality. We observe a substantial variation in ownership rates among the municipalities. In Sendai and Kanazawa, the ownership rate is close to 90%, though the figure is somewhat lower in those aged in their 50s and 70s in Sendai. The rate is lower in Takikawa than Sendai and Kanazawa, which are close to three quarters for those aged in their 50s. Shirakawa’s ownership rate is exceptional and remarkable. In all age groups, the home ownership rate is close to 100%. Among all five municipalities, the lowest rate is found in Adachi at less than 80% for all age groups. One obvious factor to account for the difference in the ownership rate across municipalities is housing and land prices. They are very expensive in Tokyo including Adachi and inexpensive in rural areas including Shirakawa. Other municipalities, especially Sendai and Kanazawa, are in between.
The SHARE book classifies European countries into three groups depending on homeownership rates and related them with welfare state regimes: high ownership rate in the Mediterranean countries (more than three quarters of the elderly population), middle rate in the north (less than three quarters) and lower rate in the central European countries (slightly more than half). The homeownership rate in Japan is comparable with that in Mediterranean countries, though we need to keep in mind the difference in age range between the two surveys. What accounts for the high rate in Japan is to be investigated in future research using variation across municipalities. One of the merits of JSTAR examining this topic is that institutions related to housing and living arrangements such as housing taxation do not differ much across municipalities.

Another interesting finding is that the homeownership rate does not decline along with age in Japan, which is also observed in the high ownership countries of southern Europe. In other European areas, ownership rates generally decrease with age, especially in the central European countries. The SHARE book speculates that homeownership is an alternative form of social security (Kurz & Blossfeld 2004) or that ownership reflects on the timing of transferring ownership from the elderly to the younger generations. Along with the higher homeownership rate in Japan, the absence of age gradient in the ownership rate should be further examined controlling for a variety of factors. Longitudinal data will allow us to exploit some social security reforms to identify a causal relationship between house ownership and public pension benefits.
Next, we turn to years passed since current accommodation was established. Figure 3-1-4 reports the distribution of vintage years of the current accommodation. We observe a clear age effect, that is, older persons are more likely to live in an “older” house. Together with the higher ownership rate in Japan, this is partly because that some people purchased or began to rent a newly-built house when they were young and continued to live in the same accommodation. Except for Shirakawa, the average of vintage years is about 20 years for those aged in their 50s, with somewhat shorter terms in Sendai and Adachi and longer terms in Takikawa and Kanazawa. The age gradient is the steepest in Kanazawa and the years reach almost 30 years for those aged between 70 and 75. The obvious outlier is Shirakawa. The average vintage year is close to 50 years for individuals in their 50s, and 60 years for those in their 60s and 70s. It is highly likely that those accommodations were purchased not by the respondents but by their parents and they live together. If this is the case, family relationship and cohabitation decision in Shirakawa might be different from that in other municipalities.

We will turn to the remaining homeownership issues again in Chapter 5. Like in the Mediterranean countries, real estate holdings make up a larger part of wealth in Japan, which might be explained by the lack of attractive alternatives or strong family tradition, and this is also examined by the pattern of property acquisition (individuals or bequests).
3.1.4 Conclusions

- Physical limitation is more prevalent for older people and may be an important determinant of housing and living arrangements. But the prevalence does not change much between the 50s and the first half of the 70s in the JSTAR sample.
- Homeownership is high in Japan but does not change much across age groups. This observation is similar to that in the Mediterranean countries.
- What accounts for the high ownership rates with no age gradient, i.e., relationship to social security generosity or family tradition, is to be investigated in future research.
3.2 The Number of Living Children

3.2.1 Introduction
This subsection describes how many children JSTAR respondents have. Children play a large role for the elderly through monetary and nonmonetary supports. The number of children and their proximity to their parents are the main determinants of availability of mutual transfers within a family, e.g., giving informal care, which improves well-being of the elderly. Moreover, older parents also provide support to their children by giving care to their grandchildren, assisting with living expenses and leaving bequests. Whether a parent is selfish or altruistic or neutral has been one of the major topics in economics and sociology to consider the unit of behavioral decision-making and there has been prolific literature on the subject.

As previewed in Chapter 1, the total fertility rate in Japan has been declining to historically low levels. At the same time, we should pay attention to the fact that the fertility rate differs across generations and regions within a country. JSTAR provides rich information on children by their parents’ age cohorts and municipalities; the survey asked how many children a respondent had and then for each child his/her sex, age, marital status, geological proximity to the respondent, employment status, frequency of contacts and educational attainment. In addition, a variety of questions related to mutual transfer asks whether the respondent gave or received several types of help to or from children. Together with other related variables, JSTAR enables us to examine the role of children in the lives of middle-aged and older adults.

While the basic feature of the series of questions about children is shared by JSTAR and SHARE, we make two remarks. First, unlike SHARE, JSTAR did not distinguish whether a child is a natural child, a stepchild, an adopted, or a foster child of either or both members of the couple. The SHARE book shows that 14% of male and female respondents have no living children of any type in the sample and 96% of respondents who have any children have natural children only, implying that very few have fostered or adopted children in Europe. While the prevalence of stepchildren varies across countries, genders, and ages, the proportion is still very small. In Japan, natural children are also very dominant.

Second, JSTAR did not distinguish whether a child is the current spouse’s/partner’s or not. SHARE asks regarding children of the current spouse/partner only. Since the divorce rate, which is still low in Japan, has been increasing especially for aged couples, we might distinguish children of past and current spouse/partner in future. Third, in common with SHARE, JSTAR did not collect full fertility histories of female respondents and the birth years of natural children are available only for those children who were alive at the time of the interview. We also plan to consider these issues as a future agenda item for JSTAR.
3.2.2 Variations in the Number of Children across Age and Municipality

Figure 3-2-1 represents the average number of living children by age group and municipality. We note that we do not distinguish genders of the respondents in this figure. We see a substantial variation in the average number of living children across age groups. In Sendai and Adachi, the number of children increases from those in their 50s to 60s and levels off. We should note that the number of children of those aged in their 50s in Adachi is substantially lower than any other group. The number of children for those aged in their 70s is close to two. In Kanazawa and Takikawa, the pattern is U-shaped, which represents the largest number of living children in those aged in their 60s which slightly exceeds two and the numbers for those aged in their 50s and 70s are below two. Shirakawa’s pattern is exceptional. The number of living children increases steeply with age. The number of children of those aged in their 50s exceeds any age group in the other municipalities and that of those aged in their 70s reaches about 2.6.

Since the individuals in JSTAR are aged between 50 and 75, it is not possible to perform a direct comparison of the number of the living children between JSTAR and SHARE whose age range is between 50 and 100. The SHARE book found a hump-shaped distribution of the number of natural living children in most countries and females aged 60 and 75, who belong to the baby boomers born right after the end of the World War II, have a larger number of living children. While we cannot perform a comparison in the number of children between baby boomers and the preceding generations in JSTAR, the fact that the number of children is larger for those aged in their 60s and 70s than those aged in their 50s coincide with that in SHARE. As the SHARE
book points out, variations in the number of children across age groups and regions is affected by fertility behavior as well as selective attrition of respondents and differences in children’s survival rate, which should be examined in JSTAR too.

Figure 3-2-2 illustrates the number of living children across gender and municipality. First, comparing males and females, the number of living children does not differ much across gender but we see a slightly larger number in Sendai of males and lower number in Takikawa, Shirakawa and Adachi. The numbers for both sexes are close to 2.5 in Shirakawa, 2 in Kanazawa and Takikawa, and less than 2 in Sendai and Adachi. The number in Shirakawa is comparable with Spain which has had the highest fertility in Europe and that in Adachi is comparable with those in Germany and Austria which belong to the lowest fertility group in Europe.

![Figure 3-2-2 Natural living children by gender](image)

Figure 3-2-3 depicts the distribution in the number of children by municipality. We should pay attention to not only the average but also the distribution of the number of living children since the distribution also affects availability of mutual transfers (including giving care) and cohabitation. We notice that the distribution has a similar shape in Sendai, Kanazawa and Takikawa, but the shape is different in Shirakawa and Adachi. First, we notice that the proportion of the respondents without any children occupies less than 10%. The share is lowest in Shirakawa and highest in Adachi, which exceed 10%. Except Shirakawa, the most dominant number of children is two. The proportion of the respondents with two children is more than half in Sendai, Kanazawa, and Takikawa. In Adachi, the most dominant number is two but the share of those re-
3.2.3 Variations in the Number of Natural Children across Socioeconomic Status

In addition to variations of the number of children across age and municipality, we preview the relationship between the number of children and socioeconomic and health status. The large merit of JSTAR enables us to connect what interests us with a variety of socioeconomic statuses and to disentangle causal directions among a variety of variables. Figure 3-2-4 compares the mean number of natural children that are alive for males and females across three broad education categories: junior high school graduates, senior higher school graduates, and some college (university graduates or higher).

We see different patterns across municipalities for male respondents. In Sendai, the largest number is observed in male senior higher school graduates. In Kanazawa, the largest number is observed in college graduates, though the number is comparable with that for junior high school graduates. In other municipalities, we see a negative relationship between educational attainment and fertility, especially in Shirakawa and Adachi. The ambiguity of the relationship is also observed in SHARE. The SHARE book shows that the number of natural living children is the largest for male respondents with lower educational attainment, but there is no strong and robust (across countries) relationship between education and the number of children. While the largest number
Figure 3-2-4-1 Natural living children by educational level, males

Figure 3-2-4-2 Natural living children by educational level, females
of children is observed for junior high school graduates in Takikawa, Shirakawa, and Adachi in Japan, which is also the case in SHARE, this is not the case for Sendai and Kanazawa.

In contrast, the results based on female respondents show a clearer negative relationship between educational attainment and fertility. Except for a few education-municipality groups, we see a negative gradient in the figure. In this case, we see a clear negative relationship in Takikawa and Shirakawa. The negative relationship is also more clearly observed in Europe. In any case we need to control for age before we begin to understand the effect of education on the number of children.

3.2.4 Variations in the Number of Natural Children across Health Status

Lastly, we turn to the relationship between the number of living children and health status. As a health measure, we use the European version of self-perceived health status: very good or good (better health) and poor or very poor (worse health). Note that the measure of health status is a current one. We excluded the category of “fair” to contrast the better or worse health status. Figure 3-2-5 illustrates the number of living children by the two categories of health status. A male respondent with a better health status is more likely to have a larger number of children than that with worse health status in Sendai, Kanazawa, and Takikawa but this is not the case in Shirakawa and Adachi. A female with a better health status is more likely to have a larger number of children in all municipalities except Takikawa.

What we found in the figures seem not to be consistent with the finding in the SHARE book. The SHARE book found that poor self-perceived health increases with the number of natural living children for both women and men and attributes the correlation to common factors such as age or socioeconomic status which relate systematically to both health and fertility (e.g., less educated women tend to have more children and poorer health). We note that we do not control for a variety of factors to affect fertility in this subsection and we need more in-depth analysis to examine the relationship between health status and fertility including the mechanism, channels and direction of causality.
Figure 3-2-5-1 Natural living children by health status, males

Figure 3-2-5-2 Natural living children by health status, females
3.2.5 Conclusions

- While the total fertility rate in Japan has been declining to historically low levels, JSTAR confirms that the fertility rate differs across generations and regions within the country. The larger number of children is observed in the baby boomers, a finding common to JSTAR and SHARE.

- The proportion of the respondents without any children occupies less than 10% in all municipalities. The most dominant number of children is two in all municipalities except Shirakawa where the number is three.

- We confirm the negative correlation between education and the number of natural children for females. We do not find a negative correlation between self-perceived health status and the number of natural children, which is found in the SHARE book. This issue deserves further investigation.
Chapter 3

3.3 Family Structure, Proximity, and Contact

3.3.1 Introduction

Family structure in a country is characterized by who constitutes a family and how strong the relationship among family members is. Like most European countries, Japan has experienced substantial downsizing of family size from a traditional extended family to a nuclear unit, especially after World War II and subsequent urbanization. According to Census 2005, the average family size was 4.14 in 1960, and it decreased to 2.55 in 2005. The share of nuclear families among total households was 29.5% in 2005. Moreover, population aging leads to further change in household structure. The number of two-person and single-member households has been increasing, especially among those aged 65 and over: the number reached 29% and 35%, respectively, also in 2005.

How a structural change in family has affected family relations along the traditional generational lineage is a matter of debate. While the “boundary of family” varies in each country, Tachibanaki and Kimura (2008) argue that the scope of family in Japan is still beyond the co-residing nuclear unit, but concentrates on a direct (lineal) line (a married couple and their parents and children). In such a drastic change in family structure, two distinct phenomena are particularly relevant regarding our JSTAR sample respondents aged between 50 and 75.

One is a weakening of the marriage relationship among elderly couples. A recent phenomenon is that the number of divorces among elderly has rapidly expanded in Japan: in 1960 the divorce rate was 0.74 and it increased to 2.08 in 2005. Couples with more than a 20-year relationship are more likely to divorce, often triggered by the husband’s retirement, or by the children’s becoming economically independent.

Marriage still makes up a core element of the family in Japan and is considered a prerequisite for having children under a social norm colored by Confucianist culture, which is largely different from those in European countries where a large number of unmarried couples have children. Divorce among elderly couples can be seen as a flip side of this social norm, because a couple’s decision to divorce may be facilitated after their role of raising children has been completed. Together with the increase in the number of never-married, the elderly without “kinship family,” especially in urban areas, may pose a new challenge for social policymaking.

The other issue of interest is that intergenerational exchange including a variety of forms of transfers, whether monetary or non-monetary, and emotional support, have also changed substantially with the structural change in the family. Family members help each other in the provision of child care, elderly care, and other aspects of daily life that a family function and capacity can offer, through a variety of channels of exchange and support. In the traditional extended family, healthy grandfathers/mothers were expected to take care of their grandchildren while the grandchildren’s parents were at work. When grandfathers/mothers became frail and in need of care, younger family members, traditionally the women, were obliged to provide the care. However, recent trends of the nuclear family and women’s participation in the workforce make difficult the provision of care solely by the family’s capacity for informal care. The
introduction of the public long-term care insurance program in 2000 was planned to alleviate the burden of care, by socializing elderly care and publicly providing formal care. However, whether formal care actually replaced a family’s informal care is still debatable (Shimizutani & Noguchi 2004). In addition, the rapidly growing expenditure for long-term care insurance has raised concerns about the sustainability of the program.

The rapid speed of aging further brings into focus the issue of family structure, its function, and the role of the social security system in contemporary Japan. In Europe, there has been an argument that the modern welfare state might undermine family solidarity and the family itself, and that a government should not intervene in “family matters.” Although such debate is still controversial, it would be fair to accept the fact that the change in family structure invites reforms in social security policy, and in turn, those reforms affect family structure. What makes things more complicated is that the change of family structure is diverse across and within countries. As seen in this chapter, we observe a wide variety of family forms across age groups and municipalities. As the SHARE book asserts, we should not simply accept “stereotyped” facts about families (e.g. increasing childlessness, divorce, and numbers of singles and the decrease of multigenerational co-residence), but our assessments should be based on empirical examination of comprehensive data in this country to reach an in-depth understanding of the causal relationship between family and health, and economic and social issues.

This chapter will explore several aspects of family in the JSTAR sample, such as spatial and emotional closeness, frequency of contact, personal and instrumental support as well as transfers of money and goods, paying a special attention to comparability with findings in SHARE countries. In Japan, a large volume of political and academic debates on the role of the family have accumulated, though an empirical approach using comprehensive and rich micro-level data is not necessarily abundant. JSTAR provides the opportunity for researchers and policymakers to examine the current state of Japanese families from a comparative perspective with European countries. In Europe, there are considerable differences between Scandinavia, Central and Western Continental countries (“weak family countries”) and those of the Mediterranean (“strong family countries”) (Reher 1998). The Scandinavian countries generally have the lowest proportion of traditional family structure, the Mediterranean countries (Spain and Italy more so than Greece) hold the highest proportion, and the other continental countries lie somewhere in between (SHARE book). Some might speculate that Japan belongs to a “strong family country.” In fact, Japan does share some experiences with “strong family countries.” The trend of the fertility rate was high in the past but today has become the lowest, and the decline in the fertility rate is attributed to the increase of women with higher education and labor participation and consistent social norms of gender roles that prevent gender equity in the family and in public provisions for family (Kohler et al. 2002 for Europe).
3.3.2 Variations in Marital Status across Age, Gender and Municipality

The SHARE book pointed out that the institution of marriage has weakened overall among older Europeans, as observed in diminishing rates of those married and the increasing divorce rate. However, it also asserts that the current elderly have not yet been strongly touched by this evolution. How does the case of Japan compare?

Figure 3-3-1a reports the share of marital status by gender and age group. Among the 50s, 86% of males and 80% of females are currently married. Those two numbers are higher than those in European countries, especially for females. The remaining figure consists mainly of those never married or divorced. It is interesting that the share of “never married” is larger for males than females in the 50s, but the reverse was observed among those aged 60 and over. The share of “never married” is slightly lower in Japan than in Europe. The share of “divorced” among females was higher compared to that among males in all age strata. The divorce rate is less than 6% for males while it is more than 8% for females, numbers that are still slightly lower than those in European countries in the same age cohort. The share of the divorced declines, and that of the widowed rises with increasing age, both for males and females.

As in the SHARE results, in males, the share of “married” is about the same across age strata, while in females it declines with rising age, and is replaced with the share of “widowed.” This pattern is presumably associated with the higher likelihood of women to be widowed, since the female spouse is younger than the male spouse on average.

Figure 3-3-1b presents the shares of marital status by municipality. While the disparity across municipalities is smaller than that across countries in Europe, we see some variations in marital status across regions even in Japan. As expected, the proportion of “never married” was the highest in the metropolitan city (Adachi), and the lowest in the rural town (Shirakawa). The proportion of “divorced” was the highest in Takikawa in Hokkaido Prefecture, which is characterized by the highest divorce rate in the country. When we stratified the sample by age and gender categories, a marginally significant difference across municipalities (p=0.052) was found in females in their 70s. In this segment, Shirakawa city showed the highest share of “married” (78%) and lowest in “widowed” (19%) and “divorced” (1.5%) categories, while Kanazawa city had the lowest share of “married” (60%), and highest “widowed” (36%) and “divorced” (4%).

The divorce rate also varies across SHARE countries. Denmark and Sweden, countries with the least traditional family structure, are at the top with 13% and 12%, respectively, of those currently divorced, followed by Germany, Austria, France and Switzerland (around 9%), the Netherlands (6%), Greece (4%), and Italy and Spain with 2% (the last three named have the most traditional family structure). The average divorce rate in JSTAR sample was 5%, between the figures of the Netherlands and Greece. When comparing across municipalities, we see that even the highest divorce rate, observed in Takikawa, is 7%, still lower than those in Germany and France. The lowest, as expected, is observed in Shirakawa, a rural and traditional municipality, at 3.5%, somewhat below the number in Greece. Since those two cities represent extremes in Japan, it may be safely said that in terms of divorce rate, Japan is classified as an in-between country.
Figure 3-3-1a Share of marital status, by gender and age

Figure 3-3-1b Share of marital status, by municipality
3.3.3 Variations in Generational Constellations across Age, Gender, and Municipality

Next, we examine generational constellations. Generational constellations are one measure of the availability of trans-generational transfer among family members through exchange and support. As already mentioned, in spite of drastic change in family structure and declining fertility rate in the past few decades, the traditional norm for a direct (lineal) line (a couple, their parents and children) is still strong in Japan, and affects the socio-economic dynamics in the family.

Before we present the statistics of generational constellations, we should be careful about direct comparison between JSTAR and SHARE results. The JSTAR question regarding generational constellation is based on a traditional lineal system in which direct one-generational ascendants (parents) and descendants (children) from the respondent’s generation make the core family structure. Accordingly, JSTAR asks respondents whether they have any children, and whether either of their parents is alive. We do not have information on the respondent’s grandparents and grandchildren at this stage. Thus, we will use in the following discussion “core three-generation” to specifically refer to three generational constellations consisting of respondents, their parents, and children.

The share of those with no other generation (one generation in the figure) is about 5%, which is lower than that in SHARE results (Figure 3-3-2a). The proportion is similar across age categories. Among the respondents in their 50s, the share of those with “core three-generation” is the most dominant (58%). The “core three-generation” share declines with the rise in the respondent’s age, simply because their parents are less likely to be alive. It is supposed that a share of “No living parents but living children” could have been replaced with a new three generation family with children and grandchildren.

The number of those with no other generation is higher in larger cities and lower in rural towns, as expected: the highest is 6.8% in Adachi, and the lowest 2.5% in Shirakawa (Figure 3-3-2b). The “core three-generation” structure is most prevalent in Shirakawa (37.3%), a rural farming town, followed by local large cities such as Sendai and Kanazawa (35%), and the lowest is observed in metropolitan Adachi (23.5%). Takikawa (26.8%) takes a unique position, since it is a rural farming town, yet it deviates from a conventional norm of the multi-generational family structure. Even after stratifying by age category, those in their 50s in Takikawa show a low share of “core three-generation” (54.1%), comparable to those in metropolitan cities such as Sendai (53.9%) and Adachi (46.5%), rather than local (Kanazawa, 62.2%) and rural cities (Shirakawa, 70.6%).

Since generational constellation is closely related with the availability of informal support among family members, the variation in generational constellation across age and municipality might be reflected in the variation in the form of family support exchange, which is examined in the following subsections.
Japanese Study of Aging and Retirement

Figure 3-3-2a Share of generational constellations, by age

Figure 3-3-2b Share of generational constellations, by municipality
3.3.4 Variations in Co-residence and Proximity across Age, Gender, and Municipality

Further, we provide descriptive data of co-residence and geographical proximity of the nearest living children, as it also makes a determinant of the frequency and strength of inter-generational exchange/support among family members. As the SHARE book reveals, the pattern in those aspects differs across countries and even across regions within a country. We could expect that the impact of urbanization and subsequent demographic change in the past few decades would strongly appear in this aspect of the parent-child relationship, and it should vary depending on generations and regions.

Figures 3-3-3a and 3-3-3b depict the residence status of the nearest living child in our sample across age and municipality. The overall share of “same household” is 50.9%, a number quite close or even larger compared to those in “strong family countries” such as Spain and Italy. The “same household” share is 64.1% among respondents in their 50s, and the number decreases to around 40% when the respondents are older.

As is true in the Mediterranean countries, contemporary Japan is also characterized by very late (and increasing) ages of leaving the parental home among adult children. Of those children in the “same household” category, about 50%-60% are unmarried. When the respondents are in their 50s, nearly 90% of their children in the same household are unmarried. When the respondents are in their 70s, the share of unmarried children in the same household is still around 50%.

Since we do not have information whether these unmarried children have never left the parental home, or have moved back to the home, we could not differentiate whether the higher share of “same household” among nearest living children is attributed to the relative lack of opportunity in housing markets or to the cultural tendency towards closer intergenerational ties. However, if the unmarried children are more prevalent in metropolitan cities rather than in local cities, it may suggest the possibility of limited housing opportunities, since the land and accommodation price is much higher in metropolitan areas than in local areas.

The results support this view. Cross-region comparison in the JSTAR sample shows that the share of “same household” among nearest living children is highest in Adachi (57.4%), followed by Kanazawa (56.8%), Sendai (55.1%), Shirakawa (48.2%), and Takikawa (28.4%) (Figure 3-3-3b). When limited to the respondents in their 50s, 77.9% of nearest living children are in the same household in the case of Adachi, and more than 80% of them are unmarried. These findings suggest that the co-residence status of children is determined rather by children’s limited opportunities in housing market conditions in the metropolitan area.

Another unique finding is that the share of nearest living children in the “same prefecture” is higher among rural towns such as Takikawa (35.5%) and Shirakawa (27.5%), compared to those numbers in urban areas (Sendai 4.1%, Kanazawa 6.1%, and Adachi 9.5%). The most plausible interpretation is that in these rural towns, the younger generation is more likely to move out to larger cities in the same prefecture. In the case of Shirakawa, Nagoya city is the third largest metropolitan area in the country and is located just two hours away by train. The younger generation is more likely to move to these larger cities for better job opportunities.
Figure 3-3-3a Residence status of nearest living child, by age

Figure 3-3-3b Residence status of nearest living child, by municipality
As such, the co-residence status of children seems to be affected more by opportunity conditions (e.g. housing market and job opportunities) rather than by the strength of socio-cultural norms on family ties. Family strength may provide only a limited scope to analyze exchange and support among family members. As the SHARE book discusses, however, living arrangements may not be very good evidence for the claim of dissociation between parents and adult children. Thus, we should take a closer look at actual frequency of parent-children interaction such as contact frequency.

Figures 3-3-4a and b present the results of the frequency of contact with children. If we put “living together” and “daily contact” together, 62.7% of the respondents have a child with whom they have daily contact. The number is somewhat closer to those in non-Mediterranean countries, rather than to the number in “strong family” Mediterranean countries. Given that more than 51% are already living with children in the same household, we could say that the share of a child with daily contact is slightly smaller than those in any SHARE countries. If we include the proportion of children with contact more often than “several times a week,” 74.3% of JSTAR respondents says “yes,” and the number is as low as that in the Switzerland. Thus, the frequency of parent-child contact indicates, contrary to the anecdotal belief of a Japanese “seniority” culture with a Confucianism background that suggests strong family ties, that the JSTAR sample shows a somewhat weak family relationship compared to the family ties in SHARE European countries. Actually, the correlation between the proximity of the nearest child and the frequency of contact to the most contacted child is quite high (Spearman’s rho=0.916). That is, it may be speculated that opportunity conditions determine living accommodation and the frequency of contact between parents and children.

Figures 3-3-5a and b show the results on the frequency of contact with respondent’s parents.

As in SHARE findings, contact with parents is less frequent compared to that with children. Those who live together or have daily contact with their parents share 41% in total. The percentage goes down as age rises: 45% in the 50s and only 28% in the 70s. The share of daily contact (including “living together”) in JSTAR lies somewhat between the results of Mediterranean countries and Continental countries. Interestingly, however, the JSTAR sample shows a larger share of those who have contact “once a month or less often” (25.8%), which is higher than the number of Switzerland that has the least contact frequency among SHARE countries. Instead, the share of those having “several times a week” and “once a week or every 2 weeks” is somewhat smaller in the JSTAR sample, compared to that in SHARE countries. Thus, it seems that the contact frequency with parents is largely determined by living accommodations.

Cross-regional comparison again depicts that Shirakawa, a rural forestry municipality, fits better with the prototypical picture of conventional family tradition: the share of living together and daily contact with parents is extremely high (71.3%) (Figure 3-3-5b), a number larger than those of Spain and Italy. The largest share of those having contact “once a month or less often” or “never” is seen in metropolitan cities: Adachi (37%) and Sendai (34.2%).

This subsection previewed some findings on family and family structure obtained in JSTAR. They are summarized as follows.
Figure 3-3-4a Frequency of contact with children, by age

Figure 3-3-4b Frequency of contact with children, by municipality
Figure 3-3-5a Frequency of contact with parents, by age

Figure 3-3-5b Frequency of contact with parents, by municipality
First, nearly 90% of males are married even in their 70s. While the share of the widowed female increases with age, the share is smaller in Japan than in Europe, implying that older people are more likely to be in a marriage relationship than those in European countries.

Second, although we see some variations in the marriage and divorce rates across municipalities, the overall divorce rate lies somewhere between Mediterranean countries and Nordic countries.

Third, the prevalence of a traditional lineal generational structure (“core three-generation” of grandparents, parents, and children) varies across regions, and the share is lower in larger cities, compared to rural municipality such as Shirakawa, though Takikawa city stands as an outlier. The finding may go along with a conventional norm of “extended and strong family.”

Fourth, the share of co-residence of children in the same household is more prevalent in metropolitan and urban cities, compared to in rural farming areas. This is in contrast to the “strong family” hypothesis, and rather suggests the effect of opportunity conditions of employment and housing markets.

Fifth, the frequency of contact with children is somewhat determined by the proximity of the nearest child. The frequency of contact with parents is less than that of contact with children, and less frequent compared to that in European countries.

This preliminary evidence shows that, contrary to the prototypical view of conventional norms and seniority culture in Japan, the strength of family ties among JSTAR respondents seems at most the same as that of the family in the Continental countries rather than in Mediterranean countries. Cross-regional differences also suggest that JSTAR respondents are somewhat in a generational transition in terms of the norms from a strong-family tradition to an individual-centered weak-family culture, and that the tendency varies across urban and rural areas.

### 3.3.5 Conclusions

- Even for contemporary elderly Japanese, the family has remained a strong provider of institutional and everyday-life integration. The historical decline of marriage has not yet become apparent, which is similar to the cases in SHARE.
- The marriage bond is fairly strong especially for males, and maintained even into the 70s in JSTAR male respondents, compared to the elderly in SHARE countries.
- The multi-generational structure of the family remains prevalent, but with a large variety across regions in Japan. The proportion of co-residence of elderly with their adult children is seen as prevalent as in the case in Mediterranean countries. The likelihood of living accommodations and geographical proximity, and subsequent contact frequency are likely to be affected by regional difference in opportunity structures of employment and housing markets, rather than by the strength of traditional family norms.
- In contrast to the prototypical view of conventional norms and the seniority culture in Japan, the strength of family ties among JSTAR respondents seems at most to be the same as that of the family in the Continental countries, and cross-regional differences also suggest that JSTAR respondents are somewhat in transition from a strong family tradition to an individual-centered weak-family culture.
3.4 Family Support

3.4.1 Introduction

Family members are tied to each other through a variety of channels of exchange and support, including monetary and nonmonetary transfers. This subsection focuses on the non-monetary aspects of family support. Middle-aged and elderly people give to and receive from other family members non-monetary support in many ways, as described in the SHARE book. We focus here specifically on personal care for persons with health problems and the characteristics of care givers. We leave the issue of child care by grandparents behind due to data limitation in the first wave survey, though the SHARE report devoted considerable space to the topic. Instead, we put more focus on informal care for the elderly in the household. It should also be noted that SHARE only counts support exchange with respondent’s own parents, whereas JSTAR counts exchange with both parents and parents-in-law, since the pattern of interaction with parents and parents-in-law is anticipated to be different according to respondent’s gender, due to different gender roles under conventional “family tradition” and values for a lineal kinship.

3.4.2 Personal Care Provision to Parents

When examining this issue, we should keep in mind that the provision of informal care by family members to frail elderly parents would be influenced by traditional gender roles and related social norms, the capacity of the family, living arrangements, and the availability of formal long-term care.

Prior to the introduction of the public Long-term Care Insurance (LTCI), the family was generally obliged to provide informal care as the major source of care to the disabled elderly, unless social welfare by municipal sectors selectively provided free formal care services for those with little family support or low income (Campbell and Ikegami 2000). Even after the implementation of the LTCI, however, the family has been expected to play an important role in providing elderly care. Prevailing social norms underscored by Confucian seniority morals and the value attached to the traditional lineal family system occasionally require the first son to be responsible for taking care of his frail parents, though the actual burden of care is put on his wife. The wives of first sons, or “yome” in Japanese, have been put in the lowest power hierarchy of the family system, and were often normatively forced to take care of the parents-in-law. However, the situation has changed due to the increase in nuclear households and prevailing workforce participation by women. Thus, how the burden of care for elderly parents is (re-)distributed across age and gender becomes a research question among the participants of JSTAR. We would also see whether the pattern of sharing the care burden is different for parents and parents-in-law across genders.

Figure 3-4-1a presents the proportion of living parents and parents in need of care by the respondent’s age and sex categories. Among those in their 50s, 64% to 67% have living parents, and 13% to 17% of them (about one fourth or fifth of those with living parents) have parents in need of care. The proportion of those who have living parents goes down to 22% among those in their 60s and 10% of them (or about half of those with living parents) have parents in need of care.
Figure 3-4-1b shows the corresponding numbers for parents-in-law. Female respondents have a higher proportion of having no living parents-in-law compared to their male counterparts in all age strata, though the share of having a parent-in-law in need of care is similar between the respondents’ genders in the 50s and 60s. It is reasonable that the proportion of living parents is larger and that of living parents-in-law is smaller among female respondents, because wives are in most cases younger than their husbands. Figures 3-4-1c and 3-4-1d show the proportion of surviving parents/parents-in-law by region. Takikawa and Adachi show the highest proportion of those without living parents/parents-in-law. About 10% of respondents report having either or both parents in need of care, and the proportion is somewhat higher for parents-in-law. Kanazawa has the largest share of those who have both parents and parents-in-law in need of care.

![Figure 3-4-1a Proportion of surviving parents, by gender and age](image-url)
Chapter 3

174 JSTAR FIRST RESULTS

Figure 3-4-1b Proportion of surviving parents-in-law, by gender and age

Figure 3-4-1c Proportion of surviving parents, by municipality
Figure 3-4-2a shows the proportion of reported provision of care/help to parents. Figure 3-4-2b shows corresponding numbers for parents-in-law. As is clearly depicted in these figures, females in their 60s have the largest share of providing physical care to their parents and parents-in-law. The share of reported physical care provision among males is only 5% in the 50s and gradually goes up to 8% among males in their 70s, which is comparable to the reported share among females in their 70s. However, a striking difference across gender can be seen in the provision of care/help to parents-in-law, as was expected. The share of male provision of care/help to their parents-in-law is virtually zero, while the share of female provision of care/help to their parents-in-law is even larger than the share of care provision to their own parents, especially in the older age strata. These numbers strongly suggest that the traditional family system and norms that value a lineal relationship is still influential and puts the burden of elderly care unevenly on females.

We further test whether gender difference in elderly care provision remains after taking into consideration living arrangements (living in the same household or not) and region. “Living in the same household” is independently and significantly associated with the likelihood of provision of help/care to parents as well as to parents-in-law in both genders, after controlling for age, marital status, and municipality. Interaction between gender and living arrangements was not significant, suggesting that living arrangements affect both genders in the same manner. Thus, the higher likelihood of female provision of elderly care is partly explained by their higher likelihood of living with parents-in-law. However, even after adjusting for living arrangements, gender still significantly differentiated the likelihood of care provision.
Figure 3-4-2a Proportion of reported provision of care/help to parents

Figure 3-4-2b Proportion of reported provision of care/help to parents-in-law
Among regions, those in Shirakawa show the least likelihood of providing care/help to parents. This is a somewhat unexpected finding because Shirakawa city is a rural forestry city with the highest share of traditional three-generation households, and was expected to be most influenced by traditional norms of gender roles. We should further investigate the findings in connection with the availability and utilization patterns of formal care service across regions, since support exchange among family members is not simply private but is closely related with public services to address the needs of families.

SHARE reported limited information on care/help provision to parents, and the statistics are not provided stratified by gender. Thus, we could not discuss whether the gender role difference observed in JSTAR is similarly observed in SHARE countries, especially in Mediterranean countries with a strong family tradition. At least, however, those in the 50s and 60s are specifically exposed to the elderly care burden as we have also observed in the JSTAR case.

### 3.4.3 Receipt of Personal Care

Older people receive personal help from within and outside family members as informal and/or formal care. As seen in Chapter 2, only a small portion of the JSTAR sample suffers limitation in activity of daily life (or ADL) such as dressing, washing and bathing, and going to the toilet. Figure 3-4-3 represents the share of those who receive help in personal care, housekeeping, and instrumental activities such as preparing official document during the past 12 months, the share of those who have limitation in ADL, and that of those who receive personal help of any type (formal and informal) for ADL during the past 12 months.

![Figure 3-4-3 Proportion of those who receive care/help](image)
First, we observe that the share of those with ADL limitation and that of those receiving personal help increases gradually with age. While the SHARE book found a steep slope after age 75, which is not available in JSTAR, the pattern up to 75 is observed commonly in Japan and European countries. We notice that the share of those receiving any type of help and personal help specifically for ADL is consistently lower in Japan than in European countries. The proportion of those persons receiving personal care for ADL is close to 30% in the 70s in SHARE while it is only less than 10% in the 70s in Japan.

We cannot simply determine whether the share of receiving help exceeds the share of those with “severely limited” function, as SHARE observed, because the SHARE report does not define “severe limitation” in the text, so comparative analysis with JSTAR is not possible. JSTAR shows that the share of those receiving any help is larger than that of those reporting ADL limitation in their 50s, which is somewhat compatible with SHARE findings. However, the share of receiving help and that of having ADL limitation is close in the 60s and 70s. Even so, the share of receiving help for ADL is smaller than that of reporting ADL limitation. Thus, even with ADL limitation, JSTAR respondents tend to ask help with housekeeping and/or instrumental activities (e.g. withdraw money and prepare official papers, etc.) rather than help with personal physical care per se.

It is worth noting that females are more likely to receive help than males, and are more likely to report ADL limitations, but less likely to receive help for ADL. Whether females tend to over-report their physical limitation, or females have less access to help for ADL is an important and interesting question for further research because policy implications should be quite different.

The observations above require us to reconsider the presumed Japanese family tradition and norms in which Japanese are very likely to provide personal care for older family members. However, this pattern might not be uniform across households since care giving is not an easy task and poses large physical and mental burdens. Naturally, the next question is who provides personal care. This issue is also associated with living arrangements. Although we should explore those issues further, a small number of those who need personal care in the JSTAR sample at this stage prohibit meaningful statistical comparison across household types, caregiver characteristics, marital status, and regions. Detailed analysis should be conducted in follow-up studies where a larger number of respondents are expected to become in need of care.

We also acknowledge that support and exchange in the case of single-member households is a crucial policy issue in welfare states with aging populations. In Europe, whether welfare states will be successful in the twenty-first century is thought to depend on both acknowledgment of changing family structures (Esping-Andersen 2003). We had only 11 respondents who have ADL limitation and in a single household, and among them, five actually receive help from family living in a separate household, non-family community members, and others. Further follow up survey in JSTAR and SHARE will provide an unusual opportunity to address exchange and support both within and between households simultaneously, relating them with social policies in an international perspective.
3.4.4 Conclusions

- Non-monetary support exchange takes a variety of forms such as giving personal care, helping instrumental daily activities, or simple contact to share socioemotional support. JSTAR and SHARE explore how the pattern of support exchange is shaped across different cultures and norms of the family.

- The pattern of provision of care to fragile parents shows a striking difference across age, gender, and region. The results from the first wave of JSTAR clearly suggests that the traditional family system and norms that value a lineal relationship are still influential and put the burden of elderly care unevenly on females.

- In contrast, females are more likely to receive help than males, and are more likely to report ADL limitations, but less likely to receive help for ADL. Whether females tend to over-report their physical limitation, or females have less access to help for ADL is an important and interesting question for further research.

- To overcome the limitation of cross-sectional data, further follow up in JSTAR and SHARE are indispensable to further investigate exchange and support within and between households for international social policy discussion.
3.5 Financial Transfers and Inheritance/Bequest

3.5.1 Introduction

Following the previous subsection dealing with nonmonetary transfers, here we examine mutual exchanges among family members in terms of monetary transfers. Monetary transfers also have a variety of forms including direct support in cash/gifts, and indirect support such as donors paying a third party on behalf of the recipient. This subsection deals first with financial transfers on a regular basis and uncovers a large amount of monetary transfer through inheritance and bequest from older to younger generations, or vice versa.

As in European countries, in Japan, most recent policy debates on social security treat older people as “receivers” of financial transfers. To be sure, under the pay-as-you-go pension program, a larger proportion of aged persons relies on pension as their single source of income and therefore puts a substantial financial burden on younger generations. These elderly people incur further social burden because they are more likely to consume a larger portion of health recourses. However, as the SHARE report pointed out, older people as “givers” of financial resources are largely ignored in policy debates, despite the fact that older people often help their children through financially difficult periods or transfer wealth or leave bequests to younger generations that help them shape a majority of wealth. These facts should be treated seriously in the debate on tax policy and other economic planning in an aging society. SHARE and HRS have provided a rich data source on this aspect of economic transfer between younger and older generations, and JSTAR now joins the international academic debate on this issue.

There has been tremendous volume of theoretical models and empirical studies on inter-generational transfers. One school argues for risk sharing within the family, and explores insurance mechanism through mutual transfers across generations (i.e. Altonji, Hayashi, & Kotlikoff 1992; Hayashi, Altonji, & Kotlikoff 1996; both of which used US data). The quantitative importance of financial transfers across generations was also confirmed and some studies have revealed their consequences for capital accumulation and wealth inequality over generations. The bulk of private money transfer between generations occurs inter vivos—in other words, from living family members and not in the form of inheritance wealth (Arrondel & Masson 2001). Altonji, Hayashi, and Kotlikoff (1997) used the Panel Study of Income Dynamics (PSID) to test whether inter vivos transfers from parents to children is motivated by altruism. Their results rejected the altruism hypothesis.

Even though Japan has a very large proportion of aged persons, there has been little empirical research on financial transfers within and across families and their implications. Hayashi (1995) is an exception to examine altruism among extended families in Japan. Private inter-generational transfer is closely related with public policy, such as social security, redistribution, and tax policies. Since these policies are expected to play a role complementary to intergenerational solidarity, research on financial transfers within and across families is quite relevant for policymakers. Obviously, the
main reason of under-investigation on this important policy issue is a lack of data to examine the topic. JSTAR will provide the first opportunity for researchers to explore financial transfers and risk sharing within/across families in Japan.

JSTAR provides several variables related to private money transfer. First, the survey asked a respondent whether she/he has given or received monetary transfers for living expenses including food during the past twelve months and, if so, whether it was on regular basis. The interview also asked the amount of monetary transfer and receiver/donor of the transfer. We should keep in mind, however, that the way these questions are asked is different between JSTAR and SHARE. A conventional questionnaire would ask about the transfer amount excluding shared housing or food, which was exactly what JSTAR adopted in its interview questionnaire, while SHARE includes material gifts and indirect transfers such as payments for medical care or insurance, schooling, or a down payment for a home (loans were not included). In contrast, SHARE excludes any transfers worth less than 250 euros. In addition, SHARE asked regarding all transfers including those on an irregular basis with information about their motives, though JSTAR focuses strictly on monetary transfers on a regular basis without asking their motivation. In this section, we first focus on the transfer on a regular basis and will explore inheritance and gifts, which take place irregularly, in the next subsection.

3.5.2 Monetary Transfer on Regular Basis
In JSTAR, 10.5% of respondents answered that they received direct money transfer from outside their household by the time of the interview (Figures 3-5-3-1a and 3-5-3-1b). The number seems much higher than those reported in SHARE countries. Since SHARE ignored transfers of less than 250 euros, we cannot simply compare the results here.

![Figure 3-5-3-1a](image-url) Proportion of those who received regular monetary transfer in the past 12 months, by age, gender, and municipality
The proportion of those receiving money transfer from parents and parents-in-law is dominantly seen in those aged in the 50s (4.1%), and virtually none in aged 60 and over (Figure 3-5-4-2a). Instead, the proportion of those receiving transfer from children goes up from 7.5% in the 50s to 9.3% in the 70s (Figure 3-5-4-2b). We can also see that females are more likely to receive money transfer from outside the household, which may be partly related to limited job participation and income source among females. Gender difference in the likelihood of receiving monetary transfer, however, remains significant even after adjusting for age, educational attainment, equivalent household income, and job status. Those with lower educational attainment and lower equivalent household income are significantly more likely to receive money transfer (not shown in tables. Odds ratio: 1.72[1.32-2.25] for education, 2.05[1.60-2.62] for equivalent household income). Across municipalities, those in Kanazawa and Sendai are more likely to receive money transfer, and those in Takikawa and Shirakawa are the least likely. This cross-regional difference remains significant even after adjusting for age, gender, education, income, and employment status. Thus, the difference may be related to regional difference in the pattern of risk sharing among family members, which would deserve a closer investigation. In contrast, no clear pattern is observed for monetary transfer from non-family members (Figure 3-5-4-2c).
Figure 3-5-4-2a Proportion of those who received monetary transfer from parents/siblings in the past 12 months, by age, gender, and municipality.

Figure 3-5-4-2b Proportion of those who received monetary transfer from children/grandchildren in the past 12 months, by age, gender, and municipality.
Giving direct money transfer to outside the household is seen in 9.8% of JSTAR respondents. The proportion is larger in the 50s (13.7%), then decreases as respondent’s age goes up: 7.7% in the 60s and 7.0% in the 70s (Figures 3-5-5a and 3-5-5b). Among those in their 50s, 3.9% reported money transfer to parents or parents-in-law (Figure 3-5-6a), and 9.9% to children (Figure 3-5-6b). Among those in their 70s, the corresponding numbers are only 0.6% to parents and 6.1% to children. Thus, those in their 50s are most obliged to give money transfer to other family members. Gender difference that we have observed in incoming transfer is not as obvious as in the case of outgoing transfer. In the 50s, males rather than females are more likely to make money transfer to outside the household. Those with lower education and lower income are less likely to make money transfer out (not shown in tables). Another interesting finding is the regional difference: those in Shirakawa and Takikawa are more likely to make money transfer outside the household compared to those in Sendai and Kanazawa, which is reverse in the case of incoming transfer. A plausible explanation might be that those in rural farming/forestry towns have family members, presumably children who are students or young adults, who work or study in cities where housing and living costs are more expensive than in rural towns, and the children may have larger needs for financial assistance from their family. In contrast, no clear pattern is observed for monetary transfer to non-family members (Figure 3-5-6c).
Figure 3-5-5a Proportion of those who gave regular monetary transfer in the past 12 months, by age, gender, and municipality

Figure 3-5-5b Proportion of those who gave irregular monetary transfer in the past 12 months, by age, gender, and municipality
Figure 3-5-6a Proportion of those who gave monetary transfer to parents/siblings in the past 12 months, by age, gender, and municipality.

Figure 3-5-6b Proportion of those who gave monetary transfer to children/grandchildren in the past 12 months, by age, gender, and municipality.
3.5.3 Inheritances and Bequests

In the rest of this subsection we will examine the prevalence of inheritances and bequests and their contribution to asset accumulation among Japanese elderly. Inheritances and bequests are surely one of the largest components of wealth formation. It is the major source of intergenerational wealth transmission in Japan. The SHARE book shows that most people receive bequests from parents and other relatives before they leave the labor market. SHARE also found that intergenerational transfers are potentially a major economic resource during retirement. In the European context, this fact often attracts concern among policymakers regarding expanding wealth inequality through intergenerational wealth mobility. The intergenerational wealth transmission may also affect the early retirement decision, especially for more productive individuals. While the latter is scarce in the case in Japan, the intergenerational transmission of wealth is closely related to the inequity issue and makes one of the most serious social problems in modern Japan. Thus, in-depth research on the intergenerational wealth transmission would provide relevant information for a variety of public policies regarding taxation and redistribution.

While JSTAR is not the first to provide information on inheritances and bequests in Japan, such data has been very scarce and only partial examination was possible. However, JSTAR collects data on the amount of inheritance and bequests which a respondent has already received and that which he expects in the future as well as those which he will leave. Together with a in-depth information on family structure and economic, social, and health status, JSTAR will enable us to explore determinants and consequences of inheritance and bequests in a way comparable with other developed countries including the SHARE countries.

Figure 3-5-6c Proportion of those who gave monetary transfer to non-family persons in the past 12 months, by age, gender, and municipality
JSTAR has in common with SHARE questions about inheritance and bequests, but the way of inquiry is slightly different. JSTAR asks a respondent whether he has received inheritance or bequests regardless of the amount and, if so, the total amount of receipt to date and from whom he received the bequest. Since JSTAR asked the total amount which a respondent has ever received, it does not ask regarding the timing of receipt. SHARE asked whether a respondent (or his/her spouse) ever received gifts or inheritance worth more than 5,000 euros in the form of money, goods, property, or large gifts at least once and, if so, how much they were at that time and when they were received. Both JSTAR and SHARE also asked a respondent whether he is expecting to receive inheritance or bequest in future.

3.5.4 Received Inheritance and Individual and Regional Variations
According to the SHARE book, one third of the respondents are reported to have received gifts or inheritances often in the form of housing from parents, parents-in-law, as well as aunts and uncles. The book also emphasizes considerable differences in the prevalence and distribution of inheritances across SHARE countries. While the respondents in JSTAR are under the same circumstances of common laws and taxes, we will observe substantial variations in inheritance and bequests across municipalities.

Figure 3-5-7a shows the proportion of those who have ever received inheritances/bequests by age, gender, and region. The overall prevalence of having received inheritances is 30.6% for males and 20.8% for females. These numbers are relatively lower than those in SHARE where about one third of all households have ever received such a transfer. In Europe, Spain, the Netherlands, and Austria are the countries with the lowest prevalence (below 25%) and Japan’s prevalence is about the same as the lowest in Europe. The distribution of transfer amounts shows that the medium was JPY5 million.

Comparison across gender and municipality tells that the proportion is the largest in Shirakawa for males and in Kanazawa for females. While the proportion for females is close to 20% in all municipalities, we see a larger disparity for males. The gap between the highest (Shirakawa 44.4%) and the lowest (Takikawa 24.7%) is close to 20%. In contrast, females in Shirakawa have the lowest proportion of ever having received inheritances (15.2%), and those in Kanazawa showed the highest (27.3%). This clearly suggests that gender difference in inheritance receipt is closely associated with the strength of the traditional family system that values male lineage and transmission of wealth to the eldest son. Figure 3-5-7b endorses such interpretation. Shirakawa males show the largest proportion of receiving inheritances from parents in any age strata.
Figure 3-5-7a Proportion of those who have ever received inheritance, by age, gender, and municipality

Figure 3-5-7b Proportion of those who have ever received inheritance, by age, gender, municipality, and source
The SHARE book shows that one fifth of all households have received small inheritances (between 5,000 and 50,000 euros) which are predominant in Sweden and Denmark, and only 10% have received inheritances larger than 150,000 euros, which is predominant in Switzerland, Germany, and also Italy. The SHARE book discusses two possibilities to account for large cross-national differences in bequests. One is cross-national differences in gifts and inheritance taxes, which is irrelevant for the disparity across municipalities in Japan. When decomposing the shares based on the amount of inheritances and bequests, the share of those who have received less than JPY5 million does not vary substantially across gender or municipalities. The difference comes from the share of those who have received more than JPY5 million. The share of respondents having received more than JPY15 million is larger in Kanazawa and Sendai but smaller in Takikawa.

Household wealth consists of accumulation of savings from earned income (lifecycle wealth) and receiving gifts or bequests. This issue is particularly important in terms of intergenerational wealth transmission. While there is a large volume of empirical evidence in the US, there is relatively scarce research in other countries (Davies & Shorrocks 2000). Examining the case of Japan might be attractive for researchers since Japan has one of the highest household savings and wealth accumulation among elderly households. As the SHARE book warns, however, we have to overcome some measurement issues because inheritances and gifts are likely to be underreported and the reported ratio of inherited to total wealth is probably just a lower bound.

3.5.5 Inheritance and Bequest Expectations

Finally, we examine expectations concerning future inheritances and bequests. While about 20% of the respondents in JSTAR has already received a large gift or inheritance, younger respondents whose parents are still alive will expect to receive (further) inheritances in the future. This may be especially the case for Japan where the prevalence of gifts and inheritances are lower than in European average. The lower prevalence might be explained partly by the longer life expectancy in Japan. In addition, many wealthy households expect to leave sizeable bequests to their heirs. This is particularly the case for Japanese elderly since wealth level for Japanese elderly is higher than international standards.

JSTAR asks the respondents whether they expect to have a chance to receive any inheritances in the future. If there are multiple expected inheritances, a respondent is asked to answer about the largest one. While SHARE has the same question with limits for bequests to the next ten years, JSTAR does not confine the time span. Among JSTAR respondents, 8.8% answer that they expect any inheritances in future, and three fourths of them are in their 50s. There was no gender difference. Those in Sendai and Kanazawa are more likely to have expected inheritances in future (about 12%). The likelihood of expected inheritance receipt in the future decreases over age. As is expected, the likelihood has a strong and significant interaction with living arrangements with parents. Among those with living parents, the female gender, lower education, and lower equivalent household income are independently and significantly associated with lower likelihood of expected inheritance receipt in the future, after adjusting for
age, municipality, and marital status. However, among those without living parents, the female gender is associated with higher likelihood of expected inheritances. Education and household income are not significant in this case. Thus, the former case clearly suggests the transmission from parents to sons, and fixed social strata of wealth formation. The latter case seems to be more free from the traditional lineage family system, and may need further investigation.

3.5.6 Conclusions
- JSTAR provides detailed description of monetary transfers across generations that may help the policy and research on risk sharing among/across families.
- Those in their 50s are most likely to receive monetary transfer from outside of the household, and at the same time most likely to give transfer to outside the household. Thus, those in their 50s are most exposed to financial burdens of monetary transfer.
- Those in rural areas are more likely to receive monetary transfer, and those in rural areas are more likely to give transfer, suggesting that higher living cost in rural life may shape the pattern of monetary transfer across families.
- Inheritance transfer is more likely to be reported among males and those in rural areas with a stronger family tradition. Among those with living parents, the expected inheritance in future may explain wealth formation stratified by socioeconomic status.
3.6 Quality of Employment and Well-Being

3.6.1 Introduction
Together with financial incentives and health status, quality of employment may be closely associated with the decision regarding labor participation, especially among older people. As seen in Chapter 4, Japan enjoys the highest labor force participation rate among the industrialized countries. In contrast, early retirement is a major policy challenge in many European countries and puts substantial pressure on social security and health policies (Brugiavini 2001). A natural question is whether the quality of employment is higher in Japan than in European countries and how the disparity, if any, accounts for the large difference in labor force participation rate between Japan and Europe.

There are two channels of quality of employment that affect retirement decision: those that are direct and those that are indirect. The direct channel is that poor quality of work, high ergonomic exposure and physical work load, as well as mentally/cognitively stressful working conditions, e.g. high work pressure, monotonous tasks, poor incentives, and elevated job instability encourage premature departure from working life (Mein et al. 2000). On the other hand, the indirect channel is that stressful working conditions contribute to poor health, which may result in premature retirement (Ostry et al. 2003; Schnall et al. 2000). In Europe, job stress was identified as a risk factor for myocardial infarction (Karasek et al. 1988; Chandola et al. 2008), depression (Wang et al. 2008), and other health outcomes among the working population. In Japan, job stress was also identified as a risk factor of depression (Tsutsumi et al. 2001a) and absenteeism (Kondo et al. 2006).

There are two major theoretical models on work stress, and SHARE provided a good chance to examine those models on retirement decision in an internationally comparable way. The first one is the demand control model (Karasek et al. 1998; Karasek and Theorell 1990). This model identifies stressful work conditions by profiling work demand and decisional latitude. Work demand is measured as amount of work demanded, and the degree of ergonomic exposure and time pressure. Decisional latitude refers to the degree with which a worker can exercise autonomous decision on the way the job is done. This model predicts that if job demand relatively exceeds job control, it makes a stressor in the working condition. The demand control ratio is used as a summary score to depict the degree of stressful conditions, and it is known to vary across job types and job hierarchy. For example, administrators are characterized with high demand and high control, and consequently have a low demand-control ratio, while blue collar workers tend to have high demand and low control, leading to a high demand-control ratio. The theory also predicts that social support that a worker enjoys from his peers and supervisors buffers the impact from stress.
The second major model on job stress is the effort-reward imbalance model (Siegrist et al. 2004). Effort is a concept similar to job demand, and refers to the effort that a worker has to pay to finish an assigned task. Reward can be monetary (e.g. paid salary), or non-monetary (reputation, esteem, career prospects, opportunity for skill acquisition, and job security). The theory claims that an imbalance between efforts and rewards leads to stress-evoking conditions. Siegrist also argues that the third concept named “over-commitment,” or an individual worker’s property spent and low rewards received in return (money, esteem, career prospects, job security), adversely affects health.

This subsection employs a measurement similar to that employed in the SHARE book and performs a comparative study on quality of work between Japan and Europe. In what follows, we explore the prevalence of poor quality of employment across respondents’ demographic and socioeconomic status, including job status and type. We then examine the relationship between quality of employment and self-reported health conditions such as self-rated health and depression.

3.6.2 Quality of Employment: Measurement
To measure health-related stressful work, a short battery of items derived from the Job Content Questionnaire (JCQ) measuring the demand-control model (Karasek and Theorell 1990) and from the Effort Reward Imbalance Questionnaire (ERIQ) measuring the effort-reward imbalance model (Siegrist et al. 2004) was included in both SHARE and JSTAR interviews in an almost comparable manner. Both JCQ and ERIQ have been translated and validated in Japan (Kawakami et al. 1996; Tsutsumi et al. 2001b). The original version of JCQ contains 49 items which are categorized into three sub-domains: demand, control, and support. On the other hand, ERIQ contains 46 items, which are also divided into three sub-domains: efforts, rewards, and over-commitment.

SHARE did not adopt a full scale JCQ and ERIQ questions presumably due to space limitation. Instead, SHARE selected items on the basis of factor loadings on respective original scales. Accordingly, SHARE includes 2 items for demand/efforts (physical demand and time pressure), 2 items for control (job discretion and skill opportunity), and 5 items for rewards (support, respect, monetary reward, job advancement, and job security). In addition, 1 item asks regarding job satisfaction. In JSTAR, we adopted the same set of items for comparative purposes, except for skill opportunity and job advancement.
The demand control ratio is obtained by the average score of job physical demand and time pressure divided by the score for job discretion. The effort reward ratio is computed by the average score of job physical demand and time pressure divided by the average score of support, respect, and monetary reward and job security. Following SHARE, values of effort-reward ratio greater than 1.0 were defined as indicating an imbalance between high effort and low reward, whereas values equal to or lower than 1.0 were defined as indicating a balanced state, i.e. no stressful work conditions. SHARE defined “high quality of work” in terms of “high task control” by tertiles of sum of 2 items on job discretion and control. Since JSTAR only had a single item on job discretion, we re-categorized 4 response categories of the item to make a comparable category of task control tertiles. In this JSTAR report, a response of “strongly agreed” and “agreed” indicates low quality of work (or low job discretion), “disagreed” as medium, and “strongly disagreed” as high quality of work. The data of this analysis are restricted to the respondents who are aged between 50 and 65 and still in regular employment or self-employed at the time of the interview.

The SHARE report categorized countries with more than 50% of all respondents exhibiting effort-reward imbalance (>1.0) as a country with very poor quality of employment. In countries with a percentage of imbalance ranging from 30% to 40%, the country was considered to be of medium or fair quality of work. Those countries with the prevalence of imbalance below 30% were considered as that of high quality of work. Table 3-6-2a shows the distribution of effort-reward ratio by municipality. In JSTAR, the prevalence of those with effort reward ratio >1.0 ranged 20-28% in 5 municipalities. Thus, if we follow the criterion of SHARE, Japan, like the Netherlands and Switzerland, should be categorized as a country with high quality of work. Table 3-6-2a also shows the prevalence of low quality of work in terms of effort reward ratio >1.0 by demographics and educational attainment across cities. The share of low quality of work was significantly low in Takikawa, and the difference across municipalities still remains significant even after age, gender, educational attainment, and equivalent household income were adjusted for.

Figure 3-6-2 shows the distribution of another dimension of job quality, task control, by municipality. Two things should be mentioned about this figure. Firstly, the share of “low quality of work,” or the lowest level of task control is about 40%, which is somewhat closer to the situation in Italy and Germany where a medium level of control was observed. Thus, in terms of task control, Japan is not categorized as a country with a high quality of work. Secondly, the share of lowest level of task control is the largest in Shirakawa and Takikawa, rural farming and forestry towns, and the smallest in Adachi, a metropolitan city. The share of the highest level of task control is higher in Adachi and Sendai, again both metropolitan cities, and the smallest in Takikawa. Since the difference across municipalities might be due to difference in demographic and socioeconomic status, Table 3-6-2b shows the prevalence of low quality of work stratified according to gender, age, educational attainment (less than compulsory education or over), and employment status for each municipality. This difference across municipalities still remains even after adjusting for age, gender, educational attainment, and equivalent household income.
Table 3-6-2a Prevalence (%) of “Low Quality of Work” in terms of Effort-Reward Ratio >1.0

<table>
<thead>
<tr>
<th></th>
<th>Sendai</th>
<th>Kanazawa</th>
<th>Takikawa</th>
<th>Shirakawa</th>
<th>Adachi</th>
</tr>
</thead>
<tbody>
<tr>
<td>N</td>
<td>380</td>
<td>471</td>
<td>190</td>
<td>340</td>
<td>363</td>
</tr>
<tr>
<td>Gender</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>27.6</td>
<td>23.8</td>
<td>17.9</td>
<td>32.6</td>
<td>26.0</td>
</tr>
<tr>
<td>Female</td>
<td>24.1</td>
<td>19.1</td>
<td>23.1</td>
<td>20.4</td>
<td>23.9</td>
</tr>
<tr>
<td>Age</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>54-59</td>
<td>28.5</td>
<td>22.6</td>
<td>22.6</td>
<td>28.7</td>
<td>23.4</td>
</tr>
<tr>
<td>60-65</td>
<td>19.8</td>
<td>19.4</td>
<td>15.2</td>
<td>27.7</td>
<td>28.8</td>
</tr>
<tr>
<td>Educational attainment</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Low</td>
<td>25.7</td>
<td>30.0</td>
<td>25.8</td>
<td>36.4</td>
<td>37.8</td>
</tr>
<tr>
<td>High</td>
<td>26.3</td>
<td>20.0</td>
<td>18.9</td>
<td>23.0</td>
<td>21.8</td>
</tr>
<tr>
<td>Equivalent income</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Low</td>
<td>32.0</td>
<td>23.1</td>
<td>20.8</td>
<td>33.3</td>
<td>31.0</td>
</tr>
<tr>
<td>High</td>
<td>19.8</td>
<td>18.6</td>
<td>15.5</td>
<td>24.4</td>
<td>21.9</td>
</tr>
</tbody>
</table>
With regard to effort-reward imbalance, low quality of work is significantly more prevalent among employees with low education and low equivalent household income, which was similarly seen across municipalities. Males are more likely to be in low quality of work compared to females, which was unique compared to SHARE findings, where no consistent gender differences were observed. Although differences across age groups were not consistent in SHARE, JSTAR subjects showed that older respondents are less likely to face low quality in work conditions, which can be explained by the healthy worker effect among older workers who could continue to work at their ages. Adachi was the exception where older respondents show the larger share of low quality of work compared to younger respondents.

When comparing these differences in quality of work with respect to task control, a different situation appears as the SHARE report also found. Lower education and lower household income are more drastically associated with low quality of employment, if compared to the effort-reward imbalance. Moreover, older respondents are more likely to engage in a low quality of work, which is contra to the healthy worker effect as we have seen in the case of effort-reward imbalance. Furthermore, the prevalence of low job control is significantly higher among females. These findings are quite similar with those in the SHARE report, and may imply an important cross-country lesson on the dimension of job quality and its relationship with a worker’s demographic/socioeconomic status.

Table 3-6-2b  Prevalence (U%) of “Low Quality of Work” in terms of Low Job Discretion

<table>
<thead>
<tr>
<th></th>
<th>Sendai</th>
<th>Kanazawa</th>
<th>Takikawa</th>
<th>Shirakawa</th>
<th>Adachi</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>N</strong></td>
<td>383</td>
<td>485</td>
<td>192</td>
<td>342</td>
<td>369</td>
</tr>
<tr>
<td><strong>Gender</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>44.7</td>
<td>36.3</td>
<td>42.5</td>
<td>41.9</td>
<td>30.9</td>
</tr>
<tr>
<td>Female</td>
<td>31.4</td>
<td>39.9</td>
<td>50.6</td>
<td>57.5</td>
<td>35.2</td>
</tr>
<tr>
<td><strong>Age</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>54-59</td>
<td>41.8</td>
<td>35.6</td>
<td>44.4</td>
<td>45.7</td>
<td>32.0</td>
</tr>
<tr>
<td>60-65</td>
<td>34.4</td>
<td>43.9</td>
<td>48.5</td>
<td>53.0</td>
<td>34.5</td>
</tr>
<tr>
<td><strong>Educational attainment</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Low</td>
<td>37.1</td>
<td>42.5</td>
<td>61.3</td>
<td>49.0</td>
<td>32.9</td>
</tr>
<tr>
<td>High</td>
<td>40.0</td>
<td>37.0</td>
<td>42.9</td>
<td>46.0</td>
<td>32.8</td>
</tr>
<tr>
<td><strong>Equivalent income</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Low</td>
<td>38.1</td>
<td>42.3</td>
<td>44.4</td>
<td>55.7</td>
<td>33.9</td>
</tr>
<tr>
<td>High</td>
<td>39.7</td>
<td>35.1</td>
<td>44.7</td>
<td>39.1</td>
<td>32.7</td>
</tr>
</tbody>
</table>
3.6.3 Strong Association between Quality of Employment and Well-Being

The third question concerns the frequency and strength of associations between quality of employment and well-being, as measured by level of self-rated health and mental health status. As in Chapter 2 section 5, here again we rely on self-rated health measured in a single US version Likert scale, and dichotomize it into good health (very good or better) and poor health. Although SHARE adopted EURO-D for comparative purpose across European countries with different measure of depression, we used CES-D and dichotomize responses into “Yes” (CESD score >=16) and “No.”

Tables 3-6-3 and 3-6-4 depict the distribution of “poor quality of work” by the strata of self-rated health and depressive status. As was seen in SHARE and previous empirical studies (Marmot & Siegrist 2004), JSTAR also found statistically a significant difference in quality of work conditions according to self-related health and depression status. Even after adjustment for age, gender, educational attainment, and municipality, poor quality of work condition remains significantly related to poor self-reported health status. Since this is a cross-sectional observation, however, we could not identify any causal relationship at this stage. As already discussed in Chapter 2, it may be due to health selection (poor health status leads to downward social mobility and higher likelihood of job with poor quality) or due to social selection (poor quality of job leads to poor health outcomes). Since both the quality of work and self-reported health status are strong predictors of retirement decisions, follow-up surveys and subsequent panel data are indispensable to tackle how work conditions and health affect and are affected by each other, and how they lead to the likelihood of job participation.

Table 3-6-3  Prevalence (%) of “Low Quality of Work” in terms of Effort-Reward Ratio>1.0

<table>
<thead>
<tr>
<th></th>
<th>Sendai</th>
<th>Kanazawa</th>
<th>Takikawa</th>
<th>Shirakawa</th>
<th>Adachi</th>
</tr>
</thead>
<tbody>
<tr>
<td>Self-rated health</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Bad</td>
<td>35.5</td>
<td>24.0</td>
<td>21.3</td>
<td>34.8</td>
<td>27.0</td>
</tr>
<tr>
<td>Good</td>
<td>20.0</td>
<td>19.5</td>
<td>19.1</td>
<td>25.2</td>
<td>23.5</td>
</tr>
<tr>
<td>Depression (CESD&gt;16)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>41.4</td>
<td>25.4</td>
<td>20.7</td>
<td>33.3</td>
<td>32.8</td>
</tr>
<tr>
<td>No</td>
<td>22.7</td>
<td>20.5</td>
<td>18.8</td>
<td>27.3</td>
<td>23.2</td>
</tr>
</tbody>
</table>

Table 3-6-4  Prevalence (%) of “low quality of work” in terms of low job discretion

<table>
<thead>
<tr>
<th></th>
<th>Sendai</th>
<th>Kanazawa</th>
<th>Takikawa</th>
<th>Shirakawa</th>
<th>Adachi</th>
</tr>
</thead>
<tbody>
<tr>
<td>Self-rated health</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Bad</td>
<td>40.7</td>
<td>38.6</td>
<td>39.5</td>
<td>42.4</td>
<td>37.5</td>
</tr>
<tr>
<td>Good</td>
<td>39.5</td>
<td>37.3</td>
<td>50.0</td>
<td>49.6</td>
<td>28.9</td>
</tr>
<tr>
<td>Depression (CESD&gt;=16)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>42.4</td>
<td>39.7</td>
<td>43.3</td>
<td>52.3</td>
<td>32.2</td>
</tr>
<tr>
<td>No</td>
<td>39.7</td>
<td>37.5</td>
<td>45.8</td>
<td>46.4</td>
<td>32.1</td>
</tr>
</tbody>
</table>
3.6.4 Conclusions

- Quality of employment in terms of (im)balance between perceived effort and reward was observed similarly in JSTAR as was seen in Northern European countries with “high quality of work.” Quality of employment in terms of task control, however, was as poor as that of medium-fair level countries. Our results may raise a question as to which measure expresses which aspects of job quality in cross-country comparison.

- Quality of employment is strongly associated with socio-economic status (educational degree) in JSTAR as was true in almost all SHARE participating countries.

- Quality of employment is strongly associated with self-reported well-being, again as was also observed in all SHARE participating countries: lower quality of employment goes along with higher prevalence of poor self-rated health and depression. Since job environment and quality of work is a strong predictor of a worker’s health, longitudinal observation and further investigation are required to identify the impact of job conditions and health on job participation among Japanese and European elderly, a subject which deserves high policy priority in our aging society.
3.7 Quality of Life and Well-Being

Achieving a good quality of life in one’s later life stage is a societal ideal in our aging society. How to assess the quality of life, however, is not straightforward, since the construct of “quality of life” is apparently multi-faceted. Widely used “generic quality of life” measures, such as Medical Outcomes Study Short Form 36 (or SF36) actually measure physical and mental functioning. The WHO Quality of Life scale includes happiness and life satisfaction. Since determinants of happiness and satisfaction are broad and vague, the usefulness of the scales may be limited in policy planning and evaluation.

The English Longitudinal Study of Ageing (ELSA) includes a quality of life measure called CASP-19 (Hyde et al. 2003). The scale has been developed to assess 4 constructs hypothesized to compose basic needs of human life: control, autonomy, self-realization, and pleasure. SHARE also adopted a derived scale CASP-12, which was a shortened version of CASP-19 based on a result of secondary factor analysis. The recent SHARE book reports that the score of CASP-12 is highly correlated with socioeconomic and health status across participating countries, and that the average score showed the North-South gradient across Europe.

In the first wave of JSTAR, we chose to give up including CASP-19 because the scale needs rigorous cross-cultural adaptation and subsequent scale validation. The concept of autonomy and control is not self-evident across cultures. As Markus and Kitayama (2003) show in their studies on cross-cultural psychology, American and European people have a sense of self-focused agency, while East Asians including Japanese tend to perceive the sense of agency in the context of social relationship with surrounding others. Currently, an independent study on cross-cultural adaptation of CASP19 is to be conducted with a small sample of Japanese elderly other than JSTAR respondents. In this study, we also adopt an additional set of psychological well-being such as sense of coherence (Antonovsky 1987; Togari et al. 2007). In the second wave of JSTAR, these measurements will be newly administered to the JSTAR respondents, and the data will provide another unique opportunity of cross-cultural comparison in psychological well-being and life achievement in later life among Japan, the UK, and SHARE countries.
Chapter 3

3.1 References

3.2 References

3.3 References

3.4 References

3.5 References
3.6 References
3.7 References