

Original Paper

## Influence of Family Cohesion and Sense of Filial Responsibility on Viewpoints Regarding Socialization of Elderly Care in East Asian Countries

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### Abstract

The present study was conducted to clarify the influence of family resources on viewpoints regarding the socialization of elderly care based on data from 636 Japanese students and 368 of their parents; 461 South Korean students and 460 of their parents; and 959 Chinese students and 707 of their parents. Specifically, a causal model was established describing the influence of family cohesion on viewpoints regarding the socialization of elderly care through a sense of filial responsibility. By classifying the subjects into six groups according to country (Japan, South Korea and China) and generation (students and their parents), the goodness of fit for this causal model to the data and relationships were examined using structural equation modeling. In China, family cohesion influenced the sense of filial responsibility, whereas the sense of filial responsibility did not influence viewpoints regarding the socialization of elderly care. In Japan and South Korea, family cohesion influenced viewpoints regarding the socialization of elderly care through attitudes toward emotional support. The influence of family resources on viewpoints regarding the socialization of elderly care became smaller as the socialization of elderly care developed.

### Introduction

In East Asian countries, including Japan, South Korea and China, support for elderly parents has become a social problem as the elderly population continues to increase. Support for elderly parents in East Asian countries has been affected by the traditional norms set by Confucianism, though at differing levels [1]. A typical lesson of Confucianism is *jin* (benevolence), which is considered to refer to affection and respect between people [2]. The practice of *jin* to parents, who are the closest persons around someone, is called *kou*, or filial duty. Based on these values, it has been considered ideal in East Asian countries that children support their parents, and children are expected to fulfill this duty. On the other hand, with rapid modernization of the social structure in these countries, conventional family support is becoming more difficult because of a marked reduction in family function due to a trend toward nuclear families and the individuation of family members [3]. Accordingly, socialization of caregiving for elderly parents, as well as childcare and education, is required. In Japan, an elderly care insurance system was implemented in 2000, while in South Korea a chronic care system was implemented in 2008.

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Support for elderly parents is one type of social support [4]. The hierarchical compensatory model [5] explains social support systems, and hypothesizes that there are hierarchical human relationships between persons representing sources of care, and that persons of lower rank provide and complement care when persons of higher rank are not available [6]. According to the attachment theory [7], the desire to provide care for one's parents suffering from disease or disability arises from the close parent-child relationship developed from infancy. Therefore, it is considered that the development of socialization of elderly care is affected by emotional aspects of the family members. Meanwhile, Bengton et al [8]. point out that the degree of modernization of society affects attitudes toward elderly persons [9]. Considering these factors, it seems desirable, in the Eastern Asian region, that family function be socialized without impairing the strong family ties that have been cultivated over long periods of history. To realize the socialization of family function, it seems necessary to clarify how the relationship between the development of socialization of elderly care and family members' emotional aspects changes.

## Aim

The present study was conducted to empirically identify changing trends in the relationships among viewpoints regarding the socialization of elderly care and two related factors—emotional relationships among family members and support provided for the elderly—among university students and their parents living in three different East Asian countries (Japan, South Korea and China) using a hierarchical compensatory model to explain their social support systems.

Specifically, the present study assessed family cohesion as an indicator of emotional relationships with family members. Since some of the students and their parents had no experience in caregiving, the present study assessed the support provided and their viewpoints regarding the socialization of elderly care using two parameters: sense of filial responsibility and viewpoints regarding elderly care.

There are reports that the degree of modernization of the society affects attitudes toward elderly persons, and that the more realistically people recognize caregiving, the less likely they are to think that the family should take all the responsibility for providing care for the elderly [10]. The social cognitive theory [11] proposes that behavioral modification occurs as a result of the interaction among three factors—behavior, environment and the person—and that cognitive factors, which form a part of personal factors, produce individual differences in responses to stimuli. If we base our analysis on this theory, support for elderly parents and the source of caregiving for elderly parents seems to change depending on the realistic recognition of support for elderly parents. Therefore, when generation (a personal factor) is taken into consideration, sense of filial responsibility seems to be weaker and viewpoints regarding the socialization of elderly care seem to be less positive among parents than among students, and the relationship between viewpoints regarding the socialization of elderly care and family cohesion or sense of filial responsibility also seems to be weaker among parents than among students.

## Methods

### 1. Design and setting

In the present study, cross-sectional data were collected through a questionnaire survey, which was conducted in three different countries (Japan, South Korea and China), where social systems for elderly care have been developed to varying degrees.

### 2. Subjects of survey

Responses were obtained from 772 Japanese students and 414 of their parents; 505 South Korean

students and 505 of their parents; and 1,017 Chinese students and 808 of their parents. The following respondents, with no missing responses, were included in the analysis: 636 Japanese students and 368 of their parents; 461 South Korean students and 460 of their parents; and 959 Chinese students and 707 of their parents.

### 3. Data collection

The questionnaire survey was conducted among students at two universities respectively in Japan, South Korea and China, and their parents. In each country a faculty member selected students based on their affiliations to related research centers. Firstly, the Japanese version of the questionnaire was prepared after discussions by Japanese researchers in healthcare and social welfare. South Korean and Chinese researchers then translated the Japanese version into Korean and Chinese. Subsequently, Japanese, South Korean and Chinese researchers discussed the questionnaire again to provide consistency with the Japanese version. The survey was conducted between September and November 2008.

### 4. Survey items

The survey investigated the subjects' gender, age, degree of family cohesion, sense of filial responsibility, and viewpoints regarding the socialization of elderly care.

#### 4.1 Family cohesion

The degree of family cohesion was measured using ten items for family cohesion on the Family Adaptability and Cohesion Scale III developed by Olson et al., [12] which comprises the two dimensions of family cohesion and family adaptability. The Japanese version translated by Sadaki et al [13]. was used. The construct validity of family cohesion was verified based on data collected in Japan and South Korea [14]. The subjects were asked to respond on a five-point scale, and each option was assigned a score of 0 to 4.

#### 4.2 Sense of filial responsibility

Sense of filial responsibility was measured using the Simple Scale of Attitudes toward Filial Responsibility in East Asia (Mikane *et al* [15].), which consists of two factors—instrumental support (4 items) and emotional support (4 items). The subjects were asked to respond on a five-point scale, and each option was assigned a score of 0 to 4.

#### 4.3 Viewpoints regarding the socialization of elderly care

Viewpoints regarding the socialization of elderly care were assessed using the following three items the researchers developed independently: “when your parents need care”; “when you need care in the future”; and “about care of family members.” The subjects were asked to choose one of the following three options: “I hope that family members will take care of elderly parents if possible” (family resources); “I hope that family members will provide care with the help of hospitals or facilities if possible” (family and social resources); and “I hope that care will be provided by hospitals or facilities if possible” (social resources). Each option was assigned a score of 0, 1 or 2, and the subjects' viewpoints were rated with scores.

### 5. Statistical analysis

Family cohesion, sense of filial responsibility and viewpoints regarding the socialization of elderly care were compared between the two generations, using the *t* test. Attitudes toward instrumental support and emotional support were also compared, using the *t* test. The parameters were compared among the three countries, using one-way analysis of variance. Subsequently, a causal model was established describing the

relation between viewpoints regarding the socialization of elderly care and family cohesion or sense of filial responsibility, and the goodness of fit of data to this model. The relationships between each variable were assessed using structural equation modeling by classifying the subjects into 6 groups according to country (Japan, South Korea and China) and generation (students and their parents). Prior to the analysis of this causal model, the construct validity of family cohesion and sense of filial responsibility was examined. To assess reliability, we focused on internal consistency, and calculated the Cronbach's  $\alpha$  reliability coefficient. SPSS 17.0 software was used for the above-mentioned analyses. In these analyses, the construct validity was assessed by the maximum likelihood method using Amos 17.0 software. Since viewpoints regarding the socialization of elderly care were rated on a three-point scale, the causal model was analyzed with the statistical package M-plus 5.21 using the mean- and variance-adjusted weighted least-squares (WLSMV) method for estimating categorical data. The goodness of fit for family cohesion and sense of filial responsibility and that of the data to the causal model were assessed on the basis of the comparative fit index (CFI) and the root-mean-square error of approximation (RMSEA). Since viewpoints regarding the socialization of elderly care were assessed using three different observed variables comprising a saturated model, a causal model was used.

## 6. Ethical considerations

Oral and documented explanation was provided to students, and their consent was considered gained when their responses were put in the collection box. Documented explanation was provided to their parents, and their consent was considered gained when their responses arrived by mail. The subjects were assured that their participation in the study was voluntary, that they would suffer no disinterests due to not participating, that their anonymity was protected and that the collected data would not be used for purposes other than the study, etc. The study was approved by the ethics committee of Okayama Prefectural University.

## Results

### 1. Demographics of respondents

In the three countries, men accounted for 27.0% to 46.4% of the students and 47.0% to 49.6% of the parents. The average age of the students in these countries was 20.3 to 22.5 years and that of their parents was 47.1 to 50.8 years (Table 1).

Table 1 Characteristics of subjects

		Japan	Korea	China	
Gender	Students	Male n= 671	198 (31.1%)	214 (46.4%)	259 (27.0%)
		Female n=1385	438 (68.9%)	247 (53.6%)	700 (73.0%)
	Parents	Male n= 733	173 (47.0%)	228 (49.6%)	332 (47.0%)
		Female n= 802	195 (53.0%)	232 (50.4%)	375 (53.0%)
Age	Students n=2056	20.3 $\pm$ 1.3(18-28)	22.5 $\pm$ 2.2(19-29)	20.8 $\pm$ 1.3(17-29)	
Mean $\pm$ S.D. (Range)	Parents n=1535	50.8 $\pm$ 4.2(37-65)	50.5 $\pm$ 5.0(35-68)	47.1 $\pm$ 4.1(38-72)	

percentages indicates the rate for total subjects

### 2. Construct validity of family cohesion and sense of filial responsibility: six groups

#### 2.1 Family cohesion

The distribution of the responses to questions concerning family cohesion is presented in Table 2. The goodness of fit as measured by the CFI was 0.813 to 0.953, while that as measured by the RMSEA was

0.091 to 0.167 in the six groups. Since the RMSEA was above 0.1, the goodness of fit was not acceptable. Therefore, the scale was modified by omitting some of the items. For pairs of items with a correlation coefficient of 0.75 or more, either was omitted. The following four items were arbitrarily omitted, and confirmatory factor analysis was performed using the remaining six items: “yc3, We can think of something for our family to do together,” “yc4, We like to do things together as a family,” “yc7, Family members help one another” and “yc10, All family members feel strong commitment to one another.” Since the goodness of fit as measured by the CFI was 0.960 to 0.999, and that as measured by the RMSEA was 0.016 to 0.085, the revised scale was considered statistically acceptable. The Cronbach’s  $\alpha$  reliability coefficient for the family cohesion scale consisting of six items was 0.763 to 0.889 in the six groups.

Table 2 Distribution of the responses to questions concerning family cohesion

Items		Strongly Disagree	Generally Disagree	Undecided	Generally Agree	Strongly Agree	
yc1. Family members consult other family members on their decisions.	Japan	Students	50 (7.9)	207 (32.5)	142 (22.3)	138 (21.7)	99 (15.6)
		Parents	6 (1.6)	86 (23.4)	103 (28.0)	86 (23.4)	87 (23.6)
	Korea	Students	23 (5.0)	47 (10.2)	57 (12.4)	184 (39.9)	150 (32.5)
		Parents	16 (3.5)	24 (5.2)	43 (9.3)	170 (37.0)	207 (45.0)
	China	Students	31 (3.2)	202 (21.1)	215 (22.4)	317 (33.1)	194 (20.2)
		Parents	26 (3.7)	101 (14.3)	126 (17.8)	243 (34.4)	211 (29.8)
yc2. Family members like to spend free time with each other.	Japan	Students	48 (7.5)	143 (22.5)	148 (23.3)	170 (26.7)	127 (20.0)
		Parents	10 (2.7)	89 (24.2)	134 (36.4)	85 (23.1)	50 (13.6)
	Korea	Students	12 (2.6)	44 (9.5)	85 (18.4)	178 (38.6)	142 (30.8)
		Parents	10 (2.2)	18 (3.9)	59 (12.8)	180 (39.1)	193 (42.0)
	China	Students	28 (2.9)	66 (6.9)	127 (13.2)	277 (28.9)	461 (48.1)
		Parents	26 (3.7)	31 (4.4)	78 (11.0)	225 (31.8)	347 (49.1)
yc3. We can easily think of things to do together as a family.	Japan	Students	86 (13.5)	170 (26.7)	178 (28.0)	125 (19.7)	77 (12.1)
		Parents	21 (5.7)	137 (37.2)	113 (30.7)	65 (17.7)	32 (8.7)
	Korea	Students	20 (4.3)	77 (16.7)	135 (29.3)	139 (30.2)	90 (19.5)
		Parents	24 (5.2)	46 (10.0)	99 (21.5)	162 (35.2)	129 (28.0)
	China	Students	36 (3.8)	69 (7.2)	142 (14.8)	270 (28.2)	442 (46.1)
		Parents	25 (3.5)	54 (7.6)	87 (12.3)	224 (31.7)	317 (44.8)
yc4. We like to do things with just our immediate family.	Japan	Students	73 (11.5)	156 (24.5)	164 (25.8)	135 (21.2)	108 (17.0)
		Parents	13 (3.5)	130 (35.3)	120 (32.6)	61 (16.6)	44 (12.0)
	Korea	Students	15 (3.3)	67 (14.5)	125 (27.1)	137 (29.7)	117 (25.4)
		Parents	14 (3.0)	41 (8.9)	82 (17.8)	158 (34.3)	165 (35.9)
	China	Students	34 (3.5)	88 (9.2)	192 (20.0)	298 (31.1)	347 (36.2)
		Parents	20 (2.8)	59 (8.3)	114 (16.1)	213 (30.1)	301 (42.6)
yc5. Family togetherness is important.	Japan	Students	46 (7.2)	103 (16.2)	143 (22.5)	174 (27.4)	170 (26.7)
		Parents	6 (1.6)	56 (15.2)	121 (32.9)	84 (22.8)	101 (27.4)
	Korea	Students	1 (0.2)	3 (0.7)	23 (5.0)	153 (33.2)	281 (61.0)
		Parents	5 (1.1)	2 (0.4)	27 (5.9)	124 (27.0)	302 (65.7)
	China	Students	38 (4.0)	25 (2.6)	41 (4.3)	151 (15.7)	704 (73.4)
		Parents	30 (4.2)	16 (2.3)	34 (4.8)	135 (19.1)	492 (69.6)
yc6. We approve of each other's friends.	Japan	Students	51 (8.0)	111 (17.5)	157 (24.7)	169 (26.6)	148 (23.3)
		Parents	10 (2.7)	86 (23.4)	119 (32.3)	77 (20.9)	76 (20.7)
	Korea	Students	9 (2.0)	12 (2.6)	88 (19.1)	176 (38.2)	176 (38.2)
		Parents	7 (1.5)	20 (4.3)	70 (15.2)	171 (37.2)	192 (41.7)
	China	Students	28 (2.9)	75 (7.8)	170 (17.7)	313 (32.6)	373 (38.9)
		Parents	23 (3.3)	41 (5.8)	112 (15.8)	222 (31.4)	309 (43.7)
yc7. Family members ask each other for help.	Japan	Students	33 (5.2)	83 (13.1)	121 (19.0)	171 (26.9)	228 (35.8)
		Parents	6 (1.6)	26 (7.1)	74 (20.1)	106 (28.8)	156 (42.4)
	Korea	Students	4 (0.9)	7 (1.5)	42 (9.1)	198 (43.0)	210 (45.6)
		Parents	5 (1.1)	4 (0.9)	41 (8.9)	155 (33.7)	255 (55.4)
	China	Students	35 (3.6)	26 (2.7)	57 (5.9)	219 (22.8)	622 (64.9)
		Parents	21 (3.0)	25 (3.5)	46 (6.5)	169 (23.9)	446 (63.1)
yc8. Family members feel closer to other family members than to people outside the family.	Japan	Students	34 (5.3)	90 (14.2)	109 (17.1)	173 (27.2)	230 (36.2)
		Parents	8 (2.2)	20 (5.4)	43 (11.7)	87 (23.6)	210 (57.1)
	Korea	Students	3 (0.7)	6 (1.3)	32 (6.9)	148 (32.1)	272 (59.0)
		Parents	2 (0.4)	7 (1.5)	27 (5.9)	143 (31.1)	281 (61.1)
	China	Students	39 (4.1)	38 (4.0)	79 (8.2)	185 (19.3)	618 (64.4)
		Parents	29 (4.1)	26 (3.7)	51 (7.2)	153 (21.6)	448 (63.4)
yc9. When our family gets together for activities, everybody is present.	Japan	Students	70 (11.0)	154 (24.2)	169 (26.6)	157 (24.7)	86 (13.5)
		Parents	8 (2.2)	62 (16.8)	104 (28.3)	107 (29.1)	87 (23.6)
	Korea	Students	9 (2.0)	36 (7.8)	69 (15.0)	167 (36.2)	180 (39.0)
		Parents	8 (1.7)	14 (3.0)	48 (10.4)	175 (38.0)	215 (46.7)
	China	Students	38 (4.0)	77 (8.0)	167 (17.4)	231 (24.1)	446 (46.5)
		Parents	25 (3.5)	56 (7.9)	96 (13.6)	195 (27.6)	335 (47.4)
yc10. Family members feel very close to each other.	Japan	Students	54 (8.5)	110 (17.3)	169 (26.6)	181 (28.5)	122 (19.2)
		Parents	7 (1.9)	36 (9.8)	80 (21.7)	94 (25.5)	151 (41.0)
	Korea	Students	4 (0.9)	14 (3.0)	54 (11.7)	188 (40.8)	201 (43.6)
		Parents	10 (2.2)	14 (3.0)	32 (7.0)	170 (37.0)	234 (50.9)
	China	Students	39 (4.1)	45 (4.7)	105 (10.9)	236 (24.6)	534 (55.7)
		Parents	28 (4.0)	17 (2.4)	77 (10.9)	165 (23.3)	420 (59.4)

percentages in parentheses

2.2 Sense of filial responsibility

The distribution of the responses to questions concerning sense of filial responsibility is shown in Table 3. The goodness of fit as measured by the CFI was 0.949 to 0.988, and that as measured by the RMSEA was 0.051 to 0.093 in the six groups. The scale was considered statistically acceptable. The Cronbach's  $\alpha$  reliability coefficient was 0.779 to 0.850.

Table 3 Distribution of the degree in the response for the question on filial responsibility

Items		Strongly Disagree	Generally Disagree	Undecided	Generally Agree	Strongly Agree	
Instrumental	yi1. Children should naturally support their elderly parents financially so that parents do not run into financial difficulties.	Japan Students	7 (1.1)	43 (6.8)	125 (19.7)	265 (41.7)	196 (30.8)
		Japan Parents	65 (17.7)	73 (19.8)	69 (18.8)	103 (28.0)	58 (15.8)
		Korea Students	2 (0.4)	10 (2.2)	54 (11.7)	123 (26.7)	272 (59.0)
		Korea Parents	23 (5.0)	33 (7.2)	70 (15.2)	193 (42.0)	141 (30.7)
		China Students	2 (0.2)	8 (0.8)	10 (1.0)	46 (4.8)	893 (93.1)
		China Parents	6 (0.8)	28 (4.0)	28 (4.0)	83 (11.7)	562 (79.5)
	yi2. Children should pay for treatment, hospital care and welfare services for their elderly parents.	Japan Students	9 (1.4)	57 (9.0)	172 (27.0)	264 (41.5)	134 (21.1)
		Japan Parents	55 (14.9)	81 (22.0)	97 (26.4)	87 (23.6)	48 (13.0)
		Korea Students	1 (0.2)	8 (1.7)	49 (10.6)	142 (30.8)	261 (56.6)
		Korea Parents	16 (3.5)	38 (8.3)	70 (15.2)	199 (43.3)	137 (29.8)
		China Students	1 (0.1)	5 (0.5)	22 (2.3)	33 (3.4)	898 (93.6)
		China Parents	3 (0.4)	24 (3.4)	37 (5.2)	95 (13.4)	548 (77.5)
yi3. Children should provide their elderly parents with opportunities for travel or hobby activities.	Japan Students	7 (1.1)	36 (5.7)	125 (19.7)	267 (42.0)	201 (31.6)	
	Japan Parents	63 (17.1)	78 (21.2)	98 (26.6)	85 (23.1)	44 (12.0)	
	Korea Students	3 (0.7)	11 (2.4)	54 (11.7)	159 (34.5)	234 (50.8)	
	Korea Parents	31 (6.7)	51 (11.1)	85 (18.5)	163 (35.4)	130 (28.3)	
	China Students	1 (0.1)	4 (0.4)	25 (2.6)	100 (10.4)	829 (86.4)	
	China Parents	17 (2.4)	33 (4.7)	85 (12.0)	105 (14.9)	467 (66.1)	
yi4. It is natural that elderly parents ask their children to take care of them.	Japan Students	20 (3.1)	73 (11.5)	187 (29.4)	216 (34.0)	140 (22.0)	
	Japan Parents	68 (18.5)	92 (25.0)	109 (29.6)	71 (19.3)	28 (7.6)	
	Korea Students	12 (2.6)	37 (8.0)	102 (22.1)	143 (31.0)	167 (36.2)	
	Korea Parents	55 (12.0)	61 (13.3)	94 (20.4)	139 (30.2)	111 (24.1)	
	China Students	0 (0.0)	5 (0.5)	15 (1.6)	47 (4.9)	892 (93.0)	
	China Parents	7 (1.0)	25 (3.5)	22 (3.1)	89 (12.6)	564 (79.8)	
Emotional	ye1. Children who are not living with their elderly parents should remember to send word to or hear about them.	Japan Students	4 (0.6)	7 (1.1)	46 (7.2)	130 (20.4)	449 (70.6)
		Japan Parents	2 (0.5)	3 (0.8)	18 (4.9)	65 (17.7)	280 (76.1)
		Korea Students	1 (0.2)	6 (1.3)	19 (4.1)	80 (17.4)	355 (77.0)
		Korea Parents	4 (0.9)	6 (1.3)	37 (8.0)	101 (22.0)	312 (67.8)
		China Students	2 (0.2)	5 (0.5)	13 (1.4)	43 (4.5)	896 (93.4)
		China Parents	5 (0.7)	10 (1.4)	19 (2.7)	85 (12.0)	588 (83.2)
	ye2. Even adult children should regularly have time to enjoy the company of their elderly parents.	Japan Students	4 (0.6)	8 (1.3)	46 (7.2)	171 (26.9)	407 (64.0)
		Japan Parents	6 (1.6)	10 (2.7)	35 (9.5)	102 (27.7)	215 (58.4)
		Korea Students	0 (0.0)	3 (0.7)	17 (3.7)	121 (26.2)	320 (69.4)
		Korea Parents	3 (0.7)	8 (1.7)	30 (6.5)	133 (28.9)	286 (62.2)
		China Students	2 (0.2)	1 (0.1)	15 (1.6)	39 (4.1)	902 (94.1)
		China Parents	2 (0.3)	11 (1.6)	18 (2.5)	65 (9.2)	611 (86.4)
ye3. Children should always pay attention to their elderly parents' health conditions and possible changes to them.	Japan Students	2 (0.3)	9 (1.4)	53 (8.3)	195 (30.7)	377 (59.3)	
	Japan Parents	3 (0.8)	7 (1.9)	28 (7.6)	129 (35.1)	201 (54.6)	
	Korea Students	0 (0.0)	2 (0.4)	18 (3.9)	84 (18.2)	357 (77.4)	
	Korea Parents	4 (0.9)	4 (0.9)	28 (6.1)	132 (28.7)	292 (63.5)	
	China Students	0 (0.0)	3 (0.3)	12 (1.3)	22 (2.3)	922 (96.1)	
	China Parents	2 (0.3)	14 (2.0)	15 (2.1)	59 (8.3)	617 (87.3)	
ye4. Children should always empathically talk to their elderly parents when the parents are in trouble.	Japan Students	2 (0.3)	1 (0.2)	54 (8.5)	164 (25.8)	415 (65.3)	
	Japan Parents	2 (0.5)	6 (1.6)	32 (8.7)	100 (27.2)	228 (62.0)	
	Korea Students	0 (0.0)	1 (0.2)	29 (6.3)	82 (17.8)	349 (75.7)	
	Korea Parents	3 (0.7)	4 (0.9)	33 (7.2)	143 (31.1)	277 (60.2)	
	China Students	6 (0.6)	18 (1.9)	39 (4.1)	127 (13.2)	769 (80.2)	
	China Parents	11 (1.6)	24 (3.4)	38 (5.4)	106 (15.0)	528 (74.7)	

percentages in parentheses

3. Comparison of the viewpoints regarding the socialization of elderly care and related factors

3.1 Comparison of family cohesion

Table 4 shows a comparison of the mean scores for family cohesion. Among students, the family cohesion score was 14.0 in Japan, which was significantly lower than in South Korea (18.8) and China (18.4). Among parents, the scores revealed significant differences: 19.7 in South Korea, 18.9 in China, and 15.4 in Japan. When the two generations were compared, no significant differences were noted in family cohesion between the two generations in China, whereas in Japan and South Korea, students had significantly lower scores than their parents.

Table 4 Comparison of the mean scores of family cohesion

	Students	p <sup>1)</sup>	Parents	p <sup>1)</sup>	p <sup>2)</sup>	
Japan	14.0 ± 5.9	**	15.4 ± 4.7	**	**	
Korea	18.8 ± 3.8		**	19.7 ± 3.7	**	**
China	18.4 ± 4.9		**	18.9 ± 5.0	**	n.s.

note1) Comparison between Japan, Korea and China by ANOVA,

note2) Comparison between Students and Parents by T-test,

\*\*p<.01, n.s.; not significant

### 3.2 Comparison of sense of filial responsibility

Table 5-1 indicates the comparison of the mean scores for sense of filial responsibility. When the three countries were compared, the scores for filial responsibility among students were 31.0 in China, 27.8 in South Korea, and 25.4 in Japan, thus revealing significant differences. Among parents, the scores for family cohesion were 29.3 in China, 24.9 in South Korea, and 21.6 in Japan, thus indicating significant differences. This trend was similar to that among the students. When the two generations were compared, students had a stronger sense of filial responsibility than parents in all countries. Comparison of attitudes toward instrumental and emotional support indicated significantly weaker attitudes toward instrumental support than toward emotional support in the five groups after excluding Chinese students (Table 5-2). When the three countries were compared with respect to attitudes toward instrumental support, the scores among students were 15.5 in China, 13.1 in South Korea, and 11.2 in Japan, revealing significant differences. Among parents, the scores were 14.3 in China, 10.8 in South Korea, and 7.7 in Japan displaying significant differences also observed among students. When the two generations were compared, students had significantly stronger attitudes toward instrumental support than parents in all countries (Table 5-3). When attitudes toward emotional support were compared among the three countries, the scores among students were 15.5 in China, 14.8 in South Korea, and 14.1 in Japan in descending order, with significant differences. Among parents, attitudes toward emotional support were significantly weaker in South Korea (14.1) and Japan (14.0) than in China (14.9). When the two generations were compared, no significant differences were found in attitudes toward emotional support between the two generations in Japan, whereas Chinese and South Korean students had significantly stronger attitudes toward emotional support than their parents (Table 5-4).

Table 5-1 Comparison of the mean scores for sense of filial responsibility

	Students	p <sup>1)</sup>	Parents	p <sup>1)</sup>	p <sup>2)</sup>	
Japan	25.4 ± 4.5	**	21.6 ± 5.3	**	**	
Korea	27.8 ± 4.1		**	24.9 ± 5.1	**	**
China	31.0 ± 2.5		**	29.3 ± 4.3	**	**

note1) Comparison between Japan, Korea and China by ANOVA

note2) Comparison between Students and Parents by T-test

\*\* p<.01

Table 5-2 Comparison of the mean scores for attitudes toward instrumental and emotional support

		Instrumental	Emotional	p
Students	Japan	11.2	14.1	**
	Korea	13.1	14.8	**
	China	15.5	15.5	n.s.
Parents	Japan	7.7	14.0	**
	Korea	10.8	14.1	**
	China	14.3	14.9	**

Comparison between Instrumental and Emotional by T-test,

\*\* p<.01, n.s.; not significant

Table 5-3 Comparison of the mean scores for sense of instrumental support

	Students	p <sup>1)</sup>	Parents	p <sup>1)</sup>	p <sup>2)</sup>
Japan	11.2±2.9	**	7.7±4.0	**	**
Korea	13.1±2.7		10.8±3.8		**
China	15.5±1.3		14.3±2.7		**

note1) Comparison between Japan, Korea and China by ANOVA

note2) Comparison between Students and Parents by T-test

\*\* p&lt;.01

Table 5-4 Comparison of the mean scores for sense of emotional support

	Students	p <sup>1)</sup>	Parents	p <sup>1)</sup>	p <sup>2)</sup>
Japan	14.1±2.5	**	14.0±2.6	**	n.s.
Korea	14.8±2.1		14.1±2.4		**
China	15.5±1.4		14.9±2.2		**

note1) Comparison between Japan, Korea and China by ANOVA

note2) Comparison between Students and Parents by T-test

\*\* p&lt;.01

### 3.3 Comparison of the viewpoints regarding the socialization of elderly care

Table 6-1 summarizes the distribution of responses to questions concerning viewpoints regarding the socialization of elderly care. The highest percentages of Japanese and South Korean students and their parents chose “family resources and social resources” in response to all questions. The highest percentages of Chinese students and their parents chose “family resources” in response to the following questions specifying to whom care would be provided: “yc1, when your elderly parents need care” and “yc2, when you need care in the future.” However, in response to the question “yc3, about care of your family member(s),” which did not specify to whom care would be provided, the highest percentages of Chinese students and their parents chose “family resources and social resources,” as did South Korean and Japanese students and their parents. Comparison of the mean scores for viewpoints regarding the socialization of elderly care is presented in Table 6-2. When the three countries were compared with respect to viewpoints regarding the socialization of elderly care, the scores among students were significantly higher in South Korea (3.0) and Japan (3.0) than in China (1.8). Among parents, the scores were 1.7 in China, 3.1 in South Korea and 3.5 in Japan revealing significant differences. When the two generations were compared, Japanese students had significantly less positive viewpoints regarding the socialization of elderly care than their parents, whereas no significant differences were noted between the two generations in South Korea or China.

Table 6-1 Distribution of viewpoints regarding the socialization for elderly care

Item		Family	Family and Social	Social	
ys1. When your parents need care	Japn	Students	10 (16.5)	472 (74.2)	59 (9.3)
		Parents	2 (6.8)	282 (76.6)	61 (16.6)
	Korea	Students	12 (27.1)	297 (64.4)	39 (8.5)
		Parents	12 (27.0)	242 (52.6)	94 (20.4)
	China	Students	57 (59.4)	214 (22.3)	175 (18.2)
		Parents	46 (65.5)	122 (17.3)	122 (17.3)
ys2. When you need care in future	Japn	Students	9 (14.5)	376 (59.1)	168 (26.4)
		Parents	1 (2.7)	243 (66.0)	115 (31.3)
	Korea	Students	6 (13.7)	291 (63.1)	107 (23.2)
		Parents	8 (18.3)	244 (53.0)	132 (28.7)
	China	Students	57 (60.2)	228 (23.8)	154 (16.1)
		Parents	44 (63.2)	153 (21.6)	107 (15.1)
ys3. About care of family members	Japn	Students	9 (14.2)	461 (72.5)	85 (13.4)
		Parents	2 (6.3)	292 (79.3)	53 (14.4)
	Korea	Students	4 (9.5)	341 (74.0)	76 (16.5)
		Parents	7 (15.2)	285 (62.0)	105 (22.8)
	China	Students	34 (35.5)	594 (61.9)	25 (2.6)
		Parents	26 (37.8)	405 (57.3)	23 (5.0)

percentages in parentheses



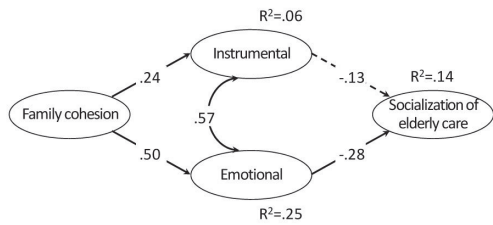
Table 6-2 Comparison of the mean scores for viewpoints regarding the socialization for elderly care

	Students	p <sup>1)</sup>	Parents	p <sup>1)</sup>	p <sup>2)</sup>	
Japan	3.0 ± 1.2	**	3.5 ± 1.1	**	**	
Korea	3.0 ± 1.2		3.1 ± 1.5		**	n.s.
China	1.8 ± 1.4		1.7 ± 1.5		**	n.s.

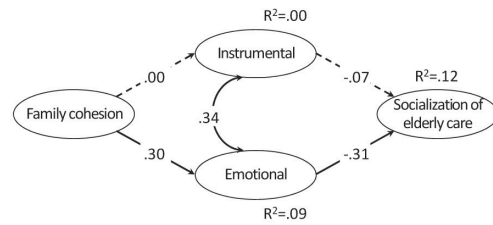
note1) Comparison between Japan, Korea and China by ANOVA  
 note2) Comparison between Students and Parents by T-test  
 \*\* p<.01, n.s. ; not significant

4. Casual model between viewpoints regarding the socialization of elderly care and family cohesion or sense of filial responsibility

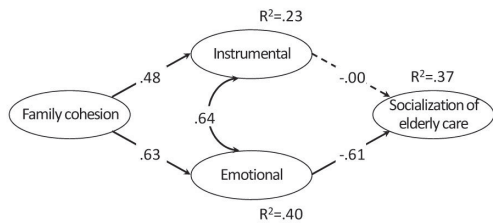
The results of the assessment of the relation between viewpoints regarding socialization of elderly care and family cohesion or sense of filial responsibility are illustrated in Fig. 1. In the six groups of subjects classified by country and generation, the goodness of fit as measured by the CFI was 0.969 to 0.999 and that as measured by the RMSEA was 0.009 to 0.072. These values indicated that this model was statistically acceptable.



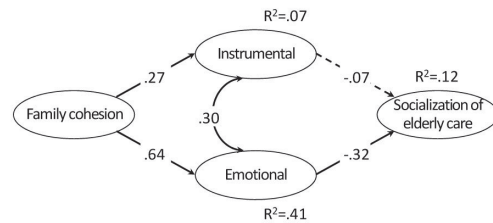
n=636, CFI=0.982, RMSEA=0.052  
 Fig. 1-1 Japanese Students



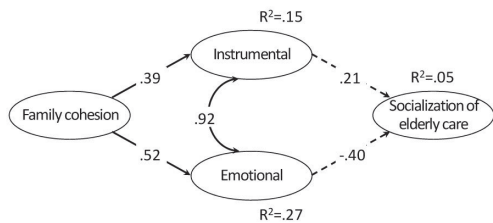
n=368, CFI=0.969, RMSEA=0.067  
 Fig. 1-2 Japanese Parents



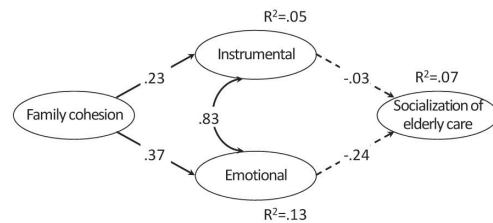
n=641, CFI=0.970, RMSEA=0.072  
 Fig. 1-3 Korean Students



n=640, CFI=0.974, RMSEA=0.062  
 Fig. 1-4 Korean Parents



n=959, CFI=0.970, RMSEA=0.009  
 Fig. 1-5 Chinese Students



n=707, CFI=0.994, RMSEA=0.028  
 Fig. 1-6 Chinese Parents

Fig. 1 Influence of family cohesion and sense of filial responsibility on viewpoints regarding socialization of elderly care

#### 4.1 Relationship between sense of filial responsibility and family cohesion

The path from family cohesion to attitudes toward instrumental support was significant in the five groups after excluding Japanese parents. The path from family cohesion to attitudes toward emotional support was significant in all six groups. In addition, the coefficient of the path from family cohesion to attitudes toward instrumental support was smaller than that of the path from family cohesion to attitudes toward emotional support in all six groups.

#### 4.2 Influence of sense of filial responsibility on viewpoints regarding the socialization of elderly care

The path from attitudes toward instrumental support to viewpoints regarding the socialization of elderly care was not significant in any of the six groups. The path from attitudes toward emotional support to viewpoints regarding the socialization of elderly care was not significant in China, whereas it was significant in South Korea and Japan.

#### 4.3 Rate of contribution of family cohesion and sense of filial responsibility to viewpoints regarding the socialization of elderly care

The rate of contribution of family cohesion and sense of filial responsibility, which are both family resources, to viewpoints regarding the socialization of elderly care were assessed. The contribution rate was not significant among Chinese students and was low (7%) among Chinese parents. When the three countries were compared, the contribution rate was lower in Japan (14%) than in South Korea (37%) among students, whereas it was equal (12%) in South Korea and Japan among parents. When the two generations were compared, the contribution rate was higher among students than among parents in South Korea, whereas the rate was similar between students and their parents in Japan.

### Discussion

#### 1. A trend in factors relating to viewpoints regarding the socialization of elderly care

##### 1.1 A trend in family cohesion

Family cohesion was weaker in countries where social elderly care systems have been developed, and was weaker among the younger generation than among the older generation. Previously, relatives had a strong sense of solidarity, family feeling was respected, and family or kinship was given priority over individuals. However, with modernization, individual rights and the establishment of individuality came to be highly valued, individual needs respected, and personal life given priority over families [16]. In other words, the reduction of family cohesion may be interpreted as a reflection of the individuation of family members represented by the trend of giving priority to individual needs with modernization. This seems to explain the weaker family cohesion among Japanese and South Korean students than among their parents. Substituting social systems for all family function further weakens family ties [17]. This seems to explain the lower scores of family cohesion in Japan, where social care systems have been developed and used widely, than in South Korea and China.

##### 1.2 A trend in sense of filial responsibility

Sense of filial responsibility was weaker in countries where social elderly care systems have been developed, and was stronger among the younger generation than among the older generation. Sense of filial responsibility both among students and their parents was lowest in Japan and highest in China. This result matches the report by Hosoe et al [18]. This is considered to reflect that social systems in South Korea and China lag behind those in Japan, where the elderly care insurance system and the pension system were established in the earliest period, and that the sense of *kou* (filial duty) to support

one's parents is higher in South Korea and China than in Japan. Between generations, sense of filial responsibility was stronger among students than among parents in all the countries. Studies conducted by Maeda et al. [19] on nursing persons, and by Kirino et al. [20] on parents of nursery children, report that sense of filial responsibility was higher among older age groups, which differs from the results of the present study. On the other hand, Sugiyama [21] reports that her study targeting junior high, high school and university students revealed that their sense of filial responsibility was high. Matsuo [22] reports that many people in their 20s and 60s or above have a relatively positive image of nursing, while people in their 30s to 50s usually have a negative image. Support for elderly parents involves two different viewpoints: the supporting and the supported [23][24]. It is suggested that sense of filial responsibility varies depending on which position the respondents put themselves in. As people grow older from the younger generation to the middle-aged generation and then to the elderly generation, the attitude toward independence is considered to become stronger [25]. Elderly people hope not to trouble their family members, especially their children [26]. This is probably the cause of the higher sense of filial responsibility among students than among their parents.

Comparison of the lower factors disclosed stronger attitudes toward emotional support than toward instrumental support in the five groups after excluding Chinese students. Nasu [27] states that the essential factor for family support in modern families is the unity of affection between elderly parents and their children's families, and that the emotional function based on affection, which is an essential and intrinsic function, is the base for support for elderly parents that is difficult to be substituted by any public agencies. Therefore, the finding that attitudes toward emotional support were stronger than attitudes toward instrumental support suggests that family members still have a sense of emotional support after instrumental support has been socialized. In Japan, however, no great difference was noted in attitudes toward emotional support between the two generations. This can be interpreted as a weakening of students' attitudes toward emotional support to the same level as those of their parents. According to Hosoe *et al* [18], with the expansion of social welfare systems along with the development of industrialization, factors that affect the sense of responsibility for support of elderly parents shift from normative to a more emotional factors, i.e., whether one is satisfied with the family one was born into. This also suggests that the weak family cohesion among Japanese students contributed to the less positive attitudes toward emotional support.

### 1.3 A trend in viewpoints regarding the socialization of elderly care

Viewpoints regarding the socialization of elderly care was more positive in countries where social elderly care systems have been developed, and among the younger generation was less positive among the older generation. Nonoyama *et al* [16]. define the socialization of caregiving as the behavior of family members doing what they can or what only family members can do to provide care while depending on experts and seeking their cooperation for knowledge or skills available only to experts. They state that delay in the socialization of caregiving behavior is due to backward viewpoints regarding elderly care. Based on this theory, the change from the attitude of providing care using family resources alone to that of providing care using social resources as well, according to available family resources, may be interpreted as an attitude toward the socialization of elderly care. The distribution of the responses to questions on viewpoints regarding the socialization of elderly care shows that the highest percentages of South Korean and Japanese students and their parents chose "family resources and social resources" in response to all questions. This suggests positive viewpoints regarding the socialization of elderly care. The highest percentages of Chinese students and their parents chose "family resources" in response to the questions specifying to whom care would be provided (questions about providing care for the subject's elderly parents

or for the subject himself/herself when he/she gets old in the future), whereas the highest percentages of them chose “family resources and social resources” in response to the question not specifying to whom care would be provided (question about care of the subject’s family member[s]). This finding suggests that attitudes toward the socialization of elderly care are also emerging in China. No great differences were noted in viewpoints regarding the socialization of elderly care between the two generations either in China or South Korea. In contrast, in Japan, where long-term care insurance system has been operating for about 10 years, parents, who will provide or will be provided with care in the near future, had more positive viewpoints regarding the socialization of elderly care than students. This finding seems to be associated with their awareness of their right to use social care services [28][29] or with their wish not to place a burden on their family members [30]. This awareness and wish seem to have arisen from the spread of the long-term care insurance system, insurance premium burdens imposed by the social insurance method, and the system of payment according to service use.

## 2. Influence of family cohesion and sense of filial responsibility on viewpoints regarding the socialization of elderly care

In China, it was revealed that family cohesion does not affect viewpoints regarding the socialization of elderly care based on a sense of filial responsibility. This seems to have been because the problem of elderly care has yet to emerge in the rapid aging of the Chinese society with falling birthrates due to the one-child policy, although a sense of socialization of elderly care is emerging, and because social care systems have not fully developed.

In Japan and South Korea, attitudes toward emotional support affect viewpoints regarding the socialization of elderly care, but that attitude toward instrumental support do not. Among Japanese students and South Korean students and their parents, family cohesion influenced their attitudes toward instrumental and emotional support. Among the parents of Japanese students, family cohesion did not influence their attitude toward instrumental support, but only their attitude toward emotional support. Hosoe [31] presents results showing that one’s satisfaction with their family members is related to their attitudes toward economic support and nursing support. Yamane et al. [32] report results that affection influences the sense of responsibility for nursing. These results differ from the outcome of Japanese parents in the present study. However, the studies by Hosoe et al. and Yamane et al. were conducted before the introduction of the elderly care insurance system. Following the establishment of social caregiving services, it is considered that the provision of instrumental support has become increasingly dependent on such social services to date [33], before the present study was conducted.

Assessment of the rates of contribution of family resources, i.e., family cohesion and sense of filial responsibility, on viewpoints regarding the socialization of elderly care, revealed that the rates were lower among Japanese students than among Korean students. The rates among Japanese students were as low as those among Japanese and Korean parents. Thus, among students in Japan, where social care systems have been developed and used widely, family resources were found to have a weaker influence on viewpoints regarding the socialization of elderly care. This seems to be a problem in establishing future social care systems when there is a need for socialization of family function without impairing strong ties among family members.

## Conclusion

1 The influence of family resources, i.e., family cohesion and sense of filial responsibility, on viewpoints regarding the socialization of elderly care, was weaker among Japanese students than among Korean students. The influence among parents was at similar levels in Japan and South Korea. The influence

of family resources on viewpoints regarding the socialization of elderly care was weaker among parents than among students.

2 In Japan and South Korea, where social caregiving systems have been established, family cohesion influenced viewpoints regarding the socialization of elderly care, through attitudes toward emotional support, but not through attitudes toward instrumental support. In particular, family cohesion did not influence attitudes toward instrumental support among Japanese parents.

3 In China, family cohesion influenced attitudes toward instrumental and emotional support, but not viewpoints regarding the socialization of elderly care.

The above results signify that, as the socialization of elderly care develops, sense of filial responsibility declines in terms of both instrumental and emotional support, with the decreasing family cohesion in the background. The socialization of elderly care is originally intended to relieve family members of burdens resulting from having to support elderly persons who need care. The above results suggest that socialization involves a risk of destroying family ties. Such a collapse of emotional ties between family members may be one cause of abuse to elderly persons, which does not decrease even after social caregiving services are established, and the problem of elderly persons whose whereabouts are unknown. It is important to relieve nursing persons of this burden by shifting instrumental support for elderly people who need care. At the same time, it is also necessary to provide direct intervention to for caregivers, through measures such as comprehensive support centers and home nursing support offices, which are aimed at retaining ties and the establishment of positive relationships between the caregivers and those being cared for.

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