

Type of Trust and Political Participation in Five Countries: Results of Social Quality Survey*

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This article classifies types of trust by combining general trust, interpersonal trust, and institutional trust based on the hypothesis that individuals have different types of trust. The results of this article show different shapes of types of trust distribution in South Korea, Germany, Italy, Greece, and Turkey. Also, multinomial logit analysis reveals that each type of trust is influenced by certain conditions.

Four types (Δ distrust, Δ institution-oriented trust, Δ person-oriented trust, and Δ full trust) are drawn from latent class analysis. Age, monthly income, network, financial crisis experience, and participation in private association are proven to have a critical impact on types of trust. Analysis shows that South Korea, Germany, Italy, Greece, and Turkey have different distribution of types of trust. Institution-oriented trust, person-oriented trust, and full trust type respectively account for about 25% in Germany. Turkey has a relatively higher percentage of institution-oriented trust type. In contrast, distrust type accounts for more than two-thirds in South Korea, Italy, and Greece.

Finally, logit analysis was conducted to figure out the role of types of trust in four kinds of political participation (Δ online expression, Δ expressing one's opinion toward governments or media, Δ participating in activities such as political campaigns, demonstrations, and strikes, and Δ voting) as dependent variables. The result shows that institution-oriented trust type people are more likely to participate in expressing their opinions toward governments or media and voting than distrust type. Also, person-oriented trust type people are more likely to express their opinions toward governments or

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media and participate in political campaigns, demonstrations, and strikes than distrust type. Finally, full trust type people show higher presence in three non-institutional political participations.

Keywords: *Types of Trust, Political Participation, Latent Class Analysis*

Introduction

Since political participation has been considered as a major factor that contributes toward a better place to live in society, it has triggered research interests of many scholars. Alexis de Tocqueville is representative. He paid attention to the town hall meetings of New England, U.S., and Americans' "habits of the heart," which is the effort to solve social issues within the setting of organizational meetings. Indeed, Almond and Verba (1963) concluded that, according to their research on the U.S., U.K., West Germany, Italy, and Mexico, it is "trust" which eventually effects political participation and ultimately provides positive influence over democracy.

After Putnam (Putnam, Leonardi, and Nanetti 1993; Putnam 1995, 2000) conceptualized social capital at the community level, research dealing with the subject of how and in what ways social capital can effect overall political participation flourished. Putnam defined social capital as "features of social organization such as networks, norms, and social trust that facilitate coordination and cooperation for mutual benefit" and concluded that, in Italy, each province's implementation of effective public policy are determined by social capital (Putnam, Leonardi, and Nanetti 1993). Also, in "Bowling Alone" (Putnam 2000), by focusing on participation in associations, he demonstrated how social capital brings positive effect over democracy. For Putnam, it is the organizational structure which functions externally as the transferring voices of groups towards governments or society and acts internally as "school of democracy" in that the inner part of an organization is where democracy is cultivated through mutual debates and discussions, which also increases higher trust, reciprocity, and compromises. However, despite many previous researches on relations between political participation and social capital's various subcategories such as trust, norms, and network, there is a definite lack of comprehensive research efforts to investigate the relationship between political participation and multidimensionality of trust.

Trust fundamentally premises a truster who is willing to rely on the

actions of another person or agent (trustee). Thus, each individual's trust can be diverse, depending on whom the trustee is. For example, one may easily trust strangers and the government, but others may possess higher trust for the government than strangers. Interaction of this kind of trust can ultimately affect the actions, such as political participation, of the individual. In this article, an attempt is made to find different types of individual trust using general trust, interpersonal trust, and institutional trust, and then to figure out how these different types affect political participation.

Theoretical Background and Review of Previous Research

Trust

Many scholars define trust as follows: "A set of expectations shared by all those involved in an exchange" (Zucker 1986); "the expectation that arises within a community of regular, honest and cooperative behavior based on commonly shared norms, on the part of other members of that community" (Fukuyama 1995); "a simplifying strategy that enables individuals to adapt to complex social environments" (Earle and Cvetkovich 1995); "a bet on the future contingent actions of others" (Sztompka 1999); "expectation that others or other parties will consider my interests while in action" (Lin 2004). By modifying Fukuyama and Nan Lin's definition of trust, trust is defined in this article as "expecting honesty and cooperative behavior from others or other agents in actions."¹

Trust has been classified into diverse dimensions. In their seminal research, Lewis and Weigert (1985) classified ideological, cognitive, and emotional trust, depending on the root of each trust. In addition, Sitkin (1995) formalized trust as ability-based, mercy-based, or value-based trust, depending on the bases of trust. Furthermore, there are many categorizations that set the target of trust as the criterion for analysis. There is public trust for institution or organization, private trust for people (Pagden 1988), general trust for members of society, and particularized trust for members of a specific organization (Uslander 1999). Sztompka (1999) also argued that there are five types of trust targets: 1) others, 2) social role, 3) social association, 4) institution or organization, and 5) system and order within

¹ There is no guarantee that cooperative actions of others or other agents are based on universally normative forms.

which each consists of its own trust. Zucker (1986) divided trust into process-based, characteristic-based, and institution-based trust by focusing on the ways in which trust is established. There are also researches which set the degree of trust as a criterion for analysis. Khodyakov (2007) argued that one society's trust level should be assessed by three measures—two from personal trust as per the status of connection with the trusted agent (i.e., weak-tie trust and strong-tie trust), and one from trust in institutions. Weak-tie trust is similar to that of Zucker's characteristic-based trust and Uslander's particularized trust, whereas strong-tie trust is similar to Zucker's process-based trust and Uslander's general trust. Also, these are similar to in-group and out-group trusts, depending on the homogeneity of connection (Yee 1998). Meanwhile, institutional trust can be conceptualized as having trust in the system; it can be seen as a reflection of the public's perceived legitimacy, technical competence, and ability to perform assigned duties efficiently (Khodyakov 2007).

Trust enables coordination of actions over large domains of space and time, which in turn permits more complex, differentiated, and diverse societies. At the same time, trust reduces complexity for individuals while providing them with a sense of security by allowing them to take for granted most of the relationships upon which they depend. These effects not only contribute to well-being in itself, but also enable individuals to expand their horizons of action (Warren 1999). Furthermore, those who trust each other voluntarily share the cost of providing public goods, which results in solving social problems with relative ease. Trust saves transaction costs in preparing safeguards for risks as well (Park 2004). This means that trust lays the foundation for political participation of individuals.

Traits of trust in institutions also should be considered. As elsewhere, owing to the disproportion between our political resources (such as time and knowledge) and the complex web of extended dependencies within which we live, we are subject to many more vulnerabilities than we might affect through political participation. This situation leads us to trust most of the political decisions from institutions or elites to optimize the ways in which we allocate our limited political resources (Warren 1999). If institutions make policies against the public's needs and people's patience comes to an end, however, people will begin to engage in various kinds of political participation in order to turn the institutions' policies into favorable ones for themselves.

In sum, general trust would facilitate political participation, but it is expected that institutional trust would not enhance the level of political

participation on the part of the people unless governments fail remarkably. Taken together, it is assumed that these two types of trust are interactively correlated with the extent, and the way, of individuals' political participation. Thus, this article will classify the categorization of trust into general trust and trust in institutions (trust in system) to take individuals' interaction into account for political participation. Also, in-group and out-group trusts (interpersonal trust) are added to the two trusts, because they are another way of reducing complexity and uncertainty.

In their research, Yee (1998) and Lee (1998) classified trust with more insight through the utilization of previous researches. Yee (1998) divided the social system into eight types by focusing on Δ abundance of private trust between individuals, Δ clarity of social rules or public institutionalization, and Δ power distance, i.e., the horizontal or vertical degree of social relations. Also Lee (1998) divided ideal society into four types: Δ trust society, Δ traditional community society or *yeonjul* (particularistic relations maintained by kin, school, and regional ties) society, Δ *laissez-faire* competitive society, or welfare type totalitarian society, and Δ Hobbes' state of nature, or authoritarian surveillance society by focusing on private trust and public trust. Although these categorizations have significance in providing a theoretical map for various types of trust, they still require more empirical investigation. Considering the fact that types of trust are being discussed at the societal level in both researches mentioned above, these researches seem to complement this paper in its effort to derive types of trust at the individual level based on empirical data and then to review social characteristics by assessing the distribution of types of trust.

Political Participation

Since political participation has shifted from being the exclusive possession of small elite groups to relying on the participation of the broader public, it eventually became the interest of a scholarly theme. In their seminal research, Verba and Nie (1972) viewed only legitimate actions such as activities within the system for electing officials or for affecting the policy-making process as political participation. However, Huntington and Nelson (1976) viewed political participation as consisting of both voluntary and forced participation, including all legitimate and illegitimate actions (Jang 2005). This article defines political participation as legitimate and illegitimate, voluntary and forced participation that all attempt to influence government policies, administration, and political leaders.

Although primarily divided into electoral and non-electoral participation, political participation can be divided into several types. Verba, Nie, and Kim (1978) divided it into political participation as election, participation in campaigns, contact participation, and autonomous organization activities by considering Δ types of influence, Δ degree of conflict, Δ required efforts, and Δ cooperation with others. To these, Dalton (2006) added protest, other types of controversial activities, and internet activism. And among these, election is considered to be institutional political participation because it is a system in which official process is necessary to elect representatives, while the others are included in non-institutional political participation. Although other types of participation are not directly related to electing the representatives, they are also a kind of behavior trying to influence politics in non-institutional ways such as through propaganda to the public.

Meanwhile, there are numerous studies that consider political participation as the dependent variable. Specifically, there are conflicting empirical research results supporting the claim that trust, network, and norms of reciprocity all consist of social capital affecting political participation. Many researchers reported that general or political trust positively influences diverse types of civic engagement, which causes a positive effect (Almond and Verba 1963; Brehm and Rahn 1997; Uslaner 1999; Norris 2001; Mishler and Rose 2005). However, there are also other researches which indicate that diverse types of trust do not influence political participation, or even cause negative effect (Park 2007). Furthermore, it is reported that other factors such as interest in politics and political self-efficacy (Verba, Schlozman, and Brady 1995), voluntary association participation (Putnam, Leonardi, and Nanetti 1993; Putnam 2000; Anderson 1996), family ties (Alesina and Giuliano 2011), statism and corporateness (Schofer and Fourcade-Gourinchas 2001), or nationalism (Jeong 2011) affect political participation.

In consideration of previous researches mentioned above, this article aims to answer the following research questions:

First, how many categories exist based on general, interpersonal, and institutional trust, and what are the characteristics of each of these categories?

Second, what are the conditions affecting each type of trust?

Third, what are the relations between political participation and each type of trust?

Data and Research Method

Data

This study used data from “Survey on Life and Society” data conducted in South Korea, Germany, Italy, Greece, and Turkey by the Institute for Social Development and Policy Research, Seoul National University in May 2012 to research “social quality.” And as such, 5,232 males and females above the age of 18 (age 19 in Korea) were chosen as the target per allocated sampling methods based on gender and age (1,000 in Korea, 1,200 in Germany, 1,001 in Italy, 1,013 in Greece, and 1,018 in Turkey); face-to-face interview method using structured questionnaires was employed. This study analyzed 3,801 of the survey results excluding faulty or missing values in the total sample. In terms of voting, 3,643 cases were included in the model. Appendix table 1 shows the descriptive statistics of the survey target population.

Composition of Variables

Type of trust. Type of trust is derived by using the variables of general trust, interpersonal trust (out-group trust), and institutional trust (trust in system).² General trust is operationalized as per the response to the question, “Generally speaking, would you say that most people can be trusted or that you need to be very careful in dealing with people?” The response to the question of “How much do you trust various groups of people: strangers, foreigners?” is used as the trust variable towards people. And the response to the question of “How much do you trust various organizations or institutions: the central government, the national assembly?” is used as the representative variable for trust in institutions. Despite the fact that four variables except general trust were measured on a four-point scale, for the sake of parsimony, latent class analysis is done with four dichotomized variables (i.e., trust and distrust).

Other independent variables. In order to control effects on the chosen model, socio-financial variables including gender, age, marital status, educational level, employment status, and monthly household income are examined. Marital status is decided as per the response result on the existence

² Originally, in-group trust was included in the latent class analysis model. But it was excluded in this model for the sake of parsimony because it did not affect the classification of types of trust.

of a spouse or partner, and educational level is classified into three categories: below lower secondary level, post-secondary level, and above tertiary level. Employment status is conceptualized by checking whether the respondent is working or not. Rather than using actual income as a continuous variable, monthly household income is categorized into four sequential groups by converting country-specific currencies into Euro currency: \triangle below 1,499 Euro (2.24 million won), \triangle 1,500-2,399 Euro (2.25-3.59 million won), \triangle 2,400-3,599 Euro (3.60-5.39 million won), and \triangle above 3,600 Euro (5.40 million won).³

Next, items included in the model are network (“contact frequency with family, friends, neighbors, etc.”), financial crisis experience (“household financial status for the past year”), and participation in public/private associations, which were verified as meaningful factors in prior studies. Associations can be divided in many ways according to hierarchy, openness, characteristics of purpose, media for social reproduction, attitude towards the media, etc. (Warren 2001; Park and Kim 2006; Park 2010); this study divides associations as public/private by paying attention to their characteristics of purpose. Experience of public or civilian organizations is perceived as participation in a public association, which is dichotomized by applying point 1 for any response with even a single participation experience because over 90% of respondents never experienced it. Likewise, participation in a private association is divided into two categories by comprehensively combining participation experience in sports/leisure/cultural or religious activities.

Dependent variable (political participation). As dependent variables, four elements of political participation are used such as \triangle voting, \triangle on-line expression, \triangle expression toward governments and media, and \triangle participation in political campaigns, demonstrations, and strikes. Except for voting, the survey questionnaire measures three items by using a five-point scale such as never, almost never, sometimes, often, and very often. However, due to the fact that the response of “never” exceeds over 60% for all three variables in the distribution of response ratio, the three variables are dichotomized into participation/non-participation rather than treating them as continuous variables. All four of the abovementioned variables are respectively used as dependent variables in the analysis of binomial logit regression.

³ One Euro (€) is calculated as 1,500 won based on the prevailing foreign exchange conversion rate of May 2012 when this survey was conducted.

Research Method

In this study, latent class analysis is applied to detect various dimensions of individual trust by using the variables general trust and trust towards persons and institutions. Contrary to factor analysis, which seeks latent variables by targeting observed continuous variables, latent class analysis has the advantage of deriving latent variables from observed categorical variables. Latent class analysis also has the advantage of deriving empirically relevant and rigorous composite variables which are usually made through relatively arbitrary combinations. Therefore, this is an appropriate analysis method for deriving types of trust by using trust variables which are categorical variables.

The null hypothesis of latent class analysis is that there is no relationship among observed variables, which means there is no latent variable among observed variables. Analysis in this paper employs this hypothesis as the standard model for testing other models through the application of chi-square statistics. In addition, it shows whether the explanatory power of the model increases or not through various indices such as likelihood ratio chi-square (L^2), Akaike Information Criteria (AIC), Bayesian Information Criteria (BIC) when the latent variable X contains two, three, ...n categories. If the latent variable is divided into four groups, for example, the four groups model would produce a meaningful level of p -value in the likelihood ratio test, with lower AIC and BIC when compared with other models (Goodman 2002; McCutcheon 2002; Lee 2005).

After deriving types of trust, multinomial logistic regression analysis is conducted to understand the individualized condition per each type of trust by applying type of trust as the dependent variable. Then, to verify the

TABLE 1
MODEL FITNESS INDEX FOR LATENT CLASS ANALYSIS

	AIC	BIC	Likelihood ratio chi-square (L^2)	Degree of freedom	P -value
1 group model (standard model)	27618.32	27650.7907	5301.388	26	0.00
2 groups model	24224.55	24295.9762	1895.613	20	0.00
3 groups model	22712.64	22823.0318	371.707	14	0.00
4 groups model	22356.77	22506.1237	3.838	8	0.87
5 groups model	22367.43	22555.7373	1.697	2	0.43

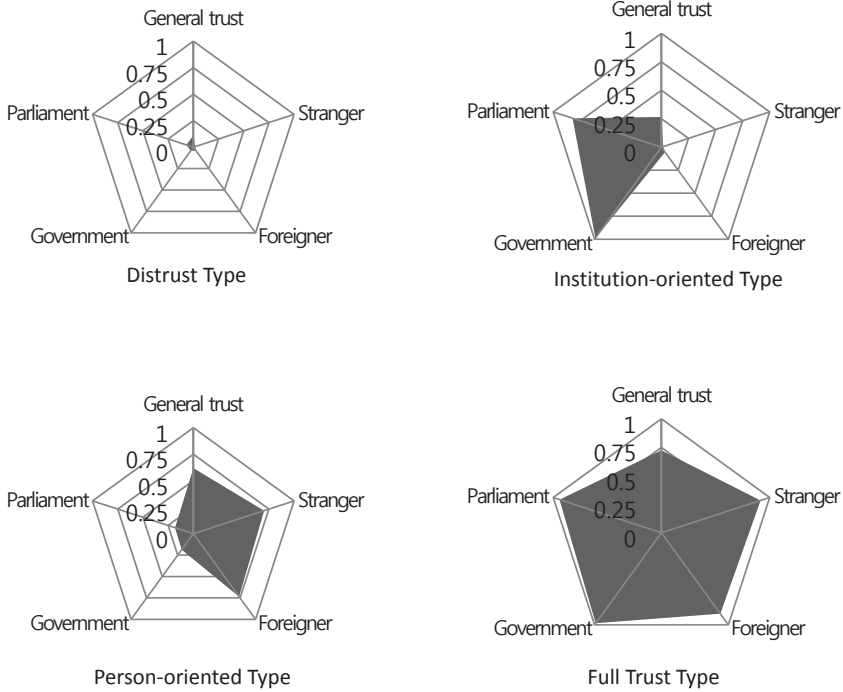


FIG. 1.—Ratio per respective question on each type of trust as a radiant graph.

NOTE.—The size of the pentagon per respective type can be deemed as a reflection of the average societal moral resources.

influence of type of trust, binomial logistic regression analysis is conducted by applying political participation as dependent variables.

Results

Type of Trust

To find out how many types of trust there are, latent class analysis is conducted by gradually increasing the number of groups from a standard model to a five groups model. According to the result of model fitness index shown in table 1, the four groups model is deemed most appropriate. The indices of AIC and BIC for the four groups model is the lowest among all models, and it appears to be the best model with drastic decrease in L^2

compared with the three groups model (p -value = 0.87).⁴ Although the five groups model is also acceptable, it seems less suitable than the four groups model because the indices of AIC and BIC are higher than the four groups model.

In this study, types of trust derived through latent class analysis are classified as distrust type, institution-oriented trust type, person-oriented trust type, and full trust type according to the characteristics of each type of trust (see figure 1 and appendix table 2). Distrust type consists of 59.4% of total responses, which consists of individuals who do not trust others and institutions. Of the distrust type, 88.9% responded that they are not able to trust people, and over 90% responded that they are not able to trust strangers and foreigners. As well, 100% of distrust type responded that they could not trust the government, and 93% responded that they could not trust national associations. Institution-oriented trust type accounts for 18.2% of total responses, and the respondents of this type responded with 100% trust towards the government and 73.9% for the national assembly, although the level of general trust and interpersonal trust is low. Person-oriented trust type accounts for 12.8% of total responses and a high ratio of distrust towards the government and the assembly, although 60%-80% show a high level of general and interpersonal trusts. Lastly, full trust type accounts for 9.6% of total responses, which shows a higher level of general/interpersonal trust than person-oriented trust type. It is especially interesting to note that the response of all full trust type respondents state they trust the government and the assembly.

Figure 1 shows the ratio per questions on each type of trust as a radiant graph. The numbers in the graph reflect how individuals belonging to the respective type responded on average. Therefore, the size of the pentagon per respective type can be deemed as reflecting the average societal moral resources. Although distrust type accounts for the majority of total respondents, it can be confirmed that they do not contribute to an increase in societal moral resources because the size of that pentagon is the smallest of all. On the other hand, full trust type shows the largest pentagon, which implies that the greater the full trust type, the richer a society's moral resources.

In addition, the distribution of type of trust by each country is reviewed

⁴ In latent class analysis, p -value means data fitness of the model. The null hypothesis is that "the given model would significantly apply to the population." Therefore, the null hypothesis would not be rejected as long as the p -value is greater than 0.05.

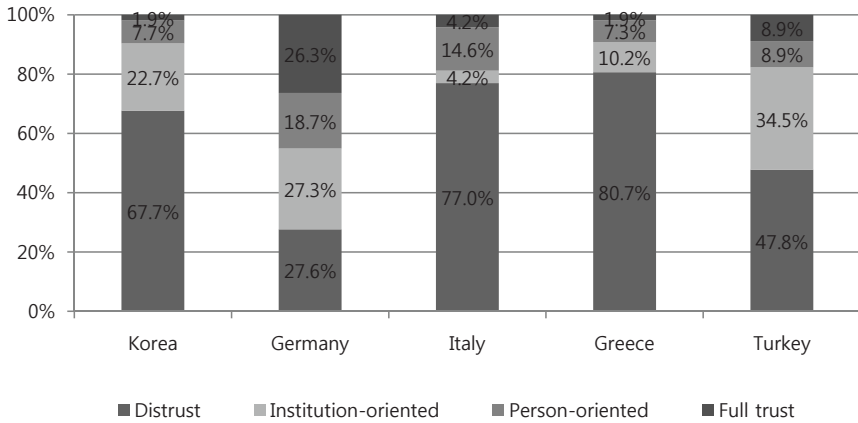


FIG. 2.—Distribution of type of trust per country.

in this paper (figure 2). Individual type of trust would affect individual behavior, which then would change the shape of a society. Therefore, the distribution of type of trust per country would function as an index of the characteristics of that country. And previous studies on the trust level of a society divide high-trust society and low-trust society by applying the criterion of a comprehensive level of trust (representatively, Fukuyama 1995). However, if trust is divided more analytically, as a matter of fact, type of trust matters more than overall trust.

Germany shows even distribution for all types of trust: △distrust type 27.6%, △institution-oriented trust type 27.3%, △person-oriented trust type 18.7%, and △full trust type 26.3%. In Germany, trust in institutions and people are both high, which shows a relatively lower distribution of distrust type compared with other countries. As a result, we can interpret that it is relatively easy for Germany to get the public’s consent on overall change in society and policies led by political elites, which is characteristic of easy consensus building in society.

Korea, Italy, and Greece show a similar distribution. Distrust type takes large majority of respondents out of four types in these countries with 67.7%, 77%, and 80.7%, respectively, while full trust type takes up 1.9%-4.2%. Korea shows a relatively high level of institution-oriented trust type with 22.7% while Italy shows a relatively high level of person-oriented trust type with 14.6%. Greece shows 10.2% in institution-oriented trust type and 7.3% in person-oriented trust type. From the perspective of moral resources, Korea does not seem to have become an extreme distrust type society compared

with Italy and Greece. It can be partially assumed that the Korean government did not experience a big failure since the so-called “IMF crisis” of 1997. Low person-oriented trust type reveals that Koreans maintain an exclusive attitude towards others. And considering the very small distribution of full trust type, we could conclusively view Korea as having weak moral resources. Italy and Greece seem much worse than Korea in terms of distrust type. Particularly, Italy can be seen as a type of society with higher trust for people than institutions, considering that person-oriented trust type has a 14.6% distribution, which is three times higher than the 4.2% institution-oriented trust type distribution.

The distribution for Turkey is \triangle distrust type 47.8%, \triangle institution-oriented trust type 34.5%, \triangle person-oriented trust type 8.9%, and \triangle full trust type 8.9%. Although Turkey is situated relatively at a lower position than other countries in terms of the level of financial and social development, Turkey’s societal moral resources are higher than Korea, Italy, and Greece. It is assumed that Turkey’s distribution of type of trust is influenced by religion or relatively slow democratization of society. Considering the fact that non-democratic societies like China and Vietnam also show a higher level of trust in institutions (World Value Survey Association 2009), it is interpreted that traditional, authoritative mobilization is still effective in Turkey.

Conditions Affecting Type of Trust

Multinomial logistic regression analysis is conducted by applying types of trust as the dependent variable to verify which conditions of the respondents affect individual type of trust (table 2). Independent variables included are socio-financial status (gender, age, marital status, education, job status, monthly household income, and experience of financial crisis) and social capital variables (network and participation in private/public associations). Distrust type is used as a reference category out of four types, because distrust type is the largest type that accounts for 59.42% of all respondents. In addition to this, we think we are able to understand in what condition people trust institutions or persons by comparing individuals who do not trust institutions and persons both with individuals who trust at least one of them.

The result of analysis shows a significant difference between distrust type and other types. First of all, the higher the age, income, and participation in private association, the greater the probability of becoming institution-oriented trust type compared with distrust type. On the other hand,

TABLE 2
MULTINOMIAL LOGISTIC REGRESSION TEST RESULT BY
APPLYING TYPES OF TRUST AS DEPENDENT VARIABLES

	Type of Trust (Reference Category: Distrust Type)		
	Institution- oriented trust type	Person- oriented trust type	Full trust type
	Coefficient	Coefficient	Coefficient
Gender (male)	0.100	0.044	-0.008
Age	0.009**	-0.014**	0.002
Marital status (married/cohabiting)	-0.035	0.128	0.119
Education (below lower secondary level)			
Post-secondary level, non-tertiary level	0.006	0.196	0.112
Above tertiary level	0.073	0.340*	0.219
Job status (employed)	-0.060	0.133	0.211
Monthly household income	0.152**	0.034	-0.131 [†]
Network	-0.017	0.005	-0.055*
Participation in private association	0.459***	0.357**	0.145
Participation in public association	-0.077	0.274	0.098
Financial crisis experience (the higher, the more experience of crisis)	-0.099	0.125 [†]	-0.145 [†]
Constant term	-0.566	-0.647	0.881
Log likelihood		-3791.0295	
LR Chi ² (45)		1061.92	
Sample size		3801	

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$, [†] $p < 0.1$.

NOTE.—Excluding the missing value for variables, only 3,801 among the entire sampling size of 5,232 (South Korea 799, Germany 961, Italy 661, Greece 506, and Turkey 874) are included in this model. Variations for countries are controlled by the dummy variable.

individuals in a younger age bracket with above tertiary education and higher participation in private association show a higher probability of belonging to person-oriented trust type. At the 0.1 significance level, the more people have experienced financial crisis, the higher the possibility of becoming person-oriented trust type. Lastly, the smaller the network, the lower the monthly household income at 0.1 significance level, and the less experience of financial crisis, the higher the possibility of becoming full trust type. In other words, major variables affecting type of trust are age, education, income,

network, participation in private association, and experience of financial crisis.

Analysis result showing that individuals tend to become person-oriented trust type than distrust type with increased experience of financial crisis has many implications; and although it is not statistically significant, it is worthy to note the negative relationship between institution-oriented trust type and experience of financial crisis. With these findings, it can be interpreted that people with financial crisis experience reveal an attitude of resolving social problems in a non-institutional manner through reliance on interpersonal relationships that acts as a substitute for the system after losing their faith in the system and its rules. On the other hand, the negative relationship between full trust type and experience of financial crisis suggests the possibility of keeping a high level of trust in institutions and persons by individuals with full trust type, because they never experienced financial crisis at the individual level or the family unit.

Network, defined as the frequency of communication with family, friends and neighbors, reflects the trust and faith in people around each individual. High value of network can be deemed as an attitude of prioritizing acquaintances before the system or strangers, which, according to the results of this research, reveals the difficulty of becoming full trust type.

Lastly, individuals joined in sports, leisure, and cultural and religious groups show the probability of not becoming distrust type. This supports the study result of Putnam (Putnam, Leonardi, and Nanetti 1993; Putnam 2000) which displays the trust level to have increased by having experience of private association. Experience of private groups would not simply enhance trust in acquaintances but also further increase trust towards the public. However, through further study, it is necessary to verify specific mechanism of the concrete characteristics of private associations that affect the system or people, because participation in private association influences both types of trust.

A cautious interpretation is required of the outcome that participation in private association has no influence on full trust type, considering participation in private association was previously correlated with positive relationship with institution-oriented trust type and person-oriented trust type. The multinomial logit analysis using full trust type as the reference category (appendix table 3) shows a higher possibility of institution-oriented trust type over full trust type the more the income increases, the less the job opportunities decreases, and the more the experience of private association increases. And the probability of person-oriented trust type rather than full

TABLE 3
RESULT OF BINOMIAL LOGISTIC REGRESSION ANALYSIS BY APPLYING POLITICAL PARTICIPATION AS DEPENDENT VARIABLE

	Online expression	Expression toward governments and media	Participation in political campaigns, demonstrations, and strikes	Voting
Type of Trust (distrust)				
Institution-oriented trust type	-0.014	0.213*	0.002	0.386**
Person-oriented trust type	0.113	0.641***	0.568***	0.215
Full trust type	0.580***	0.682***	0.631***	0.132
Countries (Germany)				
South Korea	-1.221***	-0.182	0.226 [†]	0.518***
Italy	-0.896***	0.513***	0.404**	0.318*
Greece	-1.455***	-1.125***	-0.071	1.603***
Turkey	-1.696***	0.064	0.317**	1.417***

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$, [†] $p < 0.1$.

NOTE.—Excluding the missing value for variables, only 3,643 (South Korea 794, Germany 903, Italy 643, Greece 492, and Turkey 811) to 3,801 (South Korea 799, Germany 961, Italy 661, Greece 506, and Turkey 874) among the entire sampling size of 5,232 are included in this model. For voting, respondents without the right to vote in a recent election were treated as a missing value. Full models are presented in appendix table 4.

trust type increases the less the age decreases, the more the income, network, and financial crisis experience increase. In other words, compared with institution-oriented trust type and person-oriented trust type, full trust type would be constructed with a different mechanism that does not follow a linear change in behavior.

The Relationship between Type of Trust and Political Participation

In order to test for significance of types of trust and to verify the influence of political participation, this research set types of trust and background variables as the independent variable, then implemented logistic regression analysis by setting subcategories of political participation using all of the data gathered for the five countries: Δ online expression, Δ expressing one's opinion toward governments or media, Δ participating in activities such as political campaigns, demonstrations, and strikes, and Δ voting as the

dependent variable (table 3; see appendix table 4 for full models).

First, it appears that full trust type respondents tend to express themselves online more than other types of trust. For background variables, those who are male, younger of age, married or cohabiting, employed, and have attained higher education than secondary-level diploma and participated in public/private associations tend to express more opinions online.

For expression toward governments or media, it is revealed that all three types participate relatively more than distrust type. Also, respondents who are male, younger of age, part of a smaller network, and have attained higher education than secondary-level diploma and participated in public/private associations tend to suggest more opinions towards governments or media.

It is revealed that people belonging to both person-oriented trust type and full trust type have higher possibilities of participating in political campaigns, demonstrations, and strikes than distrust type. For background variables, those who are male, younger of age, employed, and have attained higher education than secondary-level diploma and participated in public/private associations have higher chances of participating in political campaigns, demonstrations, and strikes.

Lastly, for voting in an election, only people of institution-oriented trust type have a relatively higher possibility of voting than distrust type, which is related to the fact that people of older age, higher income, larger network, more participation in public associations, and less experience of financial crisis tend to vote more than people who aren't.

By examining the results provided above, we can conclude that type of trust has significant influence over political participation. Institution-oriented trust type has a positive effect only for giving suggestions toward governments or media and voting. In contrast, both person-oriented trust and full trust type have a positive effect on giving suggestions toward governments or media and participating in political campaigns, demonstrations, and strikes, although they do not influence voting. Moreover, it is observed that full trust type has a positive influence on online expression.

The fact that people in person-oriented trust type and full trust type participate in non-institutional politics except voting represents that trust in other people are the basis for non-institutional political participation. Unlike voting which requires only a small amount of his/her time during an election day, non-institutional political participation requires resources such as time and money from the participant. It is also important to note that if one thinks

one cannot bring about changes by participating in politics towards the ways one desires, one may worry about the possibility of wasting one's time or money, which, in return, makes one cease one's participation in political activities.

The reason why people tend to vote more in institution-oriented trust type than in distrust type is because they believe that political and administrative elites of their government or assembly will solve their social issues, and thus, they concentrate on political participation in electing the elites through voting. Also, within non-institutional political participation, it is revealed that these activities are concentrated by utilizing of tools such as governments and media. It is inferred that concern about behavioral effectiveness and risk would be the variables which affect political participation of institution-oriented trust type individuals. This is because the result of this study reveals that institution-oriented trust type people have negative direction, which is not statistically significant, with variables on online expression and participation in political campaigns, demonstrations, and strikes. It is difficult to perceive the effectiveness of online-based expression of political opinions unless the individual is a politician or entertainer; otherwise, online expression has the characteristics of affecting only a small number of people. However, participating in political campaigns, demonstrations, and strikes requires consumption of high individual resources, and it has the characteristics of relatively dissident nature with high risk. By conducting further research on controlling the effectiveness and the risk of political participation, this result can be verified.

We can come up with several implications for researchers by combining the results above and type of trust distributions in South Korea, Germany, Italy, Greece, and Turkey. According to these results, high institution-oriented trust type ratio brings about high voter turnout, and high person-oriented trust type and full trust type ratios bring about increased political participation. However, since two-thirds of the population of South Korea, Italy, and Greece are located in distrust type, it is assumed that there is weak political participation overall; particularly, there would be less non-institutional political participation. By looking at the coefficient of the national dummy variable, however, each country exhibits a different outcome than the hypothesis provided above. For voting in elections, four countries except Germany have higher participation rates than Germany. Among the non-institutional participation, while Germany has the highest rate of online expression, it is Italy which has the highest rate for suggesting opinions towards governments and media. It is revealed that South Korea, Italy, and

Turkey have higher participation in political campaigns, demonstrations, and strikes over Germany as well. It is assumed that these results probably reflect variables which are not discussed in this research's model, such as each country's unique historical and cultural background, and path dependency of ways of political participation that may possibly influence each country's types and degree of political participation in the overall outcome.

Conclusion

Based on the hypothesis that individuals respectively have different kinds of type of trust, this article attempts to derive types of trust with latent class analysis by using variables such as general, interpersonal, and institutional trust. And the result verifies how different types of trust distribution occur in South Korea, Germany, Italy, Greece, and Turkey, followed by a multinomial logit analysis that reveals under what conditions each type of trust is shaped.

As a result, four types of trust are derived: distrust type, institution-oriented trust type, person-oriented trust type, and full trust type. It also turns out that individuals' type of trust has to do with age, monthly income, network, experience of financial crisis, and participation in private association. Trust type distribution by country shows that these four types of trust are equally distributed in the case of Germany, while distrust type accounts for more than two-thirds in South Korea, Italy, and Greece. For Turkey, half consists of distrust type, and institution-oriented trust type is one-third of its distribution. By considering institutional trust as trust in system and interpersonal trust as trust in others, Germany notably has the least distrust type, meaning there are outstanding social and normative infrastructures available for resolving social problems. For South Korea, Italy, and Greece where distrust type consists of more than two-thirds, however, lack of existing social resources to reach resolutions for social issues seem to indicate less effective governmental policy power which eventually would provoke social conflicts in these countries. In Turkey where it has a relatively higher proportion of institution-oriented trust, it is believed that traditional and authoritative mobilization is still in effect.

Meanwhile, in order to test for significance of types of trust, this research implemented logit analysis by setting four subcategories (Δ online expression, Δ expressing one's opinion toward governments or media, Δ participating in activities such as political campaigns, demonstrations, and

strikes, and Δ voting) as dependent variables. Analysis result shows that in the case of institution-oriented trust type, there are higher chances of expressing one's opinion toward governments or media as well as of exercising voting than distrust type. Also, for person-oriented trust type, there are higher possibilities of participating in political campaigns, demonstrations, and strikes, and of petitioning governments and media than distrust type. Finally, full trust type sees higher rates in all non-institutional political participation compared to distrust type.

This research outcome provides three implications. First, types of trust can function as a new contingency, at least in the political arena. Many previous researches considered trust only as a single and social substance, or merely divided it into general, interpersonal, and institutional trust to find correlations with other variables. Through this research, we can assume that individual level of trust is a sort of perception of an individual towards other people, institutions, and other objects, and interaction among these various kinds of trust would affect the individual's behavior. Moreover, depending on the circumstances, it would be more significant to combine trust with types of trust rather than dividing it as general, interpersonal, and institutional trust. Therefore, previous studies that analyzed the relationship between trust and other variables can be revisited by applying "type of trust" as a variable, but further research is necessary in order to confirm whether type of trust correlates with variables outside the political arena. Trust type would be useful for conducting future empirical study on trust because this study derives type of trust through more empirical and rigorous manner by applying the statistical method of latent class analysis while excluding arbitrary combinations.

Second, it is noteworthy that distribution of trust type can function as an index for understanding a particular society's societal moral resources. As the diverse trust type distributions of five countries exhibit, there will be new categorization of different countries, each consisting of higher distrust type, institution-oriented trust type, and person-oriented trust type by expanding target countries of research. Furthermore, it is also possible to conduct new research to see how the distribution of trust type affects macro-social indices such as GDP, or vice versa, in each country.

Third and finally, it is type of trust which acts as the variable for political participation type (institutional/non-institutional political participation). As it is closer to institution-oriented trust type, there is higher institutional political participation; for person-oriented trust type and full trust type, more non-institutional political participation occurs.

Appendix

TABLE 1
DESCRIPTIVE STATISTICS

Variables (N = 3,801)	Average	S.D.	Min.	Max.
Independent Variables				
Sex (male)	0.50	0.50	0	1
Age	46.73	16.35	18	94
Marital status (married/cohabiting)	0.66	0.47	0	1
Post-secondary, Non tertiary educational level	0.42	0.49	0	1
Above tertiary educational level	0.22	0.42	0	1
Job status (employed)	0.54	0.50	0	1
Monthly household income	2.39	1.12	1	4
Network	17.40	2.65	3	21
Participation in private association	0.35	0.48	0	1
Participation in public association	0.07	0.26	0	1
Financial crisis experience	2.05	0.78	1	4
Dependent Variables (Political Participation)				
Online expression	0.36	0.48	0	1
Expression toward governments or media	0.36	0.48	0	1
Participation in political campaigns, demonstrations and strikes	0.38	0.48	0	1
Voting (N = 3,643)	0.79	0.41	0	1

NOTE.—Excluding the missing value for variables, only 3,643 (South Korea 794, Germany 903, Italy 643, Greece 492, and Turkey 811) to 3,801 (South Korea 799, Germany 961, Italy 661, Greece 506, and Turkey 874) among the entire sampling size of 5,232 are included in these model. For voting, respondents without the right to vote in a recent election are treated as a missing value.

TABLE 2
QUESTION RESPONSE PERCENTAGE FOR EACH TYPE OF TRUST

Question	Classification	Distrust (59.42%)	Institution- oriented trust type (18.18%)	Person- oriented trust type (12.76%)	Full trust type (9.63%)
General trust	Distrust	88.91	75.66	31.94	27.06
	Trust	11.09	24.34	68.06	72.94
Trust in stranger	Distrust	97.52	100.00	23.44	7.79
	Trust	2.48	0.00	76.56	92.21
Trust in foreigner	Distrust	95.5	96.11	17.36	13.64
	Trust	4.5	3.89	82.64	86.36
Trust in the government	Distrust	100.00	0.00	77.26	0.00
	Trust	0.00	100.00	22.74	100.00
Trust in the assembly	Distrust	93.16	26.07	81.42	0.00
	Trust	6.84	73.93	18.58	100.00

N = 4,883 (South Korea 842, Germany 1,147, Italy 951, Greece 972, and Turkey 971).

TABLE 3
MULTINOMIAL LOGIT ANALYSIS BASED ON FULL TRUST TYPE

	Type of Trust (Reference Category: Full Trust Type)		
	Institution-oriented trust type	Person-oriented trust type	Distrust type
	Coefficient	Coefficient	Coefficient
Gender (male)	0.108	0.052	0.008
Age	0.007	-0.016**	-0.002
Marital status (married/cohabiting)	-0.154	0.009	-0.119
Education (below lower secondary level)			
Post-secondary level, non-tertiary level	-0.105	0.084	-0.112
Above tertiary level	-0.146	0.121	-0.219
Job status (employed)	-0.270 [†]	-0.078	-0.211
Monthly household income	0.283***	0.166*	0.131 [†]
Network	0.038	0.060*	0.055*
Participation in private association	0.314*	0.212	-0.145
Participation in public association	-0.176	0.176	-0.098
Financial crisis experience (the higher, the more experience of crisis)	0.046	0.270**	0.145 [†]
Constant term	-1.447*	-1.528*	-0.881
Log likelihood		-3791.0295	
LR Chi ² (45)		1061.92	
Sample size		3801	

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$, [†] $p < 0.1$.

NOTE.—Excluding the missing value for variables, only 3,801 (South Korea 799, Germany 961, Italy 661, Greece 506, and Turkey 874) among the entire sampling size of 5,232 are included in this model. Variations for countries are controlled by the dummy variable.

TABLE 4
RESULT OF BINOMIAL LOGISTIC REGRESSION ANALYSIS BY APPLYING POLITICAL PARTICIPATION AS DEPENDENT VARIABLE

	Online expression	Expression toward governments and media	Participation in political campaigns, demonstrations, and strikes	Voting
Gender (male)	0.201*	0.169*	0.279***	0.029
Age	-0.080***	-0.012***	-0.015***	0.024***
Marital status (married/cohabiting)	0.176 [†]	0.127	0.039	0.500***
Education (below lower secondary level)				
Post-secondary level, non-tertiary level	0.805***	0.387***	0.238**	0.052
Above tertiary level	1.368***	0.823***	0.478***	0.162
Job status (employed)	0.301**	0.073	0.177*	0.064
Monthly household income	0.024	0.005	0.038	0.136**
Network	-0.013	-0.027 [†]	-0.003	0.069***
Participation in private association	0.507***	0.372***	0.537***	0.103
Participation in public association	0.905***	1.186***	1.459***	0.735***
Financial crisis experience (the higher, the more experience of crisis)	-0.088	-0.031	0.007	-0.189**
Type of trust (distrust)				
Institution-oriented trust type	-0.014	0.213*	0.002	0.386**
Person-oriented trust type	0.113	0.641***	0.568***	0.215
Full trust type	0.580***	0.682***	0.631***	0.132
Countries (Germany)				
South Korea	-1.221***	-0.182	0.226 [†]	0.518***
Italy	-0.896***	0.513***	0.404**	0.318*
Greece	-1.455***	-1.125***	-0.071	1.603***
Turkey	-1.696***	0.064	0.317**	1.417***
Constant term	2.831***	-0.418	-0.978	-2.086***
Log likelihood	-1771.9558	-2248.6263	-2296.5653	-1699.0939
LR Chi ² (18)	1420.65	468.47	443.80	325.12
Sample Size	3,801	3,801	3,801	3,643

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$, [†] $p < 0.1$.

NOTE.—Excluding the missing value for variables, only 3,643 (South Korea 794, Germany 903, Italy 643, Greece 492, and Turkey 811) to 3,801 (South Korea 799, Germany 961, Italy 661, Greece 506, and Turkey 874) among the entire sampling size of 5,232 are included in this model. For voting, respondents without the right to vote in a recent election are treated as the missing value.

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