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<td>2019-03</td>
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Social Confusion and Corruption: 
Investigating the Causes and Effects of a Breakdown of Ethics

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March 2019

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Social Confusion and Corruption: Investigating the Causes and Effects of a Breakdown of Ethics*

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Abstract: While studies of transitions to market economies have long focused on the issue of corruption, the perspectives from which their analyses have been based have diverged. Accordingly, this paper employs a systematic review through testing 14 hypotheses from the perspectives of political and economic causes, as well as culture and values, based on 559 works from the literature on the subject. Its findings make it clear that the liberalization and privatization of ownership both expand and contract corruption; the effects of culture and values also should not be overlooked, while mostly rejecting the so-called “greasing-the-wheels” hypothesis.

Keywords: corruption; systems; economic growth; democracy; tradition; systematic review

JEL Classifications: C00, O17, P24, P26

* This research was financially supported by a grant-in-aid for scientific research from the Ministry of Education and Sciences in Japan (No. 23243032) and Program of the Joint Usage / Research Center at Institute of Economic Research, Kyoto University (FY2016) and Institute of Economic Research, Hitotsubashi University (FY2018). We thank Ichiro Iwasaki and anonymous referees of Japanese Journal of Comparative Economics for their helpful comments, suggestions, and insights. We also would like to thank Eriko Yoshida for her research assistance and Tammy Bicket for her editorial assistance. Needless to say, all remaining errors are solely our responsibility.

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1. Introduction

In examining the fundamental ethics of human society (Jacobs, 1992), Jane Jacobs looked at the types of moral codes of market ethics and government ethics, pointing out that, in the case of the latter, in particular, transaction avoidance becomes an important factor. In doing so, she both warned against corruption and identified the presence of corruption that is difficult to eradicate amid a mixture of both moral codes. It goes without saying that the relationship between these two moral (ethical) codes brings to mind the contrast between market principles and organization. As a result, while in a democratic society there is a need for a conscious choice between the two moral codes, a socialist economic system under party or state control requires ethics on the part of rulers. Together with stressing the ethical breakdown of communication states, Jacobs asserted, “Former Marxist societies, as they seek to reconstitute themselves, desperately need to clarify right and wrong in business and politics” (Jacobs, 1992, p. 446). Truly, in addition to considering corruption in transition economies to be a phenomenon that was fostered within social systems, we must also look at how values change in preparation for the post-transition economy.

Just what is meant by corruption in the first place? Corruption is an ambiguous, broad-ranging concept that encompasses a wide range of matters, as seen in the way it has been described to include the concepts of “fraud, embezzlement, theft, nepotism, cronyism, gifts, tips, donations, clientelism, connections, networks, lobbying, bargaining, mafioso protection rackets, patronage, conflict of interest, kleptocracy” (Offe, 2004, p. 77). Accordingly, when seeking a highly versatile conceptual rule of thumb on the subject, the definition of Nye (1967) comes to mind (Offe, 2004, p. 77): Corruption is “behavior which deviates from the formal duties of a public role . . . because of private-regarding . . . wealth or status gains.” This definition includes bribery and nepotism but not acts offensive at a moral level, such as murder of the opposition. At the very least, the process of securing private gains in connection with official duties can only be described as corruption, as in a case of deviating from legal frameworks and systems, including rent-seeking, and “ privatizing” state power (Offe, 2004, p. 79). Other views of corruption, as extensions of this definition, include a “misuse of public office for private gain” (Treisman, 2007, p. 360) or, as advocated by the private think-tank Transparency International,1 “the abuse of entrusted power for

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1 Headquartered in Berlin and with 100 branch offices worldwide, Transparency International is a large-scale international NGO that aims to solve corruption issues around the world. Its website is: https://www.transparency.org/.
private gain.” The widely used international Corruption Perceptions Index relies on this last definition. Based on its monetary amount of losses and the sector of its origins, corruption can be categorized as large-scale corruption, minor corruption, and political corruption. Since its antonym, transparency, concerns rules, plans, processes, and actions, corruption can be positioned in terms of systematic research aspects. That is, politically speaking, corruption is an impediment to democracy and the rule of law, and economically, it decreases national wealth, distorts fair market structures and competition, destroys social structures through the loss of people’s trust, and worsens the environment through deficiencies in environmental legal and regulatory systems (Transparency International, Rose-Ackerman and Palifka, 2016).

Under the assumptions of specific field of research on transition economies that looks at the transition of systems, corruption comes into view as an extremely complex presence. While corruption did exist as a legacy of a bureaucratic socialist economic system, at the same time, it has taken a new form as the corruption of the market’s moral code. That is, corruption during the transition of systems appears as both a legacy and a collateral development of the transition itself. Furthermore, even if corruption causes both political and economic losses, “under specific conditions”—when, in the process of nation-building (e.g., during the transition of systems), building market systems on top of the legacy of a socialist economic system that had conformed excessively to the bureaucracy—“corruption even improves economic outcomes” (Rose-Ackerman and Palifka, 2016, p. 32). This is because corruption makes it possible to reduce transaction costs by avoiding excessive bureaucratic systems. This is the hypothesis that corruption is a form of greasing the wheels. Campos et al. (2010) systematically reviewed research on corruption (based on quantitative evidence), focusing on the efficacy of this greasing-the-wheels hypothesis. Their meta-regression analysis of 460 estimation results extracted from 41 studies showed that 32% did not support the greasing-the-wheels hypothesis, 62% were unrelated to it, and 6% supported it. While existing studies as a whole did not support the greasing-the-wheels hypothesis, Campos et al. (2010) also suggested that strongly policy-oriented studies and unpublished studies were less likely to support the hypothesis, and when these studies were excluded, the results were ambiguous.

From an early stage, the issue of corruption in economies with transitioning systems was proposed as a research subject, and such studies have focused mainly on macro and micro studies. Macro studies have included an approach that considers macroeconomic performance during the 1990s to have been underestimated and argues
that unofficial economic sectors, including corruption, need to be assessed properly. As a result, according to this approach, actual economic performance during the shock of transition to a market economy was better than it appeared (Lavigne, 1996). Micro research has advanced in a more broad-ranging and complex manner.\(^2\) Above all, it was a natural development that such research would be addressed as a focus for researchers on the transition of systems, since phenomena equivalent to the selling off of state property appeared in the process of privatizing ownership and management—which should be seen as the star policy of the transition of systems—and as the transition of systems was accompanied by a lack of transparency in reorganizing the bureaucratic structures responsible for approving and authorizing building in the new state. For this reason, the study of corruption also served as proof that research on the transition of systems was developing in an interdisciplinary manner, to encompass not only economics but also other fields, such as political science and sociology.

Despite the fact that corruption has been studied considerably in connection with systemic transmission, the findings of such research have not been consistent—in fact, they show a tendency to diverge. Even on the subject of its relationship to growth, the meta-analysis of Campos et al. (2010) does not suffice. There is a need to ascertain whether their conclusions are valid, even in consideration of the special conditions of system transition. Accordingly, this paper will attempt a systematic review of corruption in countries undergoing the transition of systems, using a basic collection of 559 studies—more than the number used by Campos et al. (2010). In other words, through an unprecedented large-scale systematic review, it will consider the causes and effects of corruption in transition economies. In addition, the author will verify the correlation between the content of research and the literature attribute of medium of publication to attempt to get a prospective of future debates regarding corruption by considering trends in research on the subject. This paper will employ the following structure: After first taking an overview of the levels of corruption in transition economies, it will propose theoretical hypotheses for consideration in the systematic review. Then, it will consider the attributes of the basic collection of 559 works, from the literature subject to the systematic review, and then successively test hypotheses concerning causes and effects.

\(^2\) Papers by Partos (2004) and Radin et al. (2011) are leading examples of those surveying the present states of affairs. Another study (Социальноэкономических проблем народоселения РАН, 2003) asked police officers directly about subjects such as their experiences with corruption and the amounts of money involved.
2. Corruption levels in transition economies

Although research on corruption under the transition of systems began at the same time as the transitions themselves, only since 2000 has the topic of corruption secured its status within transition research. Initially, the publication by the NGO Transparency International of its Corruption Perceptions Index\(^3\) served as the major impetus behind the shift from research inclined toward case studies to empirical research; this is related to the fact that this index began to be used in analysis as an indicator of the degrees of market maturity and transition to a market economy. Distinguishing features of research on corruption include the facts that research has been led by an international organization rather than a specific individual, that research has advanced since the 2000s, and that the number of quantitative studies increased with the use of the above index in research.

Despite the fact that it is difficult to compare Corruption Perceptions Index rankings over the years due to differences in the populations of countries surveyed, and the fact that it would be difficult to say that the evaluation criteria used necessarily are objective, trends in the index over time do, to some degree, aptly express the properties of countries undergoing economic transitions (Figure 1). As the figure shows, the countries of Central and Eastern Europe and the Baltics, which successfully joined the EU, have held relatively high positions since the start of the transitions of their systems. In particular, Estonia, which received aid as a model for transition in Europe after quickly stabilizing its currency, is ranked highest among transition economies, at a level that rivals even developed countries. After Estonia comes a series of Central and Eastern European states, among which Poland shows a rising trend while Hungary’s is falling. Next come the EU member states in southeastern Europe, followed by southeastern Europe’s non-EU member states. At the lowest level are the former Soviet states, with the low rankings of Russia and the regions of Central Asia and the Caucasus standing out in particular. In general, it must be said that the low levels of corruption in these former Soviet states rival those in Africa. China’s level is in

\(^3\) This integrated indicator of corruption, developed in 1995, rated 180 countries in 2018 on a scale of 0 (the highest degree of concern about corruption) to 100 (the lowest). It was calculated based on 13 reports from 12 international agencies regarding concern about corruption among businesspeople and national experts over the most recent two years. The global average score is 43, with Denmark scoring the highest, at 88, and Somalia the lowest, at 10.
between those of southeastern Europe and the former Soviet Union.

It must be noted, however, that the above facts do not mean that the eastern European states ranked higher in terms of corruption control are ranked among the countries with the lowest levels of corruption globally. According to the Research and Training Institute of the Ministry of Justice of Japan (2008), the annual rates of victimization by corruption (i.e., the percentage of survey subjects who reported having encountered corruption by public officials) in 2003/2004 averaged 1.9% in the OECD and was 1% or less in the major EU member states, but they were quite high in Poland (4.4%) and Hungary (4.9%). In addition, an awareness survey (on corruption in administrative agencies) by the International Social Survey Programme (ISSP) (2016) showed that, while it must be said that levels were low in Central and Eastern Europe as compared to the original EU member states, corruption levels were relatively high in transition economies as a whole.4

However, even among these transition economies, where corruption levels are relatively high by global standards, there is a marked range in degrees of corruption. These differences are characterized by lower degrees of corruption in Central and Eastern European states, where the continual period under socialism was shorter, the transition began relatively sooner, and the transplanting of European systems was advanced. However, corruption was high in the former Soviet states, particularly Russia and the Central Asian and Caucasus regions, whose continual periods under socialism were longer, as were their periods of transition, which advanced the formation of their own unique systems. These differences can be restated, largely unchanged, as differences in economic growth and the degree of transition to a market economy. Since corruption is a crime, no studies provided ethical support for it, based on the assumption that differences would be apparent in corruption, degree of transition, and economic performance among transition economies. The theoretical hypotheses to be tested in this paper are described in the following section.

3. Theoretical hypotheses regarding corruption issues

Before proposing the hypotheses, the difficulty of empirically identifying factors that lead to corruption must be pointed out. This is because acts of corruption and other endogeneities of economic and social activities are extremely acute. For example, the relationship between economic growth and corruption could be hypothesized either as

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one in which economic growth results in lower corruption or one in which a low level of corruption itself leads to economic growth. Put another way, “Its (corruption’s – the authors) many likely determinants interrelate in complicated ways. Some can change quickly and may be caused by corruption as well as the reverse. As with other types of criminal activity, it is hard to observe directly, and so researchers must rely on surveys of corruption’s victims, the accuracy of which is often difficult to assess…. recent years have seen some major advances.” (Treisman, 2007, p. 393). This has been based on improved data.  

Treisman’s (2000, 2007) studies tested hypotheses concerning the correlation between corruption and economic phenomena in the most systematic way. He identified and tested 12 hypotheses regarding the correlation between corruption on one hand and legal and political systems and economic growth on the other. The hypotheses are grounded in considerations such as the legacy of colonialism and legal systems, religious traditions, ethnic categories, resources and rent, economic development, federal structures, democracy, and degree of trade openness. Following the lead of Treisman (2000, 2007), this paper too will propose theoretical hypotheses, mainly from the aspects of causes, effects, and culture and values, based on the assumptions of research on corruption and rent seeking under the transition of systems—that causes and effects are correlated with each other and that each is characterized by internal connections between cause and effect factors.

3.1. Causative factors

Corruption arises based on the three factors—specific social and economic systems, economy and welfare, and attributes and environments. A comprehensive economic system must be based on a comprehensive political system, under which power is distributed broadly across society and its arbitrary exercise is restrained, which serves to prevent the establishment of an exploitative economic system for personal enrichment. In contrast, corruption, a misuse of power, suggests the presence of an

5 For example, a measurement of governance by the World Bank uses more than 350 variables from more than 200 countries, analyzing the six aspects of voice and accountability, political stability and absence of violence, government effectiveness, regulatory quality, rule of law, and control of corruption (Daniel Kaufman, Back to Basics—10 Myths About Governance and Corruption, Finance and Development, IMF, Vol. 42, No. 3, 2005 September). A succession of other attitude surveys, including the International Social Survey Programme and World Values Survey, which compare opinion surveys internationally, the International Crime Victimization Study, Eurobarometer, and New Russia Barometer, also may be considered opportunities to promote the empirical study of corruption (Richards, 2017, p. 6).
exploitative system (Acemoglu and Robinson, 2012). Corruption arises in such an environment based on a balance between the expected costs (social, psychological, and monetary) of acts of corruption and their anticipated gains. If the greatest cost of corruption is that of arrest and punishment, then the above balance will depend on factors such as the efficiency of the country’s legal system (Treisman, 2000, 2007).

Hypothesis H1.1: Corruption is rarer under an efficient social and economic system. In particular, the nature and consistency of formal and informal systems are decisively important factors. Since corruption is an act for personal gain arising in connection with the exercise of official systems, if such systems are inefficient or are strongly informal in nature, such as one in which they are customary and depend on the discretion of the parties involved, corruption is more likely to arise. Efficient systems can improve the quality of the market and ensure fairness (Yano, 2008).6

Hypothesis H1.2: Corruption is rarer under conditions of democracy and political stability (Iwasaki and Suzuki, 2012).7 Democracy is premised on a stable legal system, the free expression of opinion and debate, and the disclosure of information for these purposes. “Democracy to a significant extent reduces corruption” (Kolstad and Wiig, 2011, p. 19). In contrast, in countries with frequent electoral irregularities, voters lose trust, and governance worsens. In countries where governance has worsened in this way, corruption intended to secure instable government power and resources is relatively more frequent and deeper rooted. For this reason, the former Soviet Union faces greater risks than do Central and Eastern Europe. The European Bank for Reconstruction and Redevelopment (EBRD) (2016) argued for a negative correlation between democracy and corruption. However, there is considerable skepticism about the view that holds simply that democracy directly reduces corruption. In fact, in the initial stages of democratization, corruption may increase as a means of securing voters’ support. In such initial stages, democracy may not necessarily be able to perform its role of serving as a check on corruption (Rose-Ackerman, 1999).

Hypothesis H1.3: Corruption is rarer in developed economies or where wages are high. Put simply, poverty has the simple effect of encouraging corruption among public

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6 Systems of ownership and contractual systems are particularly important in regard to the behavior of private economic actors (Frye, 2017). Treisman (2000) stressed the strength of common-law ownership protections, while also broadening the perspective to include legal culture, colonial (suzerain state) traditions, and religion.

7) Alvarez et al. (1996) is a study on the taxonomy of political systems that categorized democracy and dictatorship based on the selection of top leaders, selection of members of the legislature, and presence of multiple political parties.
officials. It already has been shown that growth reduces corruption, and it is in this sense that corruption is relatively more common in the former Soviet Union than in other transition economies.

Hypothesis H1.4: Corruption is more common in resource-rich nations. This is because gains through corruption are quite large in resource-rich nations, due to the large amount of rents associated with resources and the ease of access to resource development rights. This is why corruption is so common in former Soviet states rich in metal and fossil fuels, such as Russia, Kazakhstan, and Turkmenistan. Such states also are characterized by corporate scandals related to resources.

Hypothesis H1.5: The privatization of ownership increases the likelihood of corruption. Generally, the privatization of ownership involves opening up public property and public economic activities to private businesspeople. If all other conditions were to remain the same, the risk of corruption would increase, as compared to a case in which no privatization of ownership took place. While, individually, transition economies have followed their own methods of ownership privatization—management-employee buyouts, the spontaneous privatization of ownership, or voucher privatization of ownership, which involve low levels of transparency—the likelihood of corruption occurring is greater, “because of their slow pace, high levels of discretion, and lack of transparency” (Rose-Ackerman and Palifka, 2016, p. 160), or more specifically, due to the difficulty of externally auditing the granting of preferential conditions to related parties through the pricing of properties, selection of methods and recipients of transfer, and internal application. In general, countries that prioritized voucher privatization of ownership, which permitted splurging on state-owned properties (e.g., Russia, the Czech Republic, and Kazakhstan), have higher levels of corruption than those that prioritized the transfer of state-owned properties based on market principles (e.g., Poland, Hungary, and Estonia).

Hypothesis H1.6: Liberalization reduces the likelihood of corruption. For example, top-down restrictions, such as protectionist tariffs and trade permits, increase transaction costs as compared to cases in which such restrictions do not apply. This makes corruption payments to cover such costs more likely. Liberalization reduces corruption by decreasing such transaction costs (Sarwar, 2013, p. 185). Of course, this hypothesis is not self-evident, and liberalization could increase corruption due to its relationship with other reforms. Tavares (2007) showed through empirical analysis of experiences with political and economic liberalization during the 1980s through the
1990s that, even if democratization reduced corruption, liberalization potentially could increase it. Corruption increased even when liberalization took place five or more years after the experience of democratization. Based on these studies, the effects of liberalization on transition economies may be felt in two ways.

3.2. Effect factors

Corruption not only affects social and economic systems as well as the economy and welfare but also determines the level of governance as it pertains to “traditions or systems exercised by government for public goods, including the processes chosen, monitored, or substituted by government (political aspects), government’s ability to manage resources effectively and implement sound policies (economic aspects), and respect for the public and national systems (systemic aspects)” (Kaufman, 2005). Accordingly, when looking at corruption as an effect factor, the following hypotheses can be proposed regarding transition economies.

Hypothesis H2.1: Corruption hinders economic growth. It is clear from aspects such as the distortions in systems (monopoly pricing to secure rents) arising as a result of, or in the process of, the misuse of official authority and prioritizing private interests that corruption has a negative effect on economic growth. However, at the same time, in the absence of trust in public systems within national and social relations, corruption may be chosen as an act intended to support the economy and ensure survival vis-a-vis an untrustworthy state. In such a case, corruption may serve as a factor supporting economic growth because failure to take any action would mean that the economic gains lost due to an untrustworthy state would be secured as private gains by a specific stratum of society. That is, it would be worthwhile to study whether the greasing-the-wheels hypothesis applies where an untrustworthy state is present in conditions specific to the transition of systems. Put another way, this theoretical hypothesis concerns whether, amid the confusion of the transition of systems, corruption is a factor that merely hinders growth or contributes to growth as a survival tactic.

Hypothesis H2.2: Corruption grows the informal sector. If corruption is an attempt to reduce formal transaction costs, it would be likely to systematize and grow the scale of activities other than formal economic activities (the informal economy). Based on this logic, corruption would correlate positively with the informal sector, so that a decrease in acts of corruption would decrease the size of that sector.

Hypothesis H2.3: Corruption increases economic disparity and reduces the level of public welfare. If corruption results in a concentration of gains among an oligarchy
or well-connected private capitalists, excluding the general public, then corruption could promote the concentration of wealth in a specific social group, possibly lowering the level of national welfare as a result. Generally speaking, in the former Soviet Union, the activities of a behind-the-scenes oligarchy increased the maldistribution of wealth, while this phenomenon was rarer in Central and Eastern Europe. The EBRD (2010) pointed out that the value of informal payments—an indicator of the level of corruption—was highest in the former Soviet Union, followed by southeastern Europe, and was lowest in Central and Eastern Europe, although it still was higher there than in Western Europe. However, an overall trend toward convergence with the level of Western Europe has been observed (EBRD, 2016, p. 28).

Hypothesis H2.4: Corruption worsens governance. As the misuse of entrusted power for private gain, corruption is related directly to the worsening of governance because it makes government power and systems less trustworthy.

Hypothesis H2.5: Corruption hinders transitional reforms. Since it distorts fair market systems, corruption makes it more difficult to transition to a market economy and implement liberalization policies, resulting in a more difficult transition process.

3.3. Culture and values

Corruption is connected to culture, customs, and values. Corruption is merely a cultural phenomenon (Barr and Serra, 2010), and the efficacy of studying corruption from the cultural perspectives of the value of uncertainty avoidance and the customs of human orientation and group behavior also has been emphasized (Seleim and Bontis, 2009). Treisman (2000, 2007) also looked at the historical process by which legal culture, legal systems, and religion are formed, showing that culture and values have major impacts on corruption. From the perspective of transition economies in particular, the following points are likely to be of importance.

Hypothesis H3.1: The degree of permeation of communism is connected to corruption. Corruption has existed at least since the communist era, and the longer that era lasted, the more commonplace the presence of corruption, the more it was accepted as commonsense, and the more formal it tended to be. This is why the levels of corruption in the former Soviet Union and Central and Eastern Europe are so high.

Hypothesis H3.2: Religion and culture are connected to corruption. Since religious views and culture regulate individual behavior, corruption is regulated strongly by religion and culture (Seleim and Bontis, 2009). In general, Protestants are more tolerant of challenges to authority and individual disagreement, demanding individual responsibility, while other Christian sects stress human weakness. In
particular, Protestants see poverty as being related to idleness, and they stress working hard in life. On the other hand, in the Eastern Orthodox Church, the ties between church and state are strong, as are paternalistic values (Treisman, 2007). As a result, greater tolerance of corruption was fostered in Russia (Eastern Orthodox), as compared to the Baltic states and Central and Eastern Europe where, for the most part, the influence of Germany (Protestant) was strong. The same can be observed in Central Asia and elsewhere. In addition, the lessening of legal and political system criteria for EU membership when some Baltic and Central and Eastern European states joined the EU suggests that where there are differences among original EU member states regarding public attitudes toward corruption, domestic cultural factors have a strong influence. In fact, many empirical studies deny religion’s influence on corruption (for example, Shadabi, 2013; Ko and Moon, 2014).

Hypothesis H3.3: Public distrust of society and systems is interrelated with corruption. While the public’s trust in politicians at the highest level, such as presidents, is relatively high in the former Soviet states, trust is low in lower-ranking public officials, and even lower in society and systems. This leads to increased corruption. Empirical research by the EBRD (2010) using the Life in Transition Survey (LiTS) showed that trust levels and corruption were inversely related, and that corruption in public services negatively affects trust in public officials.

4. Overview of the testing method, literature query method, and basic sampling method for literature

For the purpose of objectively testing the hypotheses proposed in the preceding section, literature was collected through a mechanistic process established in advance. Specifically, literature from 1995 through 2017 was searched using Web of Science, a digital literature database that covers the social sciences as a whole. We conducted this search using combinations of two keywords or terms, one of which was either corruption or rent seeking, which are core keywords in corruption research. We used another keyword or phrase from among the following: transition economies, Central Europe, Eastern Europe, former Soviet Union, or the names of China or any of the countries in Central and Eastern Europe or the former Soviet Union. This resulted in a collection of 676 works. However, as the result of further close review of the literature queried in this mechanistic way, the basic collection was narrowed down to 559 works.

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8) The frequency of corruption was high among traffic police officers (EBRD, 2011).
A preliminary profile of the literature is described below.

As seen in Figure 2, while there is some variation in the number of works by year of publication in the basic collection, a trend toward an exponential increase can be observed. This includes similar increasing trends in studies that, instead of simply analyzing the current situation, analyze causes and effects and correlation and in analysis results concerning economic and social systems.

With regard to the research content, Figure 3 presents an outline of the basic collection by attributes of authorship and publication media. In total, the authors of the 559 works in the basic collection numbered 1109, of whom 328 were affiliated with research institutions in North America, 136 in the United Kingdom, and 164 in western Continental Europe, while 154 were affiliated with research institutions in Central and Eastern Europe, 59 in the former Soviet Union, and 185 in other countries. As such, about two-thirds of researchers were from countries other than former socialist states. Thus, it can be said that researchers in states not directly affected by the implementation of market transition policies were more sensitive to the realities hindering such implementation. At the same time, totaling the number of works in the basic collection in five-year intervals shows that few works were published during the 1990s, but the number has skyrocketed over the years. Although one factor behind this increase might be the availability of the objective index from Transparency International, mentioned above, as an effective index for research use, it also is affected by factors such as an increase in the number of social surveys and the manifestation of actual large-scale corruption. In addition, a debate on this subject has developed in journals, including journals in the field of economics as well as those in various other specialized fields, such as sociology, law, political science, and area studies, which clearly shows that the issue of corruption definitely is more than an issue of pure economics.

The bulk of the basic collection showed a strong tendency to focus narrowly on certain regions and countries, with about 20% of studies looking at multiple regions, while about 60% focused on specific countries. Even those studies that looked at multiple countries tended strongly to compare countries within the same region. This suggests the high possibility that corruption has become strongly subsumed as a subject of research in certain area studies and is not necessarily being treated as a subject of comparative research, hence, indicating the importance of the cultural backgrounds of certain countries.

While about 60% of all of the literature employed full-fledged quantitative
analysis or quantitative backing, they were extremely diverse in terms of their methods of treating indicators in regression analysis, the subjects of testing for a relationship to indicators of corruption, and the directions of cause-and-effect relationships; therefore, it is difficult to identify overall trends in the research.

A review of the literature shows that the styles of research in this field can be divided into the two main categories—studies of the present state of corruption and analytical studies intended to verify its causes and effects. Of these, just under 80% of studies focused on causal relationships between corruption and some other factor. These will serve as the basis for the hypothesis testing in this paper. On the other hand, examples of studies of the present state of corruption include Partos (2004), Radin et al. (2011), Votápková and Žák (2013), Yeager (2012), Yessenova (2012), Belas et al. (2015a,b), Jancsics (2015), and Linhartová and Volejníková (2015). While, in light of the point of this paper, these works will not be described here in detail, each presents highly thought-provoking research results and is likely to serve as a valuable source of information for further research on corruption.

The various factors that have been identified as being related to corruption can be divided into the two main categories—decisive factors affecting corruption and factors affected by corruption. As described in the preceding section, decisive factors affecting corruption include traditions and culture as well as trust in society, in addition to social and economic systems, economy and welfare, and attributes and environments. Of these, social and economic systems and their efficiency can be subdivided into a wide range of systemic factors regulating the economy and society, such as foreign exchange, liberalization, privatization of ownership and the methods thereof, size of bureaucratic structures, decentralization of power, system transition reforms, political freedom, property rights, and rule of law. Nearly half of the studies discussing decisive factors affecting corruption focused on these areas. It is clear that, among researchers studying transition economies, systems themselves are considered the most strongly related cause of corruption. Based on this background, a very large number of points are at issue, and four of the hypotheses presented in the preceding section of this paper—H1.1, H1.2, H1.5, and H1.6—concern this area.

On the other hand, traditions and customs include a wide range of practices that are not themselves formal systems, such as past practices, historical vestiges, ethics, degree of tolerance for corruption, personal connections, and permeation of Western European culture, as well as culture and social climate. These include numerous items in the category of factors referred to generally as informal systems, and they attract the
next highest degree of interest as causes of corruption after social and economic systems. Two of the hypotheses presented in the preceding section of this paper—H3.1 and H3.2—concern this area.

The state of the economy and welfare includes the outcomes of economic activities and indicators concerning the level of the public’s standard of living as a result of such activities. Examples include growth expectations, direct investment, technological progress, the import ratio, the economic growth rate, returns on investment, and levels of corporate profits, employment, and social security. These economic factors attract less attention than the two factors discussed above and are subjects of about 10% of the studies. The only hypothesis presented in this paper that concerns this area is H1.3.

At the same time, trust in society and systems also is a factor sometimes identified as a cause of corruption in light of this theme (and as a result of corruption, as described below). In addition, when conducting micro analysis at the level of individuals or firms, sometimes the environments of these actors, as well as their own personal attributes—such as reserves of natural resources, corporate size, age of managers, and individuals’ professions and ethnicities—are identified as causes. Of the hypotheses presented in the preceding section of this paper, H3.3 and H1.4 concern these items.

On the other hand, factors affected by corruption can be divided into the main categories of social and economic systems and reforms thereof, political governance, trust/mistrust in society and systems, and public welfare/natural environment. Of these, the factor of social and economic systems and reforms thereof partially overlaps with social and economic systems, which are causes of corruption. In addition to the factors of corporate barriers to entry, market reforms, democratization, and state apparatus, non-currency payment systems also belong to this category. This suggests that, as discussed at the start of this paper from the perspective of endogeneity, while social and economic system factors affect corruption, corruption also affects aspects of social and economic systems. Among factors affected by corruption, transition reforms and the informal economy are attracting attention in particular, and this paper also pays attention to these tendencies in hypotheses H2.2 and H2.5.

Political governance concerns factors such as social disorder and strife brought about by the state of economic and social systems and reforms therein or the efficient functioning of systems. Specific examples include extreme ethnic disputes, national unity, transparency and fairness, and organized crime and insurrection. Hypothesis
H2.4 in this paper concerns these factors.

Economic/corporate performance attracts the most attention among factors affected by corruption. Specific examples include factors related to various economic outcomes—at both a micro and a macro level—such as corporate earnings, rates of entrepreneurship, foreign direct investment (FDI), economic growth, bank lending, returns on investment, numbers of patents, international trade volume, and income level. The negative effects of corruption on such economic outcomes have long been identified, and this paper also treats these as one point at issue (Hypothesis H2.1).

In addition, as noted above, degrees of trust in and attitudes toward society and systems also have been focused on as outcomes of corruption; in these, a two-way cause-and-effect relationship with corruption can be discerned. The remaining subjects of national welfare and the natural environment consist mainly of factors that appear to be results of the above-mentioned economic/corporate performance and social and economic systems and reforms therein, such as public welfare, happiness, healthy life expectancy, welfare policies, inequality, healthcare efficiency, and environmental degradation. In light of researchers’ areas of focus regarding these factors, this paper will summarize conclusions in these areas based on the consideration of Hypotheses H2.3 and H3.3.

This section overviewed the profile of the literature collected systematically in this paper and confirmed that the factors related to corruption addressed in the basic collection are consistent with the areas subject to the hypotheses we have proposed. Accordingly, in the next section, we will test the series of hypotheses proposed in Section 3 by collecting all results related to the hypotheses proposed in the preceding section.

5. Results of testing

Table 1 collects the results of previous studies related to the hypotheses proposed above, by cause and effect.

This section will introduce the results of hypothesis testing and main relevant works of the literature in the order in which the hypotheses were proposed in Section 3.

Hypothesis H1.1: Corruption is rarer under an efficient social and economic system.

Researchers of transition economies do not dispute the argument that factors such as the quality and consistency of the design of social and economic systems govern levels of corruption. For example, Ahrend (2005) argues that, while it would be
difficult for Russia to break out of its dependency on resources, it would be able to free itself from the spell of resources by preventing corruption through simple, strict, and fair laws. Similarly, Desai and Goldberg (2001) argue that Russia’s lack of property rights is a driving force behind corporate misappropriation, and Gherghina and Chiru (2013) state that the diversion of national funds, rooted in defects in the law, continues in Romania, in a vicious circle in which the passage of a bill to counter such diversion merely spurs a search for loopholes to enable further diversion.

At the same time, empirical analysis has confirmed that a number of systemic factors are decisive. Results of empirical analysis by Duvanova (2014) of panel data from 26 former communist states for the period from 1999 through 2005, based on a fixed-effects model, lead to the conclusion that forms of ownership, bureaucratic intervention, and a lack of rule of law form a breeding ground for corruption. In addition, Goel et al. (2015) identify factors such as anti-corruption laws, corporate internal ethics rules, and bureaucratic pressure, (and the gender of managers) govern the likelihood of corporate bribes. Of the studies reviews, 48 supported this hypothesis, while none rejected it by arguing against a relationship between systems and corruption.

Hypothesis H1.2: Corruption is rarer under conditions of democracy and political stability.

Only one of the studies reviewed—Sharafutdinova and Steinbuks (2017), which identified a positive correlation between an administration’s length of time in power and frequency of corruption—clearly rejected this hypothesis. Clearly there is strong support for the hypothesis that, in general, democracy and political stability have restraining effects on corruption. For example, Grzymała-Busse (2003) suggests the efficacy of democracy by pointing out that, in Central and Eastern Europe, cases in which there was a lack of competition among political parties were more likely to experience a diversion of national funds by political parties due to lax legal systems. In addition, Maloney and Kelly (2000), in introducing case studies of efforts in primary and secondary education to restrain criminal activity in developing countries including Russia, offer the assessment that the development of civil society is a valid countermeasure against corruption, inferring the importance of developing a democratic society.

At the same time, since two prior studies identified necessary preconditions for the efficacy of restraints on corruption by political systems, some reservations may be
needed when presenting this type of argument. For example, Jetter et al. (2015) argue that, while in countries with per-capita GDP of $2000 or higher, democratization restrains corruption, in countries with lower levels of GDP, it may actually further corruption, pointing out the pitfalls of haphazard democratization. In contrast, another prior study proposing preconditions for the efficacy of efforts to restrain corruption, Zaloznaya (2015), argues from the case of Belarus that, while under a benevolent dictatorship, corruption may be furthered, under a strict dictatorship, corrupt bureaucrats may be removed from office. This raises the possibility that nondemocratic political systems, which tend to be spoken of most often in critical terms, may, at times, help restrain corruption.

However, it may be said that most researchers recognize (although not unconditionally) the presence, overall, of restraining effects of democracy on corruption.

Hypothesis H1.3: Corruption is rarer in developed economies or where wages are high.

Interpreting the results regarding this hypothesis definitely is not a simple matter. While the hypothesis is supported if wealth is measured simply by the level of national income, it is also possible that the presence of opportunities for rent seeking in the process of accumulating wealth can encourage corruption. For example, in looking at regional corruption disparities in Russia, Dinino and Orttung (2005) identify a strong negative correlation between the degree of corruption and both the size of the bureaucratic structure and the economic level. In studying decisive factors related to the probability and degree of corporate exploitation and state capture, Iwasaki and Suzuki (2007) point out that economic crisis encourages the spread of corruption, as do the degrees of decentralization in relations between government and corporations and of national intervention in corporate management.

In contrast to these studies that suggest a negative correlation between stability and wealth in people’s way of life and corruption, some studies have found economic growth to be a hotbed for corruption. A leading example is the study of Safavian et al. (2001), which identified a tendency for small businesses in Russia to be more likely targets of corruption if their rates of corporate growth were higher. In addition, Wei (2015) warns of the risk that the overheating of rapid urban development in China could encourage the spread of corruption. While, overall, more studies supported than rejected this hypothesis, some show that, when viewed over the short term, there were different aspects to the relationship between wealth realization and restraint of
corruption, and the nonlinear relationship between the two may need to be further considered.

Hypothesis H1.4: Corruption is more common in resource-rich nations.

While, as compared to the other hypotheses, relatively few studies argued that the presence of natural resources itself was a decisive factor affecting corruption, no studies rejected this hypothesis. For example, Ahrend (2005) discusses natural resources, together with the systemic factors mentioned above, as causes of corruption in Russia. In addition, Gylfason (2000) argues, based on a correlation coefficient, that natural resource reserves in transition economies spurred corruption, leading both directly and indirectly to low growth.

Hypothesis H1.5: The privatization of ownership increases the likelihood of corruption.

Although more studies rejected than supported this hypothesis, researchers were divided in their views, and some were neutral on the subject. A look at the studies over time shows that, while those published during the 1990s tended to support the hypothesis, over the years there has been increasing advocacy for the effects of privatization of ownership on restraining corruption. Among those supporting the hypothesis, Braguinsky (1999) argued that uncertainties inherent to private sector management in Russia induced rent-seeking behavior by causing management to adopt extremely short-sighted approaches, suggesting that privatization of ownership in Russia might induce corruption. In addition, Harris and Lockwood (1997) summarized the series of systemic transactions in Russia, China, Vietnam, and the Ukraine by arguing that, when the previous system merely collapsed without having built up a functional market economy, and particularly when the privatization of ownership was delayed, the result was a nation of rent-seekers. In contrast, among those who rejected this hypothesis, Holmes (2008) identified renationalization as one possible cause of the increased corruption in Russia after a temporary decrease during the Putin era, while Benevolenskaya (2010) analyzed the case of Russia as showing that entrusting the management of state property to the private sector diminished incentives for corruption, mainly through the public disclosure of information.

There also is a tendency to argue that the effects of ownership privatization will vary depending on the method of privatization and the form of ownership. For example, Bornstein (1999) argued that the method of monetary auctions employed in the Czech
Republic, Hungary, and Poland was least likely to induce corruption, while sales through negotiation and management and employee buyouts (MEBOs) were most likely to induce it. Christev and FitzRoy (2002) argued that, while in Poland, outsider firms had the highest increases in productivity and wages, insider firms were more susceptible to rent-seeking behavior through larger wage increases as compared to lower increases in productivity, due to the lower degrees of external pressure on the latter firms.

In addition, empirical studies, such as those of Iwasaki and Suzuki (2007), mentioned above, and Holtbrügge et al. (2007), who identified a positive correlation between government-related stakeholders and corruption, were more likely to reject the hypothesis (i.e., to support the idea that the privatization of ownership has a restraining effect on corruption). From this, it can be inferred that progress toward private ownership and the spread of corruption are, objectively and over a longer term, more likely to lead to the finding of a negative correlation; there also is a need to pay close attention to conditions and environments.

Hypothesis H1.6: Liberalization reduces the likelihood of corruption.

Overall, there is a struggle between those who support this hypothesis and those who reject it. However, there is a strong tendency for research on the former Soviet Union and China to see liberalization as inducing corruption, and a tendency for analyses of Central and Eastern Europe and multiple regions to conclude that liberalization restrains corruption. As such, this hypothesis is characterized by a difference in conclusions depending on region. For example, Gokcekus et al. (2015) identified the degree of economic openness in transition economies as a factor governing corruption, while Neshkova and Kostadinova (2012) argued that transition reforms in six Central and Eastern European states were confirmed to restrain corruption and induce FDI. On the other hand, Popov (2012), citing the Corruption Perceptions Index (CPI), argued that, in 24 transition economies, a transition to smaller government led to systemic breakdown that brought about various negative effects, including corruption. Kneen (2000) summarized the experience of Russia as one in which, in the absence of necessary systems and the rule of law, practices of corruption from the Soviet era were spread by a sudden shift to a market economy.

These regional disparities also can be interpreted as representing disparities between regions in which liberalization had advanced and those in which it had not, suggesting a nonlinear relationship between the two.
Hypothesis H2.1: Corruption hinders economic growth.

The overwhelming majority of studies supported this hypothesis. There is a kind of consensus, at least among researchers studying the economies of Central and Eastern Europe and the former Soviet Union, that corruption is harmful to the economy. For example, Earle (2000), in recommending countermeasures against corruption in transition economies, strongly warned of a vicious cycle in which the growth of corruption hinders economic development by driving up the costs of investment. This in turn leads to a loss of support for reforms, and the resulting delay in reforms further worsens the economy. In addition, Ledyaeva et al. (2012, 2013) detected a strong relationship in which the level of corruption governs FDI. This would be strongly expected to have economic effects resulting from the inflow of funds.

Even among the minority of studies that rejected this hypothesis, none argued that, at a macro level, corruption encouraged national economic growth. However, on an exceptional basis, some studies did support the greasing-the-wheels hypothesis, arguing based on micro-level analysis of the former Soviet Union that corruption stimulated economic transactions. One such example is the study of Guriev et al. (2010), which confirmed the improved performance of firms in regions adjoining more regions that are captured by multi-regional business groups seeking to remove barriers to distribution transactions.

Some analysis results also showed that the impact of corruption on economic growth varied among different social structures. In analyzing the reasons for the differences in the effects of corruption in China and Russia, Larsson (2006) mentioned differences in the social structures of the Brezhnev-era Soviet Union and Mao-era China. Larsson argued that, in China, where the economy was centered on low-tech, labor-intensive industries, corruption did not cause trading partners to stay away because most counterparty countries for trade and investment consisted of similar developing countries in which corruption was rampant. In addition, the decentralization of power had advanced to the point where bribing certain bureaucrats would not affect national policy, so that corruption did not become a factor hindering economic growth. On the other hand, in Russia, where the centralization of power and industrialization already had advanced, corruption severely hindered economic growth.

While this hypothesis is supported overall, a very small minority argued that corruption actually encourages growth.
Hypothesis H2.2: Corruption grows the informal sector.

A small majority supported this hypothesis. While none of the studies that rejected it were of the view that corruption restrains the informal economy, they mainly argued that corruption was not a primary factor or that it had no particular influence. For example, Johnson et al. (2000) detected a strong influence of bureaucratic corruption on informal activities in three eastern European nations, and Williams (2015) argued that the extent of the spread of corruption affected the payment of informal wages in 10 Central and Eastern European states. Nesvetailova (2004) argued that the non-monetary economy in Russia was not caused by previously identified factors, such as corruption, but arose instead as a reaction to deregulated financial markets.

While it is not possible to derive a clear conclusion because of the limited number of works on this theme examined in this paper, since no studies in the literature argued that corruption had positive effects, it is certain at the very least that this is not grounds for justifying corruption.

Hypothesis H2.3: Corruption increases economic disparity and reduces the level of public welfare.

The only study that rejected this hypothesis was that Hung et al. (2017), which pointed out the possibility that corruption could increase returns in corporate units. The vast majority supported the hypothesis. Based on the results of interviews with public officials, politicians and regulators, and parties related to NGOs, Škrbec and Dobovšek (2013) showed that it has been confirmed through various approaches that state capture distorted the rule of law among local governments in Slovenia, resulting in negative effects including negative impacts on trust in government administration and economic outcomes as well as inequality and environmental degradation. Bobak et al. (2007), who studied the causes of worsening health through a logit model, also identified a positive correlation between corruption and poor health. In addition, using a regression model, Minagawa (2013) showed that, among 23 transition economies during the years 2008–2009, healthy lifespans were shorter in those with more widespread corruption.

While it is clear that this hypothesis is justified since, as seen under Hypothesis H2.1, it already is generally accepted that corruption negatively affects the economy, the fact that it would worsen the public’s standard of living can be considered a natural consequence.

Hypothesis H2.4: Corruption worsens governance.
The overwhelming majority of studies supported this hypothesis. For example, Hagan and Radoeva (1997) concluded that corruption in the upper levels of the social hierarchy in Czechoslovakia prior to transition served as a hotbed for social distrust during the transition and for resulting criminal behavior, and Kolossov and Toal (2007) showed, by surveying people in various positions, that one cause of strife in Russia was the widespread recognition of corruption.

On the other hand, one study that rejected this hypothesis was that of Darden (2008), who concluded that, in conditions such as those of Ukraine, in which bribery has become a type of informal system, it impedes the development of free politics, but it contributes to stability in tax collection and social order and restrains political opposition.

Overall, it is widely recognized that corruption hinders governance, while other results may be demonstrated in extremely specific cases in which corruption deeply permeates society.

Hypothesis H2.5: Corruption hinders transitional reforms.

Perhaps because the relationship described in this hypothesis is considered a natural state of affairs, few of the studies reviewed in this paper addressed this theme head on. However, no studies rejected the hypothesis. It would appear that this process may be viewed in various ways. As one example, Chen (2008), looking at the cases of China and Vietnam, pointed out that transition reforms in which rent-seeking is rampant are able to advance no further than the point at which further government reforms would eliminate rents. In addition, as noted previously, Earle (2000) argues that, the vicious cycle between corruption and worsening economic growth apparent under conditions of corruption hinders economic development by restraining investment, leading to a loss of support for reforms. Whatever the case, there is presently no disagreement with the argument that corruption is a serious impediment to the transition of systems.

Hypothesis H3.1: The degree of permeation of communism is connected to corruption.

No strong opinion was identified in the basic collection opposing the hypothesis that the vestiges of the former era served as a hotbed for corruption. Studies on this theme are very common with regard to the former Soviet Union in particular. For example, Allina-Pisano (2010) identified the legacy from the Soviet era as one cause of corruption in an analysis of the capture of political authority by the bureaucratic
apparatus in Ukraine, and Obydenkova and Libman (2015) found that corruption was more likely to occur in regions in which rates of membership in the former Communist Party were high.

Hypothesis H3.2: Religion and culture are connected to corruption.

No views could be found that rejected this hypothesis. To the contrary, the vast majority of studies supported it. Regarding the former Soviet Union, Brovkin (2003), in tracing the history of corruption through a review of Russian history since the Soviet era, identified corruption as being rooted in ethical norms and cultural practices. Denisova-Schmidt and Huber (2010), exploring why corruption is more widespread in the eastern part of Ukraine, mention commercial practices that have developed in a history free from any battle against corruption. On the other hand, many similar points have been made regarding the nations of Central and Eastern Europe as well, with Dimitrova-Grajzl (2007) finding that differences in the severity of corruption in Central and Eastern Europe were strongly influenced by the legacy of political corruption since the later years of the Ottoman Empire.

However, it also has been pointed out that this influence of historical vestiges weakens as countries advance further on reforms. A typical example of such a study is that of Grosfeld and Zhuravskaya (2015), which argues that, in Poland, factors such as corruption and regional income disparities are becoming more separated from the impacts of historical processes and culture over time.

From the above consideration, it can be said that most researchers recognize the religious and cultural backdrops behind corruption, and that the argument for the present may focus on the strength or weakness of their influences.

Hypothesis H3.3: Public distrust in society and systems is interrelated with corruption.

Only one paper, discussed below, expressed a view counter to the arguments that distrust in society breeds corruption, and corruption breeds such a sense of distrust. The vast majority identified a relationship between corruption and distrust in society and systems. Among studies included in the literature that identified distrust as a cause of corruption, Ateljevic and Budak (2010) and Giordano (2010) pointed out, through analyses of the Croatian and Serbian societies, respectively, that a lack of mutual social trust was a cause of corruption. In addition, studies that identified trust as a domain of society affected by corruption included that of Horne (2012, 2014), which showed that progress on policies to clean up corruption and decreased awareness of corruption in
Central and Eastern Europe led to a recovery of trust in government and systems. Heusala (2013) pointed out that corruption during the post-Perestroika period in Russia was a cause of distrust in public administration.

At the same time, Hendley (2010) rejected such an interrelationship. This paper pointed out that the public viewed the law itself as an impediment to litigation, rather than distrust in the administration of justice as a result of corruption, as the cause of passivity toward litigation on home repair projects in Russia. However, Arnold et al. (2012), in investigating decisive factors affecting the degree of trust in the EU among the 27 EU member states, showed that citizens of countries in which corruption was rampant were more likely to trust the EU, identifying cases in which, ironically, trust in international institutions increased as the mirror image of their distrust of their own countries due to corruption.

Thus, these arguments suggest that corruption and the public’s trust in society are two sides of the same coin, showing just how important the social capital of mutual trust among individuals and groups can be.

6. Closing summary, in lieu of a conclusion

A diverse range of points at issue are involved in corruption in transition economies, reflecting the complex interrelationships between the corruption and delays or distortions in improvements in various social, economic, and cultural aspects in transitioning societies. In light of these circumstances, this paper posited hypotheses regarding the main points at issue in research on corruption in transition economies, based on a basic collection of 559 works, testing each of these hypotheses by the degree of support for it found in the literature. Table 2 briefly summarizes these findings. Although researchers’ views diverged concerning Hypothesis H1.6 (Liberalization reduces the likelihood of corruption) and Hypothesis H2.2 (Corruption grows the informal sector), in the former case a nonlinear relationship between liberalization and corruption is conceivable. The fact that analyses that included Central and Eastern Europe, where liberalization is more advanced, tended to support the hypotheses while those looking at the former Soviet Union and Asia, where the progress of liberalization has been slower, tended to reject it may be described as evidence supporting this concept of a nonlinear relationship. In addition, in the latter case, it is appropriate that researchers’ views should diverge, given the complexity of the decisive factors affecting the informal economy. One looks forward to seeing the results of further study in the future. On the other hand, while in the 1990s most studies
supported Hypothesis H1.5 (The privatization of ownership increases the likelihood of corruption), since the start of the 21st century, there has been a strong tendency to see privatization of ownership as a factor that restrains corruption. This may be symbolic of the fact that transition economies have overcome the disorder arising from reforms and succeeded in restraining corruption. A number of considerations must be noted in interpreting these results since, generally speaking, it is hard to imagine ethical or social support for corruption as a form of misusing a public position for personal gain or to imagine advocating policies that would support corruption, regardless of the political system, as shown by the systematic review conducted in this paper. There is unlikely to be an argument against the statement that the dominant view of corruption rejects it, both socially and economically. Certainly, transition economies have become “normal countries” (Shleifer and Treisman, 2005). On further reflection, however, while the most important central point of this paper was to verify the degree of support for the greasing-the-wheels hypothesis—assuming conditions in which the markets of transition economies are not functioning fully and democratic political systems have not yet taken root, while the psychological legacy of dependency on and fear of the state remains from the previous socialist history, and the level of performance of their duties by the public officials who manage the apparatus of the state is low, then corruption may be tolerated as the second-best solution—for the most part, the basic collection does not support this hypothesis. However, what has been identified is the presence of an interrelationship in which efficient and transparent social, political, and economic systems reduce corruption, and a low level of corruption increases the quality of these systems.

Even the testing and review of the theoretical hypothesis that corruption has no benefit whatsoever suggest that the following points should be noted. First, although systems are important, in transitioning to a market economy, the influence of liberalization and privatization of ownership on corruption has a dual nature. That is, while both liberalization and privatization of ownership have an anti-corruption effect of shrinking the domain of government intervention, at the same time, each can increase corruption that accompanies a market economy by strengthening competition in the market. The rich will try to control knowledge and information to shape public opinion to their own benefit, making payments to lobbyists and political donations for this purpose as they attempt to change the system. Truly, “the market economy...has become a corrupter of knowledge” (Crouch, 2016, p.26). If so, then consistency between policies and correlation between political and economic systems are essential
subjects in the research of corruption.

Second, there are three layers of corruption: pre-transition corruption, corruption in the transition process, and post-transition corruption. Discrepancies in the scale of corruption among transition economies still remain, depending on their cultures, histories, values, and systems. As a result, even if we reject the greasing-the-wheels hypothesis for transition economies as a whole, studies that support it, even if few in number, can be confirmed in Russia. The continuing differences between the former Soviet Union on one hand and Central and Eastern Europe and the Baltic states on the other are grounded in the scale of differences in the systems they have developed, in addition to the size of the legacies (debts) they have inherited.

Third, if the transition is process dependent (Mizobata and Horie, 2013), then the strength of the governing factors of culture and values cannot be overlooked. However, at the same time, systems (markets and governments) that are high in quality from the perspectives of transparency and fairness reduce corruption, and democratization itself is considered of utmost importance for anti-corruption systems (Roland, 2014). The correlation between system reforms that take time to and the development of systems that will not take so much time is an important consideration in corruption research (Roland, 2012).

As symbolized by the Xi Jinping administration’s policies to root out corruption in China in recent years, in nearly all transition economies, corruption is seen as the social phenomenon most symbolic of public dissatisfaction. For this reason, policymakers cannot ignore anti-corruption measures. It is impossible to suppress public dissatisfaction by forcing acceptance of groundless disparities, due to the recognition that the misuse of public positions for private gain is an existential threat to the legitimacy of the state itself. Even if, at certain specific times and in certain specific regions, corruption may play a role in greasing the wheels, what is necessary in the vast experimental laboratory of the transition to a market economy is not greasing the wheels but the stability and transparency of systems to satisfy both policymakers and the public, as well as public sympathy for their promotion.

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Figure 1. Change of Corruption Perceptions Index rankings

Note: This integrated indicator of corruption, developed in 1995, rated 180 countries in 2018 on a scale of 0 (the highest degree of concern about corruption) to 100 (the lowest). For details, see footnote 3.

Source: Transparency International
Figure 2. Number of publication in the basic collection by year

Source: Illustrated by the authors
Figure 3. Breakdown of the basic collection by literature attribute

(a) Authorship・Publication media attributes

(b) Research content attributes

Note: Numbers in parentheses are those of the relevant literature.
Source: Illustrated by the authors
Table 1. Result of vote counting on hypotheses by studies of corruption in transition countries

<table>
<thead>
<tr>
<th>Cause of corruption</th>
<th>H1.1 Corruption is rarer under an efficient social and economic system.</th>
<th>H1.2 Corruption is rarer under conditions of democracy and political stability.</th>
<th>H1.3 Corruption is rarer in developed economies or where wages are high.</th>
<th>H1.4 Corruption is more common in resource-rich nations.</th>
<th>H1.5 The privatization of ownership increases the likelihood of corruption.</th>
<th>H1.6 Liberalization reduces the likelihood of corruption.</th>
<th>H3.1 The degree of the permeation of communism is connected to corruption.</th>
<th>H3.2 Religion and culture are connected to corruption.</th>
<th>H3.3 Public distrust in society and systems is interrelated with corruption.</th>
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<td>No</td>
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<td>Yes</td>
<td>No</td>
<td>Yes</td>
<td>No</td>
<td>Other</td>
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Source: Authors' calculations
**Table 2. Results of examination of hypotheses**

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<td>H1.3 Corruption is rarer in developed economies or where wages are high.</td>
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<td>H1.4 Corruption is more common in resource-rich nations.</td>
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*Note: ○ means support for hypothesis, △ means partial support, × means reject.*