

Intellectual Capital and Chaos of Innovation: Antagonist Coalition in Organizations

Asiye Yüksel¹ 

¹Dr, Kocaeli University, Hereke Vocational School, Kocaeli, Türkiye

ABSTRACT

As a critical resource of human capital, employees might be the leading supporters of innovation management considering the integrated intellectual capital. In addition to the formal organizational structure, employees in an organization usually group informally within the institution. They conflict by taking an opposing role to other informal groups. When a manager/leader comes from outside or "someone from within the organization" takes a new position, conflicting groups quickly take a stand against the newcomer and even come together spontaneously with other groups. Hence, opposition groups' unity against this newcomer within the organization has been defined as an "Antagonist Coalition in Organizations". The antagonist action structure that is the subject of this article plays a role in innovation management and negatively affects the process. This research examines the chaotic effect of antagonist coalitions on innovation. The semi-structured observation questionnaire was used as a data collection tool in the research. The tables containing the frequency values were used to analyze the survey data. The answers to the open-ended question were analyzed by qualitative data analysis. As a result of the research, most of the participants expressed a positive opinion on an antagonist coalition in organizations and that this would drive innovation into chaos. Study findings indicate a significant relationship between the antagonist coalition in organizations and the chaos of innovation.

Keywords: Antagonist, Antagonist Coalition, Chaos, Innovation, Intellectual Capital.

JEL Code: M12

Introduction

Nowadays, where innovation is the main factor that enables businesses to have a sustainable structure, it is not enough to see businesses only with tangible assets. In modern management understanding, organizational memory, experience, business structure, innovative thinking structure and employee inclusion in business creativity have corporate value. Enterprises' knowledge and innovation capability underlie this information's processing and transformation into intellectual capital. The relationship between innovation and intellectual capital has been examined many times in the literature, and it has been found that there is a significant relationship between them (Subramaniam & Youndt, 2005).

The international dimension of the economy, the need to continuously innovate, and more use of information technologies have obliged companies to operate in an intensely competitive environment businesses that should differentiate them from their competitors to survive and create value for their customers; they should offer customer-oriented products and services to the market (Aragón-Sánchez & Sánchez-Marín, 2005). The realization of all these differentiation and value-creating products and services is possible with innovation

Considering that the company's information is somehow human-sourced, it is expected that the information that the employees have will contribute to the enterprise's innovative work. The most crucial step to be taken toward the wealth of intellectual capital will be to increase the number of people with a high level of innovative literacy (Yüksel *et al.*, 2022). Therefore, businesses want to activate this structure by making changes in their organizations and choosing innovative managers to achieve their goals. Employees mostly resist or behave silently to this change targeted by the administrations. Most of the literature studies confirm that employees do not adapt quickly to change during organizational change. This study explicitly shows that the resistance that develops against the organizational change moves in the enterprises dealing with innovation management interrupts the innovation studies.

Corresponding Author: Asiye Yüksel **E-mail:** asiye.yuksel@kocaeli.edu.tr

Submitted: 24.01.2023 • **Revision Requested:** 23.03.2023 • **Last Revision Received:** 11.04.2023 • **Accepted:** 12.04.2023



This article is licensed under a Creative Commons Attribution-NonCommercial 4.0 International License (CC BY-NC 4.0)

Recently, an observation that reveals the conflict or inaction encountered in organizations in innovation management has formed the purpose of the conflict. This antagonist effect structure, which is the subject of the article, has been described in the literature. The issue of antagonism is an important component of innovation management. In addition, the antagonist coalition's chaotic effect on innovation is examined. This research identified the antagonist's concept in other disciplines, but depicted that the antagonist coalition's concept had not been used in the field of innovation, and no similar work had been done before.

The observation form and questionnaire, which were stipulated in the research methodology, were applied. An open-ended question was added to the questionnaire to increase the quality of the research. To create the research sample, experts experienced in R&D and innovation, and management were carefully selected. In the conclusion section, the antagonist coalition's effect on organizations and innovation is discussed. Antagonism is an important issue of chaos management. Also, it is interesting that until now this topic has not been applied to "innovation management".

Literature Review

Innovation behavior is of principal significance for understanding how organizations can benefit from human capital (Anderson *et al.*, 2014; Montag *et al.*, 2012; Liu *et al.*, 2017; Wu *et al.*, 2018). Innovation means leading to the competitive advantage of companies. It is a process of management that, to be effective, requires specific tools and management systems (Jardon, 2015).

A modern business depends on the preponderance of which resides in the skills of employees, their experiences, insights and intuitions, and their relationships. Knowledge management has therefore increasingly recognized workers as important contributors to the intellectual capital of businesses (Gorry, & Westbrook, 2013).

Data from several studies have identified that intellectual capital also refers to the integrated value consisting of innovation efforts with customers and partners, relationships with company infrastructure, and organization members' knowledge and skills (Roos *et al.*, 1997). The information owned by transactions might be transformed into value for businesses by intellectual capital (Edvinsson and Sullivan, 1996), which is defined as a determining factor in businesses' future gains.

Wu *et al.*, (2008) stated that intellectual capital accumulation increases the innovation performance of the enterprise. Considering that human beings have a unique and infinite creative capacity, it can be stated that intellectual capital has an important place in guiding enterprises' innovative processes.

According to Wilson (1966), the innovation process is divided into the idea stage, suggestion and adoption, and implementation. According to (Damanpour, 1991; Katila *et al.*, 2005; Wolfe, 1994), innovation itself is a process, whereas (Yoo *et al.*, 2016) it can be defined as the result of a process. Innovation and knowledge management are determining factors for the success and continuity of organizations. However, because they are considered intangibles, their measurement becomes a challenge (Dickel & de Moura, 2016). Knowledge is required for innovation, depending on the definition of innovation, which is the transformation of new ideas within the business into outputs that create value for stakeholders; it comes from the company's internal and external stakeholders such as employees, suppliers, and customers. All value-oriented products and services offered by businesses are not obtained by accident, but by processing the information from these sources and converting them into know-how. Managing the enterprise's knowledge base and converting intellectual capital into useful products and services is fast becoming the critical executive skill of the age (Cormican & O'Sullivan, 2003).

Most studies in the literature have only been carried out on innovation performance. A considerable amount of literature shows that businesses with valuable and skilled human resources have a higher potential to find new product ideas and implement them. According to Merriam-Webster (2023) dictionary sources, the word antagonism means enemy. Antagonism in philosophy; means "opposition" and "being a cause for a certain purpose". It is also known as the opponent or opponent enemy.

The term antagonism, first used by Bonacich (1972), expresses any discriminatory behavior or prejudiced attitude from one group to another. Labovitz and Hagedorn (1975) explain in the theory of antagonism that using social power, competition and labor structure directly affect intergroup relations based on structural and behavioral orientations. Otherhand, the term "antagonism" is intended to encompass all levels of intergroup conflict, including ideologies and beliefs (such as racism and prejudice), behaviors (such as discrimination, lynchings and riots), and institutions (such as laws perpetuating segregation).

Antagonism has been evaluated as the adverse meaning of agreeableness to one of the elements of the big five personality traits as extroversion vs. introversion, agreeableness vs. antagonism, conscientiousness vs. lack of direction, neuroticism vs. emotional stability and openness vs. closeness to experience in the psychology literature (Turan, 2015; John and Srivastava, 1999; Costa and McCrae, 1985). Parks *et al.* (2013) claimed antagonism is a multifaceted concept needed to be evaluated. One of the facets is power and its abuse use. For instance, an individual can behave as a gatekeeper of collective goods or evaluate it as a common-pool resource that could be utilised for individual needs so it is protected or harmed.

Even more broadly, antagonism can be characterized as individual differences in the motivation to maintain positive social

relations with others (Graziano & Eisenberg, 1997). Antagonistic individuals place less value on interpersonal harmony, being more likely to sacrifice interpersonal harmony for other goals. Agreeable individuals, on the other hand, are likely to be motivated to maintain harmonious relations across many interpersonal contexts. Antagonism, the low pole of agreeableness, references traits related to immorality, combativeness, grandiosity, callousness, and distrustfulness (Lynam & Miller, 2019).

Behaviors can be characterized as “the internally coordinated responses (actions or inactions) of whole living organisms (individuals or groups) to internal and/or external stimuli. Many patterns may arise in organizations’ and companies’ performance in organizations, which may be in organizational behavior, business relations, team production, organizational culture, decision-making, and other well-established management areas that affect business performance (Levitis *et al.*, 2009). Employees’ tendency to maintain the status quo in strong organizational cultures opposes the initiation of change or an innovative guest. The visible result of mutual interactions between employees who show this resistance is chaos in the organizational system. Managing innovation in such structures is almost impossible due to problems arising from dealing with daily problems.

Businesses innovate to keep up with change. According to the author’s comment, “*they mostly use new human resources to mobilize and manage innovation in their business processes. This person may be from within the organization or from outside the organization. This selected person is given new business-related goals. There is also time to achieve these goals. The new person faces antagonistic obstacles if there are power centers in the organization. This pressure also damages the efficient management of time. Without the support of human resources, organizational innovation becomes unsustainable. Considering the rapid change rate of the external environment in which the organization is located, the enterprise cannot keep up with this change rate*”.

A corporate organization is essentially a kind of complex system. Innovation is a complex construct and overlaps with a few other prevalent concepts such as technology, creativity, and change. Research on innovation spans many fields of inquiry including business, economics, engineering, and public administration. The organizational innovation process is the combination of subsystems, a set of complex systems that change various aspects of the business. Changes in the external environment show that organizational innovation is essential for the development of the firm. This is a must for the survival of the business (Damanpour, 2017).

Crain *et al.* (2008) assume that synergy’s cumulative effect occurs less than the sum of these opposing effects in organizations with opposing personal effects. Conflict lowers energy and is chaotic. Because some behaviors are unpredictable, it is impossible to know where the system’s boundary will shift at any moment (Dolan & Garcia, 2003). Organizations are potentially chaotic due to the merging of counter forces, as organizations are also defined as non-linear dynamical systems subject to forces of stability and the forces of instability that push them towards chaos (Thiétart & Forgues, 1995).

If there is too much criticism in an organization, the development team may not generate enough product ideas. In such cases, the role of antagonists emerges. The antagonist’s role in innovation projects is the role in which an individual strongly opposes a project and evokes negative emotions even when the project receives organizational support. These antagonists try to influence innovation with their support or opposition to specific projects. Conflict and political behavior occur when individuals oppose innovations (Markham, 2000).

An organization’s ability to use information depends mostly on the human resources that effectively create, share, and use it (Antunes & Pinheiro, 2019). Information stagnates in uncertain and difficult environments (Smith & Paquette, 2010). This creates chaos of information. Information not supported by human resources cannot turn into an innovation. Human-made chaos is the enemy of innovation.

It has been demonstrated that there are various unforeseen situations in the innovation process; if any phase is not well coordinated, the entire organizational innovation system will be confused. Especially the chaos experienced in periods of change will disrupt the firms dealing with innovation. Promoting internal cooperation among members of organizations can be a powerful resource for generating organizational knowledge. The interaction is necessary to transform personal knowledge into collective knowledge, otherwise, innovation will be chaotic. The research has tended to focus on antagonist structures in organizations that should be examined.

Research Method

The first phase was to identify the prerequisites for using semi-structured interviews. The aim of this phase was to evaluate the appropriateness of the semi-structured interview as a rigorous data collection method in relation to the selected research question(s). According to the selected studies, the researcher needed to be able to determine some areas of the phenomenon based on previous knowledge before the interview (Turner, 2010).

This study employed a systematic methodological review. The review was conducted by adapting the theory review method. Based on our results, the semi-structured interview guide development included five phases: (1) identifying the prerequisites for using semi-structured interviews; (2) retrieving and using previous knowledge; (3) formulating the preliminary semi-structured

interview guide; (4) pilot testing the interview guide; and (5) presenting the complete semi-structured interview guide (Campbell *et al.* 2014).

The data were collected through a semi-structured questionnaire prepared by the researcher. The semi-structured questionnaire combines structured and unstructured questionnaires with closed and open-ended questions that try to reveal purposeful views (Sarantakos, 2005). The semi-structured interview technique was chosen because it has proven to be both versatile and flexible as well as being a popular data collection method (Dearnley, 2005). After the questionnaire was prepared in two parts, it was first given to two experts, one of whom was an R&D specialist and the other an academic, and they were asked to examine whether the questions were understandable or not and their adequacy within the scope of the subject. The questionnaire prepared after the arrangements based on the recommendations of the experts was sent to the participants. Following the expert opinions, the following items were formed:

Items 1. When organizations want to change, they bring in a new person.

Items 2. The newcomer creates new business methods to be accepted by the organization.

Items 3. Organization employees show individual resistance to newcomers' business practices.

Items 4. Employees of the organization, who show individual resistance, first evaluate the newcomer's corporate goals within their informal groups.

Items 5. In organizations, these informal groups spontaneously cooperate with other informal groups and develop a counter-attitude when they feel that they will be negatively affected by the change.

Items 6. The antagonistic coalition in organizations keeps the newcomer busy with unnecessary daily problems. Items 7. Daily pursuits hinder the innovative goals of the newcomer.

Items 8. The antagonist inhibitions create chaos in innovation management.

Items 9. Chaos reduces innovative moves.

Items 10. Decreases in innovative movements negatively affect intellectual capital.

Item 11. This study poses a research question. Based on this research question, a survey was created.

Research Question: Antagonist coalition in the organization; negatively affects innovation.

Styhre (2007) stated that the relationships between professionals and managers are intricate, and parties can take the other group's role and see a broader perspective than just individual interests. In the emerging knowledge society, a significant challenge for human resource management theory and practice is how to lead professionals and experts in daily work. The literature on professionals shows that the relationship between professionals and managers is complicated, as professional ideologies, practices, and interests tend to conflict with organizational and managerial goals.

It is also challenging to find the right balance and define the right balance between soft and hard actions on which innovation success is built. Long-term and full benefits can only be recognized if the problematic aspects complement sensitive actions that give momentum to the underlying dynamics and innovation. Indeed, these delicate actions make the organization innovative in the long run (Pervaiz, 1998). From this point of view, the newcomer to a senior position usually leads to a change in behavior. Individuals in businesses react to events instead of analyzing the situation and developing an antagonist attitude with their informal groups.

It should not be forgotten that innovation management is fed by the collaborative practices of innovation activity. These new practices, which are not accepted and understood by the employees, create obstacles created by opposing attitudes and hinder the innovation efforts of the management. From this point of view, the newcomer to a senior position usually leads to a change in behaviour. Individuals in businesses react to events instead of analyzing the situation and developing an antagonist attitude with their informal groups. If the employees' acceptance and understanding of innovation in this organization are not realized, this will negatively affect the innovation management. One of the reasons for this may be the reaction to the change in organizational structure. For employees, the focus is still on the coordination of activities caused by this restructuring. At such times, opposition groups can turn into unity.

This study was conducted to investigate the opposing structures in companies that strengthen with cooperation and drag innovation into chaos. The participants' opinions on whether a survey created based on this issue drag innovation into chaos or not will be useful to confirm these findings.

Data Collecting

The observation form and questionnaire, which were stipulated in the research methodology, were applied. An open-ended question was added to the questionnaire to increase the quality of the research. The survey consists of 19 questions with 11 main statements and 8 demographic information supporting the research question. A 19-item electronic questionnaire was applied to sector and R&D managers (n = 40). Data were collected in 2020. Managers, directors, academics, and R&D managers were informed by phone calls to complete the survey correctly. The data from the questionnaire sent electronically were transferred to the SPSS program. For semi-structured interviews, the last question was added to the questionnaire, and they were asked to write a detailed answer. It was ensured that only volunteer participants answered the semi-structured questionnaire. It was emphasized that a name should not be written in the questionnaire to express valid opinions easily. It was stated to the participants that expressing their valid opinions was essential for the validity of the research results. The questionnaire was created electronically.

During the data collection process, all 40 questionnaires were returned (n = 40). Different samples were selected as directors, managers, TÜBİTAK (The Scientific and Technological Research Council of Turkey) R&D managers, employees, academicians, public and private sector senior representatives, and the results were analyzed based on categories. The Scientific and Technological Research Council of Türkiye (TÜBİTAK) is the leading agency for the management, funding and conduct of research in Türkiye. TÜBİTAK is responsible for promoting, developing, organizing, conducting and coordinating research and development in line with national targets and priorities. TÜBİTAK acts as an advisory agency to the Turkish Government on science and research issues, and is the secretariat of the Supreme Council for Science and Technology (SCST), the highest S&T policy-making body in Türkiye. Setting its vision as to be an innovative, guiding, participating and cooperating institution in the fields of science and technology, which serves to improve the living standards of our society and sustainable development of our country, TÜBİTAK not only supports innovation, academic and industrial R&D studies but also in line with national priorities develops scientific and technological policies and manages R&D institutes, carrying on research, technology and development studies. The Gebze Campus, located in Tübitak Marmara Region, was chosen for this study. Approximately 2700 personnel work in this campus. Since the author has done many R&D studies in the Tübitak Marmara campus, it is known that the institution is suitable for this type of research. The sample consists of senior employees in various units of the institution. Therefore, this sample is sufficient in terms of qualitative and quantitative representation for the semi-structured questionnaire.

According to Morse (2012), such analysis is amenable to non-parametric statistical analysis. Sampling for Semi-Structured Interviews research must be guided. This research followed Morse's principle. The data collected are adequate according to the literature. A minimum of 30 participants is recommended for initial recruitment to ensure adequate data collection. Adequacy of data in this type of research is defined in both qualitative (i.e., the depth of data collected) and quantitative terms (i.e., the number of data collected). The data may be thin. Although participants know they are free to respond to questions as they wish, they are also aware that they are to respond to scheduled questions. Hence, participants may respond to categorical questions in kind. The second aspect of adequacy, however, is the sufficiency of the data for quantitative analysis. Because Semi-Structured Interviews data are collected with an interview schedule in which each participant is asked the same questions, data analysis proceeds by item. A sample size of 30 is the minimum number recommended for such statistical analysis to be meaningful. Finally, in addition to qualitative and quantitative analysis, data derived from Semi-Structured Interviews may be used in a mixed-method design. In this case, the sample size needs to be a minimum of 30 for adequacy of the quantitative analysis (Morse & Niehaus, 2009; McIntosh, & Morse, 2015)

The questions that make up the first part of demographic information were transferred to the SPSS (Social Science Statistic Program); frequency and percentage values were calculated. For each question in the second part, separate analyses were made using the content analysis technique. Content analysis is expressed as identifying, enumerating, and interpreting recurring issues, problems, and concepts within the qualitative data obtained (Miles & Huberman, 1994; Silverman, 2000). In the next step, repetitive codes were categorized and themed with an inductive approach (Baxter, 2003; Stake, 1995). According to the obtained themes, the data decomposed are presented in tables with frequency and percentage values provided that they are separate for each question and reflect gender differences. Due to the limited number of participants and expressions, advanced research techniques could not be applied.

Findings

When the demographic characteristics of the participants are examined in Table 1. data; participants' characteristics when the data are examined; 40% of the participants are women, 60% are men, 2.5% of the participants are between the ages of 18-25, 12.5% are between 26-35, and 32.5% are between 36-45 years. 45% were between the ages of 46-55, and 7.5% were between the ages of 56-65. Over the age of 65, there was no participant. When the participants' education level is examined, the highest education level is 37.5% with a master's degree.

Other levels are specified as 32.5% with a bachelor's degree, % 37.5 with a master's degree, 27.5% with a doctorate, and 2.5%

with an associate degree. In addition, the management experience of the participants is 40% for 0-5 years. It is 7.5% for 6-10 years, 12.5% for 11-15 years, 22.5% for 16-20 years, and 17.5% for 21 years. Considering the type of sector the participants work in, it is seen that 62.5% of them work in the public sector, 35% in the private sector, and 2.5% in the project-based sector. This ratio can be attributed to the fact that the participants are among the R&D employees and that they are TÜBİTAK and R&D-based public institutions. The profiles of the participants consisted of qualified employees working in different sectors.

The area of the sector in which we work is stated as service with 25%. The education sector followed this rate at 17.5%. In selecting the education sector, the opinions of academic staff working in the field of R&D were also wanted to be taken. The percentages of other sectors: Health and Social Services 10 %, Automotive 2.5 %, Service 25 %, Manufacturing 10 %, Chemical, Mining, Petroleum, Rubber and Plastic 7.5 %, Electricity, Electronics and Energy 10 %, Food 2.5 %, Business and Management 7.5%, Information Technologies 5 %, Glass, and Cement and Soil 2.5 %.

On the other hand, it was observed that the answer as yes was 67.5% in the question “Did you take part in innovative projects”. In the answers given to the question of “antagonist groups”, which is one of the key questions of this study, have you heard before, we see that the no option is in the majority with 92.5%. The ‘no answer’ given to this question reveals that the study is a previously unknown concept in literature. Although it is included in a linguistic sense as an antagonist word, it has been determined that it does not exist as a human dimension concept in research in the management discipline.

The main aim of this research based on the theme of how important internal cooperation between the members of the organization is for innovation; to produce organizational innovation, has tried to draw attention to the antagonist coalition formed against the newcomer during the high level of change in the enterprises.

Table 2 shows that the participants agree that there may be an antagonist coalition in organizations and that this will create chaos in innovation.

When Table 3 is examined, the items with the highest participation percentage are;

- * “to the statement the newcomer has created new business methods to be accepted by the organization” (85%),
- * “to the statement "organization employees who show individual resistance first evaluate the corporate goals set by the newcomer within their informal groups" (90.0%),

In the question that constitutes the semi-structured part of the questionnaire;

The question “Do you agree with the view Antagonist Coalition Creates Chaos in Innovation in Organizations?” was asked, and it was declared that writing your opinion besides yes or no to this question will make a significant contribution to innovation. Answers from the participants are shown in Table 4. Participants are numbered from “1 to 40”. The answers are directly transferred to the table.

Table 1. Demographic Characteristics of Research Participants

Variable	Category	f	%
Gender	Man	16	40
	Female	24	60
	18-25	1	2.5
	26-35	5	12.5
Age range	36-45	13	32.5
	46-55	18	45
	56-65	3	7.5
	65 >	0	0
	High School	0	0
Education	Vocational School	1	2.5
	Faculty	13	32.5
	Master's	15	37.5
	Doctorate	11	27.5
Management Experience	0-5	16	40
	5-10	3	7.5
	11-15	5	12.5
	16-20	9	22,5
Sector Type	21 >	7	17.5
	Public	14	35
	Private	25	62.5
	Project Based	1	2,5
Sector Branch	Education	7	17.5
	Building	0	0
	Health and Social Services	4	10
	Automotive	1	2.5
	Service	10	25
	Production	4	10
	Agriculture, Hunting and Fishing	0	0
	Textile, Ready-to-Wear, Leather	0	0
	Chemical, Mining, Petroleum, Rubber and Plastic	3	7.5
	Electricity, Electronics and Energy	4	10
	Food	1	2.5
	Business and Management	3	7.5
	Information technologies	2	5
	Glass, Cement and Soil	1	2.5
Tourism, Accommodation, Food and Beverage Services, Transportation	0	0	
Have you taken part in innovative projects?	Yes	27	67.5
	No	13	32.5
Have you heard of "Antagonist Groups" in Business?	Yes	7	17.5
	No	33	82.5

When Table 4 is examined, it was observed that 3 people out of 40 participants left this question unanswered, 6 people disagreed with this opinion, 5 people partially agreed, 1 person thought that it could trigger otherwise, and 1 person did not have in-depth knowledge.

The rest of the participants agreed that the antagonist coalition could be in firms, expressed their opinion that this would lead innovation to chaos, and used statements supporting the research question.

Conclusion

This chaotic situation caused by antagonist coalitions often leads to an individual inability to take innovative action and organizational ineffectiveness. This dilemma also hinders the generation of new ideas as they find it easier not to act when action is required.

This research is based on the theme of how important internal cooperation between the members of the organization is for innovation. In order to generate organizational innovation, attention should be drawn to the opposing coalition formed against the newcomer during periods of high change in businesses. Data from this study explicitly show that the resistance that develops against the organizational change moves in the enterprises dealing with innovation management interrupts the innovation studies.

Table 2. Participants' Opinions on the Antagonist Coalition and the Chaos of Innovation

No	Items	Strongly Disagree		Disagree		Neutral		Agree		Strongly Agree	
		f	%	f	%	f	%	f	%	f	%
1	When organizations want to change, they bring in a new person	1	2.5	3	7.5	5	12.5	24	60	7	17.5
2	The newcomer creates new business methods to be accepted by the organization.	1	2.5	1	2.5	4	10	27	67.5	7	17.5
3	Organization employees show individual resistance to newcomers' business practices.	0	0	1	2.5	6	15	23	57.5	10	25
4	Employees of the organization, who show individual resistance, first evaluate the newcomer's corporate goals within their informal groups.	0	0	1	2.5	3	7.5	30	75	6	15
5	In organizations, these informal groups spontaneously cooperate with other informal groups and develop a counter-attitude when they feel that they will be negatively affected by the change.	0	0	2	5	5	12.5	23	57.5	10	25
6	The antagonistic coalition in organizations keeps the newcomer busy with unnecessary daily problems.	0	0	4	10	10	25	18	45	8	20
7	Daily pursuits hinder the innovative goals of the newcomer.	0	0	4	10	7	17.5	23	57.5	6	15
8	The antagonist inhibitions create chaos in innovation management.	0	0	2	5	9	22.5	24	60	5	12.5
9	Chaos reduces innovative moves.	0	0	5	12.5	2	5	23	57.5	10	25
10	Decreases in innovative movements negatively affect intellectual capital.	0	0	1	2.5	10	25	22	55	7	17.5

Table 3. Participants Agree on Rates

Antagonist Coalition and the Chaos of Innovation	Agree+ Strongly Agree
When organizations want to change, they bring in a new person	77.5
The newcomer creates new business methods to be accepted by the organization.	85.5
Organization employees show individual resistance to newcomers' business practices.	82.5
Employees of the organization, who show individual resistance, first evaluate the newcomer's corporate goals within their informal groups.	90
In organizations, these informal groups spontaneously cooperate with other informal groups and develop a counter-attitude when they feel that they will be negatively affected by the change.	82.5
The antagonistic coalition in organizations keeps the newcomer busy with unnecessary daily problems.	65
Daily pursuits hinder the innovative goals of the newcomer.	82.5
The antagonist inhibitions create chaos in innovation management.	72.5
Chaos reduces innovative moves.	82.5
Decreases in innovative movements negatively affect intellectual capital.	72.5

There are multivariate relationships that affect innovation management. Innovation is an activity that includes uncertainties in terms of its characteristic features. Employees are important in the realization of innovation activities. However, employees'

Table 4. Open-ended question (with participant number)

Unanswered	Disagree	Without in-depth Knowledge	Agree	Strongly Agree
(35.)	<p>(39.) No, I disagree. Change is continually happening in companies (especially in the last 20 years). A senior executive is always exposed to inertia for the company and knows how to avoid it. A reaction, as mentioned, cannot stop a government that has made a decision. Change and innovation are different things. I cannot see a consistent chain of argumentation here. Chaos is a particularly preferred prerequisite in some innovative sectors.</p> <p>(28.) The antagonist coalition can sometimes also create an opposition benefit to sense the problem and save the situation with minimal damage.</p>	<p>(12.) I do not have in-depth knowledge.</p>	<p>(30.) Partially agree</p> <p>(29.) Whether it creates chaos or not, in my opinion, depends on the attitude of the innovative leader. If a leader is fully committed, he knows how to motivate employees and overcomes the barriers to innovation.</p> <p>(26.) It depends</p> <p>(19.) Yes, he can, even partially. However, to change, this chaotic environment must occur.</p>	<p>(40.) Yes, there is a reaction against change</p> <p>(38.) Every change faces resistance, but not every change creates innovation.</p> <p>(37.) It creates chaos in the innovation process as a common goal is not adopted, and it prevents participation at all levels.</p> <p>(36.) Yes, it is necessary to prepare the working groups before the change for this change.</p> <p>(34.) Yes, it does. In innovation, the spirit of group work / acting together is at the forefront rather than individual activities. An antagonistic activity or grouping prevents the institution's sense of unity or solidarity for innovative activities or at least prolongs the process.</p>
(32.) (6.)	<p>(27.) (16.) (13) No</p>		<p>(14.) Yes</p> <p>(8.) It can also trigger</p>	<p>(33.) Yes. The antagonist coalition, which does not want its status to change, is completely closed to new views. The main thing for them is to preserve their status. If they were already open to change and development, they would provide the business's necessary innovation, and no new would be needed. In any case, the status quo is the biggest obstacle to innovation and the primary source of all kinds of chaos.</p> <p>(32.) (31), (25), (21), (20), (17), (15), (10) yes</p>
				<p>(24.) It is true because ambitions, not ideas, compete on uncooperative grounds. In the war of ambitions, nothing but a Pirus victory can be achieved.</p> <p>(23.) Yes, but innovation thrives if the manager manages the chaos.</p> <p>(22.) Absolutely yes. Individuals' antagonistic attitudes damage collective progress and corporate interests, while employees in corporate belonging and motivation are also negatively added. Splinter groups act in line with the interests of the group they feel belong to, rather than the institution's goals and objectives, damaging the institutional structure, excluding people who are not from their "group", and even causing an unfavorable deviation of their career goals.</p>

thinking of innovations as a risk for themselves will reduce the manager's impact on innovative activities. As innovation exists with uncertainties due to its nature, the new manager's processes to deal with these groups will blind the intellectual capital.

If there is too much criticism in an organization, the development team can face chaos in generating good product ideas. In such cases, the antagonists' role is that in innovation projects, the employee strongly opposes the workflows and causes negative emotions by disrupting or silencing the work. These antagonists try to influence innovation with their opposition. The scarcity,

Table 4. Open-ended question (with participant number) Page.2

Unanswered	Disagree	Without in-depth Knowledge	Agree	Strongly Agree
	(4.) No, The monotony of the antagonistic effect increases innovation by creating an effect against self-repetition and banality.			(18.). Continuous opposition can create frustration and counter-cooling in managers and other employees, and a sense of failure may spread.
				(11.) Yes. It causes a loss of energy, capital, labor, and motivation. An idealist starting manager, thinking that innovation will not happen with this team, can suspend or postpone the project or even cancel it.
				(9.) Coalitions always face self-interest. Innovative agreements are not accepted.
				(7.) It certainly creates chaos for a newcomer to have his own rules and procedures implemented before a specific adaptation process is completed. Following the adaptation process is passed in the first place, and after the team spirit is formed, the necessary ideas and evaluations should be made to create a cooperative environment. Then, innovative activities should be handled as a team. Today, it is impossible for individual innovation activities to reach the result/success without spreading it to the team. This is only possible with the coordination of a leader and a team-oriented towards the same goal with effective communication and respect.
				(5.) I agree that informal groups of employees in the organization act for the benefit of the daily self, not for the organizational benefit. They are not rational but reactive.
				(3.) The incompatible work of organizations and their efforts to abandon the past naturally cause chaos.
				(2.) Yes, it creates chaos. People become so much time and effort that they cannot even concentrate on their work with the rightful or unjust opposing structures in the organization, managing human relations. Unable to follow innovations, they move away from vision, and as a result, they become blunted in innovation. This process in businesses always causes chaotic and troubled environments, such as falling into a dead end.
				(1.) I agree with this view. Employees resist change. If you do not direct the innovative needs of the institution, they may not see it.

interdependence, and heterogeneous conditions of innovation goals are broad causes of innovation chaos. Conflict and political behavior stall innovative activities when individuals oppose innovation.

The results of the research show that an antagonist attitude toward the newcomer is formed in enterprises. This attitude negatively affects innovation. It will be difficult for managers to struggle with these cooperative antagonist groups, and as a result, the disruption of intellectual accumulation will create chaos in innovation.

Survey results can vary widely according to different education, sectors, and cultures. In other countries, with a larger sample,

the questionnaire's administration may be useful to validate the hypothesis. Besides, studies from a broader perspective can be conducted to introduce the concept of "antagonist coalition in organizations", which the researcher tried to emphasize in the literature.

In the literature review, no similar study has been found on these antagonist structures that drive innovation into chaos. Since a scale measuring this structure could not be found, a new concept was created to fill the gap. In this study, some expressions were developed to analyze this.

This concept, introduced by the researcher, can be made widespread by transforming the questionnaires into a scale. An in-depth investigation of such analyses that will remove similar innovation barriers in organizations will contribute to innovation management.

Peer Review: Externally peer-reviewed.

Conflict of Interest: The author has no conflict of interest to declare.

Grant Support: The author declared that this study has received no financial support.

REFERENCES

- Anderson, N. Potocnik, K. & Zhou, J. (2014). Innovation and Creativity in Organizations: A state-of-the-Science Review, Prospective Commentary and Guiding Framework. *Journal of Management*, 40(5), 1297-1333. <https://doi.org/10.1177/0149206314527128>
- Antunes, H. D. J. G. & Pinheiro, P. G. (2020). Linking Knowledge Management, Organizational Learning and Memory. *Journal of Innovation & Knowledge*, 5(2), 140-149. <https://doi.org/10.1016/j.jik.2019.04.002>
- Aragón-Sánchez, A., & Sánchez-Marín, G. (2005). Strategic Orientation, Management Characteristics, and Performance: A Study of Spanish SMEs. *Journal of Small Business Management*, 43(3), 287–308.
- Baxter, P. (2003). The Development of Nurse Decision Making: A Case Study of a Four Year Baccalaureate Nursing Programme. Unpublished Doctoral Thesis, McMaster University, Hamilton, ON. <http://hdl.handle.net/11375/6027>
- Bonacich, E. (1972). A Theory of Ethnic Antagonism: The Split Labor Market. *American Sociological Review* 37(October), 547-59 . <https://doi.org/10.2307/2093450>
- Crain, C. M., Kroeker, K. & Halpern, B. S. (2008). Interactive and Cumulative Effects of Multiple Human Stressors in Marine Systems. *Ecology Letters*, 11(12), 1304–1315. <https://doi.org/10.1111/j.1461-0248.2008.01253.x>
- Cormican, K., & O'Sullivan, D. (2003). A Collaborative Knowledge Management tool for Product Innovation Management. *International Journal of Technology Management*, 26(1), 53-67. <https://doi.org/10.1504/IJTM.2003.003144>
- Costa, P. T., Jr. & McCrae, R. R. (1985), The NEO Personality Inventory Manual. *Odessa, FL: Psychological Assessment Resource*.
- Crain, C. M., Kroeker, K. & Halpern, B. S. (2008). Interactive and Cumulative Effects of Multiple Human Stressors in Marine Systems. *Ecology Letters*, 11(12), 1304–1315. <https://doi.org/10.1111/j.1461-0248.2008.01253.x>
- Damanpour, F. (1991). Organizational Innovation: A Meta-Analysis of Effects of Determinants and Moderators. *Academy of Management Journal*, 34 . <https://doi.org/10.5465/256406>.
- Damanpour, F. (2017). Organizational Innovation. In *Oxford Research Encyclopedia of Business and Management*.
- Dearnley, C. (2005). A reflection on the use of Semi-Structured Interviews. *Nurse researcher*, 13(1). <https://doi.org/10.7748/nr2005.07.13.1.19.c5997>
- Dickel, D. G., & de Moura, G. L. (2016). Organizational Performance Evaluation in Intangible Criteria: A Model Based on Knowledge Management and Innovation Management. *RAI Revista De Administração E Inovação*, 13(3), 211-220. <https://doi.org/10.1016/j.rai.2016.06.005>
- Dolan S. & Garcia S. (2003). An Auerbach, Understanding and Managing Chaos in Organisations. *International Journal of Management*. 20(1), 2.
- Edvinsson, L. & Sullivan, P. (1996). Developing a Model for Managing Intellectual Capital. *European Management Journal*, 14(4). [https://doi.org/10.1016/0263-2373\(96\)00022-9](https://doi.org/10.1016/0263-2373(96)00022-9).
- Gorry, G. A. & Westbrook, R. A. (2013). Customers, Knowledge Management and Intellectual Capital. *Knowledge Management Research & Practice*, 11(1), 92–97. <https://doi.org/10.1057/kmrp.2012.14>.
- Graziano, W. G., & Eisenberg, N. (1997). Agreeableness: A dimension of Personality. In R. Hogan, J. Johnson, & S. Briggs (Eds.), *Handbook of Personality Psychology* (pp. 795–824). *Academic Press*: San Diego, CA. <https://doi.org/10.1016/B978-012134645-4/50031-7>
- Hamel G. (2000). *Leading the Revolution*. Harvard Business School Press, Boston: MA
- Jardon, C. M. (2015). The Use of Intellectual Capital to Obtain Competitive Advantages in Regional Small and Medium Enterprises. *Knowledge Management Research & Practice*, 13(4), 486–496. <https://doi.org/10.1057/kmrp.2014.4>
- John, O. P. & Srivastava, S. (1999). The Big Five Trait Taxonomy: History, Measurement, and Theoretical Perspectives. *Handbook of Personality: Theory and research*, 2,102-138.
- Katila, R. & Shane S.(2005). When Does Lack of Resources Make New Firms Innovative? *Academy of Management Journal*, 48 (5), 814–29. <https://doi.org/10.5465/amj.2005.18803924>.
- Labovitz, S. & Hagedorn, R. (1975). A Structural-Behavioral Theory of Intergroup Antagonism. *Social Forces*, 53(3), 444–448. <https://doi.org/10.1093/sf/53.3.444>.

- Liu, D., Gong, Y., Zhou, J. & Huang, J. C. (2017). Human Resource Systems, Employee Creativity, and Firm Innovation: The Moderating Role of Firm Ownership. *Academy of Management Journal*, 60(3), 1164-1188. <https://doi.org/10.5465/amj.2015.0230>.
- Levitis, D. A., Lidicker Jr, W. Z., & Freund, G. (2009). Behavioural Biologists do not Agree on What Constitutes Behaviour. *Animal Behaviour*, 78(1), 103-110. <https://doi.org/10.1016/j.anbehav.2009.03.018>
- Lynam, D. R., & Miller, J. D. (2019). The Basic Trait of Antagonism: An Unfortunately Underappreciated Construct. *Journal of Research in Personality*, 81, 118-126.
- McIntosh, M. J., & Morse, J. M. (2015). Situating and Constructing Diversity in Semi-structured Interviews. *Global Qualitative Nursing Research*, 2, <https://doi.org/10.1177/2333393615597674>.
- Markham, S. K. (2000). Corporate Championing and Antagonism as Forms of Political Behavior: An R&D Perspective. *Organization Science*, 11(4), 429-447. <https://doi.org/10.1287/orsc.11.4.429.14599>.
- Miles, M. B. & Huberman, A. M. (1994). *Qualitative Data Analysis: An Expanded Sourcebook*. Thousand Oaks, CA: Sage Publications.
- Morse, J. M. (2012). The Implications of Interview Type and Structure in Mixed-method Designs. *The SAGE Handbook of Interview Research: The Complexity of the Craft*, 193-204.
- Morse, J. M., & Niehaus, L. (2009). *Mixed-method Design: Principles and Procedures*. Thousand Oaks, CA: Left Coast Press.
- Montag, T., Maertz, J. C. P. & Baer, M. (2012). Critical Analysis of the Workplace Creativity Criterion Space. *Journal of Management*, 38(4), 1362-1386. <https://doi.org/10.1177/0149206312441835>
- Parks, C. D., Joireman, J. & Van Lange, P. A. (2013), "Cooperation, Trust and Antagonism How Public goods are Promoted". *Psychological Science in the Public Interest*, 14(3), 119-16. <https://doi.org/10.1177/1529100612474436>
- Pervaiz, K. A (1998). Benchmarking for Quality. *Management & Technology*, 5(1), 45-58.
- Roos, J., Roos, G., Dragonetti, N. C. & Edvinsson, L. (1997). *Intellectual Capital, Navigating the New Business Landscape*, Macmillan Business, London : Springer.
- Sarantakos, S. (2005). *Social Research*. 3rd edn, Palgrave Macmillan, New York.
- Silverman, D. (2000). *Interpreting Qualitative Data: Methods for Analysing Talk, Text, and Interaction*. Thousand Oaks, CA: SAGE. <http://nbn-resolving.de/urn:nbn:de:0114-fqs010363>
- Smith, S. & Paquette, S. (2010). Creativity, Chaos, and Knowledge Management. *Business Information Review*, 27(2), 118-123. <http://doi.org.10.1177/0266382110366956>
- Stake, R. E. (1995). *The Art of Case Study Research*. Thousand Oaks, CA: Sage.
- Styhre, A. (2007). Against the Antagonist View of Professional – Manager Relationships: The Case of the Culture Industry. *Human Resource Development*. 10(4), 401-416. <https://doi.org/10.1080/13678860701718794>.
- Subramaniam, M. & Youndt, M. A. (2005). The Influence of Intellectual Capital on the Types of Innovative Capabilities. *Academy of Management Journal*, 48(3), 450-463. <https://doi.org/10.5465/amj.2005.1740791>.
- Thiéart, R. A. & Forgues, B. (1995). Chaos Theory and Organization. *Organization Science*, 6(1), 19-3. <https://doi.org/10.1287/orsc.6.1.19>.
- Turan, A. (2015). Examining the Impact of Machiavellianism on Psychological Withdrawal, Physical Withdrawal and Antagonistic Behavior. *Global Business and Management Research*, 7(3), 87.
- Turner D.W. (2010) Qualitative Interview Design: A Practical Guide for Novice Researcher. *The Qualitative Report*, 15(3), 754-760.
- Wilson, J. (1966). Innovation In Organizations: Notes Toward A Theory. In James D. Thompson (Ed.), *Approaches to Organizational Design*. Pittsburgh: Pittsburgh University Press.
- Wolfe, R. A. (1994). Organizational Innovation: Review, Critique, and Suggested Research Directions. *Journal of Management Studies*. 31(3), 405-431. <https://doi.org/10.1111/j.1467-6486.1994.tb00624.x>
- Wu, W.Y., Chang, M. & Chen, C. (2008). Promoting Innovation Through the Accumulation of Intellectual Capital, Social Capital and Entrepreneurial Orientation. *R&D Management* 38(3), 265-277. <https://doi.org/10.1111/1467-9914.00120-i>
- Wu, W., Liu, Y., Kim, Y. & Gao, P. (2018). How Does Emotional Conflict Affect Innovation Behavior? *International Journal Of Conflict Management*, 29(3), 327-346. <https://doi.org/10.1108/IJCMA-09-2017-0094>
- Yoo, H.-J., Sim, T., Choi, A., Park, H.-J., Yang, H., Heo, H. M., . . . Mun, J. H. (2016). Quantifying Coordination Between Agonist and Antagonist Muscles During A Gait. *Journal Of Mechanical Science And Technology*, 30(11), 5321-5328. <http://dx.doi.org/10.1007/s12206-016-1156-8>.

How cite this article

Yüksel, A. (2023). Intellectual capital and chaos of innovation: antagonist coalition in organizations. *Istanbul Management Journal*, 94, 16-27. <http://doi.org/10.26650/imj.2023.94.002>