

COOPETITION DURING THE PANDEMIC: DYNAMICS OF COOPETITIVE RELATIONSHIPS UNDER UNCERTAINTY

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Purpose: The paper aims to examine the dynamics of coopetitive relationships in a high level of environmental uncertainty caused by COVID-19 pandemic. We focus on three research questions: Does uncertainty influence coopetitive practices? What are the primary cooperation areas between competitors under uncertainty? Are the changes in coopetitive behaviour permanent or temporary?

Design/methodology/approach: A qualitative, cross-case study design (n = 18) was used to explore this topic. We conducted semi-structured in-depth interviews with key informants (PAPI technique).

Findings: Our findings suggest that pandemic-induced uncertainty had a neutral to positive effect on coopetitive behaviour. Most companies either maintained or increased their collaboration levels, often significantly. The main cooperative areas encouraged by the pandemic included open information exchange, joint lobbying efforts on legal issues, and subcontracting work among competitors. The durability of these changes is uncertain as many firms reverted to pre-pandemic cooperation levels. On the other hand, some managers reported the development of a collaborative rather than confrontational mindset what suggests potential for sustained coopetition.

Research limitations/implications: This study is limited by its qualitative, case-study approach, which constrains generalisability and may include respondent subjectivity. Additionally, the research focused on a single country, meaning multinational studies are needed to verify universal applicability, as coopetitive behaviours can vary by national context.

Originality/value: The main contribution of this paper is the identification of the main areas of coopetition and the examination of its dynamics and durability in the highly unpredictable environment during the pandemic. The study referred to pandemics and its consequences, however, the research results could be applicable to other highly uncertain environments, e.g. wars, natural disasters, political upheaval and other environmental shocks.

Keywords: coopetition, cooperation, uncertainty, relationship development.

Category of the paper: Research paper.

1. Introduction

The growing body of research on coopetition resulted in the development of many theoretical concepts and empirical evidence in the field (e.g. Bengtsson, Kock, 2014; Czakon, Mucha-Kuś et al., 2014; Fernandez, Chiambaretto, 2016; Gnyawali et al., 2016; Padula, Dagnino, 2007; Raza-Ullah et al., 2014; Ritala et al., 2017; Luo, 2007; Tidström, 2014). Systematic literature reviews have demonstrated a significant increase in the number of papers focusing on various aspects of coopetition, including its nature, forms, and challenges (Bengtsson et al., 2013; Czakon et al., 2014; Czakon, Rogalski, 2014; Della Corte, 2018; Tidström, 2014). Additionally, considerable attention has been given to drivers and outcomes of coopetition (Dorn et al., 2016; Gnyawali, Park, 2009; Ritala, Hurmelinna-Laukkanen, 2013).

Previous studies demonstrated the evidence of coopetition in different environments and sectors, including both more stable industries and also sectors of high speed and high change, e.g. automotive, airlines, tourism, construction, aerospace, IT, etc., allowing researchers to identify various forms or types of coopetition (Akpınar, Vincze, 2016; Chiambaretto, Dumez, 2016; Chim-Miki, Batista-Canino, 2017; Dorn et al., 2016; Klimas, 2014; Munten et al., 2021; Soltani et al., 2017). However, the pandemic and post-pandemic times were unique in terms of uncertainty and market turbulence, environmental shocks, law restrictions, and resource shortage (Crick et al., 2023). In this context, the pandemic-triggered coopetition seems to be a unique phenomenon and this topic constitutes an interesting research gap.

The purpose of the study is to examine cooperative relationships' dynamics in a high level of environmental uncertainty resulting from the COVID-19 pandemic and the post-pandemic period. Thus, in our study, we focus on the general environment and external drivers of the development of dyadic cooperative relationships between market rivals (inter-organisational level). Consequently, the following research questions have been formulated:

- RQ1. Did the pandemic, along with its consequences (e.g. lockdowns, restrictions), contribute to coopetition between market rivals?
- RQ2. What were the main areas of cooperation between rivals during the pandemic? Were they unique?
- RQ3. How did cooperative relationships change during the pandemic and post-pandemic times? What was the durability of cooperative relationships?

To achieve the formulated goal and answer the research questions, we conducted empirical research using a qualitative approach. Due to the exploratory nature of the study, a cross-case study research design ($n = 18$) with semi-structured individual in-depth interviews (IDIs) with key informants was employed. The PAPI technique was used to gather empirical data. Interviews were coded and analysed following a multi-stage procedure (Creswell, 2008), and the researchers' triangulation technique was used to avoid subjectivity and individual bias.

The main contribution of this paper is the identification of the main areas of cooperation within cooperative relationships and the examination of their dynamics in the highly unpredictable environment during the pandemic. The study referred to pandemics, however, the research results and conclusions could be applicable to other highly uncertain environments, e.g. war and related restrictions, natural disasters, and other environmental shocks.

The paper is organised as follows. In the first section, the literature on coopetition was critically reviewed focusing on its nature, areas of cooperation, as well as dynamics of cooperative relationships. The second section presents the research design and methods used. In the next sections, the results of the empirical study on pandemic-triggered coopetition were presented and discussed, respectively. Finally, in the conclusion section, a summary of findings, research limitations and directions for further research have been highlighted.

2. Theoretical background

2.1. Coopetition – nature, drivers, and outcomes

Coopetition has been defined as the simultaneous pursuit of cooperation and competition between firms (Brandenburger, Nalebuff, 1996) or a relationship simultaneously containing elements of both cooperation and competition (Bengtsson, Kock, 1999). Bengtsson et al. (2010) underline that the companies involved in coopetition are cooperating and competing at the same time but in different activities or fields. This approach corresponds to the strategy of spatial separation in terms of dealing with paradoxes (Poole, Van de Ven, 1989; Smith, Lewis, 2011). Simultaneously, the literature acknowledges that the coopetition strategy is a much more complex and multifaceted phenomenon (Chin, Chan, Lam, 2008). It is viewed as a unique relational approach that goes beyond pure competition or collaboration and allows combining the advantages of both strategies (Chen, Miller, 2015; Lado et al., 1997). Consequently, coopetition has been depicted as a paradoxical approach (Gnyawali et al., 2016; Raza-Ullah et al., 2014) contradicting the idea of the traditional competitive strategy.

Prior literature provides a diverse list of drivers and antecedents of coopetition. For example, Dorn et al. (2016) differentiate three groups of antecedents: market conditions (e.g. environmental aspects, regulators, and laws), dyadic aspects comprising relationship-specific factors, and also individual aspects that determine willingness, likelihood, and capability to develop cooperative relationships with rivals. Additionally, various industry-related factors, such as short product life cycles, technological convergence, and high R&D costs, can push rival firms to engage in collaboration (Luo, 2007; Gnyawali, Park, 2009).

Coopetition can be identified on different levels, i.e. inter-organisational (network, dyadic), intra-organisational, team-level, and individual (Dorn et al., 2016), however, most studies on coopetition in the management literature focus on the inter-organisational level (Czakon, Mucha-Kuś, 2014; Devece et al., 2019), and our research contributes to the same stream of literature.

Research findings support a positive correlation between coopetition and various positive outcomes. It has been shown to contribute to performance enhancement, market share expansion, the development of new technologies and products (Gnyawali, Park, 2009; Robert et al., 2009; Meade, Hyman, Blank, 2009; Ritala, 2012), and enhanced effectiveness in organisational activities like marketing, logistics, and management control (Chiambaretto et al., 2016; Wilhelm, 2011; Grafton, Mundy, 2017). Moreover, coopetition plays a vital role in establishing new markets and industries by facilitating the development of shared technological infrastructures, platforms, and standards (Christ, Slovak, 2009; Ondrus et al., 2015; Ritala et al., 2009).

2.2. Areas of cooperation between rivals

Coopetition literature names numerous areas of cooperation between rivals (Morris et al., 2007; Rudny, 2015), e.g. new product development (e.g. high-tech industry; engineering projects), conducting projects that exceed the capabilities of a single company (e.g. construction industry; aviation), building a common resource base (e.g. tourism sector; healthcare), building a bargaining power (e.g. purchasing groups), cost and risk sharing (e.g. automotive industry), common marketing activities (e.g. retail; hotels and restaurants), knowledge exchange and technology transfer (creative sectors; start-ups). Additionally, market rivals can cooperate in the areas that are not strictly related to the market-product framework and their core business, for example, engaging in various CSR activities: charity actions, sponsoring, or social events (Rossman et al., 2018).

2.3. Dynamics of cooperative relationships

Many studies have shown coopetition as a dynamic phenomenon (Bengtsson et al., 2010; Bengtsson, Raza-Ullah, 2016; Padula, Dagnino, 2007). Cooperative relationships evolve as coopetitors reconfigure their relational interdependencies over time (Kylänen, Rusko, 2011; Rajala, Tidström, 2017), but their development differs from cooperative inter-organisational relationships (Chen et al., 2019). In consequence, both early models of the relationship life-cycle (e.g. Dwyer et al., 1987; Ford, 1980; Ring, Van de Ven, 1994; Wilson, 1995) and also later concepts of relationship development (e.g. Ferreira et al., 2017; Plewa et al., 2013) seem to be insufficient to describe the development and changes of complex and paradoxical cooperative relationships. Dorn et al. (2016) examined different level-dependent evolution patterns of coopetition and differentiated four main phases: (1) antecedents for coopetition, (2) initiation, (3) managing and shaping, and (4) evaluation phase. Moreover, coopetition

includes multiple tensions (Czakon, 2014) and may lead to conflicting roles, opportunistic behaviours, and knowledge leakage. As a result, it is seen as an unstable and fragile relationship (Akpınar, Vincze, 2016; Fernandez et al., 2014; Tidström et al., 2018).

3. Research design and methods

Due to the exploratory nature of the research, the study follows a qualitative approach based on a cross-case study research design. The purposefully selected research sample contained 18 large and medium-sized companies with domestic capital and independence in developing and implementing strategies (branches of foreign corporations and state-owned companies were excluded from the study). Due to the guidelines for selecting research objects for the cross-case study, the purposefully selected sample included companies from various industries (Gerring, 2007). The main characteristics of the studied companies and interviewees are presented in Table 1.

Table 1.
Characteristics of the studied companies and interviewees

ID	Industry and profile	Position, gender and age
R1	Waste management	CEO, F_50
R2	Funeral industry	Owner/CEO, M_44
R3	Coworking, office and conference room rental	Managing Director/Board Member, F_40
R4	Leather goods and clothing - production and sales	CEO, M_44
R5	Pharmaceutical production	Operations manager, M_N/A
R6	Construction - developer	CEO, M_49
R7	New technologies - production and sales	Owner, F_40
R8	Organic food - production and sales	CEO, M_49
R9	Beauty/cosmetics - production and sales	Owner, M_51
R10	Business services - cleanliness, security, other	CEO, founder, M_62
R11	Delicatessen production, deliveries to chain stores	CEO, M_37
R12	Financial, B2B	President, M_44
R13	Loyalty programs, cooperation with stores and petrol stations	Leadership team member, M_44
R14	Financial - supplier of services and equipment	Key account manager, M_40
R15	Construction - wholesale of materials	Vice president, M_40
R16	Electric/construction - wholesale chain	Founder and co-owner, M_69
R17	Energy technologies, photovoltaics	Managing director, M_N/A
R18	Construction - production of concrete materials	President and co-owner, F_41

Source: authors' own.

The primary data collection technique was individual semi-structured in-depth interviews (IDIs). The interlocutors treated as key informants were company owners and top managers with a dominant influence on the company's strategy (the fact was confirmed in a telephone screening survey preceding the interview). The research was conducted using the PAPI technique in the form of face-to-face meetings or using remote communication tools (Zoom), in 2022. The average duration of the interview was approximately 60 minutes.

The interviews were recorded and transcribed, then coded and analysed following a multi-stage procedure (Creswell, 2009). In the process of coding the interviews, codes were developed using a mixed approach, i.e. theory-driven combined with data-driven (Eriksson, Kovalainen, 2016). Each interview was analysed and coded independently by three members of the research team due to the researchers' triangulation technique.

This procedure was developed as part of the research project "Dualisms and Paradoxes in Strategic Management", carried out in 2021-2022 by a research team from the Department of Strategic Management at Wroclaw University of Economics and Business, of which the Authors were the members. Then, the interview data was reused and re-coded for the purpose of the analysis on the topic of coopetition under uncertainty.

4. Research findings

Analysis of the research results was guided by the purpose of the study, which was to examine the dynamics of coooperative relationships in a high level of environmental uncertainty resulting from the COVID-19 pandemic and the post-pandemic period. The following research questions became a framework for the presentation of the findings:

- RQ1. Did the pandemic and its consequences (e.g. lockdowns, restrictions) contribute to coopetition between market rivals?
- RQ2. What were the main areas of cooperation between rivals during the pandemic?
- RQ3. How did coooperative relationships change during the pandemic and post-pandemic times? What was the durability of coooperative relationships?

4.1. Pre-pandemic experiences with coopetition

The researched companies entered the pandemic with varied previous experiences and mindsets regarding coopetition. It was important to establish a baseline in order to recognise the changes brought about by the turbulence and uncertainty of the pandemic. The starting point turned out to be a wide variety of practices and attitudes, from no coopetition at all to coopetition within limited areas to coopetition as a leading business model.

Companies entering the pandemic with **no previous history of cooperation with competitors** usually attributed it to the specifics of the industry or a moment in the company's life cycle. *The industry is very competitive, and you don't cooperate with this competition on a daily basis [R14]. (There is) no cooperation. The nature of the industry is such that we are clearly in competition with each other [R6]. We are definitely in the competition model (...) As a company (...), we treat ourselves as market leaders, and we do not need to look for elements that would allow us to obtain added value through cooperation with the competition. It would not be a win & win situation, we try to create the market and get ahead of the competition [R12].*

Other companies on the verge of the pandemic described some **limited experiences with coopetition**. The main fields of such cooperation included participation in industry and employers' associations, joint legal actions and PR projects. Particularly membership in industry organisations was emphasized: *I am a great supporter of activating employers' organisations, establishing think tanks (...) I always participate as the chairman of the chamber's council, I am a member of the Polish Employers' Federation, (...) I was twice the vice-president of employers of the Republic of Poland (...) I believe that despite the small influence of employers on reality caused by the approach of successive governments or the culture of our nation (...) cooperation with competitors is, in my opinion, very effective* [R10].

Such organisations were primarily perceived as instrumental in achieving representation and lobbying influences. *The industry discusses its issues, identifying what should be reported to the regulator* [R14]. *We have industry organisations and they are for shared legal interests as the industry is decidedly overregulated* [R1]. *If we need regulations that are clearly essential for survival, we also come together very easily. Then we achieve representativeness, (...) we prepare expertise jointly, create various budgets to develop a legislative solution (...) at a high level—one that can be presented to parliament* [R10]. Joint actions in the common interest of the industry may also refer to the industry's public image: *In terms of PR, in the debt management industry, we had a project on how to change the image of debt collection companies, which are often seen as bad actors taking money from consumers and businesses. (...) Ultimately, 20 companies were involved in this project, sharing information, business models, and prospects for market development. This information was collected, and a comprehensive report was prepared (...), which was communicated to various organisations and ministries. Thanks to this, the image of the industry (...) changed somewhat* [12].

The third type of cooperative experiences included **business cooperation with competitors**. Three types of business relationships were described:

- Subcontracting work or providing services to competitors: *If we are not able to produce something ourselves due to our production capabilities, (...) then we turn to, let's call them, befriended competitors to whom we outsource or subcontract these activities and the ability to produce for our client* [R5]. *Now we have changed our strategy to more cooperation with competitors, we also provide services to competitors* [R2].
- Deliberate business model based on coopetition: *We have 7 thousand products, of which 700 are under our brands, and 6300 are in the so-called distribution. We distribute our competitors' products, and they distribute ours* [R8].
- Joint R&D: *We are looking for various advantages, entering into partnerships with companies (...) to find a better and cheaper service for the customer; we are looking for new methods* [R1].

Concluding, our findings confirmed that the development of coopetition is strongly industry and context-dependent.

4.2. Pandemic's impact on the scope of coopetition

We anticipated that the pandemic would trigger changes in cooperative behaviour and mindsets. Indeed, the conditions created by the pandemic influenced the way many companies felt about the need for cooperation. The impact on the scope of coopetition was, however, multifold and surprising. In our sample, we observed three different responses to the pandemic, regarding the scope of coopetition:

- Increased cooperation.
- Decreased cooperation.
- No change in cooperative behavior.

Many companies experienced **increased cooperation** during the pandemic. The respondents' language brought up the associations with the need for uniting in the face of a catastrophe or a war. The companies felt they were *creating a common front* [R10] against the *common enemy: the pandemic, (...) the government and landlords* [R4], being *very alert, not to miss anything* [R13], and acting out of the *defensive instinct (...) in a tragic situation* [R4]. In this context, the pandemic's triggering effect was evident, acting like a magnifying glass or an accelerator: *The pandemic was kind of a turbocharger for the cooperation* [R10], when *both of them (cooperation and competition) intensified* [R14] and *everything felt a bit more saturated* [R14]. The respondents admitted that *uncertainty encourages cooperation* [R10] and *the pandemic definitely caused most companies to integrate (...) (as they) had similar problems from the perspective of running a business* [R4]. As a result – *the increase in collaboration during the pandemic was significant and the industry debated* [14].

Increased cooperation, however, was not always the outcome. Uncertainty and threats to the company's survival also created a cornering effect. Instead of cooperation and integration – some companies observed the opposite - a shift toward **more aggressive competitive behaviour**. *Everyone is much more alert now to avoid missing out on anything, much more than before the pandemic* [R13]. *A lot of imitation appeared in the industry. If someone did something, most others started copying it to avoid falling behind. (...) Scrutinising (what others are doing) and copying things—imitation has intensified. There was no cooperation or sharing here. (...) This intensified greatly, while in normal times, companies had their own ideas. Everyone was afraid that they might miss something due to the risk and market uncertainty* [R13].

Interestingly enough, in both of the above approaches – the goal was to stay up to date with how others are dealing with uncertainty and look for inspiration for out-of-the-box solutions. Except in the case of increased cooperative behaviour, it was accompanied by positive sentiment and a sense of community and unity (joint front, joint enemy, win-win), whereas in the case of increased aggressive competition – the sentiment was threat, fear and zero-sum game perception of the situation.

Not in all the cases, however, did the pandemic bring a change in cooperative dynamics. Many of the interviewees reported a lack of influence of the pandemic either on the so far cooperative or non-cooperative strategies. In the case of very competitive young industries, the pandemic **didn't change the no-cooperation** approach: *We had model A (competition) and still have model A. (...) Regardless of the pandemic or war, the industry is very young and is under intense pressure for competition [R18]. No (cooperation). The nature of the industry is such that we clearly compete with each other [R6]. No (changes during the pandemic). There is some level of cooperation, but we don't discuss product matters; it's a very competitive, dispersed business (...) and the pandemic didn't change that [R15].*

On the other hand – in the case of some companies who had built their business model on cooperation with competitors – the pandemic didn't influence its scope, and such companies **continued their cooperative practices**: *The pandemic did not change anything, companies that wanted to cooperate with us - continued to cooperate, those that did not want to - did not. The pandemic had no impact [R2].*

4.3. The main areas of cooperation with rivals during the pandemic

Our interviewees pointed out the three most important areas of cooperation practised during the pandemic:

- Open information exchange and debate
- Lobbying, legal matters, and communication with the government
- Business cooperation in the form of subcontracting or subletting

The most dynamic area of cooperation, particularly specific to the pandemic times, was **open information exchange**. This seemed to be the area with the biggest change compared to the pre-pandemic period. A sudden disruption in business and legal conditions, combined with high uncertainty about how the situation was going to develop, served as a strong motivator to openly communicate with competitors and jointly look for new solutions or discuss the consequences for the industry: *In the initial six months of uncertainty and stress, everyone wanted to see what was happening with others; there was quite a lot of honesty and openness in comparing situations, asking, 'How are things going for you?' We compared results, I spoke openly, and I received similar information from others [R4]. We had many discussions, and sometimes I participated in two meetings at once because there was a new legal project they wanted to discuss. I won't deny that there were more friendly phone calls from the industry, asking what we were doing, how we were operating, how clients were behaving [R12].* The casual exchange of information was also accompanied by the active seeking of new ways of functioning and new business models: *From the first weeks of the lockdown, when turnover drastically dropped, we had to engage in unconventional thinking and look for various solutions. We travelled around, talked with the competition, and managed to establish some (new) agreements [R11].*

Another prevalent area of cooperation with rivals during the pandemic was **lobbying and joint representation of the industry's legal interests** with the government. The intensity of cooperation in this area increased significantly and became a necessity, not an option, especially at the beginning of the pandemic, when new conditions and regulations were shaping. *The first steps we took at the beginning (...) - we decided it would be good to unite, to be a voice that could engage with our government and with landlords. We created an association that brought together over 150 Polish companies [R4]. The industry had to consolidate to ensure that the government wouldn't do anything to hinder its operation. For instance, the industry argued that it was crucial for the economy and that it could not be entirely shut down in terms of office operations. The industry sought more rights for itself compared to other sectors [R14].* This kind of approach was necessary to secure the industry's interests and to have its voice heard. *In this uncertainty, protective measures need to be simply effective, which happens when an industry that represents a certain type of service (...) thinks together, collectively, establishing a roughly unified policy and direction [R10].*

Subcontracting work or seeking opportunities to become a subcontractor was another way in which the companies cooperated in the pandemic. Significant disturbances in orders and the supply chain, combined with staff fluctuations resulting from lockdowns and illness, disrupted the usual organisational balance. Many organisations experienced orders shortages, while others were understaffed, which opened new cooperation possibilities. *Today, we opened ourselves up to making products for others, something we hadn't done before. We had the idea, but (now) we had no choice; we had to find customers [R9].* This kind of collaboration, however, turned out to be more difficult as it demanded trust. In industries with trust issues – even impossible: *I tried to collaborate with one of the competitors by borrowing their employees, but I only ended up scaring them. I received feedback that they wouldn't go in that direction. They were simply afraid that I would take over their employees. The idea was that I had orders, and they didn't at that time, so I proposed that since I was short-staffed but not permanently, I'd gladly borrow their employees for six months or three months, during the period when I had increased demand. But it turned out I only frightened the competition. It seemed normal to me; I didn't see anything wrong with it. (...) I tried it this one time, and it didn't work out [R5].*

4.4. Dynamics of the pandemic and post-pandemic cooperative relationships

The uncertainty associated with the pandemic proved to be a disrupting factor in terms of cooperative behaviour. For most of our interviewees, it either increased their willingness to collaborate with competitors or maintained their pre-pandemic level of cooperation. Certain areas of collaboration became particularly characteristic, such as the open exchange of information between competitors regarding their perspectives and responses to the situation, as well as joint lobbying efforts to advocate for the industry's interests in the legal turmoil.

The dynamics of these changes, however, raise further questions. Will closer cooperation also be sustainable after the pandemic, or was it merely an opportunistic behaviour? Did the pragmatics of collaboration in the face of danger succeed in increasing mutual trust and fostering a climate of openness also post-pandemic?

The research indicates that for many companies, the end of the pandemic meant a return to previous practices regarding coopetition. However, it's also noticeable that there is a certain level of "warming-up" of the relationships that prevailed beyond the pandemic. *In the initial six months of uncertainty and stress (...), there was quite a lot of honesty and openness in comparing situations, asking, 'How are things going for you?' (...). Once we moved past that period, it really changed back. But we still talk, we keep in touch—maybe not as much as before [R4]. During the pandemic, cooperation grew significantly; the industry was engaging in discussions. We met and checked in with each other, but I think things have now returned to how they were before [R14]. Nothing has really changed here; there are areas where we collaborate, but it's weaker. We're friendly, sometimes meet somewhere, and maybe it will change someday [R15].* The above examples, even though reporting the weakening of the pandemic-time collaboration, also express a certain positive sentiment that prevailed ("we keep in touch", "we are friendly", "we meet somewhere").

For some managers, the experience of coopetition during the pandemic was transformative on a personal level and had a profound impact on how they perceive the right and wrong of inter-organisational relations. *As a person, I'm definitely bolder now; when I negotiate or talk with someone, I speak with complete honesty from the start. (...) it's a much better way to live. (...) I believe that building relationships and creating networks helps restore a sense of community [R9]. The pandemic (...) somewhat forced this second style (collaboration), but it feels closer to me now. After all, you can sometimes create something valuable with competitors (...). I'm looking for opportunities to explore new ways of working together [R11]. Yes, I'm convinced this is the right path for development. The pandemic acted as a turbo boost for this collaboration, but we continue on this path, learning as we go, thinking more deeply (...). The idea is for each part to collaborate with every other part, and it's the same in the marketplace [R10].* The language the managers used may suggest that collaborative experiences from the pandemic encouraged their transition to a different, possibly more mature, values-driven approach to inter-organisational relations (Laloux, 2016; Greiner, 1972) and that such change may be sustainable.

5. Discussion and conclusions

The COVID-19 pandemic was an example of high uncertainty disruption to organisations' operations. It brought a sudden change of conditions in which businesses functioned both on macro, industry, organisational and personal levels. In our research, we wanted to find out if high uncertainty influences an organisation's readiness to cooperate with competitors and, if so – what are the main areas of cooperation and whether such changes are permanent.

Eighteen companies that we interviewed entered the pandemic with varied previous experiences of cooptition – from none to limited to incorporated into the business model. Our research showed that the uncertainty of the pandemic had a neutral to a positive impact on cooptitive behaviour, and the vast majority of companies either sustained the collaboration level or increased it, sometimes significantly. The scope of this cooperation was largely industry-dependent, with industry dynamics and stage in the life-cycle being the main contributing factors. This confirms previous studies showing cooptition as industry-dependent (Chim-Miki, Batista-Canino, 2017; Gnyawali, Park, 2009; Dorn et al., 2016; Klimas, Czakon, 2018).

The change in the cooptitive behaviour extended from “increased cooptition” to “no change in cooptitive strategies” to “decreased (or constricted) cooptition” in rare cases when the uncertainty provoked more aggressive competitive practices. We observed varied responses, with the prevalence of positive or neutral-positive impact on inter-organisational relationships. The main areas of cooperation with competitors triggered by the uncertainty of the pandemic were: the open exchange of information, joint lobbying efforts in legal matters and activities aimed at subcontracting and outsourcing of work to and from competitors. Particularly the open exchange of information between competitors on how they respond to the pandemic brought new value to cooptitive practice and could be considered the most characteristic of this uncertain situation. This, together with the lobbying efforts, could be considered less advanced levels of cooptitive behaviour and are characteristic of the beginning stages of cooperation, i.e. awareness or pre-relationship phases, in traditional relationship life-cycle models (Dwyer et al., 1987; Ford, 1980). This is an indication of future collaboration possibilities once the initial trust and rapport are built.

When it comes to the permanence of the changes in cooptitive behaviour, once the pandemic was finished, many of the interviewees reported a return to the previous level of cooperation with competitors; however, the sentiment seems to have changed. Some of the managers declared warm-up of their relationships with competitors, including increased contact, communication, and friendliness. Also, for some of the managers, the experience of collaboration during the pandemic had a personal transformative effect, leading to the appreciation of cooperation as a good path to follow and to the development of a collaborative rather than confrontational mindset (Colpaert et al., 2015; Iriyama et al., 2016) - possibly

moving the managers on the continuum of cooperative-competitive strategic thinking style (Tang, 1999). This opens an interesting line of future research on how uncertainty changes not only organisations but also individual strategists and the way they think and make decisions.

The permanence of the coopetitive practices that were observed during the pandemic is uncertain, which is in line with other studies presenting coopetitive relationships as dynamic and prone to change in any context (see e.g. Bengtsson, Raza-Ullah, 2016; Kylänen, Rusko, 2011; Tidström et al., 2018). The prevalence of positive connotations with collaboration for some managers, and the personal impact it had on others, indicate a possible increased level of trust between the actors and a higher likelihood of future coopetition.

The study contributes to the inter-organisational relationship literature in several ways. Firstly, it shows the uncertain time of the pandemic as a trigger of coopetition for organisations. This, however, remains an industry and context-dependent phenomenon. Secondly, it describes the development of coopetitive relationships during the turbulent time of the COVID-19 pandemic by identifying the main areas of cooperation and examining their dynamics in a highly unpredictable environment. What is important, the research results and conclusions drawn from studying the pandemic may be applicable to other highly uncertain environments, e.g., war, natural disasters, political upheaval and other environmental shocks.

The work has research limitations concerning e.g. limited generalisability, case selection, and subjectivity of the interviewees. However, the study was exploratory in nature, and the in-depth examination of interfirm coopetitive relationships allowed us not only to identify motives, areas of cooperation between market rivals, and the dynamics of coopetitive relationships at the organisational level, but also examine the mindset changes on the individual level. This direction seems to be appealing in terms of future studies on coopetition.

Our research was limited to one country, and according to previous studies, coopetition can vary depending on the country context (Czakoń, Mucha-Kuś, Rogalski, 2014; Dorn et al., 2016). In our case, some cultural factors, e.g. low level of social trust, may play a vital role in the development of coopetitive relationships between market rivals, which suggests extending research into a multinational context.

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