



A review of 50 years of research since Knickerbocker (1973): competitive dynamics in international business

Fiona Kun Yao¹ · Ming-Jer Chen² · Jiatao Li³ · Danielle Combs⁴ · Qiang Li⁵

Received: 10 June 2022 / Revised: 8 December 2023 / Accepted: 28 December 2023 / Published online: 13 June 2024
© Academy of International Business 2024, corrected publication 2024

Abstract

Competition has long been considered a central element of strategy for multinational enterprises in classical foreign direct investment theories. This review evaluates the large and diverse literature on competitive dynamics in international business since Knickerbocker's (Oligopolistic reaction and the multi-national enterprise, MIT Press, Cambridge, 1973) seminal work on oligopolistic reaction. Specifically, we review the literature on follow-the-leader, awareness–motivation–capability, competitor analysis, and multimarket competition. Our review reveals that competitive interaction in the international context is a multi-arena, multi-player, and multi-level phenomenon. We also identify opportunities for future research, such as deepening the understanding of the micro-foundations of competitive dynamics, incorporating more country-level factors into the analysis of firm-level competitive interactions, broadening the consideration of international stakeholders, and giving greater emphasis to non-market strategies as competitive actions in the global environment. Our review contributes to the development of international business theory by improving our understanding of the mechanisms underlying the execution and consequences of multinational firms' competitive strategies. Moreover, it enriches the competitive dynamics theory in strategic management by emphasizing the complexities that the international context introduces to competitive interactions among firms.

Keywords Oligopolistic reaction · Competitive dynamics · Follow-the-leader · Awareness–motivation–capability · Competitor analysis · Multimarket competition

Introduction

Classical theories in foreign direct investment (FDI) have long considered competition a central element of strategy for multinational enterprises (MNEs) (Caves, 1982; Knickerbocker, 1973). Knickerbocker's (1973) seminal work on the

Accepted by Alain Verbeke, Consulting Editor, 28 December 2023.
This article has been with the authors for three revisions.

✉ Fiona Kun Yao
fionayao@illinois.edu

✉ Jiatao Li
mnjtli@ust.hk

Ming-Jer Chen
ChenM@arden.virginia.edu

Danielle Combs
dcombs2@ua.edu

Qiang Li
qiangli@ceibs.edu

² The Darden School of Business, University of Virginia, PO Box 6550, Charlottesville, VA 22906-6550, USA

³ Department of Management, The Hong Kong University of Science and Technology, Clear Water Bay, Kowloon, Hong Kong

⁴ Department of Management, University of Alabama, 361 Stadium Drive, Tuscaloosa, AL 35487, USA

⁵ Department of Strategy, China Europe International Business School (CEIBS), 699 Hongfeng Rd, Pudong, Shanghai 201203, People's Republic of China

¹ Department of Business Administration, University of Illinois, Urbana-Champaign, 1206 S. Sixth Street, Champaign, IL 61820, USA



role of competition in FDI theorizes “oligopolistic reaction” as firms’ competitive actions and responses in FDI in limited competitive environments. According to this theory, foreign investments are essentially a result of competitive moves by MNEs in oligopolistic industries (Flowers, 1976; Li & Guisinger, 1992), or those sectors in which firms are few enough to recognize the impact of their reactions on their rivals, and vice versa (Caves, 1982). In oligopolistic industries, MNEs invest in a host country to maintain competitive parity either by the “follow the leader” strategy (Knickerbocker, 1973) or in reaction to foreign firms invading their home markets in the “exchange of threat” scenario (Graham, 1974).

The practical importance of competitive interactions among MNEs is increasingly salient today, when a growing number of industries are evolving into international oligopolies as a result of cross-border mergers and acquisitions (Hansen & Hoenen, 2016; Yu et al., 2009). Such industries include airlines, automobiles, electronics, and telecommunications. International concentration is especially high in Internet-based industries, where companies like Amazon, Meta, Google, and LinkedIn dominate their markets. In these industries, the same rivals often meet each other in multiple international markets, establishing multimarket contact (Yu & Cannella, 2013). Multi-market contact arises because MNEs achieve advantages when they match their rivals’ international presence across markets. These advantages include reduced costs associated with economies of scale, improved access to location-specific knowledge, and enhanced mutual forbearance among competitors (Edwards, 1955). Multi-market contact further increases the impact of competitive actions and reactions among MNEs (Yu et al., 2009). Such a series of actions (moves) and reactions (countermoves) among rivals constitutes “competitive dynamics”, a fundamental concept in strategy (Chen, 1996; Chen & Miller, 2012, 2015) that advances understanding of how firms gain and sustain competitive advantage. The dynamic process by which firms act upon and respond to one another determines whether firms can maintain or improve their positions relative to competitors, thereby affecting firm survival and long-term performance (Schumpeter, 1942).

In line with the theoretical relevance and practical significance of competitive dynamics and oligopolistic reaction around the globe, international business (IB) scholars have paid increasing attention to the topic of competitive interactions (e.g., Alcácer et al., 2013; Kotha et al., 2001). For example, research has generated abundant insights into how competitive interactions among MNEs affect FDI entries (Rose & Ito, 2008), exporting (Feinberg, 2013), outsourcing (Hahn et al., 2009), innovation (Sandström, 2016), and pricing and marketing strategies (Fruchter & Kalish, 1997; Gross & Schmitt, 2000; Norman & Nichols, 1982; Tokatli, 2013).

Yet, despite extensive investigations into competitive interactions in the international context, existing comprehensive reviews are limited, resulting in a large body of literature lacking integration. A comprehensive review is warranted, owing to the importance of this topic in practice and theory, the fragmentation of the literature, and the distinctiveness of the MNE and global environments that shape competitive dynamics. First, as we highlighted above, this topic has its theoretical roots in classical FDI theories and is gaining increasing practical significance today. Second, the existing literature on competitive interactions in IB remains disjointed in terms of the research questions and theoretical perspectives scholars pursue at various levels. For example, scholars have drawn on the follow-the-leader insight (Li & Guisinger, 1992), the competitive dynamics and multimarket competition perspectives (Yao & Li, 2016; Yu et al., 2009), the institutional approach (Yu & Cannella, 2007), the psychological perspective (Agnihotri & Bhattacharya, 2021), and the knowledge-based view (Alcácer et al., 2013) to explain competitive actions. The disparate streams of research have had limited engagement with each other, constraining our current understanding of this topic. We see this as an opportunity to expand and integrate IB research. Third, the distinct international setting offers a prime opportunity to refine and extend theories of competitive dynamics in strategy, which heretofore have largely relied on the single-country environment, and specifically to integrate the classical oligopolistic reaction theory in IB and the competitive dynamics perspective in strategy. Successful execution of competitive moves in the global arena requires effective international coordination among subsidiaries (Yu & Cannella, 2013). Yet, due to the diversity of institutions across countries, MNEs, unlike domestic firms, face heightened difficulties in coordinating subsidiaries’ actions.

Our literature review reveals that competitive interaction in the international context is a *multi-arena, multi-player, and multi-level* phenomenon. This notion echoes the insight that competitive dynamics can “go beyond the firm-dyadic level, involving multiple players and spanning various organizational levels and arenas” (Chen et al., 2021: 1835), and further extends to the international context. Multi-arena indicates that international players compete in a variety of arenas, including geographic markets, product markets, factor markets, technological domains, and even non-market arenas. Multi-player emphasizes the presence of multiple types of players in the international context, including MNEs, domestic firms, and other international stakeholders. Multi-level highlights the importance of antecedents and outcomes of competitive actions and reactions at multiple levels, including individual, firm, industry, country, and international levels. Based on this view of competition in the international context, we offer



systematic and critical evaluations of the theoretical and empirical developments in different research themes: follow-the-leader, awareness–motivation–capability, competitor analysis, and multimarket competition.

Our review seeks to make the following contributions. First, it contributes to the development of IB theory by improving our understanding of the various mechanisms underlying the execution and consequences of MNEs' international competitive strategies. We consolidate diverse literature on this topic in IB. We also propose several avenues for future research by highlighting the need to further identify factors at multiple levels, incorporate influences of other international players, explore competition in less examined arenas, and establish connections between disparate literatures. Second, our review also contributes to the competitive dynamics theory in strategy by focusing on the international setting as distinct from the single-country environment. The implications of interfirm rivalries in multiple countries may differ from the consequences of competitive dynamics explored in domestic settings (Chen, 1996). Indeed, Chen and colleagues have called for more competitive dynamics research that “incorporates cross-border, cross-cultural concerns into its research domain” (Chen, 2018a; Chen et al., 2010: 1425).

Theoretical background: oligopolistic reaction and competitive dynamics

Oligopolistic reaction

The theory of oligopolistic reaction is one of the major FDI concepts to build on market imperfections (Graham, 1974; Knickerbocker, 1973). In contrast to the early works of FDI theory based on perfectly competitive markets, the theory of oligopolistic reaction has its origins in industrial organization economics that links FDI to imperfect markets, such as oligopolistic industries (Graham, 1974; Knickerbocker, 1973). Based on the premise that industry structures determine MNEs' competitive actions and performance, the theory of oligopolistic reaction considers FDI as rivalrous strategic actions in oligopolistic industries. In these industries, MNEs are sensitive to their rivals' moves and can be expected to react to maintain competitive positions through various rivalrous strategic behaviors, such as follow-the-leader and exchange-of-threat. Follow-the-leader emphasizes that firms tend to follow the same home country competitors' FDI in other countries (Knickerbocker, 1973). Exchange-of-threat stresses reciprocal FDI, proposing that MNEs are likely to enter the home countries of invading rivals in response to invaders' entering their home markets (Graham, 1974). In this regard, the theory of oligopolistic reaction focuses on strategic interactions between

competitors, by considering FDI as a vehicle to maintain and expand industry positions relative to competitors (Hansen & Hoenen, 2016).

The theory of oligopolistic reaction centers on three crucial premises: uncertainty, risk aversion, and oligopolistic industries (Head et al., 2002). Uncertainty exists regarding the production costs in the host country to which firms are exporting. Therefore, firms run the risk of being undermined by a competitor shifting from exporting to setting up manufacturing facilities in the country (Head et al., 2002). In this situation, risk-averse firms tend to follow their main competitors' FDI to reduce uncertainty, as the alternative, i.e., the divergent strategy, may prove dangerous and costly (Hansen & Hoenen, 2016). Moreover, follow-the-leader or “tit-for-tat” may benefit rivals by facilitating collusion, because “divergent strategies reduce the ability of the oligopolists to coordinate their actions tacitly” (Porter, 1979: 217). The oligopolistic market structure is an essential premise as well because firms should be few enough to observe and recognize the impact of rivals' investment actions (Caves, 1982). These three elements, uncertainty, risk aversion, and oligopolistic markets, collectively account for oligopolistic reaction.

The theory of oligopolistic reaction makes significant contributions to the IB literature because oligopolistic reaction offers an important but mostly underexplored explanation for the international flows of FDI. Before Knickerbocker's (1973) work, the economics literature largely focused on two motives for MNEs to select a specific country as the site for a new subsidiary: deploying abundant factors in the host country and obtaining improved access to the host country's markets. The theory of oligopolistic reaction offers an alternative motivation: MNEs invest in a specific host country to follow competitors' moves. Foreign investments are then regarded as an extension of oligopolistic rivalry from MNEs' home countries to host countries (Hansen & Hoenen, 2016).

Competitive dynamics

In a separate vein, competitive dynamics is a major line of work in the strategic management field (Chen, 1996; Chen & Miller, 2012, 2015; Chen et al., 2021; Ketchen et al., 2004; MacMillan et al., 1985; Smith et al., 2001). Competitive dynamics research in strategy can be traced back to the Austrian School of economics, especially Schumpeter's (1942) theory of “creative destruction,” a process Schumpeter describes as a “perennial gale” by which the dynamic interplay of competitive action and reaction affects organizational survival and performance. Later, Chen and colleagues further developed the competitive dynamics perspective (Chen, 1996; Chen & Miller, 2015; MacMillan et al., 1985). Emphasizing that competitive actions and responses determine firm performance, the key theoretical premise of competitive dynamics research is



that competition is dynamic/interactive and relative (Chen & Miller, 2012). Competitive dynamics' emphasis on competitors' interaction and engagement characterizes the main body of the work, and dyads of actions and responses are the building blocks of competition (Smith et al., 2001). Therefore, relativity is an essential premise as well – “the notion that a firm's strategy and market position must be examined within the context of and vis-a-vis its competitor's strategies and positions” (Chen & Miller, 2012).

The competitive dynamics research includes a few notable theoretical frameworks, such as awareness–motivation–capability and market-commonality/resource-similarity. Awareness–motivation–capability and market-commonality/resource-similarity are two sides of the same coin: whereas the former concerns the exchange of competitive actions and reactions, the latter highlights the relationship between competitors. Specifically, Chen (1996) advances the awareness–motivation–capability framework to explore various drivers of competitive actions and responses. Chen (1996) proposes that the likelihood that a firm will respond to a rival's competitive action is determined by three factors: the firm's awareness of the action, its motivation to act or respond, and its capability to act or respond.

The market-commonality/resource-similarity framework is an approach to competitor analysis. Integrating industry structure analysis and the resource-based view of the firm, Chen (1996) proposes a theoretical model that uses both market and resource factors to analyze the relationship between competitors. The tension between two competitors, Chen (1996) suggests, is shaped by two factors: market commonality, the degree to which two firms share common markets, and resource similarity, the extent to which two firms use similar resources. Chen and colleagues further propose a concept of competitive asymmetry, emphasizing that two firms within a pair may view the market–resource relationship differently; therefore, a rival-centric, as opposed to focal firm-centric, approach is warranted in competitor analysis (Tsai et al., 2011). Competitive dynamics research also advances the strategic group approach as another tool for competitor analysis. A strategic group is defined as a subset of industry competitors “following the same or a similar strategy along the strategic dimensions” (Porter, 1980: 129). The central theme of this approach is that firms within a strategic group are similar to each other but different from others in the industry (Mcgee & Thomas, 1986). Whereas the strategic group approach defines competitors based on similarities in strategic postures, the market-commonality/resource-similarity framework stresses similarities in market positions and resource endowments (Chen, 1996). Regarding analytic levels, strategic groups affect how firms compete at the group level (Mcgee & Thomas, 1986), while the market-commonality/resource-similarity framework accounts for tension between competitors at the firm and action/response dyad levels (Chen, 1996).

The approaches complement each other as competitor analyses, maintains Chen (1996): competitive rivalry is a function of market commonality and resource similarity as well as a function of the group in which firms compete.

Competitive dynamics research is also concerned with multimarket competition and mutual forbearance (Chen & Miller, 2012). Multi-market competition describes “a situation where firms compete against each other simultaneously in several markets” (Karnani & Wernerfelt, 1985: 87). Scholars define markets as geographic or product markets (Jayachandran et al., 1999; Yu & Cannella, 2013). A geographic market is a geographic unit within which the manager has decision-making authority over competitive actions and reactions, while a product market is a set of goods or services that target similar consumers (Jayachandran et al., 1999). For example, Hyatt Hotels and Marriott International compete in multiple geographic locations; Dell and Hewlett-Packard compete in different product segments. More importantly, when studying multi-market competition, “one must specify the boundaries between the markets” (Barnett, 1993: 257). For example, some scholars use country borders as boundaries and define markets as national markets (e.g., Yu et al., 2009), whereas others use a narrow definition of markets, such as states, provinces, cities, and the like (e.g., Yao & Li, 2016). The choices of the definition of markets and the boundary between markets are conditional on the context (e.g., the industry and the nature of competition, etc.).¹

Mutual forbearance, an important notion in multimarket competition, holds that multimarket competitors are likely to reduce the intensity of rivalry by subordinating one market to a rival in exchange for the rival's subordination in another market. The idea has its historical roots in industrial organization economics (Edwards, 1955) and sociology (Simmel, 1950), each of which developed a theoretical logic to explain mutual forbearance. Emphasizing the logic of “deterrence,” Edwards (1955) argues that firms meeting each other in multiple markets may hesitate to compete aggressively due to the increasing danger of retaliatory attacks by rivals in other markets. Highlighting the logic of “tacit cooperation,” the sociologist

¹ Take geographic markets as examples. In some manufacturing industries, it may be valid to examine national markets, as competition is largely generated from within the country. For example, Yu and colleagues (2009) explored multimarket competition across national markets in the global automobile industry. In other manufacturing contexts, examining subnational markets (province, state, and the like) may be valid when market segmentation and local institutional barriers lead to localized competition within smaller geographic areas. For example, Yao and Li (2016) studied multimarket competition among manufacturing MNEs across provincial markets within China before 1995, because China consisted of multiple localized provincial markets rather than as a unified nationwide market in the early period of economic transition. In summary, “no one definition of boundaries will be best for all studies, so each study is faced with having to make a defensible compromise” (Barnett, 1993: 258).



Table 1 Comparisons of oligopolistic reaction and competitive dynamics

	Oligopolistic reaction	Competitive dynamics
Seminal pieces	Knickerbocker (1973) and Graham (1974)	MacMillan et al. (1985), Chen (1996) and Chen and Miller (2015)
Period of major publications	1970s–2000s	1990s–now
Theoretical foundations		
Theoretical roots	Industrial organization economics	Schumpeter and Austrian economics
Basic premise	Industry structure determines competitive actions and performance; competition is dynamic.	Competition is dynamic/interactive and relative; action and response matter for firm performance.
Orientation	Industry environments	Resource and market considerations
Market structure	Oligopolistic	Competitive and oligopolistic
Research question(s)	When and where do firms expand abroad to improve positions relative to main competitors?	How do firms initiate competitive actions, and respond to others' actions, to gain competitive advantages?
Theoretical mechanisms and frameworks	Follow-the-leader Exchange-of-threats	Interfirm rivalry – action and response Awareness–motivation–capability Market commonality and resource similarity Multimarket competition
Nature of relations between firms	Competition and tacit collaboration	Competition, tacit collaboration, and explicit collaboration
Analytical components		
Competitive area	Cross-country	Mostly single-country; also applied in multipoint/multimarket context
Competitive action	Foreign entry	Repertoires of competitive actions, e.g., pricing, promotion, new product introduction, market entry, multipoint competition,
Competitive actor	Multinational enterprises (MNEs)	Mostly domestic firms
Analytical focus	Responders: followers' defensive reactions	Both initiators' aggressive actions and responders' defensive reactions
Level of analysis	Mostly macro industry level	Micro firm and action level, dyad and/or group of firms

Simmel (1950) maintains that firms interacting in multiple markets tend to cooperate because of the increasing interconnectedness of their operations and enhanced information about each other. Information and interdependence facilitate the formation of implicit coordination agreements, arrangements that allow the rival to dominate in its “sphere of influence” in exchange for acquiescing to the focal firm’s dominant market (Simmel, 1950).

The theory of competitive dynamics contributes to strategic management by viewing competition in a way that is qualitatively different from the traditional treatment of competition in industrial organization economics, particularly in early work such as Porter (1980) that relies on industry structure analysis and treats competition as static and relatively simple. A distinguishing feature of competitive dynamics is its micro firm/action level and strong dynamic and behavioral orientation. Thus, competitive dynamics may be understood fundamentally as a series of behaviors of a firm, that is, its actions and reactions in competing with rivals, as well as the corresponding managerial decision-making process (Chen, 1996; Chen & Miller, 2012, 2015; Chen et al., 2021).

Comparisons between oligopolistic reaction and competitive dynamics

The two lines of research with which we are concerned, oligopolistic reaction and competitive dynamics, have common features and different foci. Table 1 presents a comparison of the two research streams.² Notably, oligopolistic reaction and competitive dynamics differ temporally; major pieces of oligopolistic reaction were published in the 1970s, while competitive dynamics research began to flourish in the 1990s.³ Theoretically, both emphasize that competition is

² We also include a table (Online Appendix 1) to compare the various competitive dynamics frames: awareness–motivation–capability, competitor analysis (market commonality/resource similarity and strategic group), and multimarket competition.

³ Despite the temporal differences, the origin of competitive dynamics seems to have relatively limited connections to oligopolistic reaction. As noted by one of the co-authors (also a co-founder of competitive dynamics), competitive dynamics originated from phenomena and the co-founder’s personal experiences. The co-founder, who was



dynamic: firms compete against each other through actions and reactions (Chen, 1996; Chen & Miller, 2012, 2015; Graham, 1974; Knickerbocker, 1973). However, whereas the oligopolistic reaction theory is oriented toward industry environments that determine competitive actions (Flowers, 1976; Knickerbocker, 1973), competitive dynamics research focuses on market conditions and resource endowments, highlighting that both affect the likelihood of actions and reactions and the tension between competitors (Chen, 1996; Chen & Miller, 2012, 2015). The oligopolistic reaction theory considers the oligopolistic market as an important premise (Graham, 1998; Head et al., 2002), while competitive dynamics can apply to both competitive and oligopolistic markets. Originating from an industrial organization economics perspective, the oligopolistic reaction theory stresses industry environments, which affect the observability and awareness of competitive actions and responses (Head et al., 2002). Differently, the competitive dynamics perspective does not restrict competitive interactions to oligopolistic markets. Instead, rivalrous engagement occurs in competitive markets as well: the extent to which an actor attends to and competes intensively with a rival is determined by the degree of market commonality and resource similarity between competitors (Chen, 1996).⁴

The two lines of research have different research questions as well. The oligopolistic reaction theory aims to answer the research question of when and where MNEs expand abroad to improve positions relative to main competitors, so the focus is specifically on MNEs' FDI entries. The competitive dynamics research, on the other hand, tackles competition from a broader perspective by addressing how firms initiate

competitive actions and respond to others' actions to gain competitive advantages. Further, the two streams of research imply different natures of relations among competitors. Strategic interactions can take forms ranging from competitive to cooperative (including tacit and explicit types of cooperative interactions) (Basole, 2009; Bunte et al., 2021; Oh & Yoo, 2022; Powell et al., 2017). The theory of oligopolistic reaction stresses direct competition and tacit collaboration between competitors. For example, Knickerbocker (1973) suggests the possibility of collusion among oligopolistic MNEs, as firms tend to avoid follow-the-leader when industry concentration reaches a threshold. The competitive dynamics research explores competition, tacit collaboration, and explicit collaboration as well; for example, multimarket competitors tend to collude and engage in explicit cooperation due to increased interdependence (Ryu et al., 2020).

The two streams of research also have different analytical components. For example, oligopolistic reaction theory applies to the cross-country setting, while competitive dynamics research applies to both single-country and cross-country settings. The competitive dynamics research was developed in a single-country setting (particularly in the U.S.), but has generated notable extensions in the IB field (e.g., Nadkarni & Perez, 2007; Yu & Cannella, 2007). Whereas the literature on oligopolistic reaction primarily focuses on FDI entry as competitive actions (Graham, 1974; Knickerbocker, 1973), the competitive dynamics research often includes repertoires of competitive actions: new product introductions, new promotions, new marketing agreements, changes in price policies, and entry into new markets (Chen & Miller, 2012). Correspondingly, MNEs are the competitor actors in oligopolistic reaction research, while actors in the competitive dynamics research are mainly domestic firms but MNEs as well, as reflected in the multi-market competition research (e.g., Yao & Li, 2016; Yu et al., 2009). Moreover, oligopolistic reaction only applies after a leading oligopoly makes the first FDI. Therefore, the theory of oligopolistic reaction focuses on followers' defensive actions, without attention to the motivation and behaviors of the leader (initiator), whose investment triggers the response from followers (Flowers, 1976). The competitive dynamics research, however, explores both initiators' actions and responders' reactions. Finally, rooted in industrial organization economics, the theory of oligopolistic reaction is approached at the macro industry level. But with its origins in Schumpeter and Austrian economics, competitive dynamics highlights a fine-grained understanding of competition at the micro-level: actions, firms, dyads, and/or groups of firms (Chen, 1996; Chen & Miller, 2012, 2015). Indeed, the two lines of research differ in many dimensions, resulting in fragmented literature on competitive interactions in IB. Our review attempts to take stock of the extant knowledge

Footnote 3 (continued)

an athlete, noticed differences between his observations on competition in sports and those of Porter.

The motivation of our review is to join the two relatively independently developed perspectives. We thank the Editor and anonymous reviewers for the important insight about the temporal difference between oligopolistic reaction and competitive dynamics.

⁴ For example, Wang et al. (2014) explore Chinese domestic firms' competitive responses to foreign entries in manufacturing industries, which include many competitive sectors. Two types of MNEs are differentiated, MNEs from Hong Kong, Macau, and Taiwan, and MNEs from other countries. Wang and colleagues (2014) find that Chinese firms are more likely to have competitive responses to foreign entries from Hong Kong, Macau, and Taiwan than MNEs from other countries, because Chinese firms are likely to have high levels of market commonality and resource similarity with MNEs from Hong Kong, Macau, and Taiwan, and competitors sharing markets and resources are prone to compete aggressively (Chen, 1996). Differently, Yu and Ito (1988) test the oligopolistic reaction theory in two industries: the textile and tile industries. They find the patterns of oligopolistic reaction in the tile industry, because it is an oligopolistic industry in which MNEs are few enough to observe and identify rivals' actions (Caves, 1982). But similar patterns are not observed in the textile industry due to the textile industry's less oligopolistic and more competitive structure.



and improve our understanding of the conversation between disparate research.

Review methodology

We followed prior research to adopt a multistep search methodology, including planning, article collection, and article analysis (Cuypers et al., 2022). In the planning stage, we defined our goal: to provide a systematic review of the research on oligopolistic reaction and competitive dynamics in IB, identify gaps in our knowledge, and propose opportunities for future research. Based on this goal, we identified search terms, a list of journals, and the period for our search.⁵ Consistent with prior comprehensive reviews (Cuypers et al., 2022; Sun et al., 2021), we focused on journal articles and excluded books, book chapters, book reviews, and proceedings papers. We began our literature search with 1973, when Knickerbocker published his seminal work on oligopolistic reaction. We found only a small number of studies exploring oligopolistic reaction and competitive dynamics in the first few years after Knickerbocker, and therefore, we believe there was no extensive research on this topic before the beginning of our literature search.

In the article collection stage, we searched articles in the Web of Science using the search terms and the journal list identified in the planning stage. We screened all articles to remove those that did not fall within the scope of our review. We used the six sub-domains outlined in the *JIBS* domain statement to identify whether the study has an IB focus, excluding studies that only casually discussed oligopolistic reaction and competitive dynamics. In the article analysis stage, we coded each article's theoretical frameworks, competitive actions, actors, data sources, methods, and main findings. Based on the three steps, we included in our review a total of 140 papers published in 57 journals. We coded each article's theoretical frameworks, competitive actions, actors, data sources, methods, and main findings. Online Appendix 2

⁵ Specifically, for the research on oligopolistic reaction, we used the following search terms: “oligopolistic reaction,” “oligopoly,” “oligopolistic,” “follow the leader,” “exchange of threat,” and “tit for tat.” For the literature on competitive dynamics, we used these terms: “competitive dynamics,” “competitive interaction,” “competitor analysis,” “competitive action,” “competitive response,” “competitive foothold,” “rivalry,” “interfirm rivalry,” and “competitive rivalry” (Chen et al., 2021). We also included other competitive dynamics-related search terms such as “multimarket competition,” “multimarket contact,” “multipoint competition,” “mutual forbearance,” “dynamic competition,” “strategic competition,” and “coopetition.” Because these search terms yielded a large number of articles, we narrowed the search by the second set of terms with an international focus, including “international,” “multinational,” “foreign direct investment,” “FDI,” “MNC,” and “MNE.” These two sets of search terms produced a manageable list of conceptual and empirical articles on competitive dynamics and oligopolistic reaction in IB.

includes a figure displaying the number of articles by year and tables presenting a breakdown of articles by journal, IB-related dependent variables, competitive actions, competitive actors, and methods.

Competitive interactions in IB

The core constructs of competitive dynamics and oligopolistic reaction include actor (the firm that takes a competitive action), responder (the firm that reacts), action (the type and magnitude of competitive action), and response (the type and magnitude of the response to the action). Incorporating the notion that competition in the international context involves multiple types of players, the actor and responder could be two MNEs or an MNE and a domestic firm. Most studies explore competitive interactions among MNEs and address how MNEs respond to competitive moves by other rival MNEs (Gimeno et al., 2005; Wooster & Paul, 2016). Yet, domestic firms are competitive players as well, competing with MNEs in the host countries (Chang & Park, 2012; Curran & Ng, 2018; Hutzschenreuter et al., 2014; Mondal et al., 2021; Odlin, 2019; Som, 2006; Zahra & Garvis, 2000).

Building on the insight that competition in IB occurs in multiple arenas, actions and responses include a variety of competitive moves, such as FDI entries, product pricing, and technological innovation. Many studies focus on geographic markets as the competitive arena by examining FDI entries (Li & Guisinger, 1992; Loncan, 2022; Moya, 2010). International players also compete in product markets, factor markets, technological development, and knowledge domains (Alcácer et al., 2013; Chung et al., 2003; Giachetti & Dagnino, 2014; Giachetti & Marchi, 2017; He et al., 2006). Competitive actions and responses emerge in non-market arenas as well, such as political and legal arenas (Onoz & Giachetti, 2021; Su et al., 2015; Tzeng, 2022). Moreover, international actors initiate competitive moves, and responders carry out countermoves in multiple countries (Yu & Cannella, 2007). Given these actions cover a broad range of important topics in IB, one may raise cautions about the boundary of our review. We include a paper only when the paper focuses on oligopolistic reaction and competitive dynamics (the competitive interactions among MNEs or between MNEs and domestic firms) as the mechanism for the action. Papers that casually discuss competition are excluded. For each paper, two co-authors used this criterion to assess whether the paper should be included. In case of disagreement, a third co-author evaluated the inclusion of the paper.

Our literature review reveals that, among the previously discussed theoretical streams of oligopolistic reaction and competitive dynamics, four crucial and yet distinct research themes have been primarily studied over the years: (1) follow the leader; (2) awareness–motivation–capability; (3) competitor



analysis reflected by the market-commonality/resource-similarity framework and the strategic group approach; and (4) multimarket competition and mutual forbearance. Each stream contributes to our understanding of the topic of competitive interactions in IB. It is noted that the four research themes are not mutually exclusive from one another. For example, Yao and Li (2016) employ the awareness–motivation–capability perspective to examine multi-market competitors' FDI location decisions, which are related to both the awareness–motivation–capability and multimarket competition themes. The four research themes are also not collectively exhaustive in explaining competitive interactions in IB. Scholars have also explored other competition-related perspectives, including but not limited to organizational ecology, first-mover advantages, and game theory. We also note that the four themes are a mix of theoretical frames and empirical phenomena. While follow-the-leader and multimarket competition are more likely to concern empirical phenomena, awareness–motivation–capability and market-commonality/resource-similarity pertain to theoretical frames.⁶

Below, we review the four research themes. In each theme, we identify antecedents, outcomes, and other relevant elements at different levels. We offer a brief assessment of each theme and elaborate more in the discussion section. Table 2 summarizes our review of the four identified research themes with discussions of representative studies. Online Appendix 4 summarizes the empirics of the papers. Online Appendix 5 presents a more exhaustive summary of representative studies within each theme, showing the linkages between different themes.

Key research themes

Follow-the-leader

Our review reveals that the theme of follow-the-leader receives substantial attention in the oligopolistic reaction literature. In his seminal work, Knickerbocker (1973) proposes the follow-the-leader hypothesis in FDI and offers the first empirical investigation. He examines FDIs of 187 U.S. manufacturing MNEs in 23 countries from 1948 to 1967 and finds strong support for the follow-the-leader pattern. His findings show that 46% of new FDI in each industry in each host country is concentrated in 3-year periods, and 75% within 7-year periods, indicating a tendency toward oligopolistic reaction: multinationals follow the leader in new foreign investments. In the 50 years since the publication of Knickerbocker (1973), research on the topic has grown (e.g., Alcácer et al., 2013; Bridgewater, 1999; Delios et al., 2008; Flowers, 1976; Hahn et al., 2009; Hashai & Adler, 2021; Hennart & Park, 1994; Li & Guisinger, 1992, 2014; Madhok, 1996;

⁶ In the online appendix (Online Appendix 3), we also consider other, non-competition-related theoretical perspectives that are often leveraged to explain competitive actions and outcomes.

Moya, 2010; O'Farrell & Wood, 1994). Generally speaking, many studies explore FDI entries as the single outcome, and previous entries by industry competitors as the antecedent (Gimeno et al., 2005; Ito & Rose, 2002; Li, 1994; Rose & Ito, 2008, 2009; Terpstra & Yu, 1988; Wang, Yao, & Li, 2022; Yu & Ito, 1988). Most attention is devoted to corroborating the validity and premise of the relationship between this antecedent and outcome. Research in this field can be broadly categorized into three subareas: (1) validity of follow-the-leader as an alternative explanation of FDI; (2) premises of follow-the-leader; (3) firm contingencies in follow-the-leader.

Validity of follow-the-leader as an explanation of FDI

Many scholars in this field are committed to establishing the validity of follow-the-leader as an alternative explanation of FDI. Unlike other FDI theories that view FDI as a strategy to reduce transaction costs (Buckley & Casson, 1976) or to exploit, access, and augment assets (Dunning, 1979), follow-the-leader considers FDI as a rivalrous strategy used to improve industry positions relative to competitors (Knickerbocker, 1973). Highlighting strategic interactions between competitors, follow-the-leader takes an angle different from other theories that stress firm advantages, costs, and location resources (Hansen & Hoenen, 2016). Thus, establishing the validity of this distinct explanation of FDI is warranted. Scholars corroborate the external validity or generalizability of follow-the-leader by extending Knickerbocker's work in different countries, such as Canada, France, Germany, Italy, Japan, and emerging economies (Bridgewater, 1999; Flowers, 1976; Ito & Rose, 2002; Wang et al., 2022). Scholars have also found widespread evidence supporting follow-the-leader in the investment patterns of MNEs in a variety of industries, including the tire industry (Ito & Rose, 2002; Yu & Ito, 1988), the automobile industry (Rose & Ito, 2008), and the advertising industry (Terpstra & Yu, 1988), as well as other service industries including insurance, reinsurance, wholesale, retail, accounting, construction, publishing, and airlines (Li & Guisinger, 1992).⁷

⁷ Scholars use different operationalizations to capture follow-the-leader. The early studies of Knickerbocker (1973) and Flowers (1976) employ an indicator of FDI entry concentration to evaluate the tendency of FDI clustering in a host country within a period of time. A high value of FDI entry concentration implies the presence of follow-the-leader. However, this indicator alone does not necessarily reveal that MNEs "follow" leaders to enter other countries. Many MNEs may act independently to enter host countries for access to abundant resources in the location (Hennart & Park, 1994; Yu & Ito, 1988). Therefore later studies take a more direct approach to examine follow-the-leader, by testing the effect of prior FDI entries by industry competitors in the host country on a focal MNE's likelihood to enter the country and, importantly, controlling other location and governance explanations of FDI (e.g., Hennart & Park, 1994; Li & Guisinger, 1992; Terpstra & Yu, 1988; Yu & Ito, 1988). Most studies find support for the follow-the-leader hypothesis.



Table 2 Review of four research themes

Themes	Reviewing points	Representative studies
Follow-the-leader	<i>Validity of follow-the-leader as an explanation of FDI</i>	
	Cross-country validity	Whereas Knickerbocker studies U.S. FDI only, Flowers (1976) explores the flow of European and Canadian FDI into the U.S., and Ito and Rose (2002) expand to a global industry by investigating large-scale international oligopolistic reaction in 53 countries by MNEs from multiple home countries (France, Germany, Italy, Japan, and the U.S.). Extending to emerging markets, Bridgewater (1999) studies foreign market entries in Ukraine, and Wang et al. (2022) examine the internationalization of publicly listed Chinese firms
	Cross-industry validity	Research finds support for the hypothesis in the tire industry (Ito & Rose, 2002; Yu & Ito, 1988), the automobile industry (Rose & Ito, 2008), and the advertising industry (Terpstra & Yu, 1988), as well as other service industries including insurance, reinsurance, wholesale, retail, accounting, construction, publishing, and airlines (Li & Guisinger, 1992)
	<i>Premises of follow-the-leader</i>	
	Oligopolistic industry, uncertainties, risk tendencies	Yu and Ito (1988) show that firms in the tire industry follow competitors in foreign investments, while those in the textile industry do not present this behavior. This finding further corroborates the oligopolistic industry as an important premise of follow-the-leader. The textile industry is characterized as a less oligopolistic and more competitive structure. When there are more competitors, the competitive action of one firm will be relatively less visible than in the case of a few competitors in the oligopolistic industry (Knickerbocker, 1973). In a competitive industry like the textile industry, the importance of rivalrous actions is reduced as well due to low market shares, resulting in a lower likelihood of oligopolistic reaction Head and colleagues (2002) find that when investors are certain about costs in the foreign country and are risk-neutral, the incentive to move abroad falls with rivals' investments (Head et al., 2002)
	<i>Firm contingencies in follow-the-leader</i>	
	Market share, firm identity, firm experience	Gimeno and colleagues (2005) find that when both the focal firm and prior entrants have similarly high market shares in the same domestic market segments, U.S. telecommunications firms are more likely to follow prior entrants' moves into other Western countries Building on a similar logic, Terpstra and Yu (1988) find that follow-the-leader is more likely to hold if both the focal firm and the potential entrant are among the top 10 firms in the industry Ito and Rose (2002) find that, within the same global tire industry, firm identities matter in the follow-the-leader pattern. The presence of Goodyear in the host country is more likely to increase the likelihood that rivals invest in the same country than the presence of Bridgestone, Continental, and Pirelli Wang et al. (2022) reveal that firms with greater international experience are less likely to be influenced by prior entries in internationalization, because international experience provides the strengths that can decrease the need to match the immediate investment moves of rivals (Knickerbocker, 1973)



Table 2 (continued)

Themes	Reviewing points	Representative studies
Awareness–motivation–capability	<i>IB-related antecedents that shape components of awareness–motivation–capability</i>	
	Country-level geographic and cultural distance, entry barriers of the national market, institutional and economic development, cross-country variations in leadership	<p>Yu and Cannella (2007) reveal that the geographic distance between an MNE's home and a given host country can constrain the MNE's <i>capability</i> to act and slow the responses in the host country, because distance adds to the cost of internal coordination and increases the difficulty of taking actions</p> <p>Meyer and Sinani (2009) suggest that firms in countries with high levels of economic development often have an <i>enhanced</i> awareness owing to market similarity with MNEs, a high <i>motivation</i> to compete because of the market-oriented economy that emphasizes competition, and a strong <i>capability</i> to compete with MNEs due to their enhanced human and financial capital</p>
	Firm-level FDI orientation, subsidiary control, ownership, international strategy and structure, the importance of the national market and the rival to the MNE, multinational experience, inter-organizational learning	<p>Wooster and Paul (2016) find that MNEs with a market-seeking FDI orientation have a high likelihood of pioneering industry investments in a foreign market because market-seeking MNEs have a raised <i>awareness</i> of new investment opportunities and enhanced <i>motivation</i> to be first among competitors to exploit growth opportunities</p> <p>Yu and Cannella (2007) find that MNEs with strong control over subsidiaries increase the MNEs' speed to respond to rivals' actions, as the subsidiary also has heightened <i>motivation</i> to implement global competitive strategies. Greater control also gives MNEs increased <i>capabilities</i> to leverage resources, knowledge, and information between headquarters and subsidiaries</p> <p>A firm's international experience, as well as the firm's learning from other international firms, all play an important role in competitive dynamics around the globe (Mutlu et al., 2015; Wooster & Paul, 2016)</p>
	Managerial-level international experience	Cui et al. (2014) reveal that managers' export and FDI experiences increase the firm's propensity to conduct strategic asset-seeking FDI for competitive catch-up
	<i>IB-related outcomes</i>	
	FDI entry, a repertoire of competitive actions, international litigation actions	<p>Some studies mainly explore MNEs as competitive actors and examine the competitive actions between MNEs (Onoz & Giachetti, 2021; Wooster & Paul, 2016; Yao & Li, 2016; Yu & Cannella, 2007). For example, Yao and Li (2016) and Wooster and Paul (2016) draw on the awareness–motivation–capability framework to predict MNEs' FDI entries as a single competitive action. Yu and Cannella (2007) use awareness–motivation–capability to explain multiple cross-country competitive actions that include capacity action, pricing action, marketing action, distribution and service improvement, and major and minor product action. Likewise, Steinberg and colleagues (2022) apply awareness–motivation–capability to predict an MNE's competitive repertoire complexity, captured by the diversity, change, and novelty of the range of global competitive actions. Interestingly, Onoz and Giachetti (2021) extend to international litigation actions by examining how competitive intensity in global patent infringement lawsuits interacts with an MNE's awareness, motivation, and capability in affecting FDI entries into a country</p> <p>Other studies focus on both MNEs and domestic firms and examine the competitive actions between the two types of firms (Cui et al., 2014; Mutlu et al., 2015). For example, Mutlu and colleagues (2015) model the rivalrous engagements between MNEs and domestic firms in a transitional economy with a longitudinal perspective and an awareness–motivation–capability angle. They assess the awareness–motivation–capability of domestic firms during three rounds of competition with MNEs that predict dynamic competitive actions by domestic firms. Following the MNEs' attack (first round), domestic firms compete by enhancing technological and managerial capabilities (second round), and eventually will go abroad and compete with MNEs in international markets (third round) (Mutlu et al., 2015)</p>
	Performance	Examining performance outcomes, Meyer and Sinani (2009) combine a meta-analysis and the awareness–motivation–capability perspective and find that the presence of foreign investments is most likely to dampen the performance of domestic firms in countries with middle levels of economic development



Table 2 (continued)

Themes	Reviewing points	Representative studies
Competitor analysis	<i>Domestic firms' responses as outcomes</i>	
	FDI entry, human resource training, export	Focusing on domestic firms' responses in terms of market entries, Li (2008) finds that foreign bank density has a U-shaped relationship with domestic bank entry in the same strategic group in California Interestingly, research also shows that domestic firms engage in divergent types of actions in response to threats from different strategic groups. Based on a study of the Indian IT industry, Iriyama et al. (2016) find that local firms in India perceive that they face competitors from two different strategic groups: the informal group and the foreign group. Firms in the informal group do not formally register with the state, use illegal means in their businesses, and sell illegal products and services to their customers. Firms in the foreign group include firms from other countries that compete in the Indian market. For the threats from the firms in the informal group, local Indian firms tend to engage in corruptive activities as a response, as these activities are usually undertaken by informal firms. When responding to threats from foreign firms, local Indian firms enhance the training of their human resources because foreign firms usually have stronger technological capabilities. Therefore, local firms follow the resource similarity and emulation logic in responding to threats from competitors by implementing actions that competitors typically take based on their resources
	Survival	Chang and Xu (2008) find that the increased presence of foreign entrants negatively affects the survival rates of domestic Chinese firms in the same geographic markets. Foreign entrants from Hong Kong, Macao, and Taiwan are more likely to negatively affect the survival rate of domestic firms because of resource similarity
	<i>MNEs' responses as outcomes</i>	
	FDI entry	Based on strategic group theory, Li (2008) finds that the density of domestic banks in a specific strategic group decreases the entry rate of foreign banks in the same group
	Survival	Similarly, drawing on the market-commonality/resource-similarity framework, Chang and Xu (2008) find that Chinese domestic firms are more likely to negatively affect foreign firms' survival if local firms and foreign firms share similar resources and markets. Foreign firms are crowded out by reformed local firms, namely Chinese companies that are privatized or transformed into shareholding or limited liability enterprises with a modern ownership structure, to a greater extent than by conventional locals, namely state-owned firms and collectives, because reformed locals and foreign firms rely on similar resource endowments and markets
	<i>Tacit and explicit cooperation as outcomes</i>	
	Explicit cooperation	Based on a sample of MNEs in international high-tech industries, Duysters and Hagedoorn (1995) reveal that strategic partnering density within groups is lower than cross-group partnering density
	Tacit cooperation	Based on a sample of global pharmaceutical firms, Guedri and McGuire (2011) find that multimarket contact within the same strategic group is more likely to produce tacit collusion and increase firms' performance, than will cross-group multimarket contact



Table 2 (continued)

Themes	Reviewing points	Representative studies
Multimarket competition	<i>Outcomes of multimarket contact</i>	
	FDI entries, export, pricing, innovation, a repertoire of competitive actions	Using FDI entry as a proxy for the intensity of rivalrous actions, Yao and Li (2016) find a nonlinear (inverted U-shaped) relationship between an MNE's multimarket contact with incumbents and the MNE's likelihood to enter the geographic location Focusing on exporting as an indicator of the intensity of rivalry, Feinberg (2013) reveals that exporters in the oil and gas industry will be reluctant to enter via exports to the home markets of those rivals with whom they compete in multiple markets Highlighting pricing, research finds that MNEs competing in multiple markets may tacitly collude to maintain higher prices across markets in the global airline industry (Zou et al., 2012), the antidepressants drug market (Chintagunta & Desiraju, 2005), and the cement industry (Ghemawat & Thomas, 2008) Examining a repertoire of competitive actions ranging from technology innovations to changes in organizational structure and management systems, Yu and Colleagues (2009) show that the extent of multimarket contact is negatively related to competitive aggressiveness
	Cooperative actions	Based on a sample of global biopharmaceutical companies, Ryu et al. (2020) reveal that increased multimarket contact between MNEs likely encourages strategic alliance formation
	Performance	Studies generally suggest that mutual forbearance established through multimarket contact improves the performance of multimarket competitors (Yu & Cannella, 2013), but undermines the performance of single-market firms. For example, Chuang and Thomson (2017) find that multimarket contact among MNEs can negatively impact the market share of single-market firms in the global semiconductor industry
	<i>Contingencies of the mutual forbearance hypothesis</i>	
	Effective internal coordination of MNEs	<i>Effective internal coordination is required to implement the mutual forbearance strategy</i> One of the factors that influence an MNE's internal coordination is the pressure for local responsiveness. Based on a sample of global automobile companies, Yu and colleagues (2009) find that the degree of local responsiveness would weaken the rivalry-dampening influence of multimarket contact on competitive aggressiveness, because local responsiveness increases the difficulty in achieving coordination and integration between MNEs' headquarters and subsidiaries, which is required by mutual forbearance. Specifically, local responsiveness is manifested in factors such as subsidiary ownership, the cultural distance between the MNE's home country and the host country, regulatory restrictions in a host country, and the presence of local competitors in a host country (Yao & Li, 2016; Yu et al., 2009) In a conceptual piece, Ma (1998) suggests that such factors as an MNE's international strategy, organizational structure, and corporate culture influence the MNE's internal coordination in implementing mutual forbearance
	Explicit cooperation between MNEs	<i>Explicit cooperation weakens the impact of multimarket contact</i> Consistent with the rationale, Klein et al. (2020) find that the intensity of explicit cooperation in strategic alliances dampens the effect of multimarket contact among European airlines on market entry On the contrary, when rivals do not engage in strategic alliances, the prominence of multimarket contact between global airlines on airfares is salient (Zou et al., 2012)



Premises of follow-the-leader

As we discussed above, the follow-the-leader hypothesis has important premises, and prior research has tested these propositions. A key premise is industry structure (Yu & Ito, 1988). Knickerbocker (1973) examines the relationship between the follower-the-leader tendency and industry structures. He reveals that, overall, firms display the tendency in industries of high seller concentration. However, in industries with a very high concentration (above 70%), the correlation between FDI clustering and industry concentration turns negative, indicating that the follow-the-leader tendency is more salient in oligopolistic industries than in competitive or monopolistic sectors, an essential premise discussed above. Later, Flowers (1976) finds a similar pattern using a different sample. Other premises of follow-the-leader are uncertainties and risk tendencies. Head et al. (2002) find that when investors are certain about costs in a foreign country and are risk-neutral, the incentive to move abroad falls with rivals' investments. Certainties and risk neutrality reduce MNEs' need to imitate rivals' behaviors as a safer option. These findings further underscore uncertainties and risk aversion as essential premises of the follow-the-leader hypothesis.

Firm contingencies in follow-the-leader

Scholars have assessed various firm contingencies that moderate the impact of competitors' prior entries in the host country on the focal firms' FDI entry likelihood. Early studies in this stream follow the industrial organization economics tradition and focus only on a simple count of the absolute number of prior entries by rival firms in the industry. Later research emphasizes substantial firm heterogeneities within the same industry, such as market share (Gimeno et al., 2005; Terpstra & Yu, 1988), firm identity (Ito & Rose, 2002; Rose & Ito, 2008, 2009), and firm experience (Wang et al., 2022). For example, Gimeno and colleagues (2005) find that when both the focal firm and prior entrants have similarly high market shares in the same domestic market segments, U.S. telecommunications firms are more likely to follow prior entrants' moves into other Western countries. This finding is consistent with the oligopolistic reaction rationale that large-share firms respond more to other large-share firms to maintain the competitive status quo due to increased interdependence (Knickerbocker, 1973). Competitive responses among small-share companies are often rare because of reduced visibility and the increased likelihood that small-share companies target differentiated market niches.⁸

⁸ Prior studies also consider other firm contingencies such as firm identity and experience. For example, Ito and Rose (2002) find that, within the same global tire industry, firm identities matter in the follow-the-leader pattern. The presence of Goodyear in the host country

Overall assessment

Knickerbocker's (1973) follow-the-leader offers a seminal explanation of FDI based on competitive rivalry, which lays the foundation for promising research on strategic interactions between MNEs. As we summarized above, the external validity and premises of the hypothesis are largely corroborated. However, unfortunately, the oligopolistic reaction theory "has seemingly been – if not lost – downplayed" in the contemporary IB literature (Hansen & Hoenen, 2016: 369).⁹ Scholars have called for the re-discovery and re-invigoration of the oligopolistic reaction perspective, as a growing number of industries have become dominated by oligopolists encountering each other in multiple countries (Hansen & Hoenen, 2016). We echo this call and find it necessary to re-visit the oligopolistic reaction theory, by extending the scope of the research to account for the multi-level and multi-player nature of competition in the international context.

First, follow-the-leader research may be enriched by incorporating the notion that competition in IB has a multi-level nature. More research is warranted to integrate with the competitive dynamics perspective to enrich the firm/action/group level and expand to individual and country levels. As an example, the literature on follow-the-leader has remained largely silent on individual-level factors, such as managerial predisposition and decision-making processes. In a conceptual piece, Tallman (1992) calls for more research to integrate managerial behaviors with the oligopoly models to develop a comprehensive understanding of MNE strategies. He contends that rivalry-related oligopolistic considerations

Footnote 8 (continued)

is more likely to increase the likelihood that rivals invest in the same country than the presence of Bridgestone, Continental, and Pirelli. This is because, in the tire industry, Goodyear has a salient identity as the first mover with extensive early overseas investments. Wang et al. (2022) reveal that firms with greater international experience are less likely to be influenced by prior entries in internationalization, because international experience provides the strengths that can decrease the need to match the immediate investment moves of rivals (Knickerbocker, 1973).

⁹ Hansen and Hoenen (2016) summarize that the de-emphasis of the oligopolistic reaction perspective in the contemporary IB literature is largely attributed to the transaction-cost economics and the resource-based view, which have won prominence within the IB field. The IO-based oligopolistic reaction insight was subject to critiques, especially from transaction-cost economics. The transaction-cost perspective was explicitly motivated by "the unease with the equation of large firms with welfare-reducing oligopolies (Hansen & Hoenen, 2016: 371)." Later the extension of the resource-based view to understanding FDI switched the focus of the IB literature from the economics perspective to strategic management approaches. The increasing attention to firm-level heterogeneities in resources further downplayed the importance of the industry-level oligopolistic reaction theory in explaining FDI.



do not automatically determine actions, but are filtered through managerial predisposition and decision processes (Tallman, 1992). However, research on managerial factors in oligopolistic reaction is still sparse. Some research questions arise. For example, do MNEs with narcissistic CEOs tend to follow the leader or become leaders themselves in FDI entries? Indeed, CEO narcissism influences risk tendencies, which may, in turn, affect MNEs' likelihood to follow the leader (Head et al., 2002).

Likewise, country-level factors play a role in the follow-the-leader hypothesis but are largely underexplored. Whereas prior studies find support for the follow-the-leader hypothesis in many countries, there are exceptions, such as Japan.¹⁰ As these studies did not offer a comprehensive elaboration of why Japanese firms did not observe the follow-the-leader pattern, future research is necessary to explain cross-country differences in the follow-the-leader pattern. For example, it is unclear whether Japan's unique economic structure and institutions can explain such a country contingency. Japanese industrial organizations are characterized by a complex web of businesses linked by cross-shareholding, i.e., *keiretsu*. *Keiretsu* may promote stability and cooperation. Examining the relationship between *keiretsu* and Japanese firms' preferences for face-to-face competition is revealing.

Second, follow-the-leader research may be enhanced by paying more attention to domestic firms as important players in the host country and exploring competitive interactions between MNEs and domestic firms. Indeed, competition between MNEs and domestic firms is "a more complex process than the conventional 'competitive exclusion' hypothesis" that assumes zero-sum competition (Li, 2008: 275). It is not well known, then, how follow-the-leader is affected by competition from host-country players. For example, foreign firms may need to adjust entry modes to cope with intense competition from host-country players. Exploring the relationship between host-country competition and foreign firms' decisions to choose joint ventures with host-country players over wholly owned subsidiaries in follow-the-leader investments suggests a valuable research direction. The research on follow-the-leader is further limited because it focuses on followers' responses without attention to the leader's motivation (Flowers, 1976), such as an MNE's investment purpose, which may influence whether follow-the-leader is a better choice. In this regard, scholars may need to combine the follow-the-leader and competitive

dynamics perspectives to analyze the influences of the leader's motivation on follow-the-leader.

Awareness–motivation–capability

Since the introduction of awareness–motivation–capability (Chen, 1996; Smith et al., 2001) as a framework for examining competitive activities, extensive research has moved the framework forward, especially in the single-country context (Chen et al., 2021; Ketchen et al., 2004). Expanding the awareness–motivation–capability framework from a single country to a global setting, scholars have made important progress specific to competitive dynamics in the international context (Cui et al., 2014; Jarzabkowski & Bednarek, 2018; Ma, 1999; Meyer & Sinani, 2009; Mutlu et al., 2015; Onoz & Giachetti, 2021; Schriber et al., 2022; Steinberg et al., 2022; Wooster & Paul, 2016; Yao & Li, 2016; Yu & Cannella, 2007). Such progress has focused on: (1) identifying IB-related antecedents that shape a firm's awareness, motivation, and capability; (2) examining IB-related competitive activities and outcomes.

IB-related antecedents that shape components of awareness–motivation–capability

The extant studies of awareness–motivation–capability in the international context identify multiple factors that shape a firm's awareness, motivation, and capability and, thus, its competitive actions and responses. Some factors are similar to those assessed in a single-country setting, such as firm scale and scope, financial resources, technology, and managerial capabilities (Cui et al., 2014; Mutlu et al., 2015; Onoz & Giachetti, 2021; Wooster & Paul, 2016). Studies in the international context also identify unique IB-related factors that affect components in awareness–motivation–capability, which will be discussed in this review.

Such IB-related awareness–motivation–capability factors can exist at the *country level* and include geographic and cultural distance between the home and host country of the MNE (Yao & Li, 2016; Yu & Cannella, 2007), entry barriers of the national market (Ma, 1999), cross-country variations in leadership capabilities (Yeung & Ready, 1995), and a country's institutional and economic development (Meyer & Sinani, 2009; Ramírez Pérez, 2020; Steinberg et al., 2022; Yu & Cannella, 2007). Indeed, distance still matters in IB in the age of the Internet. The distance (geographic or cultural) between an MNE's home and a given host country can constrain the MNE's capability to act and slow the responses in the host country, because distance adds to the cost of internal coordination and increases the difficulty of taking actions (Yao & Li, 2016; Yu & Cannella, 2007).

¹⁰ For example, research finds that foreign investments from Japan appear not to display the follow-the-leader pattern or even present an opposite pattern (Delios et al., 2008; Hennart & Park, 1994; Rose & Ito, 2008). Likewise, Machokoto, Chipeta, & Ibeji (2021) find variations in the use and effectiveness of follow-the-leader across different institutional environments and economic conditions.



IB-related factors also emerge at the *firm and managerial levels* that affect components of awareness–motivation–capability. These factors include an MNE’s FDI orientation, subsidiary control, ownership, international strategy and structure, the importance of the national market and the rival to the MNE, multinational experience, inter-organizational learning, and managers’ international experience (Cui et al., 2014; Ma, 1999; Mutlu et al., 2015; Wooster & Paul, 2016; Yang & Meyer, 2019; Yu & Cannella, 2007). For example, Wooster and Paul (2016) find that MNEs with a market-seeking FDI orientation have a high likelihood of pioneering industry investments in a foreign market because market-seeking MNEs have a raised awareness of new investment opportunities and enhanced motivation to be first among competitors to exploit growth opportunities. Moreover, at the managerial level, managers with previous international experience in exporting and FDI are also likely to develop a heightened awareness of firms’ position against international rivals, a strong motivation to exploit international experiences for both personal and organizational gain, and an enhanced capability that enables firms to utilize global resources to capture opportunities (Cui et al., 2014).¹¹

IB-related competitive activities and outcomes

The existing studies have extended the awareness–motivation–capability framework to examine various IB-related competitive actions (Cui et al., 2014; Mutlu et al., 2015; Onoz & Giachetti, 2021; Wooster & Paul, 2016; Yao & Li, 2016; Yu & Cannella, 2007). Yao and Li (2016) and Wooster and Paul (2016) draw on the awareness–motivation–capability framework to predict MNEs’ FDI entries as a single competitive action. Yu and Cannella (2007) use awareness–motivation–capability to explain multiple cross-country competitive actions that include capacity action, pricing action, marketing action, distribution and service improvement, and major and minor product action. Likewise, Steinberg and colleagues (2022) apply awareness–motivation–capability to predict an MNE’s competitive repertoire complexity,

captured by the diversity, change, and novelty of the range of global competitive actions. Interestingly, Onoz and Giachetti (2021) extend to international litigation actions by examining how competitive intensity in global patent infringement lawsuits interacts with an MNE’s awareness, motivation, and capability in affecting FDI entries into a country. Onoz and Giachetti (2021) is one of the first studies to examine competitive dynamics in international litigation.

Most of the studies in this stream examine competitive actions as an outcome variable. An exception is Meyer and Sinani (2009), where the focus is on domestic firms’ performance as an outcome of competitive interactions with MNEs. Meyer and Sinani (2009) combine a meta-analysis and the awareness–motivation–capability perspective and find that the presence of foreign investments is most likely to dampen the performance of domestic firms in countries with middle levels of economic development. As we discussed before, compared with domestic firms in high-income economies, firms in medium-income economies are likely to have weaker competitive awareness, motivation, and capabilities, resulting in a lower likelihood of retaliating aggressively and successfully with MNEs. Compared with domestic firms in low-income economies, firms in medium-income economies also have lower benefits of knowledge spillover from foreign investors.

Overall assessment

Most prior awareness–motivation–capability literature examines competition in a single-country context (Chen & Miller, 2012; Chen et al., 2021). The awareness–motivation–capability studies in the IB literature expand the scope from a single-country setting to an international context, by identifying IB-related multi-level antecedents that shape components in awareness–motivation–capability, and by investigating IB-related competitive activities and outcomes. As stressed above, competition in the international context is a multi-arena, multi-player, and multi-level phenomenon. We maintain that the awareness–motivation–capability framework has the potential to become a comprehensive framework that integrates diverse theoretical perspectives to explore such a complicated phenomenon in the international context. We briefly discuss some points in the overall assessment and will elaborate more in the discussion section.

First, the awareness–motivation–capability framework can naturally link various prominent management theories, which range from micro to macro levels (Chen & Miller, 2012). Extending the framework of Chen and Miller (2012) into the international context, we present Online Appendix 6 to illustrate elements of the awareness–motivation–capability

¹¹ It is important to note that these factors may not influence the individual components of awareness–motivation–capability in the same direction. For example, having a high percentage of ownership in the subsidiary (e.g., a wholly owned subsidiary) increases the MNE’s awareness and motivation to respond to a rival’s attack, due to the subsidiary’s importance and frequent communication with headquarters. A high percentage of ownership, however, may not necessarily enhance an MNE’s capability to respond in a foreign market. High foreign ownership may allow the subsidiary to leverage resources from headquarters, but may also indicate liability of foreignness, which decreases the subsidiary’s capability to compete. We thank an anonymous reviewer for this critical insight.



model that can connect to other management perspectives at different levels. Multiple elements at the individual, group, organizational, extra-organizational, country, and international levels underlie each of the three components of awareness–motivation–capability. For example, at the country level, the literature on awareness–motivation–capability in IB has paid attention to the geographic distance between countries, as well as the economic development of the host and home countries (Meyer & Sinani, 2009; Yu & Cannella, 2007). More elements at the country level from the institutional perspective (Clougherty, 2001; Holm, 1997), such as institutional dualism and institutional voids, can be explored to account for cross-country heterogeneities in awareness–motivation–capability. At the international level, the literature on awareness–motivation–capability remains relatively silent on how international forces beyond factors within a country affect MNEs' awareness, motivation, and capability. Regional and international agreements (Irwin & Pavcnik, 2004; Sargent & Matthews, 2001), global production and trade networks (Yeung, 2009; Yeung & Coe, 2015), international media, and international non-governmental organizations may all play a role in competitive interactions between MNEs. At the individual level, consistent with our observation of the follow-the-leader literature, the awareness–motivation–capability studies in IB pay limited attention to individual-level factors, except managerial experience (Cui et al., 2014) and compensation (Bonache & Zárraga-Oberty, 2017). The micro-foundations or the psychological perspective of awareness–motivation–capability is therefore underexplored in the international context. The awareness–motivation–capability framework can indeed enrich our understanding of competitive dynamics in IB, by integrating multiple perspectives from psychological to institutional approaches at various levels.

Second, the awareness–motivation–capability framework can be leveraged to investigate competitive rivalry between multiple players in different arenas and countries. Unlike the follow-the-leader research, which mainly focuses on MNEs, awareness–motivation–capability studies in IB examine both MNEs (e.g., Jarzabkowski & Bednarek, 2018; Yu & Cannella, 2007) and domestic firms (e.g., Mutlu et al., 2015). Regarding competitive arenas, the awareness–motivation–capability studies in IB have examined actions in several arenas, but have paid sparse attention to factor markets and non-market arenas. It is unclear what awareness–motivation–capability components likely lead MNEs to choose to compete in non-market over market arenas, or how awareness–motivation–capability components affect MNEs' likelihood to select political arenas via corporate political actions over social arenas via corporate social responsibility. Therefore, future research is needed to enlarge the awareness–motivation–capability framework to explore the choices between different competitive arenas.

Competitor analysis: market commonality, resource similarity, and strategic group

Competitor analysis occupies a central position in strategy (Chen, 1996; Porter, 1980). As discussed above, the market-commonality/resource-similarity framework and the strategic group theory are two related and complementary approaches to competitor analysis (Chen, 1996). Both approaches receive scholarly attention in IB (Carpano et al., 2003; Chang & Xu, 2008; Duysters & Hagedoorn, 1995; Guedri & McGuire, 2011; Iriyama et al., 2016; Li, 2008; Wang et al., 2014). The IB literature has mainly used competitor analysis in two ways: (1) analyzing the strategic interactions between MNEs and domestic firms, including both domestic firms' responses to MNEs' competitive actions and MNE reactions to domestic firms' competitive actions; (2) exploring the influence of strategic groups on the likelihood of explicit or tacit cooperation.

Domestic firms' responses as outcomes

Prior research has used competitor analysis to elaborate on the strategic interactions between MNEs and domestic firms (Chang & Xu, 2008; Iriyama et al., 2016; Li, 2008; Wang et al., 2014). Specifically, extant studies have explored how foreign entries elicit local firms' competitive responses, such as market entries (Li, 2008), human resource training (Iriyama et al., 2016), and exporting (Wang et al., 2014). For example, focusing on domestic firms' responses in terms of market entries, Li (2008) finds that foreign bank density has a U-shaped relationship with domestic bank entry in the same strategic group in California. The entry rate of domestic banks into a specific strategic group is first deterred by foreign bank density in the group due to increasing competition for resource needs and customer bases between foreign and domestic banks. However, the entry rate of domestic banks will be stimulated through signaling effects after foreign bank density in the strategic group exceeds a threshold. As a large number of foreign banks signals more munificent banking environments, domestic banks may interpret the signal as an opportunity and increase entries.

In addition to the above-mentioned competitive actions, scholars further examine domestic firms' survival rates influenced by foreign entries. Research shows that the presence of foreign investments generates competition effects on domestic firms that influence domestic firms' survival, but whether the influence is positive or negative varies. Contingency factors include resources used by domestic firms that can create mobility barriers to foreign firms' entry (Carpano et al., 2003) and the extent of market commonality and resource similarity between foreign and domestic firms (Chang & Xu, 2008; Chen, 1996). For example, Chang and Xu (2008) find that the increased presence of foreign



entrants negatively affects the survival rates of domestic Chinese firms in regional markets, because of increasing competition due to market commonality within the same geographic region. Foreign entrants from Hong Kong, Macao, and Taiwan are more likely to negatively affect the survival rate of domestic firms because of the threat posed by resource similarity between these foreign firms and the local firms.

MNEs' responses as outcomes

Scholars have also used competitor analysis to generate insights regarding the influences of domestic firms' competitive actions on MNEs. Indeed, domestic firms may also have "reverse" competition effects on foreign investments. Compared with domestic firms, foreign firms have competitive disadvantages, such as the liability of foreignness owing to the unfamiliarity of the local environments and distant coordination. These disadvantages may negatively influence MNEs in their competitive interactions with domestic firms. Existing research generally finds that domestic firms are likely to negatively affect foreign firms' entry rates and survival if they are in the same strategic group (Li, 2008) or share similar resources and markets (Chang & Xu, 2008).

Tacit and explicit cooperation as outcomes

While the sub-streams above explore competitive rivalry, another line of research investigates the relationship between strategic group competition and cooperation (tacit collusion or explicit cooperation as in strategic alliances). Scholars find that firms are less likely to establish strategic alliances with firms in the same strategic group than with those in different strategic groups (Duysters & Hagedoorn, 1995). This finding is attributed to the major motive for interfirm partnering, that is, technological and market complementarity. Firms within the same strategic group are likely to have similar resources, so they are less likely to become partners in strategic alliances. However, tacit collusion is more likely to emerge between the same strategic group members (Guedri & McGuire, 2011). There is an element of collusive cooperation and "mutual dependence" in cartel-like strategic groups (e.g., Barbezat, 1989). Indeed, firms in the same strategic groups have similar resources, enhancing their ability to detect, interpret, and imitate any changes in other group members' strategic resources. Such familiarity with each other in the same strategic group can effectively deter strategic actions against one another, allowing firms to recognize a mutual dependence more easily and implicitly agree to maintain a non-competitive agreement across markets (Guedri & McGuire, 2011).

Overall assessment

Different from the follow-the-leader literature and awareness–motivation–capability studies in IB, the competitor analysis literature has generated interesting insights into the cooperative relationship between competitors (Duysters & Hagedoorn, 1995; Guedri & McGuire, 2011). This line of research is essential to our understanding of the nature of relations among international players. Strategic interactions among actors can take forms ranging from competitive to cooperative. MNEs compete with each other in strategies, markets, and resources, focusing on devising effective attacks and avoiding retaliation. Rivals may also have various cooperative arrangements, from tacitly colluding on price to explicitly sharing patents, technologies, and distribution channels (Edwards, 1955; Gayle & Thomas, 2016; Madureira, 2017). MNEs can also engage in cross-border mergers, have interlocking directors, and establish equity joint ventures (e.g., Kwok et al., 2019; Wong et al., 2017). Some MNEs conduct both competition and cooperation simultaneously, that is, coopetition (Ayakwah et al., 2018; Banerji & Sambharya, 1998; Kedia et al., 2016; Lacam, 2018; Liu et al., 2019; Luo, 2007; Navío-Marco et al., 2019; Peng et al., 2018). Indeed, firms are embedded in a network of multiple economic and social relations, or a multiplexity of relations. Intriguing research questions arise, such as: How does competition affect the decision to choose a specific type of cooperative relationship from various options? How do these multiplicities of ties interact with competition in affecting competitive and cooperative actions and performance?

Second, the idea of strategic groups bears some resemblance to the population ecology approach. Population ecology studies have begun to emphasize within-population heterogeneity, by proposing the concept of grade of membership which measures a member's degree of fit with a population and its typicality (Kuilman & Li, 2009). Similarly, future strategic group research may further explore within-group differences, such as the country of origin of MNEs and organizational identity related to entry modes (Li et al., 2007), and how such within-group differences play out in competitive interactions within strategic groups.

Third, because of the focus of competitor analysis on the relationship between players, we pay particular attention to how this theme can be leveraged and enriched to explore the multi-player nature of competition. Research on competitor analysis has mainly focused on the competitive tension between MNEs and domestic firms by analyzing their similarities in terms of strategies, markets, and resources. In this regard, competitor analysis, together with the awareness–motivation–capability framework, contributes to IB research by extending the follow-the-leader studies that are mostly concerned with MNEs' relation to domestic firms as



competitive players. Scholars may further extend the competitor analysis research in IB. For example, some domestic firms may have symbiotic relationships with MNEs when positive managerial and technological spillovers outweigh the downside of direct competitive rivalry (Zhou & van Witteloostuijn, 2010). From the market-commonality/resource-similarity perspective, understanding what type of domestic firms and MNEs likely generate such a symbiotic relationship is revealing. The strategic group approach emphasizes external mobility barriers between groups (Carpano et al., 2003; Guedri & McGuire, 2011). From this viewpoint, it would be interesting to explore how country institutional environments can serve as external mobility barriers to strengthen the symbiotic relationship. Finally, while prior competitor analysis in IB has examined the influences of domestic firms on MNEs' competitive responses, it is also intriguing to investigate the influences of domestic firms on how MNEs compete with other MNEs. On the one hand, threats from local firms may limit the competitive resources that MNEs can direct toward other MNEs. MNEs may even tacitly or explicitly cooperate with one another in competing against local firms. On the other hand, threats from local firms may increase the overall aggressiveness of MNEs, increasing the likelihood of competitive actions against both other MNEs and domestic firms.

Multimarket competition and mutual forbearance

Since Bernheim and Whinston's (1990) early attempt to formally examine the relationship between multimarket competition and mutual forbearance, scholars have continued to generate rich insights into multimarket competition across different disciplines (see Jayachandran et al., 1999; Yu & Cannella, 2013 for two notable reviews). The logic of multimarket competition echoes the classical tit-for-tat or exchange-of-threat model of oligopolistic reaction exploring reciprocal FDI in different countries (Ekman et al., 2014; Graham, 1974); therefore, receiving much scholarly attention in IB. The extant multimarket competition research in IB has largely aimed at: (1) exploring the consequences of multimarket contact among MNEs, especially the influences of multimarket contact on various competitive and cooperative actions and organizational performance; (2) identifying contingencies of the mutual forbearance hypothesis.

Outcomes of multimarket contact

Much of the multimarket competition research focuses on the consequences of multimarket contact among MNEs on the intensity of competitive actions, such as FDI and market entry (Ghemawat & Thomas, 2008; Klein et al., 2020; Rose & Ito, 2008, 2009; Yao & Li, 2016), exporting (Feinberg, 2013), pricing (Chintagunta & Desiraju, 2005; Ghemawat &

Thomas, 2008; Zou et al., 2012), innovation (Berry, 2020), or a repertoire of competitive actions (Yu & Cannella, 2007; Yu et al., 2009). For example, using FDI entry as a proxy for the intensity of rivalrous actions, Yao and Li (2016) find a nonlinear (inverted U-shaped) relationship between an MNE's multimarket contact with incumbents and the MNE's likelihood to enter the geographic location, based on a sample of U.S. manufacturing subsidiaries and a sample of global hotels in China. Initially, driven by the need to establish footholds in competitors' markets and seek greater knowledge about rivals, MNEs are prone to enter markets where multimarket competitors operate. Later, when the level of multimarket contact is high, MNEs tend to follow the logic of "deterrence" (Edwards, 1955) and "tacit cooperation" (Simmel, 1950) to avoid entering these locations due to the increasing danger and costs of retaliatory attacks by rivals in other markets.

More recently, scholars have advanced the multimarket competition literature by exploring cooperative actions as outcomes of multimarket contact (Ryu et al., 2020). Research reveals that increased multimarket contact between MNEs likely encourages strategic alliance formation (Ryu et al., 2020). This is because multimarket contact yields mutual forbearance from opportunism. Deterrence of opportunism increases partners' confidence in partner cooperation, enhancing the likelihood of alliance formation. Additionally, existing research also explores performance outcomes of multimarket contact (Chuang & Thomson, 2017; Guedri & McGuire, 2011; Pham et al., 2020). Studies generally suggest that mutual forbearance established through multimarket contact improves the performance of multimarket competitors (Yu & Cannella, 2013). An interesting extension in the IB literature is to explore the impact of multimarket contact on the performance of single-market firms, that is, firms that operate in single product or geographic markets. Scholars find that multimarket contact among MNEs can negatively impact the market share of single-market firms (Chuang & Thomson, 2017), as multimarket MNEs can redirect the resources saved from not competing with each other toward competing aggressively against single-market firms. Therefore, multimarket contact benefits multimarket firms that face each other in various markets at the cost of the performance of single-market firms.

Contingencies of the mutual forbearance hypothesis

Existing research reveals notable contingencies that govern the mutual forbearance hypothesis regarding the relationship between multimarket contact and the intensity of rivalry among MNEs (Chuang & Thomson, 2017; Guedri & McGuire, 2011; Klein et al., 2020; Ma, 1998; Ryu et al., 2020; Yao & Li, 2016; Yu et al., 2009; Zou et al., 2012). Broadly speaking, two general contingencies have been



considered: effective internal coordination of MNEs and explicit cooperation between MNEs. First, effective internal coordination is required to implement the mutual forbearance strategy (Ma, 1998; Yu & Cannella, 2013). Unlike domestic firms, MNEs face enhanced difficulties regarding internal coordination between MNEs and subsidiaries, as subsidiaries operate in diverse social, political, and market environments in various countries. One of the factors that influence an MNE's internal coordination is the pressure for local responsiveness—adaptation to the specific requirements of host markets rather than an integrated global market. Research finds that the degree of local responsiveness would weaken the rivalry-dampening influence of multimarket contact on competitive aggressiveness, because local responsiveness increases the difficulty in achieving coordination and integration between MNEs' headquarters and subsidiaries, which is required by mutual forbearance (Yao & Li, 2016; Yu et al., 2009).

Second, scholars increasingly have begun to emphasize explicit cooperation between MNEs as another contingency that can govern the influences of multimarket contact on the intensity of rivalry and performance outcomes (Chuang & Thomson, 2017; Klein et al., 2020; Zou et al., 2012). In the international setting, MNEs are especially likely to form strategic alliances when entering uncertain host countries. Studies generally show a substitutive relationship between the tacit form of cooperation from multimarket contact and the explicit form of cooperation. Explicit cooperation reduces the tension between rivals, decreasing the need to realize tacit collusion from multimarket contact and thereby weakening the impact of multimarket contact (Klein et al., 2020; Zou et al., 2012).

Overall assessment

Extant IB studies on multimarket competition have examined multiple contingencies that govern the mutual forbearance hypothesis. However, there are underexplored factors that deserve particular attention in the international context. The contingency of observability is often overlooked (Yu & Cannella, 2013). Mutual forbearance works only when any defections from equilibrium can be observed, detected, and punished (Yu & Cannella, 2013). Yet observability is particularly challenging in the international context. For example, institutional distance may increase the difficulty of fully observing and comprehending rivals' moves and countermoves. Different international entry modes such as wholly owned foreign subsidiaries, international joint ventures, exporting, and outsourcing also have various degrees of visibilities. One may contend that the Internet and information technologies mitigate the observability problem. Yet, the Internet may further complicate observability due to its

capacity for diffusing disinformation alongside the dissemination of factual news. Future research is warranted to delve deeper into how visibility influences the mutual forbearance hypothesis in the international context.

The second insight concerns the multi-arena nature of global competition. Markets could be defined by different approaches. The prior research on multimarket competition emphasizes product and geographic markets. Yet MNEs also interact with each other in other arenas, such as factor markets and non-market environments. Similar to our assessment of the other research themes, research in multimarket competition has been sparse in factor markets and non-market arenas. We will elaborate more in the discussion section.

Discussion and future research

Adding to our assessment of each research theme, we highlight a few underexplored research areas of competitive interactions in IB. Table 3 presents future research opportunities, including points identified in the overall assessment section of each research theme and more underexamined areas discussed in this section.

Cross-fertilization: original competitive dynamics research and IB

Future studies that combine competitive dynamics and IB research may prove to be very fruitful. On the one hand, insights from IB may enrich the original competitive dynamics research in a single-country setting. Some factors are unique to the international setting, with no ready counterpart in single-country settings. These factors include dissimilar types of competitors in different countries, increased difficulty in controlling and coordinating foreign subsidiaries, varying formal and informal institutions, and divergent barriers to entry, among others (Yu & Cannella, 2007). Consider the variety of competitors as an example. Chen et al. (2010) point out that the traditional single-country competitive dynamics research concerns competitors within developed countries (mainly the US marketplace). Conversely, the IB literature highlights diverse competitors in emerging markets and developed countries (Dike & Rose, 2019; Lee et al., 2022; McNamara & Vaaler, 2000). Emerging-market firms often have high levels of political know-how, which provides advantages in dealing with political risks, because they are used to dealing with unstable governments in their home countries. It would be interesting to explore how such distinctive capabilities may result in competitive actions from emerging-market firms in different arenas. For example, emerging-market firms may likely resort to corporate



political activities rather than conventional market actions during fierce competition with developed-country firms.¹²

On the other hand, the IB literature, and oligopolistic reaction in particular, can be enhanced by the competitive dynamics perspective. Competitive dynamics provides timely and valuable theoretical frames, namely awareness–motivation–capability, competitor analysis, and multimarket competition, for re-invigorating the oligopolistic reaction theory. Competitive dynamics offers a fine-grained understanding of the competitive interplay at the action, firm, dyad, and group levels (Chen, 1996; Chen & Miller, 2015), complementing the industry-level analysis of oligopolistic reaction. Competitive dynamics highlights competitive moves in multiple arenas, such as technological innovation or knowledge actions (Alcácer et al., 2013; Casson et al., 2016; Sandström, 2016), adding to oligopolistic reaction’s focus on FDI entries. Competitive dynamics also explores competition in non-market arenas, including political, legal, and social domains, via corporate political actions, litigation, and social responsibilities (Onoz & Giachetti, 2021). Therefore, it is intriguing to study how competitive actions in market entries may influence or be influenced by MNEs’ actions in other arenas and how these multiple arenas collectively shape MNEs’ competitive landscapes and drive competitive outcomes. Below, we offer detailed discussions about interactions between activities in different arenas.

Multi-level and multi-player: micro-foundations, country-level factors, and international stakeholders

Indeed, it is imperative to “bring the human factor back into decision-making as an important motivational element frequently left aside” (Chen et al., 2021). In the international setting, future research in competitive dynamics may explore how these psychological attributes of actors vary by country. For example, Chen et al. (2021) emphasize the importance of emotions as a motivational element of the

awareness–motivation–capability model. Certain emotions may be important motivators in some countries but not in others. For example, in the cultures of some Eastern countries, actors are likely to be motivated by shame, while in Western countries, they are prone to be driven by guilt. It would be interesting to explore whether the influences of specific emotions in motivating MNEs to conduct offensive or defensive competitive behaviors vary by country/culture. The incorporation of culturally embedded psychological characteristics into competitive motivation elements will enhance the theoretical potency of the awareness–motivation–capability framework.¹³

We call for more attention to country-level factors. For example, the differences between state and market capitalism may affect competitive interplay in international markets.¹⁴ In countries with market capitalism, competitive actions are more likely to manifest in market arenas, such as pricing differentiation, and market entries. In countries with state capitalism, domestic firms are likely to receive support from the government and may have a competitive advantage over MNEs. State capitalism may also encourage domestic firms to seek competitive actions in non-market arenas, including lobbying and bribery. As some non-market actions by domestic firms involve moral misconduct (such as bribery), it would be intriguing to examine whether MNEs from market-capitalist countries respond with the same non-market actions in state-capitalist countries. Exploring competitive dynamics in different economic systems, therefore, suggests fascinating research possibilities.

We also emphasize the ambicultural view of competitive dynamics, in light of the paucity of research on this subject, and suggest that future competitive dynamics research should explore the links between ancient Eastern thinking and contemporary Western concerns. Chen (2014, 2018a, b) proposes the “ambicultural” view of competitive dynamics and emphasizes the Eastern roots of the competitive dynamics construct. Interesting ideas are likely to emerge through further investigations of the East–West link. For example, the philosophy of three parties in the Eastern philosophy may carry implications for the dyadic approach in competitive dynamics research. The Chinese expression “three legs form an unshakable balance” highlights balancing power among three important parties in competition. This philosophy may advance the “tripartite” concept by proposing “triad” as a promising new research area in competitive

¹² Take the varying control over subsidiaries as another example. Conventional competitive dynamics research does not pay adequate attention to parent firms’ different control over subsidiaries and thus has not distinguished between modes by which market entry can be made. The IB literature, however, has highlighted multiple entry modes (Hashai & Adler, 2021). Wholly owned subsidiaries are advantageous in competitive interactions because this entry mode helps parent firms coordinate competitive actions among subsidiaries more easily than joint ventures (Yu & Cannella, 2013). Yet wholly owned subsidiaries may also have disadvantages in competitive dynamics. Due to liabilities of foreignness, wholly owned subsidiaries often have limited knowledge of the local market and institutions, inhibiting their competitive capabilities. Given the competing arguments, more research is warranted about how entry modes affect firms’ execution of competitive actions and reactions.

¹³ We present Online Appendix 6 with more individual factors that may influence competitive interactions in IB.

¹⁴ We thank an anonymous reviewer for discussing the difference between state and market capitalism.



Table 3 Research guidelines and directions for future research

Themes	Future research directions	Research question examples
Follow-the-leader	<p>Deepening understanding at the individual level</p> <p>Exploring factors at the country level</p> <p>Investigating other players in the international context, in addition to MNEs</p>	<p>How do individual-level factors, such as managerial predisposition and decision-making processes, affect follow-the-leader? For example, do MNEs with narcissistic CEOs tend to follow the leader or become leaders themselves in FDI entries?</p> <p>What country-level factors explain cross-country differences in the follow-the-leader pattern? Can the lack of support for follow-the-leader in Japanese firms be explained by Japan's unique economic structure and institutions, such as <i>keiretsu</i>?</p> <p>How is follow-the-leader affected by competition from host-country players? For example, will increasing host-country competition change entry modes of follow-the-leader?</p>
Awareness–motivation–capability	<p>Examining more factors at the country and international level</p> <p>Incorporating psychological characteristics into the awareness–motivation–capability components, and enriching cross-cultural understandings</p>	<p>At the country level, how do institutional dualism and institutional voids account for cross-country heterogeneities in awareness–motivation–capability?</p> <p>At the international level, how do international forces beyond factors within a country affect MNEs' awareness, motivation, and capability? For example, international media and international non-governmental organizations</p> <p>How do individual factors explain awareness–motivation–capability components from the psychological perspective? For example, how do individual attributes, such as CEO narcissism, celebrity, or humility, affect the likelihood that MNEs will initiate competitive actions? Will such effects vary across countries/cultures?</p>
Competitor analysis	<p>Further considering nonmarket areas, factor markets in the international context</p> <p>Deepening understanding of the influences of competition on cooperation</p> <p>Studying within-group differences in the strategic group approach</p> <p>Further examining the symbiotic relationship between MNEs and domestic firms</p> <p>Investigating the influences of domestic firms on how MNEs compete with other MNEs</p>	<p>Which awareness–motivation–capability components likely lead MNEs to choose to compete in non-market over market arenas? How do awareness–motivation–capability components affect MNEs' likelihood to select political arenas via corporate political actions over social arenas via social responsibility?</p> <p>How does competition affect the decision to choose a specific type of cooperative relationship from various options? How do the multiplicities of ties interact with competition in affecting competitive and cooperative actions and performance?</p> <p>How do within-group differences, such as the country of origin of MNEs and organizational identity related to entry modes, play out in competitive interactions within strategic groups?</p> <p>From the market-commonality/resource-similarity perspective, what type of domestic firms and MNEs likely generate a symbiotic relationship? From the strategic group approach, how can country institutional environments serve as external mobility barriers to strengthen the symbiotic relationship?</p> <p>Does competition from domestic firms induce or discourage MNEs' competitive attacks against other MNEs?</p>

Table 3 (continued)

Themes	Future research directions	Research question examples
Multimarket competition	Advancing understanding of the contingencies of the mutual forbearance hypothesis in the international context, specifically, visibility	How does visibility affect the mutual forbearance hypothesis in the international context? For example, different international entry modes, such as wholly owned foreign subsidiaries, international joint ventures, cross-border mergers and acquisitions, exporting, and outsourcing, have various degrees of visibilities.
	Expanding multimarket competition research from product and geographical markets to factor markets and non-market arenas in an international context	How does multimarket competition in factor markets and non-market arenas affect firm strategy and performance?
More future research directions	Strengthening cross-fertilization of original competitive dynamics research and IB	How do insights from IB enrich the original competitive dynamics research in a single-country setting? For example, do heterogeneous types of competitors and varying control over subsidiaries in IB carry implications for competitive dynamics research? How does the competitive dynamics perspective enhance the IB literature, and oligopolistic reaction in particular? Taking the multi-arena competitive dynamics research as an example, how do competitive actions in multiple arenas collectively shape MNEs' follow-the-leader behaviors?
	Further considering micro-foundations of competitive dynamics	How do the influences of specific emotions in motivating MNEs to conduct offensive or defensive competitive behaviors vary by country/culture?
	Integrating more country-level factors into firm-level competitive dynamics and adopting an ambicultural view (East–West link)	How do state and market capitalism affect MNEs' competitive actions and reactions? Does the philosophy of threesome and three parties in Eastern philosophy carry implications for the dyadic approach in competitive dynamics research?
	Incorporating more international stakeholders	How do the global systems of national chambers of commerce influence competition among MNEs? Do such international organizations help transfer MNEs' environmental strategy from one host country to another host? How do different international stakeholders jointly affect interfirm competition?
	Further examining non-market strategy as a competitive action in the global environment	How do MNEs use corporate political activities to compete with one another in international markets? Will MNEs' firm size or international diversification offer buffers and slack to respond to rivals' corporate social responsibility actions?
	Exploring interactions between various competitive actions	Is it more beneficial to MNEs if they respond to rivals' actions in all domains simultaneously or only react in a single domain? How does institutional complexity in the global environment affect the inter-relationship between corporate political actions and corporate social responsibilities?



dynamics (Chen, 2018a).¹⁵ Besides the similarities between the East and the West, it would be intriguing to examine the fundamental differences between philosophies regarding competition (Chen, 2014, 2018a). For example, whereas classical Chinese thinkers like Sun Tzu minimize direct confrontation, Western cultures tend to emphasize more head-on competition.¹⁶ Future research may further examine divergent competition philosophies and how differences affect Western MNEs' moves into Eastern countries and vice versa.¹⁷

Future research may also need to study other international stakeholders, such as international government institutions and non-governmental organizations. For example, the global systems of national chambers of commerce can influence competition among MNEs. Understanding how such international organizations help transfer MNEs' environmental strategies from one host country to another host suggests a valuable research direction. Moreover, different international stakeholders jointly affect interfirm competition. Social movement scholars have emphasized multi-actor interactions between governments, non-government actors, and MNEs. Global social movements have exerted increasing pressure on MNEs to use non-market strategies to compete with rivals.

¹⁵ For example, a triad notion from *The Art of War* is “besiege Wei State to rescue Zhao State.” This notion suggests that the focal state can surround Wei State's base when Wei is attacking Zhao State, to force Wei State to retreat from Zhao State to its base. This idea suggests that firm A could attack firm B's home country when B is attacking firm C's home country; because of the attack, firm B will have to shift its attention and resources back to its home country to respond to firm A's attack. As a result, the competitive pressure from firm B on firm C will be mitigated. Notably, these tactics are present in both the East and West as a form of generic gamesmanship (Mac-Millan et al., 2003).

¹⁶ One may note that nowadays direct cutthroat competition in the Chinese market is prevalent. The misalignment between traditional Asian philosophy and the current phenomenon can be explained by the difference between formal and informal institutions. If we consider the latter, Western culture is more likely to accept direct confrontation, while Eastern culture typically prefers indirect approaches. Regarding formal institutions, recently the Chinese government, in particular the Xi administration, has increased its emphasis on aggressiveness and direct competition against Western rivals. So there may be a misalignment between formal and informal institutions. This inspires intriguing research questions: When institutions misalign with one another, which one is more influential in influencing competitive dynamics in the host country? And how do formal and informal institutions interactively influence competitive dynamics? We call for future research to address these questions.

¹⁷ Appendix 6 summarizes more country factors that affect competitive interactions in IB.

Multi-arena: non-market strategies and interactions between global competitive actions

Future research may explore competition between MNEs in the non-market arenas. Take corporate political activity as an example. Multinational healthcare companies have been competing aggressively for decades in non-market arenas, including lobbying governments, engaging in litigation cases, and the like. Scholars may use the awareness–motivation–capability framework to predict these companies' corporate political activities.¹⁸ Corporate social responsibility offers another example.¹⁹ It would be interesting to examine whether MNEs' firm size or international diversification provide incentives or offer buffers to respond to rivals' corporate social responsibility actions. On the one hand, large and diversified MNEs face pressures from various stakeholders all around the world, increasing the likelihood that they will engage in corporate social responsibility. On the other hand, these firms may respond to rivals' actions rigidly and slowly due to extensive hierarchies and bureaucracies in strategic decision-making.

The relationship between global competitive actions in market and non-market arenas suggests fertile ground for discovery. For example, it is unclear whether it is more beneficial to MNEs if they respond to rivals' actions in all domains simultaneously or react only in a single domain. Understanding how these actions complement or substitute for each other in competitive interactions between MNEs is illuminating. Within the category of non-market competitive actions, corporate political action and corporate social responsibility also interact in a complex global institutional setting. Researchers emphasize the potential tension between corporate political action and corporate social responsibility (Sun et al., 2021): the former may be misaligned with ethical standards, while the latter enhances

¹⁸ For example, in 2020, Abbott Laboratories, an American multinational healthcare company, spent approximately \$3 million lobbying the federal government to approve its at-home COVID-19 rapid antigen test. Abbott's BinaxNOW became the first at-home COVID-19 test to receive emergency use authorization in the U.S., on December 16, 2020. Roche Holdings, a leading healthcare company based in Switzerland, tripled its lobby expenditures in 2021 in order to compete with Abbott and gain approval for its rapid antigen test in the U.S. market. Indeed, high awareness of Abbott's non-market strategies, greater motivation to compete against Abbott, and superior capabilities and financial resources resulted in the likelihood that Roche tripled spending on lobbying governments.

¹⁹ For example, media attention of a rival firm's corporate social responsibility actions may increase the awareness of the competitive threat; a large performance gap between a focal firm and a rival may enhance the motivation of the MNE to conduct this non-market strategy; an MNE's previous experience with corporate social responsibility may increase its capability to engage in similar non-market actions in response to competitors' moves.



ethics. If so, it is interesting to examine how institutional complexity in the global environment affects the inter-relationship between corporate political actions and corporate social responsibility actions. For example, when a competitor initiates an attack via corporate political actions in a host country, MNEs from home countries with high ethical standards may respond with similar corporate political actions, corporate social responsibility actions, or actions in other domains. Exploring contingencies that shape MNEs' choices of reactions between corporate political actions and corporate social responsibility suggests intriguing research possibilities.

Managerial and social implications

Although Knickerbocker's (1973) seminal piece has been insightful for managers to make decisions regarding market entry in the early stage of globalization, managers have been confronted with many new challenging questions as globalization evolves. We outline some of these new issues here: for example, domestic firms and MNEs employ a variety of competitive actions in market and non-market arenas; firms are embedded in diverse and complicated networks involving different stakeholders. Our review provides managers with a better understanding of how to enhance the effectiveness of competitive actions in response to different situations and, eventually, how to enhance competitive positions and firm performance. Our review also has important social implications. As we discussed above, competitive actions occur in non-market areas, including corporate social responsibility. Competition between MNEs may dampen or improve social welfare. We invite future research to explore how government policies and international stakeholders can shape global rivalry by promoting corporate social responsibility and enhancing competition's positive impact on social welfare.

Supplementary Information The online version contains supplementary material available at <https://doi.org/10.1057/s41267-024-00707-5>.

Acknowledgements We acknowledge insightful comments from Chawit Rochanakit. This research was supported in part by the Research Grants Council of Hong Kong (HKUST# 16506622).

References

- Agnihotri, A., & Bhattacharya, S. (2021). Chief executive officer regulatory focus and competitive action frequency. *Group and Organization Management*, 46(5), 931–962.
- Alcácer, J. (2006). Location choices across the value chain: How activity and capability influence collocation. *Management Science*, 52(10), 1457–1471.
- Alcácer, J., Dezső, C. L., & Zhao, M. (2013). Firm rivalry, knowledge accumulation, and MNE location choices. *Journal of International Business Studies*, 44(5), 504–520.
- Anand, J., & Kogut, B. (1997). Technological capabilities of countries, firm rivalry and foreign direct investment. *Journal of International Business Studies*, 28(3), 445–465.
- Andrevski, G., Brass, D. J., & Ferrier, W. J. (2016). Alliance portfolio configurations and competitive action frequency. *Journal of Management*, 42(4), 811–837.
- Angeli, F., & Jaiswal, A. K. (2015). Competitive dynamics between MNCs and domestic companies at the base of the pyramid: An institutional perspective. *Long Range Planning*, 48(3), 182–199.
- Arakpogun, E. O., Elsahn, Z., Nyuur, R. B., & Olan, F. (2020). Threading the needle of the digital divide in Africa: The barriers and mitigations of infrastructure sharing. *Technological Forecasting and Social Change*, 161, 120263.
- Asmussen, C. G., & Foss, N. J. (2022). Strategizing and economizing in global strategy. *Global Strategy Journal*, 12(3), 578–591.
- Averyt, W. F., & Ramagopal, K. (1999). Strategic disruption and transaction cost economics: The case of the American auto industry and Japanese competition. *International Business Review*, 8(1), 39–53.
- Ayakwah, A., Sepulveda, L., & Lyon, F. (2018). Competitive or cooperative relationships in clusters: A comparative study of two internationalising agro-processing clusters in Ghana. *Critical Perspectives on International Business*, 14(2/3), 230–251.
- Banerji, K., & Sambharya, R. B. (1998). Effect of network organization on alliance formation: A study of the Japanese automobile ancillary industry. *Journal of International Management*, 4(1), 41–57.
- Barbezat, D. (1989). Cooperation and rivalry in the international steel cartel, 1926–1933. *The Journal of Economic History*, 49(2), 435–447.
- Barnard, H. (2021). Host countries' level of development and internationalization from emerging markets: A typology of firm strategies. *Journal of International Management*, 27(3), 100828.
- Barnett, W. P. (1993). Strategic deterrence among multipoint competitors. *Industrial and Corporate Change*, 2(2), 249–278.
- Basole, R. C. (2009). Visualization of interfirm relations in a converging mobile ecosystem. *Journal of Information Technology*, 24(2), 144–159.
- Baum, J. A., & Korn, H. J. (1996). Competitive dynamics of inter-firm rivalry. *Academy of Management Journal*, 39(2), 255–291.
- Baum, J. A. C., & Korn, H. J. (1999). Dynamics of dyadic competitive interaction. *Strategic Management Journal*, 20(3), 251–278.
- Bernheim, B. D., & Whinston, M. D. (1990). Multimarket contact and collusive behavior. *The RAND Journal of Economics*, 21(1), 1–26.
- Berry, H. (2020). Internationalizing firm innovations: The influence of multimarket overlap in knowledge activities. *Journal of International Business Studies*, 51(6), 963–985.
- Bonache, J., & Zárraga-Oberty, C. (2017). The traditional approach to compensating global mobility: Criticisms and alternatives. *The International Journal of Human Resource Management*, 28(1), 149–169.
- Brache, J., Callagher, L., & Husted, K. (2022). The effects of interfirm cooperation purpose on export performance: Choosing between local and overseas partners. *Journal of Business Research*, 148, 12–22.
- Bresnahan, T. F., & Salop, S. C. (1986). Quantifying the competitive effects of production joint ventures. *International Journal of Industrial Organization*, 4(2), 155–175.
- Bridgewater, S. (1999). Networks and internationalisation: The case of multinational corporations entering Ukraine. *International Business Review*, 8(1), 99–118.



- Buckley, P. J., & Casson, M. (1976). A long-run theory of the multinational enterprise. In P. J. Buckley & M. Casson (Eds.), *The future of the multinational enterprise* (pp. 32–65). Palgrave Macmillan.
- Bunte, J. B., Gertz, G., & Zeitz, A. O. (2021). Cascading noncompliance: Why the export credit regime is unraveling. *Review of International Political Economy*, 29, 1–25.
- Carpano, C., Rahman, M., & Roth, K. (2003). Resources, mobility barriers, and the international competitive position of an industry. *Journal of International Management*, 9(2), 153–169.
- Casson, M., Porter, L., & Wadeson, N. (2016). Internalization theory: An unfinished agenda. *International Business Review*, 25(6), 1223–1234.
- Caves, R. E. (1982). *Multinational enterprise and economic analysis*. Cambridge University Press.
- Chang, S.-J., & Park, S. H. (2012). Winning strategies in China: Competitive dynamics between MNCs and local firms. *Long Range Planning*, 45(1), 1–15.
- Chang, S.-J., & Rhee, J. H. (2011). Rapid FDI expansion and firm performance. *Journal of International Business Studies*, 42(8), 979–994.
- Chang, S. J., & Xu, D. (2008). Spillovers and competition among foreign and local firms in China. *Strategic Management Journal*, 29(5), 495–518.
- Chen, M.-J. (1996). Competitor analysis and interfirm rivalry: Toward a theoretical integration. *Academy of Management Review*, 21(1), 100–134.
- Chen, M.-J. (2014). Presidential address – Becoming ambicultural: A personal quest, and aspiration for organizations. *Academy of Management Review*, 39(2), 119–137.
- Chen, M.-J. (2018a). The research-teaching “oneness” of competitive dynamics: Toward an ambicultural integration. *Asia Pacific Journal of Management*, 35(2), 285–311.
- Chen, M.-J. (2018b). Scholarship-practice “oneness” of an academic career: The entrepreneurial pursuit of an expansive view of management scholarship. *Asia Pacific Journal of Management*, 35(4), 859–886.
- Chen, M.-J., Lin, H., & Michel, J. G. (2010). Navigating in a hyper-competitive environment: The roles of action aggressiveness and TMT integration. *Strategic Management Journal*, 31(13), 1410–1430.
- Chen, M.-J., Michel, J. G., & Lin, W. (2021). Worlds apart? Connecting competitive dynamics and the resource-based view of the firm. *Journal of Management*, 47(7), 1820–1840.
- Chen, M.-J., & Miller, D. (2012). Competitive dynamics: Themes, trends, and a prospective research platform. *Academy of Management Annals*, 6(1), 135–210.
- Chen, M.-J., & Miller, D. (2015). Reconceptualizing competitive dynamics: A multidimensional framework. *Strategic Management Journal*, 36, 758–775.
- Chintagunta, P. K., & Desiraju, R. (2005). Strategic pricing and detailing behavior in international markets. *Marketing Science*, 24(1), 67–80.
- Christopherson, S. (2007). Barriers to ‘US style’ lean retailing: The case of Wal-Mart’s failure in Germany. *Journal of Economic Geography*, 7(4), 451–469.
- Chuang, Y.-T., & Thomson, K. (2017). Maneuvering multimarket competition: The effects of multimarket contact and strategic alliances on performance of single-market firms. *Strategic Organization*, 15(3), 390–409.
- Chung, C. C., & Beamish, P. W. (2010). The trap of continual ownership change in international equity joint ventures. *Organization Science*, 21(5), 995–1015.
- Chung, W., Mitchell, W., & Yeung, B. (2003). Foreign direct investment and host country productivity: The American automotive component industry in the 1980s. *Journal of International Business Studies*, 34(2), 199–218.
- Clougherty, J. A. (2001). Globalization and the autonomy of domestic competition policy: An empirical test on the world airline industry. *Journal of International Business Studies*, 32(3), 459–478.
- Cossutta, D., & Grillo, M. (1986). Excess capacity, sunk costs and collusion: A non-cooperative bargaining game: Some considerations on the European car industry. *International Journal of Industrial Organization*, 4(3), 251–270.
- Craighead, C. W., Ketchen, D. J., Jr., Jenkins, M. T., & Holcomb, M. C. (2017). A supply chain perspective on strategic foothold moves in emerging markets. *Journal of Supply Chain Management*, 53(4), 3–12.
- Cui, L., Meyer, K. E., & Hu, H. W. (2014). What drives firms’ intent to seek strategic assets by foreign direct investment? A study of emerging economy firms. *Journal of World Business*, 49(4), 488–501.
- Curran, L., & Ng, L. K. (2018). Running out of steam on emerging markets? The limits of MNE firm-specific advantages in China. *Multinational Business Review*, 26(3), 207–224.
- Cuypers, I. R. P., Patel, C., Ertug, G., Li, J., & Cuypers, Y. (2022). Top management teams in international business research: A review and suggestions for future research. *Journal of International Business Studies*, 53, 481–515.
- Delios, A., Gaur, A. S., & Makino, S. (2008). The timing of international expansion: Information, rivalry and imitation among Japanese firms, 1980–2002. *Journal of Management Studies*, 45(1), 169–195.
- Dike, M. C., & Rose, E. L. (2019). Cross-border expansion and competitive interactions of indigenous mobile network operators in sub-Saharan Africa. *Thunderbird International Business Review*, 61(1), 29–42.
- Dunning, J. H. (1979). Explaining changing patterns of international production: In defence of the eclectic theory. *Oxford Bulletin of Economics and Statistics*, 41(4), 269–295.
- Duysters, G., & Hagedoorn, J. (1995). Strategic groups and inter-firm networks in international high-tech industries. *Journal of Management Studies*, 32(3), 359–381.
- Edwards, C. D. (1955). Conglomerate bigness as a source of power. In Universities-National Bureau Committee for Economic Research (Ed.), *National Bureau of Economic Research conference report* (pp. 331–359). Princeton University Press.
- Ekman, P., Hadjikhani, A. I., Pajuvirta, A., & Thilenius, P. (2014). Tit for tat and big steps: The case of Swedish banks’ internationalization 1961–2010. *International Business Review*, 23(6), 1049–1063.
- Feinberg, R. M. (2013). Multimarket contact and export entry. *Economics Letters*, 121(1), 82–84.
- Flowers, E. (1976). Oligopolistic reactions in European and Canadian direct investment in the United States. *Journal of International Business Studies*, 7(2), 43–55.
- Fruchter, G. E., & Kalish, S. (1997). Closed-loop advertising strategies in a duopoly. *Management Science*, 43(1), 54–63.
- Gayle, P. G., & Thomas, T. (2016). Assessing firm behavior in carve-out markets: Evidence on the impact of carve-out policy. *Journal of Economic Behavior and Organization*, 128, 178–194.
- Ghemawat, P., & Thomas, C. (2008). Strategic interaction across countries and multinational agglomeration: An application to the cement industry. *Management Science*, 54(12), 1980–1996.
- Giachetti, C. (2016). Competing in emerging markets: Performance implications of competitive aggressiveness. *Management International Review*, 56(3), 325–352.
- Giachetti, C., & Dagnino, G. B. (2014). Detecting the relationship between competitive intensity and firm product line length: Evidence from the worldwide mobile phone industry. *Strategic Management Journal*, 35(9), 1398–1409.
- Giachetti, C., & Marchi, G. (2017). Successive changes in leadership in the worldwide mobile phone industry: The role of windows



- of opportunity and firms' competitive action. *Research Policy*, 46(2), 352–364.
- Gimeno, J., Hoskisson, R. E., Beal, B. D., & Wan, W. P. (2005). Explaining the clustering of international expansion moves: A critical test in the U.S. telecommunications industry. *Academy of Management Journal*, 48(2), 297–319.
- Graham, E. M. (1974). *Oligopolistic imitation and European direct investment in the United States*. Unpublished D.B.A. dissertation. Harvard University.
- Graham, E. M. (1998). Market structure and the multinational enterprise: A game-theoretic approach. *Journal of International Business Studies*, 29, 67–83.
- Greve, H. R., Mitsuhashi, H., & Baum, J. A. C. (2013). Greener pastures: Outside options and strategic alliance withdrawal. *Organization Science*, 24(1), 79–98.
- Gross, D. M., & Schmitt, N. (2000). Exchange rate pass-through and dynamic oligopoly: An empirical investigation. *Journal of International Economics*, 52(1), 89–112.
- Guedri, Z., & McGuire, J. (2011). Multimarket competition, mobility barriers, and firm performance. *Journal of Management Studies*, 48(4), 857–890.
- Hahn, E. D., Doh, J. P., & Bunyaratavej, K. (2009). The evolution of risk in information systems offshoring: The impact of home country risk, firm learning, and competitive dynamics. *MIS Quarterly*, 33(3), 597–616.
- Hamill, J. (1993). Competitive strategies in the world airline industry. *European Management Journal*, 11(3), 332–341.
- Hansen, M. W., & Hoenen, A. (2016). Global oligopolistic competition and foreign direct investment: Revisiting and extending the literature. *Critical Perspectives on International Business*, 12(4), 369–387.
- Hashai, N., & Adler, N. (2021). Internalization choices under competition: A game theoretic approach. *Global Strategy Journal*, 11(1), 109–122.
- He, Z. L., Lim, K., & Wong, P. K. (2006). Entry and competitive dynamics in the mobile telecommunications market. *Research Policy*, 35(8), 1147–1165.
- Head, K., Mayer, T., & Ries, J. (2002). Revisiting oligopolistic reaction: Are decisions on foreign direct investment strategic complements. *Journal of Economics and Management Strategy*, 11(3), 453–472.
- Hennart, J.-F., & Park, Y.-R. (1994). Location, governance, and strategic determinants of Japanese manufacturing investment in the United States. *Strategic Management Journal*, 15(6), 419–436.
- Holm, P. (1997). Vertically integrated oligopoly and international trade policy. *The Canadian Journal of Economics/revue Canadienne D'economique*, 30(1), 194–207.
- Hunt, M. S. (1972). Competition in the major home appliance industry 1960–1970. unpublished doctoral dissertation, Harvard University.
- Hutzschenreuter, T., & Gröne, F. (2009). Product and geographic scope changes of multinational enterprises in response to international competition. *Journal of International Business Studies*, 40, 1149–1170.
- Hutzschenreuter, T., Kleindienst, I., Groene, F., & Verbeke, A. (2014). Corporate strategic responses to foreign entry: Insights from prospect theory. *The Multinational Business Review*, 22(3), 294–323.
- Iriyama, A., Kishore, R., & Talukdar, D. (2016). Playing dirty or building capability? Corruption and HR training as competitive actions to threats from informal and foreign firm rivals. *Strategic Management Journal*, 37(10), 2152–2173.
- Irwin, D. A., & Pavcnik, N. (2004). Airbus versus Boeing revisited: International competition in the aircraft market. *Journal of International Economics*, 64(2), 223–245.
- Ito, K., & Rose, E. L. (2002). Foreign direct investment location strategies in the tire industry. *Journal of International Business Studies*, 33(3), 593–602.
- Jarzabkowski, P., & Bednarek, R. (2018). Toward a social practice theory of relational competing. *Strategic Management Journal*, 39(3), 794–829.
- Jayachandran, S., Gimeno, J., & Varadarajan, P. R. (1999). The theory of multimarket competition: A synthesis and implications for marketing strategy. *Journal of Marketing*, 63(3), 49–66.
- Karnani, A., & Wernerfelt, B. (1985). Multiple point competition. *Strategic Management Journal*, 6(1), 87–96.
- Kaufmann, F. (1995). Internationalisation via co-operation – Strategies of SME. *International Small Business Journal*, 13(2), 27–33.
- Kedia, B. L., Rhew, N. D., Gaffney, N. T., & Clampit, J. A. (2016). Emerging market multinationals: Coopetition for global growth. *Thunderbird International Business Review*, 58(6), 515–526.
- Ketchen, D. J., Snow, C. C., & Hoover, V. L. (2004). Research on competitive dynamics: Recent accomplishments and future challenges. *Journal of Management*, 30(6), 779–804.
- Klein, K., Semrau, T., Albers, S., & Zajac, E. J. (2020). Multimarket coopetition: How the interplay of competition and cooperation affects entry into shared markets. *Long Range Planning*, 53(1), 101868.
- Knickerbocker, F. I. (1973). *Oligopolistic reaction and the multinational enterprise*. MIT Press.
- Kotha, S., Rindova, V. P., & Rothaermel, F. T. (2001). Assets and actions: Firm-specific factors in the internationalization of U.S. Internet firms. *Journal of International Business Studies*, 32(4), 769–791.
- Kuilman, J. G., & Li, J. (2009). Grades of membership and legitimacy spillovers: Foreign banks in Shanghai, 1847–1935. *Academy of Management Journal*, 52(2), 229–245.
- Kwok, F., Sharma, P., Gaur, S. S., & Ueno, A. (2019). Interactive effects of information exchange, relationship capital and environmental uncertainty on international joint venture (IJV) performance: An emerging markets perspective. *International Business Review*, 28(5), 101481.
- Lacam, J. S. (2018). Opportunism sanctions in diverse and international co-opetition: The case of French Boating companies. *Thunderbird International Business Review*, 60(3), 427–441.
- Lazzarini, S. G. (2007). The impact of membership in competing alliance constellations: Evidence on the operational performance of global airlines. *Strategic Management Journal*, 28(4), 345–367.
- Lee, J. Y., Jiménez, A., Yang, Y. S., & Irisboev, I. (2022). The evolution of emerging market firms and time until subsidiary exit: Competitive dynamics of domestic market followers and contingency factors. *Journal of Business Research*, 145, 694–704.
- Li, F. (2022). Sustainable competitive advantages via temporary advantages: Insights from the competition between American and Chinese digital platforms in China. *British Journal of Management*, 33(4), 2009–2032.
- Li, J. (1994). Experience effects and international expansion: Strategies of service MNCs in the Asia-Pacific region. *MIR: Management International Review*, 34(3), 217–234.
- Li, J. (2008). Asymmetric interactions between foreign and domestic banks: Effects on market entry. *Strategic Management Journal*, 29(8), 873–893.
- Li, J., & Guisinger, S. (1992). The globalization of service multinationals in the “Triad” regions: Japan, Western Europe and North America. *Journal of International Business Studies*, 23(4), 675–696.
- Li, J., & Guisinger, S. (2014). Patterns of international competition in service industries: Global oligopolistic reaction and national competitive advantages. In Y. Aharoni (Ed.), *Coalitions and*



- competition (*Routledge Revivals: The globalization of professional business services*) (pp. 178–192). Routledge.
- Li, J., Yang, J. Y., & Yue, D. R. (2007). Identity, community, and audience: How wholly owned foreign subsidiaries gain legitimacy in China. *Academy of Management Journal*, 50(1), 175–190.
- Li, S. X., & Greenwood, R. (2004). The effect of within-industry diversification on firm performance: Synergy creation, multi-market contact and market structuration. *Strategic Management Journal*, 25(12), 1131–1153.
- Lindell, M., & Karagozoglu, N. (1997). Global strategies of US and Scandinavian R&D-intensive small- and medium-sized companies. *European Management Journal*, 15(1), 92–100.
- Liu, Y. (2017). The dynamics of local upgrading in globalizing late-comer regions: A geographical analysis. *Regional Studies*, 51(6), 880–893.
- Liu, Y., Jiao, J., & Xia, J. (2019). Subsidiary networks and foreign subsidiary performance: A co-competition perspective. *Management and Organization Review*, 15(1), 111–143.
- Loncan, T. (2022). Product market competition and FDI decisions. *Journal of Financial and Quantitative Analysis*, 58, 1–40.
- Luo, Y. (2007). A co-competition perspective of global competition. *Journal of World Business*, 42(2), 129–144.
- Ma, H. (1998). Mutual forbearance in international business. *Journal of International Management*, 4(2), 129–147.
- Ma, H. (1999). Determinants of strategic options in multinational market competition. *Journal of International Management*, 5(2), 93–113.
- Machokoto, M., Chipeta, C., & Ibeji, N. (2021). The institutional determinants of peer effects on corporate cash holdings. *Journal of International Financial Markets, Institutions and Money*, 73, 101378.
- MacMillan, I., McCaffery, M. L., & Van Wijk, G. (1985). Competitors' responses to easily imitated new products – Exploring commercial banking product introductions. *Strategic Management Journal*, 6, 75–86.
- MacMillan, I. C., Van Putten, A. B., & McGrath, R. G. (2003). Global gamesmanship. *Harvard Business Review*, 81(5), 62–71.
- Madhok, A. (1996). Know-how-, experience- and competition-related considerations in foreign market entry: An exploratory investigation. *International Business Review*, 5(4), 339–366.
- Madureira, N. L. (2017). Squabbling sisters: Multinational companies and Middle East oil prices. *Business History Review*, 91(4), 681–706.
- Mcgee, J., & Thomas, H. (1986). Strategic groups: Theory, research and taxonomy. *Strategic Management Journal*, 7, 141–160.
- McNamara, G., & Vaaler, P. M. (2000). The influence of competitive positioning and rivalry on emerging market risk assessment. *Journal of International Business Studies*, 31(2), 337–347.
- Meyer, K. E., & Sinani, E. (2009). When and where does foreign direct investment generate positive spillovers? A meta-analysis. *Journal of International Business Studies*, 40(7), 1075–1094.
- Mondal, A., Lahiri, S., & Ray, S. (2021). Strategic response to inward foreign direct investment: A study of Indian family firms. *Management International Review*, 61(2), 207–233.
- Moya, A. Á. (2010). Internationalisation and political bargaining under oligopoly: International Harvester in Spain (c. 1900–1980). *Business History*, 52(3), 371–389.
- Mutlu, C. C., Zhan, W., Peng, M. W., & Lin, Z. (2015). Competing in (and out of) transition economies. *Asia Pacific Journal of Management*, 32(3), 571–596.
- Nadkarni, S., & Perez, P. D. (2007). Prior conditions and early international commitment: The mediating role of domestic mindset. *Journal of International Business Studies*, 38(1), 160–176.
- Navío-Marco, J., Bujidos-Casado, M., & Rodrigo-Moya, B. (2019). Co-competition as an innovation strategy in the European Union: Analysis of the German case. *Industrial Marketing Management*, 82, 9–14.
- Norman, G., & Nichols, N. K. (1982). Dynamic market strategy under threat of competitive entry: An analysis of the pricing and production policies open to the multinational company. *The Journal of Industrial Economics*, 31(1/2), 153–174.
- Odlin, D. (2019). Domestic competitor influence on internationalizing SMEs as an industry evolves. *Journal of World Business*, 54(2), 119–136.
- O'Farrell, P. N., & Wood, P. A. (1994). International market selection by business service firms: Key conceptual and methodological issues. *International Business Review*, 3(3), 243–261.
- Oh, Y., & Yoo, N. (2022). Effective cooperation modes based on cultural and market similarities in interfirm relationships. *Journal of International Management*, 28(1), 100891.
- Onoz, E., & Giachetti, C. (2021). Will rivals enter or wait outside when faced with litigation risk? Patent litigation in complex product industries and international market entry. *Strategic Organization*, 21, 1–41.
- Parameswar, N., Dhir, S., Khoa, T. T., Galati, A., & Ahmed, Z. U. (2022). Dynamics of the termination of global alliances: probing the past, analyzing the present and defining the frontiers for future research. *International Marketing Review*, 39(5), 1093–1121.
- Park, J.-H., Park, N. K., & Zhang, A. (2003). The impact of international alliances on rival firm value: A study of the British Airways/USAir Alliance. *Transportation Research Part E: Logistics and Transportation Review*, 39(1), 1–18.
- Peng, T.-J., Yen, M.-H., & Bourne, M. (2018). How rival partners compete based on cooperation? *Long Range Planning*, 51(2), 351–383.
- Pham, T., Talavera, O., & Yang, J. (2020). Multimarket competition and profitability: Evidence from Ukrainian banks. *Oxford Economic Papers*, 72(2), 517–545.
- Pitelis, C. N., Desyllas, P., & Panagopoulos, A. (2018). Profiting from innovation through cross-border market co-creation and co-opetition: The case of global pharmaceuticals. *European Management Review*, 15(4), 491–504.
- Porter, M. E. (1979). The structure within industries and companies' performance. *The Review of Economics and Statistics*, 61(2), 214–227.
- Porter, M. E. (1980). *Competitive strategy: Techniques for analyzing industries and competitors*. Free Press.
- Powell, K. S., Takahashi, H., & Roehl, T. (2017). Status and international alliance formation. *Multinational Business Review*, 25(2), 110–127.
- Ramírez Pérez, S. M. (2020). Embedding the market during times of crisis: The European automobile cartel during a decade of crisis (1973–1985). *Business History*, 62(5), 815–836.
- Rose, E. L., & Ito, K. (2008). Competitive interactions: The international investment patterns of Japanese automobile manufacturers. *Journal of International Business Studies*, 39(5), 864–879.
- Rose, E. L., & Ito, K. (2009). Past interactions and new foreign direct investment location decisions. *Management International Review*, 49(5), 641.
- Ryu, W., Reuer, J. J., & Brush, T. H. (2020). The effects of multimarket contact on partner selection for technology cooperation. *Strategic Management Journal*, 41(2), 267–289.
- Sandström, C. G. (2016). The non-disruptive emergence of an ecosystem for 3D printing – Insights from the hearing aid industry's transition 1989–2008. *Technological Forecasting and Social Change*, 102, 160–168.
- Sanou, F. H., Le Roy, F., & Gnyawali, D. R. (2016). How does centrality in co-competition networks matter? An empirical investigation in the mobile telephone industry. *British Journal of Management*, 27(1), 143–160.



- Sargent, J., & Matthews, L. (2001). Combining export processing zones and regional free trade agreements: Lessons from the Mexican experience. *World Development*, 29(10), 1739–1752.
- Schriber, S., King, D. R., & Bauer, F. (2022). Retaliation effectiveness and acquisition performance: The influence of managerial decisions and industry context. *British Journal of Management*, 33(2), 939–957.
- Schumpeter, J. A. (1942). *Capitalism, socialism and democracy*, (UK 1943) 5th Edn (1976). George Allan and Unwin.
- Simmel, G. (1950). *The sociology of Georg Simmel*. Free Press.
- Smith, K. G., Ferrier, W. J., & Ndofor, H. (2001). Competitive dynamics research: Critique and future directions. In M. A. Hitt, R. Freeman, & J. Harrison (Eds.), *Blackwell handbook of strategic management* (pp. 315–361). Blackwell.
- Som, A. (2006). Bracing for MNC competition through innovative HRM practices: The way ahead for Indian firms. *Thunderbird International Business Review*, 48(2), 207–237.
- Steinberg, P. J., Hennig, J. C., Oehmichen, J., & Heigermoser, J. (2022). How the country context shapes firms' competitive repertoire complexity. *Global Strategy Journal*, 13, 1–29.
- Su, H.-C., Dhanorkar, S., & Linderman, K. (2015). A competitive advantage from the implementation timing of ISO management standards. *Journal of Operations Management*, 37, 31–44.
- Sun, P., Doh, J. P., Rajwani, T., & Siegel, D. (2021). Navigating cross-border institutional complexity: A review and assessment of multinational nonmarket strategy research. *Journal of International Business Studies*, 52(9), 1818–1853.
- Tallman, S. B. (1992). A strategic management perspective on host country structure of multinational enterprises. *Journal of Management*, 18(3), 455–471.
- Terpstra, V., & Yu, C.-M. (1988). Determinants of foreign investment of U.S. advertising agencies. *Journal of International Business Studies*, 19(1), 33–46.
- Tokatli, N. (2013). Doing a Gucci: The transformation of an Italian fashion firm into a global powerhouse in a 'Los Angelesizing' world. *Journal of Economic Geography*, 13(2), 239–255.
- Tsai, W., Su, K.-H., & Chen, M.-J. (2011). Seeing through the eyes of a rival: Competitor acumen based on rival-centric perceptions. *Academy of Management Journal*, 54(4), 761–778.
- Tsang, E. W. K. (2021). Multi-theoretical approaches to studying international business strategy. In K. Mellahi, K. Meyer, R. Narula, I. Surdu, & A. Verbeke (Eds.), *The Oxford handbook of international business strategy* (pp. 153–172). Oxford University Press.
- Tüselmann, H., Sinkovics, R. R., & Pishchulov, G. (2016). Revisiting the standing of international business journals in the competitive landscape. *Journal of World Business*, 51(4), 487–498.
- Tzeng, C. H. (2022). Politics, rumors and identity: How does a domestic firm challenge an MNE in the non-market environment amidst home–host political hostility? *Multinational Business Review*, 34, 64–90.
- Wang, J., Wei, Y., Liu, X., Wang, C., & Lin, H. (2014). Simultaneous impact of the presence of foreign MNEs on indigenous firms' exports and domestic sales. *Management International Review*, 54(2), 195–223.
- Wang, Y., Yao, X., & Li, K. (2022). Imitation and rapid internationalization of emerging market firms. *Journal of World Business*, 57(6), 101364.
- Wong, A., Wei, L., Yang, J., & Tjosvold, D. (2017). Productivity and participation values for cooperative goals to limit free riding and promote performance in international joint ventures. *Journal of World Business*, 52(6), 819–830.
- Wooster, R. B., & Paul, D. L. (2016). Leadership positioning among U.S. firms investing in China. *International Business Review*, 25(1, Part B), 319–332.
- Wu, J., Lao, K. F., Wan, F., & Li, J. (2019). Competing with multinational enterprises' entry: Search strategy, environmental complexity, and survival of local firms. *International Business Review*, 28(4), 727–738.
- Yang, W., & Meyer, K. E. (2019). How does ownership influence business growth? A competitive dynamics perspective. *International Business Review*, 28(5), 101482.
- Yang, W., & Meyer, K. E. (2020). How do local and foreign firms compete? Competitive actions in an emerging economy. *International Business Review*, 29(3), 101689.
- Yao, F. K., & Li, J. (2016). Multi-market contact and foreign entry location decisions in China. *Management International Review*, 56(1), 95–122.
- Yeung, A. K., & Ready, D. A. (1995). Developing leadership capabilities of global corporations: A comparative study in eight nations. *Human Resource Management*, 34(4), 529–547.
- Yeung, H. W. (2009). Regional development and the competitive dynamics of global production networks: An East Asian perspective. *Regional Studies*, 43(3), 325–351.
- Yeung, H. W., & Coe, N. (2015). Toward a dynamic theory of global production networks. *Economic Geography*, 91(1), 29–58.
- Yu, C.-M.J., & Ito, K. (1988). Oligopolistic reaction and foreign direct investment: The case of the U.S. tire and textiles industries. *Journal of International Business Studies*, 19(3), 449–460.
- Yu, T., & Cannella, A. A. (2007). Rivalry between multinational enterprises: An event history approach. *Academy of Management Journal*, 50(3), 665–686.
- Yu, T., & Cannella, A. A. (2013). A comprehensive review of multimarket competition research. *Journal of Management*, 39(1), 76–109.
- Yu, T., Subramaniam, M., & Cannella, A. A. (2009). Rivalry deterrence in international markets: Contingencies governing the mutual forbearance hypothesis. *Academy of Management Journal*, 52(1), 127–147.
- Yu, T., Subramaniam, M., & Cannella, A. A. (2013). Competing globally, allying locally: Alliances between global rivals and host-country factors. *Journal of International Business Studies*, 44(2), 117–137.
- Zahra, S. A., & Garvis, D. M. (2000). International corporate entrepreneurship and firm performance: The moderating effect of international environmental hostility. *Journal of Business Venturing*, 15(5–6), 469–492.
- Zeng, J., & Glaister, K. W. (2016). Competitive dynamics between multinational enterprises and local internet platform companies in the virtual market in China. *British Journal of Management*, 27(3), 479–496.
- Zhou, C., & van Witteloostuijn, A. (2010). Institutional constraints and ecological processes: Evolution of foreign-invested enterprises in the Chinese construction industry, 1993–2006. *Journal of International Business Studies*, 41(3), 539–556.
- Zou, L., Yu, C., & Dresner, M. (2012). Multimarket contact, alliance membership, and prices in international airline markets. *Transportation Research Part E: Logistics and Transportation Review*, 48(2), 555–565.

Publisher's Note Springer Nature remains neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Springer Nature or its licensor (e.g. a society or other partner) holds exclusive rights to this article under a publishing agreement with the author(s) or other rightsholder(s); author self-archiving of the accepted manuscript version of this article is solely governed by the terms of such publishing agreement and applicable law.



Fiona Kun Yao is Assistant Professor of International Business and Strategy at the Gies College of Business, University of Illinois, Urbana-Champaign. She received a Ph.D. from the Haas School of Business, University of California, Berkeley. Her main research interests include global strategy and the interactions between firms and institutions in international business.

Ming-Jer Chen is the Leslie Grayson Professor at the University of Virginia's Darden School of Business. A pioneer in competitive dynamics and ambicultural management, he has written two books and published in *Academy of Management Review* (AMR) and *Strategic Management Journal* (SMJ), among others. He has received numerous awards including the AMR (1996) and Journal of Management Inquiry (2008) Best Paper Awards. A Fellow and President of the Academy of Management and Fellow of the Strategic Management Society, he has served as AMR's associate editor and chair of the Academy's Business Policy and Strategy Division. Before Darden, he was on the faculties of Columbia and Wharton/Penn. He has held honorable or visiting appointments at universities in China, Taiwan, Hong Kong, and Singapore. He has contributed to the East–West dialogue through keynote speeches at forums hosted by the World Economic Forum and HSM, and as a columnist for Harvard Business Review (Chinese).

Jiatao Li is Chair Professor of Management, Lee Quo Wei Professor of Business, Director of the Center for Business Strategy and Innovation, and Senior Fellow of the Institute for Advanced Study, Hong Kong University of Science and Technology. He is a Fellow of the

Academy of International Business and an editor of the *Journal of International Business Studies*. His research interests are in the areas of global strategy, innovation, entrepreneurship, corporate governance, and digital economy.

Danielle Combs is Assistant Professor of International Business in the Department of Management at the University of Alabama. She received a PhD from the University of Illinois at Urbana-Champaign Gies College of Business. Her research interests include cross-national variation in institutions and regulatory environments, FDI strategies, and corporate governance.

Qiang Li is Associate Professor of Strategy at the China Europe International Business School. He received a PhD in Strategy and Entrepreneurship from the University of Maryland. His research focuses on strategic decision-making and corporate governance. The topics he has studied include top management team information search, CEO turnover, board leadership structure, director turnover, and firm wrongdoings.

