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Quits vs. Discharges across Job Levels: Revisiting the Positive Side of Turnover

Although scholars have repeatedly noted that employee turnover may have positive effects both at the group and organizational levels (Laulié & Morgeson, 2020; Mowday, Porter, & Steers, 1982), the well-established arguments about the costs, losses of human and social capital and the operational impairment of units involving departures has resulted in the consideration of turnover as "an important organizational problem that is costly and should be reduced" (Dalton, Todor and Krackhardt, 1982, p.117). Such view is supported by an accumulation of evidence over the last decades pointing to a linear negative relationship between turnover and different indicators of performance (Hancock, Allen, Bosco, McDaniel, & Pierce, 2013; Hancock, Allen, & Soelberg, 2017; Heavey, Holwerda, & Hausknecht, 2013; Park & Shaw, 2013).

Yet, solid arguments also hold up the benefits of employees' departures in several scenarios, such as company-triggered dismissals or poor-performers' quits (Abelson and Baysinger, 1984; Trevor and Piyanontalee, 2020). Although any departure entails costs (Batt and Colvin, 2011), they may be outweighted through gains in staff motivation (Laulié and Morgenson, 2020), renovation and unit innovation (Dalton and Todor, 1979; Maltarich, Reilly and DeRose, 2020). Furthermore, the linear negative relationship is not universally supported, with studies reporting positive effects (Keck, 1997; Virany, Tushman, & Romanelli, 1992) or showing nonsignificant relationships (Park & Shaw, 2013), and tests of the inverted-U formulation of the turnover–performance link (Shaw, 2011) have also signaled beneficial effects under low levels of departures (Glebbeek & Bax, 2004; Messersmith, Lee, Guthrie, & Ji, 2014; Siebert & Zubanov, 2009). Therefore, both theoretical arguments and empirical results so far underpin the statement that "it is

too early to conclude that the relationship between turnover and firm performance is straightforwardly negative" (Hancock et al., 2013, p. 2).

Pointing to this need for a deeper understanding of the consequences of turnover, researchers are examining specific characteristics of leavers that may influence the performance damage caused by exits. For example, Call, Nyberg, Ployhart and Weekly (2015) found that, as departures increased, the performance loss of units was mitigated when turnover was composed of low-quality employees. Similarly, Hale, Ployhart and Shepherd (2016) showed that units recover more quickly from an employee departure than from a managerial one. Other research is zooming in specifically on the positive effect of turnover. Thus, Maltarich et al (2020) provide evidence of a positive relationship -mediated by workers' average contribution- between dismissals and unit performance.

In accordance with this line of thought, although adopting a theoretical perspective, Trevor & Piyanontalee (2020) assert that more fine-grained analyses of the types of turnover may help identify their functional effects on unit performance. Following their approach, the objective of the present paper is to add specificity to the turnover phenomenon by integrating the classical distinction between quits and discharges (Price, 1977; Dalton et al, 1982; Hausknecht and Trevor, 2011) with a differentiation between job levels (staff vs. managers). In this manner we combine the relative value provided by leavers to the unit -which is key in determining the impact of turnover (Hale et al, 2016; Hausknecht and Holwerda, 2013)- with the departure reason. Turnover specificities have been characterized as "inextricably linked with one another" (Hausknecht and Holwerda, 2013, p.218), and we contend that the "why" and the "who" of turnover are conceptually imbricated.

Our first source of specificity has to do with the turnover type. It has long been accepted that quits and discharges have distinct etiologies (De Meulenaere, De Winne, Marescaux & Vanormelingen, 2019; Hausknecht and Trevor, 2011; Price, 1977). While quits reflect an employee's decision to leave an organization voluntarily, discharges are initiated by companies due to poor performance or disciplinary causes (Mobley, 1982; Shaw, Delery, Jenkins and Gupta, 1998). Quits are overwhelmingly considered detrimental, although scholars argue that a part of them may actually be functional (Trevor and Piyanontalee, 2020). For its part, the impact of discharges is yet less clear (Park and Shaw, 2013; Hausknecht, 2017). On the one hand, a discharge may trigger motivation to increase collective performance in the unit (Datta, Guthrie, Basuil & Pandey, 2010). On the other hand, in a more counterintuitive vein, discharges can aggravate performance by raising dysfunctional perceptions of job insecurity (Shaw et al, 1998) or cause levels of operational disruption that outweight their intended benefits (Trevor and Piyanontalee, 2020). With limited exceptions (e.g., Maltarich et al, 2020), research so far has failed to provide conclusive evidence of positive effects of discharges. Therefore, greater understanding of the potentially distinct benefits of turnover types is needed.

The second dimension is the role that leavers hold in the unit (Hausknecht & Holwerda, 2013; Hancock et al., 2013), in particular the distinction between managerial versus nonmanagerial turnover (Kacmar, Andrews, Van Rooy, Steilberg and Cerrone, 2006; Hale et al, 2016). In contrast to staff employees, managers accumulate tacit knowledge that is hard to transfer and replace (Eckardt, Skaggs, & Youndt, 2014), they are key role holders (Summers, Humphrey, & Ferris, 2012) and their efficiency is tied closely to unit results (Fizel & D'Itri, 1999). For the most part manager departures are

individual events expected to affect the unit in a more disruptive way (Hauknecht & Holwerda, 2013; Kacmar et al, 2006; Summers et al., 2012). Empirical research has also found distinct consequences of managerial versus employee departures (Haleet al, 2016; Li, Hausknecht & Dragoni, 2020); on account of this, not taking the job level into account represents an important oversight if we intend to reveal the benefits of quits and discharges on unit performance.

Building upon this two-dimensional -turnover type/job level- framework, we argue the consequences of turnover on four scenarios, each one presenting a combination of managerial and non-managerial quits and discharges. In this manner, we perform integrative research that reveals the potential benefits of departures for each scenario, thus extending our current knowledge about the positive side of turnover. Since this study shares common ground with previous research (e.g., Siebert and Zubanov, 2009; Glebbeek and Bax, 2004; Kacmar et al, 2006), our joint analysis permits to perform an independent, constructive replication (Köhler and Cortina, 2021) and extend earlier findings in a more holistic way. In addition, we account for the unit-level consequences of both individual and collective turnover to examine the impact of managerial versus nonmanagerial turnover, adding to the growing research on how units react to individual member departures (Hale et al., 2016; Trainer, Jones, Pendergraft, Maupin, & Carter, 2020).

We test our hypotheses over 24 months using a sample from a multinational fashion retail industry with eight different brands and more than 130,000 employees in 94 countries. Analyses were carried out using a dynamic model with panel data that controls for relevant omitted variable biases, such as the quality of the unit workforce (Glebeek & Bax, 2004; Siebert & Zubanov, 2009; Trevor & Piyanontalee, 2020). By

applying fixed-effects analysis to a multinational company sample, our findings can be generalized across multiple geographic locations. Moreover, the characteristics of our database allowed us to test each turnover scenario using independent subsamples and instrumental variable estimation, thus avoiding endogeneity biases (Aguinis & Edwards, 2014).

The present study makes the following specific contributions. First, following the call for more nuanced analyses of turnover, we examine in which way turnover types and the job level of leavers operate together over time. The analysis of the joint effect of these turnover specificities has revealed distinct consequences over unit performance, extending our knowledge about the positive side of turnover. Second, the differentiation between turnover types allowed us to show that discharges were beneficial for the unit, shedding light over the phenomenon of discharges that has received limited attention so far (Hausknecht, 2019; Trevor & Piyanontalee, 2020). Also, our results about staff quits are consistent with previous studies in the field (Hancock et al, 2017; Shaw, 2011) that signal benefits of voluntary turnover under low levels of departures. Third, we add to the scarce but growing literature regarding the role of key employee groups in the turnover–performance relationship (Hancock et al., 2013; Hale et al, 2016; Revilla et al, 2019). Our findings show job levels do not affect the significance of linear, positive relations between discharges and unit performance. Finally, our study contributes to practice by making managers cognizant of the scenarios in which turnover may be beneficial and therefore reconsidering their retention policies in the light of a more balanced view of the functionality of employees' departures.

CONCEPTUAL DEVELOPMENT AND HYPOTHESES

Although from the early stages of turnover research investigators have recognized that a portion of departures should be functional for the organization (Dalton & Todor, 1979; Mowday et al., 1982), this assumption has not either materialized into a theoretically cohesive body of knowledge in the literature (Maltarich et al., 2020; Trevor & Piyanontalee, 2020) and the empirical evidence of positive effects is very limited and (Maltarich et al, 2021).

Following the call for exploring potential benefits of turnover through scrutinizing sources of specificity of the phenomenon (Hausknecht & Holwerda, 2013; Trevor & Piyanontalee, 2020) we examine in detail to what extent the joint effect of two dimensions, turnover types and job levels, show beneficial or impairing effects on unit performance.

Quits vs. Discharges

Relying on Mobley (1982), Hom & Griffeth (1995) defined quits as the "voluntary cessation of membership in an organization by an individual who receives monetary compensation for participation in that organization" (p. 5). Quits are assumed to affect high performers fundamentally (Shaw et al., 1998) and reflect an employee's choice (Campion, 1991). Consequently, they are not wanted by companies (Heavey et al., 2013; Shaw, 2011) and are unanticipated (Hausknecht & Holwerda, 2013).

The fact that quits are not under the control of the firm turns them especially problematic for several reasons. First, until replacements accumulate human capital at least equivalent to that of the leavers, the unit suffers from the outcome of less-proficient employees (Laulié & Morgeson, 2020; Siebert & Zubanov, 2009), and remainers have to take on part of their work to compensate for the gap (Hausknecht, Trevor & Howard,

2009). Furthermore, although the loss of individual explicit knowledge (*know-what*) may be counterbalanced through additional investments in human capital (Christian, Pearsall, Christian, & Ellis, 2014; Dess & Shaw, 2001), the development of tacit knowledge requires team interaction and practice (Grant, 1996), and the idiosyncratic nature of *know-how* makes it burdensome to capture the previous functioning of unit (Huckman & Pisano, 2006; Kacmar et al., 2006).

Quits also impair social capital by altering communication channels, breaking relational ties based on trust, and damaging the transactive memory of the group (Argote, Aven, & Kush, 2018; Dess & Shaw, 2001). Consequently, remainers get diverted in their work because they must add training and socialization of the newcomers to their routines (Hausknecht et al., 2009). In addition, voluntary leavers can play an instrumental role in the perceptions of affiliation of other unit members, thus affecting the climate rather than the operations of the unit (Mowday et al., 1982). Also, they can model quitting to remainers and make job alternatives seem more salient (Staw, 1980). These effects can be exacerbated when leavers are long-tenured employees or show high levels of commitment (Rubenstein, Eberly, Lee, & Mitchell, 2018), or when the general levels of turnover in the unit are low (Holtom, Mitchell, Lee, & Inderrieden, 2005).

In contrast to all these conventional claims about the detrimental effects of quits, a number of beneficial effects can also be argued. First, poor performers may decide to leave to avoid demotion or discharge (Jackofsky, 1984). These quits have recently been characterized by Trevor and Piyanontalee (2020) as "voluntary leavers who are in the bottom of the performance distribution (...) , who are viewed by management as likely to be replaceable by better employees but not as performing badly enough to warrant firing, and who have not felt compelled to quit due to likely impending discharge" (p. 5.8). Also,

employees may quit if they perceive a lack of personal "fit" with the job or the organization, which allows employers to improve job matching (Jovanovic, 1979; Siebert & Zubanov, 2009). Quits can also create positive effects through their impact on stayers (Laulié & Morgeson, 2020; Mowday, 1981), by offering remainers an opportunity to reassess their employment and open up potential opportunities for career advancement (Mowday et al., 1982). Finally, quits improve flexibility in adapting staffing to changing business conditions (Glebbeek & Bax, 2004; Siebert & Zubanov, 2009), and the unit can benefit from leveraging the motivation of the replacing hires (Hesford, Malina & Pizzini, 2016).

While quits are decided by employees, at the other end of the spectrum we find discharges, defined as idiosyncratic exits with the employer-initiated separation attributed to poor performance or unacceptable behavior (McElroy, Morrow & Rude, 2001). Discharges are a subset of involuntary turnover, distinct from the so-called layoffs, reductions in force, or downsizing, which result from economic and strategic reasons and are not followed by replacements (Lee, 2018). Discharges also differ from contract expirations, which are planned to adjust capabilities to demand requirements (Kesavan, Staats, & Gilland, 2014), regardless of workers' performance (De Stefano, Bonet, & Camuffo, 2019).[1] Discharges can signal poor performance or insubordination (McElroy et al., 2001), thus outlining selection and hiring errors (Batt & Colvin, 2011) or a problematic or poorly managed workforce (Hausknecht & Trevor, 2011).

Unlike quits, discharges are assumed to be fundamentally beneficial under the assumption that replacements will be of higher quality than leavers (Trevor &

[1] Other types of involuntary separations not under the initiative of the employer, such as death and mandatory retirement (Mobley, 1982), are not generally considered in organizational research. Internal flows, such as transfers and promotions, are not included in turnovers either, because the employee does not move across the boundaries of the organization (Price, 1977).

Piyanontalee, 2020). First, poor performers are replaced with at least average ones, thus relieving the extra workload for remainers (Della Torre, Zarzick, Sikora, & Solari, 2017) and increasing the human capital of the unit (McElroy et al., 2001). Furthermore, fear of future discharges may lead workers to maximize their contribution to the unit (Datta et al, 2010), and the opening vacancies may motivate remainers by opening up mobility opportunities (Dalton & Todor, 1979; Lee, 2018).

Discharges can also act positively on the social capital of the unit. The arrival of more capable members may lead to team investments in the system of relations with newcomers to the unit (De Meulenaere et al., 2021). They also reinforce the knowledge base of performance norms for the team (Trevino, 1992), which decreases the level of operational disruption (Staw, 1980; Lee, 2018). Removing "bad apples" increases the trust of remainers in the company's integrity (Colquitt & Rodell, 2011) and mitigates ingrained conflicts created by the presence of undesirable workers (Staw, 1980).

Despite these argued benefits, and like any type of departure, discharges bring about negative consequences for the unit. They cause a loss of human capital and operational disruption (Hausknecht & Holwerda, 2013) and may also create perceptions of job insecurity (Hom, Mitchell, Lee, & Griffeth, 2012; Iverson & Deery, 1997) or injustice among remainers (Lee, Gerhart, Weller & Trevor, 2008) that may act as a trigger for coworker quits (Laulié & Morgeson, 2020). However, these levels of disruption do not necessarily result in net damage for unit performance (Maltarich et al, 2020).

Managerial vs. Staff Turnover

The extant, scarce literature on the role that the job level of leavers play on the turnover-performance contends that the differentiation between staff and managers is influential (Hancock et al., 2013; Watrous, Huffman, & Pritchard, 2006).

Although not denying the relevance of their experience and job skills on unit performance, staff members are considered noncore role holders and do not usually bear a high degree of differentiation among themselves, in particular with regard to their relative criticality for the unit's success (Humphrey, Morgeson & Mannor, 2009). These workers accumulate social capital through members' shared trust and common goal orientation (Leana & van Buren, 1999). It is this social embeddedness of individual contributions that allows for instrumental action at the collective level (Nahapiet & Ghoshal, 1998; Shaw, Duffy & Johnson, 2005).

Presumably as a result of the lack of role differentiation and the primacy of the social network over individual contribution, it is generally assumed that the impact of staff turnover grows in accord with the proportion of leavers in a team (Kuypers, Guenter, & van Emmerick, 2018). Insofar as unit productivity is a function of the accumulation of firm-specific human capital, any depletion should bring about negative consequences (Dess & Shaw, 2001; Nyberg & Ployhart, 2013). Elevated numbers of staff quits can also cause operational disruptions in the unit (Staw, 1980).

Beneficial effects can be argued in the case of high levels of poor-performer discharges (McElroy et al., 2001; Trevor & Piyanontalee, 2020). It has also been suggested that low to moderate levels of staff quits may be desirable for the unit in terms of preventing skill stagnation, and injecting motivation in remainers (Alexander, Bloom & Nuchols, 1994) and flexibility in the unit (Messersmith et al., 2014), although this

effect would be outbalanced by adverse effects as the proportion of quits grow (Shaw, 2011).

In contrast with staff positions, the human capital of managers involves the capacity to access and organize valuable resources and materialize them into a competitive advantage for the company (Holcomb, Holmes & Connelly, 2009; Kor & Mahoney, 2005; Messersmith et al., 2014). Managers are the main recipients of tacit, firm-specific knowledge that is nonverbalized and intuitive (Polanyi, 1967), and is particularly time- and effort-consuming to transfer (Eckardt et al., 2014). In addition, managers are central nodes in the network of social relationships in the unit (Dess & Shaw, 2001; Shaw et al., 2005), and at higher hierarchical levels as well, which increases their significance (Watrous et al., 2006). They also structure the workflow of the team (Lepak & Snell, 1999), and influence planning and coordination processes (Hale et al., 2016). This structural power conferred to the position allows managers to reshape job demands, routines, and workloads of remainers in an important way, which affects "they way of doing things" at the unit level (Laulié & Morgeson, 2020; Reilly, Nyberg, Maltarich, & Weller, 2014). This influence may decrease when there is a high level of process conformance in the units, because discretionary decisions are minimized (Ton & Huckman, 2008) and limited to sorting out problems that staff cannot resolve (Eckardt et al., 2014).

As a result of the highly influential role of managers, in contrast to the collective consideration of staff departures, research on managerial turnover increasingly emphasizes how the departure of an individual creates effects at the unit level (Hale et al., 2016; Kacmar et al., 2006; Messersmith et al., 2014; Trainer et al., 2020). Managerial departures are generally characterized as disturbing idiosyncratic events that tend to

damage the transactive memory of the team (Christian et al., 2014) and affect the whole network, rather than specific unit members (Laulié & Morgenson, 2020), creating a reverberating effect that multiplies staff quits (Kacmar et al., 2006). Such events elicit uncertainty among staff employees forcing them to question whether they should remain (Li et al., 2020), which creates "shocks" in the commitment of the unit based on their individual influence on the team (Reina, Rogers, Peterson, Byron, & Hom, 2017). Consequently, the team takes longer to recover from managerial turnover than from staff turnover (Hale et al., 2016).

However, managerial departures may not always be detrimental. The discharge of abusing managers can improve the unit's climate (Laulié & Morgeson, 2020), and if managers are judged as poor performers, their exit will create positive expectations among staff about the future (Li et al., 2020). The reactions of remainers may have a positive effect on the unit if the team trusts the incoming leader compared to the departing one (Ballinger, Lehman, & Schoorman, 2010).

The combination of the former sources of specificities results into four turnover patterns: staff quits, staff discharges, managerial quits and managerial discharges, which allows us to analyze their joint effects and discuss the turnover phenomenon from a more holistic perspective. In the next sections, we develop hypotheses about the effects of each of these turnover patterns on unit performance.

Effects of Staff Quits and Discharges on Unit Performance

Challenging the traditional linear negative view of the turnover–performance relationship (Hausknecht, 2019; Park & Shaw, 2013) and following arguments originally stated by Dalton and Todor (1979) and Abelson and Baysinger (1984), we contend that, when the level of staff quits is low, the benefits of turnover will exceed the negative impact on unit

performance. It is widely recognized that any unexpected employee departure comes at a cost for the company (Abelson & Baysinger, 1984; Hausknecht & Trevor, 2011). However, we argue that positive effects will outweigh these costs when the level of departures is low. First, a small number of staff quits signals a lack of fit between the employer and the worker, thus allowing the employer to improve the human capital of the unit (Jovanovic, 1979; Siebert & Zubanov, 2009) by opening up space to hire more suitable employees (Hom et al., 2012). There may also be cases of poor-performer quits that are valued exits for the organization (Trevor & Piyanontalee, 2020) and that offer remainers the opportunity to gain more salience, with the consequent motivation to improve the quality of their work (Mowday et al., 1982). In addition, the unexpected depletion of human capital caused by a low number of noncore departures may be superseded by the benefits in terms of renovation and diversity of the unit through the arrival of replacements (Alexander et al., 1994; Park & Shaw, 2013), and an increase in the adaptability of the unit (Shaw, 2011).

We also claim that, although quits affect the network created by the members in the team, low levels of staff turnover would not significantly damage the social capital of the unit (Dess & Shaw, 2001), nor would they impair the operational network, because the leavers are not bridging or nonredundant links (Burt, 1997; Shaw et al., 2005). Under these conditions, transactive memory still preserves the pool of knowledge and expertise of the network (Wegner, Raymond, & Erber, 1991). On the other hand, the sharing of expertise and skills within a network of interactions may not only buffer the potential negative effects of a small number of departures, but it could even add potential performance value to the organization by preventing stagnation and amplifying information exchange among remainers in the unit (Dess & Shaw, 2001)

These benefits would show from low to moderate levels of turnover (Park & Shaw, 2013), but after this "optimal point" (Abelson & Baysinger, 1984) is overrun, increased staff turnover rates would make that cost exceed the benefits, with the quits becoming detrimental to unit performance. A high number of simultaneous departures implies a significant depletion of human capital for the unit (Nyberg & Ployhart, 2013), impairs the processes necessary for efficient operation and response to customer demands (Ton & Huckman, 2008), cuts back the knowledge base of the group (Holtom & Burch, 2016), and adds to workload of the remainers (Hausknecht et al., 2009).

Similarly, moderate to high levels of staff quits also damage the transactive memory of the team (Lewis, Belliveau, Herndon, & Keller, 2007), which places major socialization demands on the remainers (Hausknecht et al., 2009), forcing the unit to divert resources from core activities and to alter the performance of job roles (Shaw et al., 2005). This instability in the social network of the unit can lead remainers to react with dysfunctional behaviors and cause a decrease in performance (Hom et al., 2012). From a social viewpoint, when an optimal point of turnover is exceeded, it also affects the perceptions of the organizational climate, disturbing the network of affiliated bonds (Mowday et al., 1982) and signaling that there are better opportunities in the market (Shaw et al., 1998). As such, we hypothesize the following:

Hypothesis 1a: The relationship between staff quits and unit performance has an inverted-U shape.

In contrast to quits, staff discharges are assumed to be functional for the unit because they aim at rectifying bad hiring decisions (Shaw et al., 1998; Siebert & Zubanov, 2009). In the case of discharges, companies incur selection and training costs for newcomers, but the opportunity cost of poor performing is also high (Trevor &

Piyanontalee, 2020). Discharges allow companies to replace poor performers with more capable employees, which should result in improved performance (Abelson & Baysinger, 1984; Della Torre et al., 2017). In this respect, Maltarich et al. (2020) proposed that for entry-level positions, "a more active approach to discharges can improve worker quality enough to outweigh increases in costs associated with the practice and result in a net benefit to firms" (p. 527).

We claim that the capacity to anticipate the turnover event is one of the key determinants of the differential impact of discharges vs. quits on unit performance. In the case of staff employees, human capital theory presupposes that the anticipated and planned loss of firm-specific knowledge conveyed by discharges may be compensated and superseded rapidly by the replacements (Della Torre et al., 2017), who should (assumedly) be better performers and more motivated to learn and achieve (Lee, 2018). Alternative views of involuntary turnover (Trevor & Piyanontalee, 2020) question the common belief that replacements are better than leavers. However, we hold that, because discharges are a company decision, new employees can be selected in advance to minimize the operational disruptions caused by a departure before it actually happens (Holtom et al., 2005), thus minimizing selection errors.

Even when any departure, regardless of its type, brings about some operational disruption (Batt & Colvin, 2011), idiosyncratic discharges free the unit from stress and overwork caused by poor performers (De Stefano et al., 2019), and preserve the performance norms and standards of the unit (Trevino, 1992). In addition, these discharges may send a warning signal to remainers (Lee, 2018; Meier & Hicklin, 2008) that may encourage them to explore alternatives in the market, which may result in poor-performer quits (Trevor & Piyanontalee, 2020), which are positive for the unit (Dalton et

al., 1982). Also, fear of being "next on the list" may motivate greater productivity on the part of remainers (Datta et al., 2010; Lee & Mitchell, 1994).

Idiosyncratic discharges also convey benefits for the unit's social network through remainers, who may be willing to socialize and integrate the more capable replacements into the team (De Meulenaere et al., 2021), thus mitigating the potential impairment of the network. In the case of staff discharges, remainers assign the cause for termination to the leaver and not to the firm (McElroy et al., 2001; Mowday, 1981), thus reinforcing commitment by building trust in the organization (Colquitt & Rodell, 2011). Thus, we hypothesize the following:

Hypothesis 1b. The relationship between staff discharges and unit performance is linear positive.

Effects of Managerial Quits and Discharges on Unit Performance

Managerial quits are likely to have a profound impact because managers' experience and the resulting firm-specific tacit knowledge are valuable resources difficult to replace. Because of this fact, their human capital can only be transferred in part from or to other units (Huckman & Pisano, 2006). Their knowledge can be facilitated through mentoring or other processes, but it is costly and time-consuming if not planned in advance (Eckardt et al, 2014). Also, managers hold the highest position in the structure of a unit, thus increasing the potential for disruption by comparison with lower level jobs (Staw, 1980; Hale et al., 2016). The meta-analysis by Hancock et al. (2017) found that studies using managerial samples showed a greater negative impact than those composed of nonsupervisory employees or a combination of all positions, although the reasons for departure are not mentioned. In addition, Hale et al. (2016) observed that, although units experienced disruption after any kind of turnover, recovering their former level of

performance was significantly harder when they experienced individual managerial departures of an unspecified type. In summary, when managers quit, losing their tacit, firm-specific knowledge leads to reduced levels of performance. We are assuming, in general, that the departures should be at least average performers; in the case of poor-performing manager quits we estimate there should be positive effects on the unit, because a replacement will assumedly contribute higher quality human capital and the unit would benefit from this improvement.

Social capital arguments also note the particular losses associated with managerial quits. Managers are critical network members, responsible for identifying and coordinating expertise (Argote et al., 2018), and for leading the adaptation of the unit to other turnover events, replacing departures and reorganizing the team to minimize performance losses (Hale et al., 2016). Therefore, individual departures of managers produce dysfunctional holes in the social structure of the unit (Messersmith et al. 2014), especially in the case of direct-line leaders, who develop closer ties with unit members and influence team members' decisions to stay or quit (Li et al., 2020). Competent managers who use inspirational appeals and prompt a positive attitude toward work may also act as role models for employees (Reina et al., 2017), and their leaving decision can signal that promotional positions are not available or attractive (Hom et al., 2012). This factor can create group-level negative perceptions of the workplace and may prompt employees to search for other job alternatives outside the company (Bartunek, Huang, & Walsh, 2008). Thus, we expect that managerial quits are consistently detrimental to unit performance, and we hypothesize the following:

Hypothesis 2a. The relationship between managerial quits and unit performance is linear negative.

For their part, managerial discharges are planned events, and therefore the company can be ready to replace the leaver with the best possible candidate—who will be committed to perform effectively in the new position—in a timely fashion (Mayer & Shoorman, 1998). Because the experience and skills of managers have a greater impact on the performance of the team (Humphrey et al., 2009), the replacement of poor-performing supervisors with at least average ones should bring about benefits to the unit. Given the centrality of a managerial role (Dess & Shaw, 2001), a discharge decision is taken after a careful recognition of poor performance and plans for the best possible replacement (with tacit knowledge of organizational style and procedures) should include minimizing the damage associated with this type of departure during the disruption phase to accelerate the recovery of the unit (Hale et al., 2016).

Social capital arguments reinforce the positive consequences of managerial discharges vs. the detrimental impact of quits in terms of the relevance of managers as key role holders for the purposes of building trust and a shared vision (Nahapiet & Ghoshal, 1998). Under poor managerial execution, a network experiences deficits in accumulated tacit knowledge and leveraging of team members' talent (Dess & Shaw, 2001). In particular, it has been argued that a strong base of social interactions may tie key workers to the company, and an impoverished network may trigger dysfunctional departures (Ballinger, Craig, Cross, & Gray, 2011). Although the literature notes that managerial exits should, in general, be considered disruptive (Shapiro, Hom, Shen, & Agarwal, 2016), we contend that, unlike the quit of a good manager, the discharge of an undesirable one is beneficial for the unit because a better replacement will improve decision quality (Dess & Shaw, 2001), leadership, and coordination of unit members (Argote et al., 2018), as well as increase the morale of the team (Staw, 1980). Along these

lines, it has been shown that employees' reactions to managerial turnover tend to be more positive when their perception of the departing manager is low (Ballinger et al., 2010), because this conveys an expectation of improvement in their working conditions. In this respect, Li et al. (2020) showed that employees in the hospitality industry tended to stay in the organization after the exit of poor-performing mid-level leaders, and that unit stability increased when the replacements were promoted internally and had some previous managerial experience. Admittedly, however, these effects may turn negative in the case of simultaneous discharges of several managers, which we consider an unlikely event. Therefore, we hypothesize the following:

Hypothesis 2b. The relationship between managerial discharges and unit performance is linear positive.

METHOD

Research Setting

Our initial sample consisted of 6,519 stores of a multinational fashion retailer, with a group of eight different brands located in 52 countries for the years 2015 and 2016. We concentrated on store managers and staff, excluding data about corporate employees because their operational dynamics depart from those in store units.

Larger stores (more than 30 employees) have several layers of managers; at any rate, each unit has at least two in order to cover the whole range of shopping hours. Managers supervise merchandising and stocking, cash lines, fitting rooms, and employees. Stores operate under a standardized basis all over the world, with slight differences resulting from factors like brand positioning or local customs. This standardization, together with a carefully designed onboarding procedures, minimizes the learning curve of new hirings, which is estimated by company officers in about two

weeks. For their part, managers organize the human resources in the store on the basis of 1) the commercial strategy of the company, 2) their unit performance (available in daily logs), and 3) the directives of headquarters in terms of contracted hours for the period. We also collected from company officers in the headquarters that, as part of their human resources strategy, managerial positions are mostly covered through internal promotions, thus buffering the impact of the departures and guaranteeing a smooth continuation of the operations in the store.

We used company records that registered monthly observations of our variables across stores for the years 2015 and 2016. Data consisted of two main data file types: one with store information and another with working contracts. Also, an ancillary dataset with per-year, per-country unemployment indices was imported from Organisation for Economic Co-operation and Development (OECD) data repositories.

The data files were processed to create new datasets with different analysis levels in tidy format (Wickham, 2014). We created a dataset for (i) store-level data, to control for extraneous variables (ii) period-level data, with one entry for each unique combination of store and month, and (iii) employee-level data with unique employee identifiers along with sociodemographic variables.

Stores that had not been opened during the 2-year span considered in the analyses were dropped from the database. We also excluded entries for working centers, which are not stores (mainly headquarter offices), or stores without a valid unique identifier. Consequently, the final version of the combined dataset included 39 countries with 119,226 month-by-month observations for 5,202 stores. Our final sample consisted of an unbalanced panel dataset (i.e., we do not have the same number of observations for each store) because there were missing data for a number of stores in the files we combined to

create our final sample. Nonetheless, for all stores in our final sample, we had at least 12 months of data from 1 year to avoid potential bias from missing 1 month during a year, as this could create an issue resulting from seasonality.

Measures

Revenues. To capture the performance of each store, we used monthly revenues. We first checked the distribution of this variable to determine the most appropriate transformation for it with the most common method that searches a subset of the ladder of powers (Tukey, 1977) to transform the variable into a normally distributed one. Our efforts revealed that using the logarithm is the most appropriate form. In addition, past related literature has also used the logarithm for such dependent variables (e.g., De Stefano et al., 2019). We therefore used the logarithm for our dependent variable.

Staff Quits. We captured this variable by using store *i*'s number of nonmanagerial departures that took place voluntarily during month *t*, divided by the number of active employees in store *i* at the beginning of month *t*. This approach is consistent with past research (Kacmar et al., 2006; Shaw et al, 2005), as the magnitude of departures should be considered in relation to the number of individuals employed in the store (Van den Vegt et al., 2010). Our approach is described later in the "Robustness Checks" section. The cross-sample, between-store yearly rate of staff quits for our sample is 4.64%, with values ranging from 0.67% to 12.61%.

Staff Discharges. We captured this variable by using store *i*'s number of nonmanagerial discharges during month *t*, divided by the number of active employees in store *i* at the beginning of month *t*. The cross-sample rate of staff discharges for our sample is 0.45%, with a minimum of 0 and a maximum of 6.35%. These rates fall within the range of other studies using this variable (e.g. McElroy et al., 2001; Maltarich et al., 2020). In the

manner of staff quits, our approach for staff discharges is consistent with past literature and is described later in the "Robustness Checks" Section.

Managerial Quits. We used a binary variable to capture quits from managers in our setting. Specifically, this variable for store during month *t* is equal to one if there was at least one managerial departure that took place voluntarily at store *i* during month *t*; otherwise, this variable is equal to zero. We also modify this approach later in the "Robustness Checks" section.

Managerial Discharges. We used a binary variable to capture discharges of managers in our setting. Specifically, this variable for store *i* during month *t* is equal to one if there was at least one manager departure that took place involuntarily at store *i* during month *t*; otherwise, this variable is equal to zero. We also modify this approach later in the "Robustness Checks" section.

It is worth noting that in the same store, both managerial and staff departures can happen during a month, as can quits and discharges. Our approach allows us to examine their effect separately by isolating the impact of one event from the other based on the way we define our four variables of interest. We also describe this later in the "Robustness Checks" section.

Control Variables

Staff Size. To account for the different effects of the number of staff we calculated the average number of active employees at store *i* for month *t*. This variable is commonly used as a control in this type of studies (Hale et al., 2016) and has been shown to influence the collective turnover-performance relationship (De Meulenaere et al., 2021).

Average Staff Tenure. This variable is related to the accumulation of firm-specific human capital in the unit and was captured by calculating the average number of years of each

staff member at store *i* for month *t*. Past literature argues that average staff tenure may help control for workforce quality (Siebert & Zubanov, 2009), and meta-analytic findings have shown that units with higher levels of tenure tend to experience less turnover (Heavey et al., 2013).

Permanent Contracts. The number of employees with permanent contracts could have an effect on store performance (De Stefano et al., 2019). We therefore determined this variable by calculating the number of employees with a permanent contract for each store *i* for every month *t* and divided it by the number of active store employees at store *i* at the beginning of that month *t*.

Full-time Staff. The proportion of full-time employees could affect the inflow and outflow of employees in the stores (Siebert & Zubanov, 2009). We determined this variable by calculating the number of full-time employees (working 30 hours or more per week) for each store *i* at month *t* and dividing by the number of active employees of store *i* at the beginning of that month *t*. Past literature has shown that full-time employees can increase revenues in our setting (Kesavan et al., 2014).

Unemployment. Turnover has been found to be influenced by the availability of opportunities in the labor market and can serve as a proxy for labor supply. Past related studies have used unemployment as a control variable (e.g., Hausknecht, Trevor & Howard, 2009). We captured the unemployment rate at the national level for 2015 and 2016. Although in the case of larger countries national unemployment rates may not be fully informative, the ones included in our sample are of very different sizes, with only 6 of them with populations larger than 100M and 18 below 10M. Hence, for every store *i*, we included the unemployment of the country in which this store is located during month *t*, and we expect it to have a negative effect on revenues.

Time: Fixed Effect. To capture any potential seasonality and time-specific factors, we controlled for month and year fixed effects by including the relevant dummy variables.

Empirical Strategy

Because each store serves different cities and countries, significant differences exist in terms of experience, personnel profile, customer characteristics, and more. Consequently, in testing our hypotheses, we used a panel fixed-effects approach at the store level with robust standard errors clustered at the store level. One advantage of our dataset is its panel structure, in which we observed a cross-section of stores repeatedly over months. By using a fixed-effects estimation, we controlled for all observed and unobserved time-invariant, store-specific factors, such as customer demographics, socioeconomic status, and others that may influence our dependent variable. Our model for the four hypotheses is the following:

$$\text{Ln}(\text{Revenues}_{it}) = a_i + a_1(\text{Staff quits}_{it}) + a_2(\text{Staff discharges}_{it}) + \alpha_3(\text{Managerial quits}_{it}) + \alpha_4(\text{Managerial discharges}_{it}) + \text{Controls}_{it} + \varepsilon_{it},$$

where a_i represents the intercept and ε represents the error term of store *i* during month *t*.

Endogeneity Issues and 2SLS Model

Our fixed-effects estimation takes into account inherently all time-invariant unobserved heterogeneity across stores, and our control variables largely account for the potential time-varying factors within stores that may affect both staff decisions and performance concomitantly. In addition, staff and managerial quits are exogenous because they are not forced by store performance. By contrast, staff and managerial discharges could be the result of poor store performance and therefore our model could suffer from reverse causality.

To address this potential problem, we used an ordinary least squares (OLS) model and then repeated our analysis using an instrumental variables approach in a two-stage least squares (2SLS) estimation procedure. When identifying a valid and effective instrument for staff and managerial discharges, we adopted prior work in economics and management (Kesavan et al., 2014), and used two market-based instruments: 1) the difference between the staff discharges of a given store in a given month and the average staff discharges of all stores of the same brand for that month (mean deviation from staff discharges) and 2) the difference between the managerial discharges of a given store in a given month and the average managerial discharges of all stores of the same brand for that month (mean deviation from managerial discharges).

These two instruments are valid because they satisfy both the relevance and the exclusion restriction criteria (Woolridge, 2002). Namely, they are correlated to the discharges of the store, but at the same time they do not have any direct relationship with the error term in the model equation (e.g., the same brand's stores' discharges in a month should not influence any given store's performance in that month).

Last, for all our hypotheses, we checked the validity of our instruments, beginning with our first-stage regressions for which our instruments are highly significant ($p < 0.01$). The F statistic of all first-stage models is well above the common threshold of 10, confirming (as suggested by Staiger and Stock (1997)) that our instruments are not weak. In addition, in all our first-stage models, the value of the Cragg-Donald Wald F statistic for weak identification test and the value of the Anderson canonical correlation Lagrange Multiplier (LM) statistic for underidentification test indicate that our instrument indeed has power and satisfies the relevance condition.

Results

Summary statistics and correlations for our variables are presented in Table 1. Notice that correlations between our dependent variable and between our independent variables are all within acceptable ranges.

Insert Table 1 about here

Table 2 shows the results for all our hypotheses using the OLS approach. In model 1, we included our control variables only. In model 2, we added our variables of interest: staff quits, staff quits squared, staff discharges, managerial quits, and managerial discharges. Model 2 provides full support for hypotheses 1a, 1b, and 2b. In model 3, we added staff discharges squared. Our results indicate that this square term is insignificant and the R^2 value remains the same compared to model 2, confirming our expectation that there is no curvilinear relationship between revenues and staff discharges. However, because our OLS models may be biased as a result of potential endogeneity, we base our remaining discussion of significance, effect size, and robustness checks on our instrumental variable approach using the 2SLS model.

Insert Table 2 about here

Table 3 shows the first-stage models for our instrumental variable approach, and Table 4 shows the results for our hypotheses using this approach. The coefficient of the linear term of staff quits is positive and significant ($p < 0.01$), and the coefficient of its square term is negative and significant ($p < 0.05$), depicting an inverted-U shape when graphed and therefore providing full support for hypothesis 1a. The coefficient of staff discharges is positive and significant ($p < 0.01$), providing full support for hypothesis 1b.

In contrast with staff quits, the coefficient of managerial quits is insignificant, providing no support for hypothesis 2a. Last, the coefficient of managerial discharges is positive and significant ($p < 0.05$), providing full support for hypothesis 2b. Therefore, and in contrast to the case of quits, we found beneficial effects of turnover by isolating idiosyncratic discharges regardless of the position held by the leavers, and that such an effect is stronger for staff discharges than for managerial ones.

In model 2, we added the square term of staff discharges. To do so, it is worth noting that we needed a new instrument for the square term of staff discharges. We cannot use the instrument we used for the linear term of staff discharges because this is a forbidden regression and could lead to biased results. We therefore relied on the work of Wooldridge (2002): We ran the first stage for staff discharges using our instrument deviation from mean staff discharges. We then took the linear prediction from that model and used its square as an instrument for the square term of staff discharges. This procedure allows us to avoid forbidden regressions and provides us with a new instrument for staff discharges squared. Our results indicate that the square of staff discharges is insignificant and the R^2 value remains the same despite its inclusion in the model. We therefore believe staff discharges squared has no effect on revenues.

Insert Tables 3 and 4 about here

Discussion

This research extends our understanding of the potentially beneficial effects of turnover on unit performance. By integrating the reasons for departures and the position held by the leavers we explicate the variations over four turnover scenarios, which compose a fuller picture of the turnover-performance relationship. Our findings demonstrate that

idiosyncratic discharges were linearly beneficial to units despite the value provided by the leaver's position, although the effect size was greater for staff employees than for managers. When looking into the impact of quits, our results showed a curvilinear relationship for staff employees, revealing a beneficial effect under low levels of departures. These findings show that distinct effects are revealed for varying patterns of turnover specificities, and thus demonstrate that the effects of turnover cannot be generalized (Hom, Lee, Shaw, & Hausknecht, 2017).

Theoretical Implications

Our study contributes to the existing literature on turnover in a number of substantial ways. Although the accepted assumption is that turnover is negative (Hausknecht, 2019; Maltarich et al., 2020), theoretical arguments in favor of the beneficial effects of departures still hold (Trevor & Piyanontalee, 2020), and the conflicting findings raised by empirical evidence can be explained because of the lack of specificities in the definition and measurements of turnover events that could create a differential effect (Heavey et al., 2013; Park & Shaw, 2013). This suggests that although many studies have used multiple dimensions of turnover, analyzing them in an isolated way may mask relevant consequences for the unit. Focusing on these specificities, we actually identified positive effects in the case of staff quits and both managerial and staff discharges. In this way, our study is consistent with recent research that corroborates the functional approach to turnover (Maltarich, 2020), and extends our understanding of how this positive side can become visible. Future research should explore these significant although understudied joint effects by looking into other sources of specificity suggested by the literature, both at the individual and organizational levels (Trevor and Piyanontalee, 2020; Hancock et al, 2017).

Our study also contributes to the cost–benefit perspective of turnover (Abelson & Baysinger, 1984; Dalton & Todor, 1979; Shaw, 2011) Although this view has received less empirical support than the linear negative one (Glebbeek & Bax, 2004; Siebert & Zubanov, 2009), it is still popular from a theoretical viewpoint, resulting in ongoing calls for studies that better capture these potential effects (Park & Shaw, 2013; Hausknecht, 2017). Although we could not provide full support for an inverted-U shape, our results reveal benefits of turnover when the level of staff departures is low (Figure 1). This finding is consistent with previous empirical evidence (Siebert and Zubanov, 2009; Meier and Hicklin, 2007; Glebbeek and Bax, 2004) although they used the aggregated total turnover rate. Therefore, our study provides new evidence that invites to expand the analysis of turnover delving into its complexity as a phenomenon in order to identify potential benefits for performance (Abelson & Baysinger, 1984; Shaw, 2011).

Interestingly, in evaluating the impact of managerial quits -based on arguments about the deleterious effect of losing human capital as well as depleting tacit knowledge and key nodes in the social network of the unit- we could not find a significant negative impact over performance. One reasonable explanation is that the level of process conformance in the units mitigates the benefits associated with managerial discharges. When units work under a well-defined set of procedures and performance standards, the impact of the manager is minimized (Ton & Huckman, 2008). Company officers confirmed that stores operate under highly standardized processes that are subject to very low variability. Unfortunately, we were not able to obtain a measure to control for the margins of freedom in operation that managers allow in the stores, and the literature in this field is very scarce (Holtom & Burch, 2016; Subramony, Groth, Hu, & Wu, 2021. Therefore, further research should delve into the role of process conformance as a

moderator of the relationship between different types of turnover and unit performance. An alternative, complementary rationale for this result comes from Trevor & Piyanontalee's (2020) argument that poor-performer discharges may be masked and scored as voluntary quits in order not to damage the employer branding of companies. We also discussed this possibility with company officers and they recognized that, although these occurrences are nonexistent for staff discharges, they may occur for managers of the larger stores, which have more influence and negotiation power. Therefore, we cannot reject the possibility that the lack of significance of the impact of managerial quits may also be a result, in part, of this contingency, and align with the growing call for a refinement of the turnover measures to optimize the validity of the research findings.

Our paper also extends our understanding of the impact of discharges over unit performance, offering a nuanced examination across job levels. Overall, even when -as noted by McElroy et al. (2001)-, the volume of idiosyncratic discharges is low by comparison with voluntary departures in the services industry, we found distinct positive effects that signal their functionality on unit performance. However, benefits were significangly stronger for staff discharges than for managerial ones. One explanation for this counterintuitive finding relies on the role that social capital may play in the operations of the unit, which has received limited empirical attention so far (Lengnick-Hall, Lengnick-Hall, Neely and Bonner, 2021). In particular, scholars have argued that the employee-employee relationships network is critical for work coordination (Gittel, 2010) and there is also evidence of the favorable impact of informal strong ties with fellow employees over performance gains (Oh, Chung and Labianca, 2004). Staff employees can create strong relations with similar others and reinforce them on the base of situational

needs. Thus, our findings suggest that this kind of social capital can act as a mediator in the turnover-performance relationship, so that the value losses through discharges in these contexts are not necessarily related with the formal position in the unit, but rather on the intensity of the ties of the leaver. Future research could benefit from testing indirect effects of employee-employee relationship variables such as relational coordination via surveys (Gitell et al, 2010) or informal socializing relationships (Oh et al, 2004) in turnover research. This type of dynamics may be particularly important for service industries, where staff workers act as boundary-spanning agents who coproduce the service with customers (Holtom & Burch, 2016). From this lens, future studies could use measures of firm's service brand (Revilla et al, 2019) or work efficiency such as customer wait time (Ton & Huckman, 2008) or customer service (Batt & Colvin, 2011).

Practical Implications

Our study has managerial implications. Although practitioners recognize the differential effect of specific voluntary departures, their beliefs are generally aligned with the linear negative relationship accepted in the literature (Jorgensen, 2021). Our results inform a more enriched approach to turnover, showing that beneficial effects can be found at certain levels of staff quits in companies. We were actually able to quantify the performance effects of quits and discharges by assessing its impact on revenues. If we increase staff quits from zero to its optimal value of 0.726, this translates into $50270.52 average additional revenue per store per month, or $603,246.20 additional revenue per store per year. From this inflection point onward, additional turnover turns into revenue losses. This finding echoes the classical study by Abelson & Baysinger (1984), showing that a certain level of staff quits is functional and healthy. **Additionally, an increase of**

one standard deviation for staff discharges increases revenues by 0.26%, which is translated in $9,316.12 per store per year. Finally, one managerial discharge increases revenues by 1.39% which is translated in $49,795.67 per store per year according to our model. Hence in order to monitor turnover in an accurate way, managers should refine the differentiation of departure types when collecting turnover data. Our results point to a potential masking of turnover effects due to the classification of several discharges as quits. Regardless of the formal paths adopted for certain terminations, considering turnover in terms of the net value for the organization (being it negative or positive in the case of the so-called "valued exits" (Trevor and Piyanontalee, 2020)) can make a difference in calculating the actual impact of turnover over performance.

Our findings about the positive effect of idyosincratic discharges, applicable to both staff and managers, does not imply that discharges should be linearly increased; besides such estimated benefits being assumedly limited (Maltarich et al, 2020), this would not be feasible according to many countries' labor regulations and -more importantly and according to our results- potentially harmful from a social capital point of view. Relatedly, our findings call for a focus on staff employees' discharges, as they seem to be more beneficial for unit performance than managerial ones. This finding implies that companies should revise their discharges policies considering the value that front-level, staff employees play in the service industries as boundary-spanning workers in terms of direct relationship with the customers. More research is needed in understanding the particularities of this customer-employee relations so that managers can inform their discharges decisions in a more effective way.

Limitations and Further Research

Our research has several limitations. First, although our database covers a large number of countries, all the stores belong to the same business group. This circumscribes our findings to the services industry—in particular, to fashion retail in physical stores. Future research should analyze the particular conditions within other industries and working contexts, including knowledge-intensive sectors and high-qualification employees. Second, our findings on managerial turnover, scarcely studied yet, reveal there may be relevant contextual variables that affect the main turnover–performance relationship—for example, a company's organizational practices may be associated with exits (Trevor & Piyanontalee, 2020). Further research should look into these contingencies.

Third, our study did not capture the entire inflow and outflow of employees in the stores, such as contract terminations. The impact of these particular departures was analyzed recently (De Stefano et al., 2019), but in isolation from the total turnover flow. We were not able to isolate other types of potentially beneficial exits such as poor-performing quits (Trevor & Piyanontalee, 2020). Future research should examine the "whole picture" to understand more completely the interrelations that may exist among the different complex configurations of turnover at the unit level.

Fourth, our main variables are measured on a monthly basis. The intramonth effects are therefore unknown and could have important implications for a unit recovering after a turnover event. Further research would be helpful in exploring shorter time spans to capture these effects. Also, our dependent variable, the logarithm of monthly store revenue, is considered a distal measure of unit performance (Park & Shaw, 2013), and analyses using proximal measures are scarce (e.g., Hausknecht et al., 2009). The research literature on the turnover–performance link would benefit from more studies including

customer satisfaction or quality perceptions (Subramony et al., 2021) for different industries.

Last, our dataset did not include any information on the specific tasks performed by the individuals who left nor any demographic information about them. Despite the fact that our approach takes care to remove any potential bias, the nature of the tasks performed by each individual, their demographic characteristics and their effect over the consequences of turnover for the unit could be an interesting point for future research.

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Table 1. Summary statistics

Variable	Mean	Std. Dev.	1	2	3	4	5	6	7	8	9	10	11
1. Revenues	11.9365	0.9995	1.0000										
2. Staff Quits	0.0399	0.0752	0.0352**	1.000									
3. Staff Quits^2	0.0072	0.0381	-0.0257**	0.6950**	1.0000								
4. Staff Discharges	0.0077	0.0285	0.0402**	-0.0001	0.0024	1.0000							
5. Managerial Quits	0.0436	0.2041	0.0780**	0.0983**	0.0322**	-0.0067*	1.0000						
6. Managerial Discharges	0.0098	0.0987	0.0537**	-0.0049+	-0.0049+	0.0100**	0.0289**	1.0000					
7. Staff Size	20.9250	20.7650	0.7948**	0.0238**	-0.0326**	0.1084**	0.0247**	0.0532**	1.0000				
8. Average Staff Tenure	3.5202	2.3991	0.0300**	-0.3448**	-0.1505**	-0.1305**	-0.0413**	-0.0098**	0.0056+	1.0000			
9. Permanent Contracts	0.6312	0.3629	-0.0161**	-0.2853**	-0.1519**	-0.0840**	-0.0083**	-0.0179**	0.0065*	0.4338**	1.0000		
10. Full Time Staff	0.7899	0.3033	0.1823**	0.1890**	0.0786**	0.1005**	0.0281**	0.0221**	0.1640**	-0.3841**	-0.2072**	1.0000	
11. Unemployment	12.0856	7.2312	-0.1543**	-0.3151**	-0.1402**	-0.1263**	-0.0223**	-0.0219**	-0.1598**	0.5538**	0.3908**	-0.7714**	1.0000

+, * and ** denote significance at 10%, 5% and 1% levels respectively

Table 2. Regression of quits and discharges on revenues

Variable	Revenues		
	(1)	(2)	(3)
Staff Quits		0.2088**	0.2088**
		(0.0251)	(0.0251)
Staff Quits^2		-0.1438*	-0.1439*
		(0.0701)	(0.0701)
Staff Discharges		0.0776**	0.0727*
		(0.0244)	(0.0321)
Staff Discharges^2			0.0237
			(0.0762)
Managerial Quits		0.0030	0.0030
		(0.0032)	(0.0032)
Managerial Discharges		0.0176**	0.0177**
		(0.0059)	(0.0059)
Staff Size	0.0104**	0.0103**	0.0103**
	(0.0007)	(0.0007)	(0.0007)
Average Staff Tenure	-0.0049+	-0.0042	-0.0042
	(0.0028)	(0.0028)	(0.0028)
Permanent Contracts	-0.2611**	-0.2659**	-0.2659**
	(0.0167)	(0.0168)	(0.0168)
Full Time Staff	0.0658**	0.0748**	0.0748**
	(0.0251)	(0.0252)	(0.0252)
Unemployment	-0.0045**	-0.0042**	-0.0042**
	(0.0016)	(0.0015)	(0.0016)
Constant	11.8463**	11.8314**	11.8315**
	(0.0335)	(0.0332)	(0.0332)
Observations (N)	119,226	119,226	119,226
R^2	0.3664	0.3680	0.3680
Month Fixed Effect	Yes	Yes	Yes
Year Fixed Effect	Yes	Yes	Yes
Center Fixed Effect	Yes	Yes	Yes

+, * and ** denote significance at 10%, 5% and 1% levels respectively
Based on 5,202 stores with 22.9 average observations per store

Table 3. First-stage models

Variable	Staff Discharges	Managerial Discharges
	(1)	(2)
Deviation from Mean Staff Discharges	-0.9998**	0.0081
	(0.0002)	(0.0074)
Deviation from Mean Managerial Discharges	-0.0000	-0.9490**
	(0.0000)	(0.0096)
Staff Quits	0.0000	-0.0025+
	(0.0001)	(0.0013)
Staff Quits^2	0.0001	0.0038*
	(0.0001)	(0.0002)
Managerial Quits	-0.0000*	0.0002
	(0.0000)	(0.0003)
Staff Size	0.0000**	0.0000**
	(0.0000)	(0.0000)
Average Staff Tenure	-0.0000**	-0.0001
	(0.0000)	(0.0001)
Permanent Contracts	-0.0007**	0.0010
	(0.0001)	(0.0008)
Full Time Staff	-0.0001	0.0009
	(0.0001)	(0.0008)
Unemployment	0.0001**	-0.0001
	(0.0000)	(0.0001)
Observations (N)	119,226	119,226
Wald chi-squared	1.98e+05**	2.72e+04**
Month Fixed Effect	Yes	Yes
Year Fixed Effect	Yes	Yes
Center Fixed Effect	Yes	Yes

+, * and ** denote significance at 10%, 5% and 1% levels respectively
Based on 5,202 stores with 22.9 average observations per store

Table 4. Regression of quits and discharges on revenues

Variable	Revenues	
	(1)	(2)
Staff Quits	0.2087**	0.2087**
	(0.0251)	(0.0251)
Staff Quits^2	-0.1438*	-0.1437*
	(0.0701)	(0.0702)
Staff Discharges	0.0868**	0.0911**
	(0.0245)	(0.0324)
Staff Discharges^2		-0.0202
		(0.0817)
Managerial Quits	0.0030	0.0030
	(0.0032)	(0.0032)
Managerial Discharges	0.0139*	0.0139*
	(0.0059)	(0.0060)
Staff Size	0.0103**	0.0103**
	(0.0007)	(0.0007)
Average Staff Tenure	-0.0042	-0.0042
	(0.0028)	(0.0028)
Permanent Contracts	-0.2659**	-0.2659**
	(0.0168)	(0.0168)
Full Time Staff	0.0748**	0.0748**
	(0.0252)	(0.0252)
Unemployment	-0.0043**	-0.0043**
	(0.0015)	(0.0015)
Observations (N)	119,226	119,226
R^2	0.3680	0.3680
Month Fixed Effect	Yes	Yes
Year Fixed Effect	Yes	Yes
Center Fixed Effect	Yes	Yes

+, * and ** denote significance at 10%, 5% and 1% levels respectively
Based on 5,202 stores with 22.9 average observations per store

Figure 1. Effect of staff quits on unit performance