

Assessing the entrepreneurial and intrapreneurial intentions of current and future labor forces: the role of entrepreneurial orientation

Assessing EI
and II

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Abstract

Purpose – The study aims to examine whether there is a difference in entrepreneurial intentions (EI) and intrapreneurial intentions (II) between current labor force (CLF) and future labor force (FLF). Moreover, the role of entrepreneurial orientation (EO) as a common determinant has been presented.

Design/methodology/approach – A cross-sectional survey was used to collect the data from 472 members of the CLF and 310 members of the FLF in Bosnia and Herzegovina. To test the hypotheses, Welch's *t*-test and multiple regression were used.

Findings – The findings show that there is a difference in both EI and II between CLF and FLF and that individual EO, to a certain degree, is a determinant of them.

Originality/value – The study extends the literature by offering a comparative approach to two populations within the same country. Furthermore, the study deviates from a more traditional approach that EI and II are divergent constructs with different determinants.

Keywords Entrepreneurial intentions, Intrapreneurial intentions, Entrepreneurial orientation, Labor force, Bosnia and Herzegovina

Paper type Research paper

Introduction

Entrepreneurship plays an important role in economic and social growth (Brancu *et al.*, 2015). Besides job creation, it also brings innovation to companies and is of the essence for economic advancement (Rico and Cabrer-Borrás, 2019). These are significant reasons governments of developing economies see entrepreneurship and self-employment as the best and fastest solution to both the high unemployment and development of overall economies. Entrepreneurship is closely related to the entrepreneurial activity (EA), which is defined as the “enterprising human action in pursuit of the generation of value, through the creation or expansion of economic activity, by identifying and exploiting new products, processes or markets” (Ahmad and Seymour, 2008, p. 14). Rajh *et al.* (2016) explain that it is generally accepted that entrepreneurship and EA are positively associated with higher economic development.

However, EA is not manifested in a single form. For example, the literature suggests an interesting discourse between entrepreneurial activities undertaken free of the influence of

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existing organizations, or simply entrepreneurship and entrepreneurial activities taken within an existing organization known as intrapreneurship (Nystrom, 2012). Although Douglas and Fitzsimmons (2013) argue that these are two divergent concepts in terms of costs and benefits they bring or the different roles of entrepreneurs and intrapreneurs, both concepts are founded on the entrepreneurial mindset that is crucial for the future development of a business context. As such, both entrepreneurs and intrapreneurs are considered critical in the contemporary business context.

According to Ajzen (1991), intentions are the best predictor of behavior. In particular, to understand individual behavior (entrepreneurial or intrapreneurial), one has to understand intentions in their essence. For example, Krueger *et al.* (2000) explain that starting a business is not spontaneous but an intentional act, and that intention is entrepreneurial. According to Bird (1988), entrepreneurial intentions (EI) are a collection of attributes of a person's mindset that enable action through guidance and coordination of the business yet to be established. Intentional behavior can help explain entrepreneurs' reasoning to start a business even before they scan for opportunities (Krueger *et al.*, 2000). Accordingly, EI can be a predictor of actual entrepreneurship. Derived from EI, in broad terms, intrapreneurial intentions (II) can be described as a conscious state of mind that directs individuals toward intrapreneurial behaviors such as new product development, initiating new business or division within the existing organization by exploring new opportunities, markets and technologies (Nicholson *et al.*, 2016).

Although literature exists on both EI and II, the prevailing one deals with EI due to wider and more direct economic and social benefits (Krueger *et al.*, 1993; Douglas and Fitzsimmons, 2008). However, II are becoming more important each day. Until now, studies have been single-focused when it comes to populations. The research so far has been focused on investigating both EI and/or II of employees (Douglas and Fitzsimmons, 2008; Hatak *et al.*, 2015; Neessen *et al.*, 2019), students (Gonzalez-Serrano *et al.*, 2018; Soomro *et al.*, 2020), gender (Arshad *et al.*, 2016) and youth (Rajh *et al.*, 2018). Besides, the comparisons were primarily drawn between different countries and cultures (Linan *et al.*, 2013; Sebjan *et al.*, 2016; Trung *et al.*, 2020), but still, they were dominantly focused on either employees or students. This creates one serious gap in the literature, considering the importance of both populations for national economies. Therefore, the first objective of this study is twofold. First, we tend to validate the operationalization of EI and II proposed by Douglas and Fitzsimmons (2013) by using two populations: CLF and FLF. Second, as both populations provide valuable insights for the future, we investigate whether there is a difference between them regarding EI and II.

Furthermore, Douglas and Fitzsimmons's (2013) study was about EI and II as divergent constructs with different determinants. On the contrary, we take the approach of finding a common determinant of EI and II. As we argued that EA is not exhibited in a single form and mostly exhibited independently or within the organization, the focus is being set on the individual. One approach is to look at the entrepreneurial orientation (EO) of individuals, which can be observed as a set of attributes needed for different behaviors within a business context (Bolton and Lane, 2012). Unfortunately, when it comes to EI studies, EO have not been thoroughly examined (Koe, 2016). Moreover, in II studies, the research barely exists. Keeping in mind individual characteristics embodied within EO dimensions, we argue that they can be valid predispositions to entrepreneurial behavior. As behavior tends to be a distant outcome, a more proxy one can be observed through EI and II. Therefore, the second objective of this study is to investigate whether EO can be considered a common determinant for both EI and II.

Considering that EI are stronger among people from developing countries Rajh *et al.* (2016), there is a motivation to investigate both types of intentions (EI and II) among the labor force in Bosnia and Herzegovina (B&H) as this context is interesting for two reasons.

First, people tend to engage in EA due to both opportunity and necessity. In line with this, [Stoica et al. \(2020\)](#) found that opportunity-driven entrepreneurship in transition countries results in more economic growth than necessity-driven entrepreneurship. Second, as entrepreneurship is a resource-dependent occupation, it requires different forms of capital, such as financial, human and social. This is in line with the overlapping literature on EI, II and occupational choice, as all of them are enrooted in social cognitive career theory ([Lent et al., 1994](#)). As such, [Vladasel et al. \(2021\)](#) argue that families and communities tend to provide a “salient context” for developing certain skills and preferences, such as entrepreneurial ones. In particular, social context is the one that complements individual intentions in career transitions. A more distant context is embodied within a larger economic environment that provides or constrains the market’s opportunities and available resources ([Meoli et al., 2020](#)). Although there is a growing popularity of entrepreneurship, when it comes to the Adriatic region, the entire region is overly characterized by low EA, and B&H is not an exception to the case ([Palalić and Bičo, 2018](#)). We might even say that entrepreneurship and awareness of the importance of entrepreneurship are low and reflected in overall economic health. As opportunities and limitations for entrepreneurship are sensitive to the environment ([García-Rodríguez et al., 2017](#)), the third objective of this study is to discuss the implications of EI and II for society and businesses in B&H.

Literature review and hypotheses

Entrepreneurship and intrapreneurship

The terms entrepreneurship and intrapreneurship are very used in business literature and investigated in academic research. A large focus is given to entrepreneurship and intrapreneurship since they are the ones that directly affect the nation’s productivity ([Luchsinger and Bagby, 1987](#)). Importance of entrepreneurship is of the essence for economies’ overall well-being. According to [Cadaru and Badulescu \(2015\)](#), the concept of intrapreneurship is rather new and, therefore, less attention has been given to it, while entrepreneurship has been present for over 200 years. An entrepreneur is a word of French origin (“*entre*” – between and “*prendre*” - to take) that defines a person who is taking a risk to start a new business. An entrepreneur is positioned between buyers and sellers and, in that relation, also absorbs the risk.

The literature recognizes the importance of individual entrepreneurship, but as well it emphasizes the importance of intrapreneurship for the renewal of large firms ([Hagedoorn, 1996](#)). Entrepreneurship and intrapreneurship are often the ones that generate innovations and help companies create new competencies. [Stull \(2005\)](#) describes entrepreneurship as the composition of particular intentions and behavior that employees exhibit at different levels of the organization, where they also exhibit some or all of the dimensions of EO. Intrapreneurship enables employees to act “entrepreneurially” but within an already existing organization. People who possess intrapreneurial attributes and behavior are characterized by leadership skills, creativity, self-motivation and proactiveness (PRA). The significant difference is that intrapreneurs benefit the organization and have no financial risk responsibility compared to entrepreneurs.

EI, II, and labor force

Although EI received significant attention in research, this was not the case with II since there are fewer of these studies available ([Bičo et al., 2022](#)). Numerous studies measure intentions through the population and the labor force. Most present ones are among the employees and the students. [Blanka \(2019\)](#) confirms that there are differences in EI and II regarding three dimensions of theory of planned behavior (TPB) influencing the intentions. This is in line with

earlier studies by Douglas and Fitzsimmons (2013) and Tietz and Parker (2012). When it comes to measuring the EI of youth in B&H, a study by Rajh *et al.* (2018) presented results on EI of B&H, Serbia, Macedonia and Croatia where B&H had the lowest EI measured among the four countries, but it has the highest percentage of early-stage entrepreneurial activities. Keeping in mind that FLF and CLF are two parts of the population that belong to entirely different generations; the effect of the generational aspect can influence the intentions. A study that adds to the possibility of differences between employees and students when it comes to intentions is performed by Hatak *et al.* (2015). The authors explained that as employees get older, they act less entrepreneurially. When developing II, companies' resource availability and capabilities are the keys (Alpkan *et al.*, 2010). Moreover, this means that if individuals work within a company that is not characterized by resource availability and capabilities, they are less likely to be intrapreneurial.

Regarding B&H, the labor market is not characterized by a high share of employment in the real sector. When comparing FLF and CLF in terms of EI and II, several differences can be emphasized. First, the generational perception of the company and its importance to the individual is different between different generations. For comparison, FLF is raised in the modern labor market where a free economy, entrepreneurship and business startups are being promoted. They were highly exposed to influences and success stories that presented them with a desirable modern lifestyle they highly wished to have, and that is a life of money, influence and power. On the contrary, in B&H, a large part of CLF belongs to a generation expected to start a career in the same company where they would retire. In particular, members of CLF possess a greater sense of belonging and identification with the company they work for and might be more ready to take the risk for the company in whose ownership structure they are not taking part. Second, FLF, as a relatively younger labor force, for the most part, are not family breadwinners. More often, they are the ones that require and can count on family support as their parents are the ones with savings. On the contrary, members of CLF are breadwinners but also the ones that experience fatigue and might be more risk-averse regarding opportunities in the market. In particular, there are differences in family expectations of individuals, job stability and risk avoidance, which are still part of the B&H narrative regarding "dream" job specifications. Third, the generations that comprise FLF are individualistic and self-confident, which, along with risk-taking (RSK), are important predispositions to act entrepreneurially. On the contrary, CLF, as part of the population that most likely possesses the experience, can be characterized by knowledge, abilities, skills and an already developed network and resources that can be used while starting a business. This results in overall better insights into the industry.

Overly, CLF and FLF in B&H are characterized by entirely different perceptions of entrepreneurship and intrapreneurship as career choices. Hence the intentions differ as well. Therefore, the following hypotheses are proposed.

- H1. There is a significant difference between CLF and FLF regarding EI.
- H2. There is a significant difference between CLF and FLF regarding II.

Entrepreneurial orientation

Many fast-growing companies accredit their growth, profitability, performance and product innovation to EO (Andrade-Valbuena *et al.*, 2019). In particular, Rauch *et al.* (2009) define it as "the strategy-making processes that provide organizations with a basis for entrepreneurial decisions and actions" (p. 762). This is the definition of EO at the organizational level, which has been translated to the individual level. As such, it represents a combination of individual characteristics required for the effective execution of EA (Abubakar *et al.*, 2019). At the individual level, the organizational five-dimensional construct is mostly observed through a

three-dimensional (Bolton and Lane, 2012). This is in line with Dess and Lumpkin's (2005) work, where they argued that the autonomy and competitive aggressiveness of individuals in firms could result in coordination problems among work units, as well as a toxic work environment. Therefore, individual EO represents a three-dimensional construct that consists of RSK, innovativeness (INV) and PRA.

While EO as a construct has been operationalized in different settings, when it comes to the relationship between EO and EI, studies have been performed mostly on the student populations (Ibrahim and Lucky, 2014; Koe, 2016; Sahoo and Panda, 2019). On the contrary, there is a literature gap when it comes to EO and II. One of the rare studies that examined this relationship was by Razavi and Aziz (2017) in the Iranian Research and Development sector. In this study, it was found that dimensions of EO had a positive relationship with II.

The literature on EO in B&H is rather limited, especially for university students. Palalić *et al.* (2017) investigated the concept of students' EO in B&H. They found that the business environment and networking are positively related to EO. However, studies investigating the EO of employees in B&H are more present (Tatarski *et al.*, 2020; Alfirević *et al.*, 2018). The study by Tatarski *et al.* (2020) measured differences in EO between EU countries (Croatia and Slovenia) and Non-EU countries (Serbia, Montenegro, B&H and North Macedonia). There was only partial support for higher EO among employees at universities in the EU than in NonEU countries.

Generally, several assumptions can be made regarding EO dimensions in B&H. For example, EO dimensions in CLF can be very pronounced due to the work experience they possess. Besides, due to their experience, their PRA and INV could be high and higher than the RSK dimension. Such an assumption can be supported by the argument that this generation has the mindset from the previous system, where safe and governmental employment is preferred over any individual risk to be taken. On the contrary, FLF in B&H is characterized by the high dimension of EO, especially concerning the dimension of risk. Bosnia and Herzegovina's youth unemployment rate is among the highest in Europe, making these generations even more risk-takers since they feel they have nothing to lose already.

Regarding the relationship between EO dimensions and EI, it is expected that there is a positive one in both labor forces. In particular, CLF, as a relatively older sample, tends to be more risk-averse or engage in so-called "safe or controlled risk". However, those who exhibit higher RSK are more likely to engage in EI. Besides, members of CLF are more likely to act entrepreneurially because their PRA comes from being experienced and anticipating better future events. Moreover, the ability to anticipate comes hand in hand with the ability to be innovative and to be able to recognize the market need for innovations. When it comes to EO dimensions and their relation to II in CLF, they are presented in a milder form since II does not involve high-risk exposure levels as EI. This is primarily true regarding one's exposure to financial risk. However, as other types of risk exist, individuals who are characterized as risk-takers are more likely to exhibit II. When it comes to INV and PRA within organizations, CLF is often found to offer new solutions and help with new internal processes due to a relatively greater extent of experience. As such, the positive relationship between INV, PRA and II should hold.

Regarding FLF, being a risk-taker comes from the fact that young people are bolder and risk-loving, which positively relates to EI. Furthermore, FLF will be the first to embrace new technologies, have creative ideas, be the first mover and embrace novelty and experimentation, which are the foundations of both INV and PRA. Such individuals are more likely to work on their own and more likely to exhibit higher EI. Although most FLF is without actual experience within the organization, very often, their primary aim in joining the organization is to develop a set of needed skills for the future. Such individuals tend to risk more and be innovative and proactive, leading to higher creativity and, eventually, II. Therefore, the following hypotheses are proposed.

H3a. RSK is positively related to both EI and II.

H3b. INV is positively related to both EI and II.

H3c. PRA is positively related to both EI and II.

H4. The relationship between EO dimensions and EI and II is contingent on labor force membership (LFM).

Figure 1 presents a conceptual model that encompasses all the arguments stated earlier.

Methods

Participants and procedure

This study included two populations. First, CLF consisted of individuals aged 18–65 that were either employed or unemployed. Second, FLF consisted of university students. As there was no public database available for either CLF or FLF, we applied snowball sampling, which is very common in such situations (Vandekerckhof *et al.*, 2019). This was carried out in two phases. First, we approached individuals from our network, which made them initial participants. Second, they recommended, without bias, other participants apart from our own network. This allowed for a larger, more diverse and reliable sample, which helped in reducing possible sample bias (Creswell, 2012).

Since the original constructs were in English, we used a back-to-back translation to ensure content validity. After that, pilot testing was applied to several individuals who had the targeted population's characteristics. The final version of the questionnaire was delivered to participants using different mediums (i.e., email, social media, labor unions and universities). The participants received a cover letter explaining the purpose of the study, granting anonymity and requesting consent to use the data for research purposes. Together with a cover letter, participants got a link to the questionnaire.

The initial combined sample contained 788 responses. However, six of the responses were incomplete, and we had to remove them. Therefore, the final sample consisted of 782

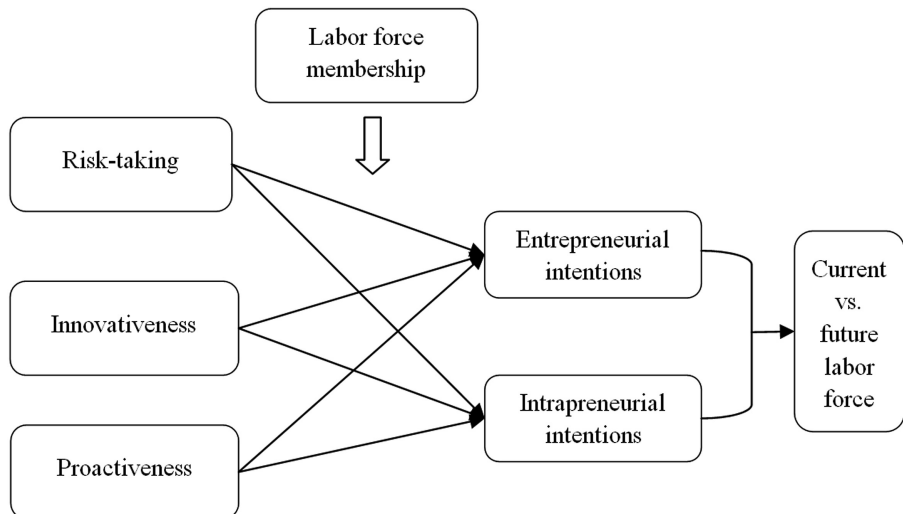


Figure 1.
Conceptual model

Source(s): Author's visualization

respondents, where 472 were from CLF and 310 from FLF. In CLF, most of them were female (61%). The average age was 37, and the average experience of 13 years. Most of them were high-educated (85%) and employed (89%). In FLF, 65% were female with an average age of 23. Most of them were bachelor's students (82%), and the sample was very divergent regarding majors.

Measurement

The questionnaire included five main constructs. EI and II were measured with four and three-item constructs developed by Douglas and Fitzsimons (2013). The responses were scored on a seven-point Likert scale, ranging from "1" very unlikely to "7" very likely. The first item differed for CLF and FLF. For CLF, the question was about starting a business within two years, while for FLF, the question was about starting a business within two years after graduation. To measure EO dimensions, we used the scale developed by Bolton and Lane (2012). Namely, RSK and PRA were measured by three items each, while INV contained four items. The responses were based on a five-point Likert scale, ranging from "1" strongly disagree to "5" strongly agree. All scales are presented in Appendix. Finally, LFM was measured as a dummy variable (FLF = 1 and CLF = 2).

Analyses and results

To test the hypotheses, we analyzed the data in two stages: preliminary analysis and hypotheses testing. The preliminary analysis was performed on both datasets. The results are presented in Table 1.

Reliability was checked through Cronbach's coefficient alpha test using a threshold of 0.70 (Bekele *et al.*, 2014). The values were above the threshold for all constructs, indicating that the instrument provided a highly reliable measure. Since we used the already established constructs, confirmatory factor analysis (CFA) was performed. In particular, we checked for convergent and discriminant validity. For convergent validity, we checked standardized factor loadings (SFLs) and average variance extracted (AVE). All values were above 0.50, which is considered the common threshold (Bagozzi and Yi, 1988). Therefore, we can conclude there are no concerns regarding convergent validity. Concerning discriminant validity, the square root of AVE was higher than the paired correlation between observed constructs. Thus, we can state that discriminant validity was achieved. Finally, since we collected the data at a single point in time, there was a possibility for common method bias. To rule it out, we performed three tests as suggested by Podsakoff *et al.* (2003): Harman's single-factor test, common latent factor and common marker variable. The results showed that a single factor in extracting was below the common threshold of 50%. Therefore, we can conclude that there is no common method bias.

The first two hypotheses were tested using an independent samples *t*-test or, more precisely, the type known as Welch's *t*-test. This was because we had unequal sample sizes where the standard *t*-test is not robust enough (Delacre *et al.*, 2017). The results are presented in Table 2.

From Table 2, we can see that both EI and II are higher within FLF and that the difference is statistically significant. Therefore, we can conclude that there is sufficient evidence to support H1 and H2.

Regarding the rest of the hypotheses, we developed two hierarchical regression models: one for EI and one for II. The independent variables were the same for each model, namely RSK, INV and PRA, while moderating variable was LFM. The results are presented in Table 3.

Regarding EI, RSK and INV are positively related, while in the case of PRA in negative. In the case of II, RSK and INV are positively related and PRA relationship is insignificant.

Table 1.
Descriptive statistics,
reliability, validity and
correlations

	M	SD	A	CR	AVE	1	2	3	4	5	6
1	5.276	1.554	0.869	0.872	0.631						
2	5.265	1.522	0.896	0.901	0.752	(0.794)					
3	3.697	0.811	0.782	0.791	0.559	0.563	(0.867)				
4	3.907	0.770	0.853	0.859	0.606	0.534	0.374	(0.748)			
5	PRA	4.017	0.799	0.799	0.570	0.408	0.357	0.683	(0.778)		
6	LFM	–	–	–	–	0.221	0.261	0.512	0.611	(0.755)	
						–0.291	–0.167	–0.151	–0.107	0.017	–

Note(s): *N* = 782. All correlations are at $p < 0.01$, except LF and PRA. CR – Composite reliability; AVE – Average variance extracted; Square roots of AVE values are in parentheses. EI – Entrepreneurial intentions, II – Intrapreneurial intentions, RSK – Risk-taking, INV – Innovativeness, PRA – Proactiveness, LFM – Labor force membership

Source(s): Authors' original findings

	N	M	SD	SE	<i>t</i>	df	Sig
<i>EI</i>							
FLF	310	5.781	1.193	0.068	8.163	774.557	0.000
CLF	472	4.944	1.671	0.077			
<i>II</i>							
FLF	310	5.562	1.271	0.072	4.723	758.788	0.000
CLF	472	5.069	1.639	0.075			

Note(s): EI – Entrepreneurial intentions, II – Intrapreneurial intentions, FLF – Future labor force, CLF – Current labor force

Source(s): Authors' original findings

Table 2.
Welch's *t*-test

Therefore we can conclude that there is support for H3a and H3b while there is no evidence to support H3c. Overall, EO dimensions explain 25% of EI variance and 20% variance in II.

When it comes to LFM, it is negatively related to EI, meaning that being a part of FLF increases both EI and II. This in line with the findings regarding H1 and H2. However, regarding the moderating effect, it is limited as the significant moderation is only presented in the case of RSK and II. Therefore, there is only some support for H4. The interaction is presented in Figure 2.

Discussion and conclusions

Although the research on EI and II has existed for some time now, comparative studies between different populations are lacking. Therefore, this research aimed to offer information about EI and II regarding CLF and FLF in B&H.

First, we validated the constructs of EI and II proposed by Douglas and Fitzsimmons (2013) on two populations. This is an important outcome of the study, as this operationalization can be used in comparative studies between different populations. In comparison, Marchiori *et al.* (2018) replicated the same study on a sample of students in Brazil. However, their validation of the scales had to be adjusted in the case of EI. Besides, we can see that students' EI and II in B&H are higher than those reported by Douglas and Fitzsimmons. This is not a big surprise as recent generations of students are more exposed to entrepreneurial behavior through successful entrepreneurial stories, advertising organizational images and a higher presence of entrepreneurship-related programs and courses within the universities across the globe.

Second, the results demonstrated a difference in both EI and II regarding two populations where FLF exhibited EI and II significantly higher than CLF (H1, H2). As comparative studies between different populations have been highly neglected, this can be considered the study's main finding. This is in line with the recent research trend in EI and II, as more studies focus on the student population (Bolton and Lane, 2012; Koe, 2016). It is because this population is more "fertile" for future "entrepreneurial actions" independently or within a company. In particular, the lower EI among CLF may be due to the opportunity cost of time (Nguyen, 2018), a decrease in the risk tolerance that may come with age (Hatak *et al.*, 2015; Baluku *et al.*, 2020), or long payback periods (Fung *et al.*, 2001).

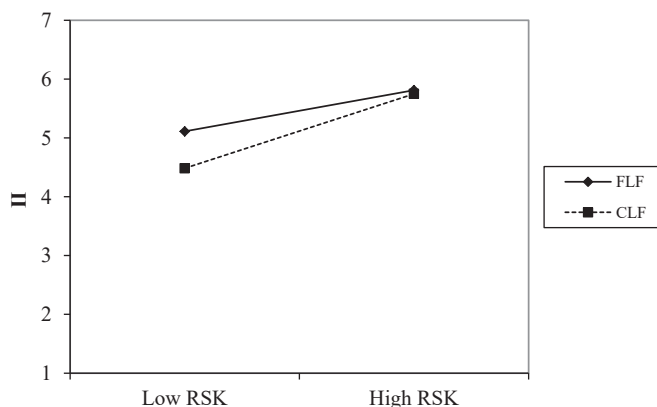
Third, when it comes to the common determinant of both EI and II, we found that EO could be considered one to a certain degree. This is essential since agreements around common determinants are debatable in interdisciplinary fields such as entrepreneurship (Panc *et al.*, 2012). While EO has been investigated concerning EI, its role in II is rather unexplored. Overall, these findings are contrary to the ones about different determinants for EI and II found

Table 3.
Multiple regression

	EI			II		
	M1	M2	M3	M1	M2	M3
RSK	0.722** (0.075)	0.659** (0.074)	0.232 (0.259)	0.389** (0.078)	0.354** (0.078)	-0.271 (0.271)
INV	0.402** (0.084)	0.379** (0.082)	0.212 (0.275)	0.425** (0.087)	0.412** (0.086)	0.640 (0.288)
PRA	-0.156* (0.076)	-0.109 (0.074)	0.156 (0.246)	0.063 (0.078)	0.090 (0.078)	-0.147 (0.257)
LFM		-0.600** (0.099)	-1.323* (0.620)		-0.338** (0.104)	-1.798** (0.649)
RSKxLFM			0.263 (0.153)			0.380* (0.160)
INVxLFM			0.110 (0.166)			-0.141 (0.174)
PRAxLFM			-0.173 (0.150)			0.146 (0.157)
ΔR^2	0.238	0.084	0.005	0.155	0.011	0.009
R^2	0.238	0.272	0.278	0.155	0.166	0.176
Adj. R^2	0.235	0.268	0.271	0.152	0.162	0.168
ΔF	80.856**	36.797**	1.932	47.504**	10.633**	2.909*

Note(s): $N = 782$. ** $p < 0.01$, * $p < 0.05$. Standard errors are in parentheses. EI – Entrepreneurial intentions, II – Intrapreneurial intentions, RSK – Risk-taking, INV – Innovativeness, PRA – Proactiveness, LFM – Labor force membership

Source(s): Authors' original findings



Source(s): Authors' original findings

Figure 2.
Interaction plot

by Douglas and Fitzsimmons (2013). Besides, EO was slightly dominant when it came to EI. As EO and II were barely the focus of the past research, this study provides a new perspective.

Namely, INV (H3b) was found to be the most consistent determinant of EI and II across both populations, which is, in the case of FLF, congruent with Bolton and Lane (2012) and Koe (2016). Today's business environment requires both entrepreneurs and employees to be innovative and bring new ideas in terms of products, services and processes (Knezović and Drkić, 2021). In the case of EI, we might say that INV is always expected as most companies are started based on the innovations of certain individuals. However, the existing organizations tend not to rely only on one or a couple of individuals within the company but rather on the teams of people. Therefore, their human resource strategy in terms of acquiring, developing and retaining valuable human capital within the company is highly founded on innovation metrics. In particular, companies are searching for potential innovators when hiring, providing an innovative environment and keeping those who can cope with dynamic environments. Regarding RSK (H3a), the results are similar to INV, except in the case of II within FLF. Previous studies present mixed results. On the one side, RSK was a significant determinant of EI (Bolton and Lane, 2012; Kropp *et al.*, 2008), while its role was insignificant on the other side (Koe, 2016; Robinson and Stubberud, 2014). Our results support the view of entrepreneurship as a process that requires the assumption of risk. However, in the case of II, we see that RSK is significant with CLF but not FLF. We rationalize this by siding with Miron and McClelland (1979) and Hansemark (1998), who argue that certain individual characteristics (i.e., RSK) are modified over time. Therefore, members of CLF have more environmental and contextual information to make risky moves compared to FLF. This can result in a better fit between RSK and II. Although previous research is concentrated on PRA as a requirement for individuals looking for business opportunities, our results suggest that the role of PRA in EI and II is insignificant (H3c). Here, we may argue that our nation is rather not proactive and can be seen in different spheres of life. For the moderating role of LFM, we only found a significant effect in the relationship between RSK and II (H4). Although there is a significant difference between CLF and FLF in EI and II, the effect is not fully extended to the relationships between EO and EI and EO and II. Therefore, we can conclude that LFM divergence within EI and II is for some other reasons.

Finally, there is a contextual significance of this study. While intention studies have been extensively researched, especially in the case of EI, developing countries are lagging behind. This study fills this gap in B&H, characterized by relatively high unemployment and the

extreme difficulty of “transiting” from FLF to CLF. These problems resulted in the significant migration of citizens to the west in the last decade. Considering social and economic context as a precondition for an effective transition to entrepreneurship or intrapreneurship as an occupational choice (Meoli *et al.*, 2020; Vladasel *et al.*, 2021) and that EI and II are related to higher employability, a better understanding of them is needed to provide concrete directions on national, social and organizational levels.

Implications for educators, policy and businesses

Overall, this study provides some essential implications for educators, policy-makers and businesses. First, the entrepreneurial focus of the universities in B&H is rather new, and usually, the courses and materials are present in business and business-related studies. Therefore, the educators might think about making entrepreneurial courses available to other fields as well. While doing so, they should incorporate a new approach to entrepreneurial mindset – intrapreneurship – and clearly differentiate it from the more traditional one. Obviously, some students are more fit to study and learn this concept as they are more suited for a career within the organization than one on their own. Furthermore, the course materials might emphasize the importance of EO. Since EO is defined as a set of attributes, this is definitely something to which more entrepreneurially designed university programs could contribute. For example, Sahoo and Panda (2019) argue that the universities should focus on “individual EO” while crafting more effective programs and curricula to equip more students with entrepreneurial skills and encourage them to act entrepreneurially. This would be a double-beneficial as this set of skills could be easily used within the firms.

Second, as students exhibit higher intentions, especially EI, there is a need for higher involvement of policy-makers. Keeping in mind that the “next generation” of the labor force has higher preferences for acting entrepreneurially, a better entrepreneurship ecosystem is needed at the national level. The biggest problem for running a business in B&H is regulation. It is well known that the B&H systems are characterized by extensive and long bureaucratic procedures, a high tax system, different legal regulations between entities, and a lack of proper government subsidies (Mulaosmanović *et al.*, 2018). Besides, there is no adequate awareness about entrepreneurship within society, and promoting it is essential for today’s societies (Audretsch, 2007). This is in line with Obschonka *et al.*’s (2010) statement that promotion “should start early in life and that public measures should target the education of “the next wave of entrepreneurs” by fostering youths’ early entrepreneurial competence” (p. 63). Considering that traditional business environments and organizational structures have faced serious changes, especially during and after COVID-19 (Al-Habaibeh *et al.*, 2021), promoting both entrepreneurship and intrapreneurship is vital to create and inductive environment in which individuals are encouraged to engage in entrepreneurial activities as their career choice.

Third, as intrapreneurial behavior is beneficial for the companies in several domains, such as the firm’s EO or investment potential (Fellnhöfer, 2018), the companies might invest more in detecting the potential of individuals in acting intrapreneurially. As this can be vital for organizational growth and sustainability, the companies might focus more on individual EO from an HR perspective. In particular, the firms should first investigate how much their organizational strategy, characteristics and capabilities are fertile for developing individual EO. As such, EO should be an important criterion while hiring, developing and retaining important human capital.

Limitations and future research

The study is not without limitations. First, students’ usage as proxies for potential entrepreneurs and intrapreneurs is debatable, especially for undergraduate studies. Perhaps,

focusing on the “near-graduation” students would provide a better insight into their intentions and, eventually, possible behavior. Second, cross-sectional data and snowball sampling limit the generalization of the results. While it would be almost impossible to draw a probability sampling from these populations, due to the lack of public databases, narrowing the population to particular companies or universities would allow researchers to draw conclusions about particular settings and provide specific recommendations. One thing that would be of particular interest is to use a longitudinal study, especially with FLF, and compare their intentions during and after the studies. Third, the study included only EO dimensions as possible common determinants. Future studies might check whether determinants such as entrepreneurial personality or entrepreneurial competence might play an important role, as suggested by Obschonka *et al.* (2010). Finally, the study is limited to a comparison between different populations and does not deal with factors that lead to higher or lower individual EO, both within and outside the organization. Further studies might focus on a variety of determinants or particular contextual factors. This would be very beneficial for the B&H context as certain recommendations could be provided at individual and national levels.

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Entrepreneurial intentions

How likely is it that you would want to be self-employed within two years, assuming you had a good new business opportunity and you could raise the funding necessary to start your own business? – for CLF/
How likely is it that you would want to be self-employed within 2 years after graduation, assuming you had a good new business opportunity and you could raise the funding necessary to start your own business? – For FLF.

How likely is it that you would want to be self-employed at some later point in the future, assuming you had a good opportunity and could raise the funding necessary?

How likely is it that you would want to start your own business to exploit a radical innovation?

How likely is it that you would want to start your own business to introduce a new variant of an existing product or service?

Intrapreneurial intentions

How likely is it that you would want to manage (within your employer's business) a new division (or branch) that is set up to exploit a radical innovation?

How likely is it that you would want to manage (within your employer's business) a new division set up to introduce a new variant of an existing product or service?

How likely is it that you would want to manage (within your employer's business) a new division (or branch) set up to introduce an existing product into a new market?

Entrepreneurial orientations

Risk

I like to take bold action by venturing into the unknown.

I am willing to invest a lot of time and/or money in something that might yield a high return.

I tend to act "boldly" in situations where risk is involved.

Innovativeness

I often like to try new and unusual activities that are not typical but not necessarily risky.

In general, I prefer a strong emphasis in projects on unique, one-of-a-kind approaches rather than revisiting tried and true approaches used before.

I prefer to try my own unique way when learning new things rather than doing it as everyone else does.

I favor experimentation and original approaches to problem-solving rather than using methods others generally use for solving their problems.

Proactiveness

I usually act in anticipation of future problems, needs or changes.

I tend to plan ahead on projects.

I prefer to "step up" and get things going on projects rather than sit and wait for someone else to do it.

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