The Entrepreneurial University: Why Focusing on the Organization of Student Life?

Sawsen Sidrat

Doctor at Faculty of Economics and Management, Department of Management, University of Sfax, Tunisia

Younes Boujelbene

Professor at Faculty of Economics and Management, Department of Management, University of Sfax, Tunisia Original Research Received 14 Jun 2021 Revised 10 Jan 2022 Accepted 10 Jan 2022 Additional information at the end of the article

Abstract: To develop an entrepreneurial university, the organization of student life has become an increasingly relevant topic. The current paper aims to develop a model relating to the organization of student life. Therefore, the paper's objective is specifically to analyze the importance of para-academic factors and the role that they can play in the development of an entrepreneurial university. To reach tis end, we conducted a quantitative study on 230 Tunisian students. The obtained results show that students' previous professional experiences and associative life have a positive impact on the development of an entrepreneurial university. The originality of this research lies in the design of a model that attempts to explain how to structure student life in order to develop an entrepreneurial university. We are particularly interested in the image of the 'dynamic student' as the main driving force behind the development of an entrepreneurial university.

Keywords: entrepreneurial university, student life, associative life, previous work experiences

Abstrak: Untuk mengembangkan kampus kewirausahaan, pengorganisasian kehidupan mahasiswa menjadi topik yang semakin relevan. Artikel ini bertujuan untuk mengembangkan model yang berkaitan dengan organisasi kehidupan mahasiswa. Oleh karena itu, tujuan khususnya adalah menganalisis pentingnya faktor para akademisi dan peran mereka dalam pengembangan kampus kewirausahaan. Untuk mencapai tujuan ini, kami melakukan penelitian kuantitatif dengan responden 230 siswa di Tunisia. Hasil yang diperoleh menunjukkan bahwa pengalaman profesional dan kehidupan asosiatif mahasiswa sebelumnya memiliki dampak positif terhadap perkembangan kampus kewirausahaan. Kebaruan penelitian ini terletak pada desain model yang mencoba menjelaskan bagaimana struktur kehidupan mahasiswa dalam rangka mengembangkan kampus kewirausahaan. Kami sangat tertarik dengan citra 'mahasiswa yang dinamis' sebagai kekuatan pendorong utama dibalik pengembangan kampus kewirausahaan.

Kata Kunci: kampus kewirausahaan; kehidupan mahasiswa; kehidupan asosiatif; pengalaman kerja sebelumnya

INTRODUCTION

Indeed, given the scientific innovation and the export of "educational services", the university represents a key growth factor in international competition. Faced with environmental change and the emergence of new requirements, Gibb (1998) has evoked the notion of the university as an "evolutionary process" to emphasize that adaptation to needs is a concept that is not static, but a functional one which is supposed to adapt to a particular changing techno- economic environment.

Indeed, the new forces, notably the increased massification and diversification, the diversified funding, the importance of transnational education (e-learning, franchised education, student and faculty mobility), information and communication technology pressures, the evaluation of quality, and the lifelong learning engendered by globalization have all shown the inability of the traditional university to cope with these challenges , and thus accelerated the transition from one Cartesian paradigm to another post-Cartesian one (Gibbons, 1998). Thus, parallel to the traditional missions of the university

a third materialized mission, i.e., a third stream, was strongly embraced by entrepreneurship (Ben Dhia, 2007 quoted by Rajhi, 2011).

To this end, the university should "work to create a different world with a place for each competency; it should unravel the potential of creativity in each individual by the appropriate mix between Teaching, Education, Initiative, Entrepreneurship, and Employability" (Ben Dhia, 2007 quoted by Rajhi, 2011). This new stram reveals that the university must not only adapt and respond to multiple forces acting on it, but must also shape and anticipate change. In this case, several authors, such as Etzkowitz (1983) and Clark (1998, 2001), evoked the concept of an entrepreneurial university to materialize this new model of university. Indeed, the entrepreneurial university must develop the creative and inventive spirit that will enable graduates to easily fit into the world of business.

Hence, it is no longer a question of transmitting knowledge, but of teaching students to learn with reliance on their personal efforts so that they could develop the initiative and entrepreneurial spirit and will be able to solve the problems that arise mainly in their home countries. It is also about making young people able to manage their intelligence so that they appear not just as jobseekers but job creators and true agents of development (Baccari, 1998). In this sense, students are the future active population, having the potential to strengthen the territory's capacity to innovate and create more chances of employability in the near future. They also contribute to the cultural openness of the territory through their international mobility and the intercultural relations that they tend to develop.

Forzy et al. (2009), believe that "for a university to be attractive, the student environment must be interesting". So, student life would be among the factors of universities' attractiveness and a more and more differentiating element in the context of increasing competition. But, despite the importance of student life in the simulation of entrepreneurial attitudes and behaviors, there is, to our knowledge, almost no quantitative studies in the entrepreneurial literature that have already dealt with the relationship between student life and the development of an entrepreneurial university, except Rajhi's (2011) qualitative study in the Tunisian context. In her study, the author examined the crucial role of student life in the development of entrepreneurial student's entrepreneurial spirit.

So, given the importance of this theme for a real consideration of all dimensions of student life in the future to develop an entrepreneurial university, it is essential to go back to the content of the concept of student life and how to manage all these dimensions. Thus, in our work, we attempt to answer the following questions: (1) Is the development of an entrepreneurial university essentially related to the organization of student life? (2) Is the student a main actor and a driving force of the entrepreneurial university? (3) Is the student of the entrepreneurial university different from other students?

Following this introduction, this document is organized as follows. First, we will present a theoretical context and a development of our hypotheses. Then, we will explain the presentation of the model and the research methodology. After that, we will proceed with the validation of our theoretical model followed by an interpretation and a discussion of the main results. Finally, we will present the conclusion and the limitations of our study as well as the main contributions and future research directions in this field.

LITERATURE REVIEW

Forzy et al. (2009) believe that student life is characterized by the activities that students perform outside the strict framework of teaching, sometimes even to the detriment of the latter, via an associative and / or activist commitment to projects that they can carry out in parallel with their studies. In this sense, student life assumes a mission of general interest by creating the conditions allowing the young person to build his autonomy, to continue the learning of democracy and his citizenship, and thus have an impact on the whole society. In their exploratory model of the entrepreneurial spirit of engineering students, Bachelet et al. (2004) consider student life as one of the influencing factors that could develop the entrepreneurial spirit of students. In the same vein, several authors including Fayolle (2000), Tounès (2003), Bachelet et al. (2003), Fayolle et al. (2006), Billet (2007), Boissin et al. (2008), and Rajhi (2011) consider that the orientations, attitudes, and behaviors of young graduates may be influenced by a number of factors relevant to student life such as past work experiences and community life. To our knowledge, all studies reveal a tendency to study associative life to measure entrepreneurship and mainly students' attitudes towards business creation and to determine the factors influencing students' entrepreneurial intention the exception of qualitative study released by Rajhi (2011). The

author has studied the importance of associative life for the development of entrepreneurship and the entrepreneurial spirit at university. Moreover, we have studied the impact of the students' life factors on the development of the entrepreneurial university. In our research, we will focus in particular on the following two dimensions; the professional experience and the community life. In fact, we were interested only in the study of these two dimensions because they are considered, according to a qualitative study carried out by Rajhi (2011) in the Tunisian context, as the most important factors that can help develop entrepreneurship and the entrepreneurial spirit at the university. It is also necessary to note that our study is the first quantitative study that has identified the link between the organization of the students' life and the development of the entrepreneurial university. In what follows, we will tackle these two dimensions:

Previous Work Experience

Several researchers have raised the importance of past experiences in predicting behavior. This is perfectly illustrated by Ajzen (1991) who argued that "past behavior is the best predictor of future behavior". In this context, it was assumed that more than two-thirds of entrepreneurs have had work experience during their secondary studies (Tounès, 2003). Similarly, Krueger (1993) in his study of 126 university students showed that students' previous entrepreneurial exposures (such as a concrete existence of entrepreneurship in one's own family, parents or friends who have undertaken a past or present job in a small business and started one's own business) have significant links with their perceptions of desirability and feasibility. Thus, in a study of a sample of 324 French engineers, Fayolle (1999) found that the majority of business start-ups or takeovers have a strong relationship with entrepreneurial engineers' previous professional activity.

In fact, the vast majority of entrepreneurs (80.7%) reveal their conviction of the importance of previous working experience. Thus, 26% of them say that their work experience has been useful and 53.8% admit that it is very useful as it has facilitated their entrepreneurial efforts when creating or taking over their businesses.

Tounès (2003) conducted a survey with 178 questionnaires and integrated professional experiences and associative experiences into his explanatory model of the entrepreneurial intention of postgraduate management students following programs or trainings in entrepreneurship. He considers that work experiences and internships provide an opportunity for students to take on important responsibilities and decisions or to participate in projects in small or medium-sized organizations. Thus, for some authors, entrepreneurial experiences also appear as factors that can influence entrepreneurial intentions (Fayolle et al., 2006) as well as the business creation process (Filion et al., 2006).

In a recent study using a questionnaire administered to 809 French students, Boissin et al. (2008) also showed that work and associative experiences indirectly influence intention as they have an impact on one's antecedents, notably one's attractiveness and perceived ability. Their results show that 63% of students who have already worked in a company seem to be more attracted to business creation compared to 47% who did not have previous working experiences. Thus, 49% of them also feel more able to create business than others (29%). In the literature, in general, and in the Tunisian context, in particular, there is only one qualitative study conducted by Rajhi (2011) with 24 officials from Tunisian universities, which dealt with the importance of students' previous professional experiences for the development of entrepreneurship and entrepreneurial spirit at the university. In fact, in a qualitative study, Rajhi (2011) demonstrated that more than half of the interviewees (54.2%) recognize the importance of students' previous entrepreneurial experiences in developing entrepreneurship and entrepreneurial spirit at the university of the importance of internships which must be mandatory, paid for and well monitored in order to be effective for them. Therefore, on the basis of these developments, we can set the following hypothesis:

*H*₁: Past students' experiences positively influence the development of the entrepreneurial university.

Associative Life

In the entrepreneurial literature, many studies have also emphasized the role of associative life with regard to the development of students' entrepreneurial attitudes and skills. On the other hand, in his study, Fayolle (1996) used an initial sample of 20 entrepreneurial engineers as part of a qualitative approach that developed a structured set of hypotheses then, a second, significant sample of 681 engineers (including 182 contractors) obtained after a questionnaire survey. Finally, he used a third

sample of 30,000 graduate engineers (including about 2000 entrepreneurs) from the 11th survey of the French National Council of Engineers and Scientists about the engineers' socio-economic situation.

Fayolle (1996) emphasized the existence of "strong relationships between the entrepreneurial intentions and the behavior of engineers." He also highlights the prominence of related factors, notably the participation in the creation, the launching and management of students' associations, or students' stays for significant periods of time (at least six months) in foreign countries.

Similarly, Tounès (2003) conducted a survey with 178 students, 76 from universities and 102 from management schools. Tounès (2003) considers that the responsibilities taken in associative activities can allow the acquisition of entrepreneurial skills. In the same sphere, Fayolle et al. (2004) conducted an exploratory study to investigate the determinants of business creation among young graduates of higher education. They conducted interviews with 16 young graduate business students during the 2nd quarter of 1999. Among the results of their survey, there are strong implications related to the associative life. Nine interviewees were responsible within their institution of training and among them five occupied the position of president. They operate on a project basis and require strong involvement. Seven interviewees had complementary experiences in other areas, such as organization of parties, involvement in music groups, political commitment.

Another study was conducted by Billet (2007) to show how an Entrepreneurial Educational and Pedagogical Process can promote the development of the entrepreneurial spirit of students in a French business school, based on a case study from the Pau Business School. The author stressed that the specificity of entrepreneurial education at the Pau Business School is to be built on a continuous Educational and Pedagogical Entrepreneurial Process throughout the students' schooling. It is based on two fundamental developmental axes that take place during class and outside it. According to this author, the entrepreneurial path outside the courses helps reinforce the entrepreneurial awakening and develop the entrepreneurial taste through two kinds of activities, those that are mandatory and those that are optional.

Mandatory activities imply that "students must invest in a charitable or humanitarian mission". This personal investment of students in a field that is often very far away from them makes them think differently. This allows students to reach the goal of having ethical, respectful and humble behavior in all circumstances. It is the development of the humanist orientation in the student character that ought to prevail at this stage. The goal is to give the student social skills and develop a "global sensitivity".

As for optional activities, students' involvement in associations is also a way of doing business and responding to a need in an original way. Here, what is sought is to develop initiative and involvement in joint projects (sports, cultural, charitable). Some of these associations lead to organizing and conducting events and projects (Just a smile, the Pau Business School), in multiple and complex environments. All these actions allow for undertaking an entrepreneurial process and finalizing it (Billet, 2007). Thus, from the same perspective, Sonntag (2007) have attempted to answer the following questions, referring to two training issues, namely the cognitive development (reasoned knowledge) and the personal development (insurance to decide and dare to commit). But, how to train what is not teachable? In other words, how to be committed to professional actions? The author showed that student life (associations, alumni networks, clubs) contributes to young engineers identity construction and reinforces their personal insurance. Indeed, according to the author, the training time is not only marked with examinations and checks of knowledge but also through all activities related to student life that bind students together and help them build their identity. If young engineers in constantly evolving situations refer to their fellow students, to their peers, and to the internalized image of their school, we can only highlight the formative and identity-building function of student and network associations of the ancients (Sonntag, 2007).

In his qualitative research with a sample of 25 Tunisian entrepreneurs, Chelley (2007) noted that the previous associative experiences of Tunisian entrepreneurs had an impact on the intention to set up a business insofar as these "experiences were part of demystification of the entrepreneurial act and sensitized the individual to the creation of enterprises."

Then, another quantitative survey shows that students with responsibility within an association have stronger attraction to starting business than students who are simply members (70% versus 56%). Students' association reacted in the same way. 56% of them feel able to start business against 43% for the simple members of association (Boissin et al., 2008).

In general, in the literature and in the Tunisian context, Rajhi (2011) was the first to study the

importance of the associative life for the development of entrepreneurship and the entrepreneurial spirit within the Tunisian university. For this rason, he conducted semi-directive interviews with 24 officials from the Tunisian universities. The results of his survey revealed that 83.3% of the interviewees agreed that community life is very important for the development of entrepreneurship as well as for the entrepreneurial spirit in the Tunisian universities. In fact, Rajhi stressed the need to focus on the student life or precisely its organization, on the one hand, and to develop community life and give controlled freedom to clubs and associations, on the other hand. She believes that universities are expected to establish contact with students. This contact translates into communication, empowerment, freedom, and student motivation. Therefore, it is possible for us to pose the following hypothesis: H_2 : Associative life positively influences the development of the entrepreneurial university.

Conceptual Model

Therefore, to test our hypotheses about the importance of previous professional experience and the associative life for the development of the entrepreneurial university, we propose the following model in Figure 1.

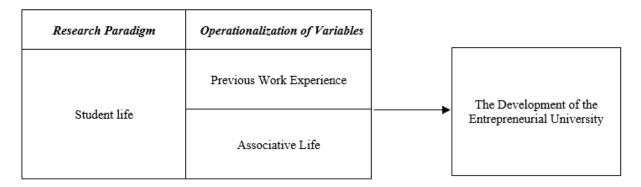


Figure 1. Conceptual Model

RESEARCH METHODOLOGY

Description of Items and Scales of Measurement

Table 1 summarizes the variables used in this study and their respective measures. The operationalization of these variables was performed using a five-point Likert scale ("1 = Not at all important" to "5 = Very important").

Sample and Data

Our essay is based on a sample of 230 Tunisian students. According to Harris (1985), the sample size must exceed the number of predictors by at least 50, therefore, a 230- observation sample meets this rule. The method chosen for the administration of the enquiry is the face-to-face. This type of method enables a direct contact between the interviewer and the respondent. Which is considered to be potentially the most interesting and effective method that can garantee the quality and quantity of information to be collected. For this reason, we have chosen this method of administering the questionnaire to verify some information and control the respondents' responses so as to avoid any misunderstanding of the questions. In our study, the data collection took about three months, between August, September and October 2018. In fact, two hundred and fifty students were selected among whom only 230 agreed to answer the questionnaire, which gave us a response rate of around 92%. However, it should be noted that the rate of filtered responses which were considered inappropriate data for our study was 8%.

Choice of Methodology

We proceeded with a multiple regression to detect the influence of the different explanatory variables (the associative life and students' previous professional experiences) on the development of the entrepreneurial university. The general purpose of multiple regression is to find out more about the

relationship between several independent or predictive variables and a dependent or criterion variable. Multiple linear regression analysis produces a linear object in (n) dimensions.

Variables in the Model	Code	Variables Measurement and Authors' References
Dependent Variable		
The Development of the Entrepreneurial Eniversity	DEVELOP	Based on the literature, we have chosen indicators to measure the development of the entrepreneurial university, namely: publishing papers with practical implications, Generate jobseekers (Guerrero & Urbano, 2010). Implementation of a strategic plan, total returns from contracts, projects, patents by academic departments, and Implementation of entrepreneurial culture in study programmes (García-Aracil et al., 2013).
Independent Variables		
Previous Work Expérience	PREVI	The operationalization of the students' previous experience is expressed through the following items: A past or a present job in a small business, or the student has a friend who has undertaken the concrete existence of entrepreneurship in one's own family (Krueger, 1993). Training or a little job, has the student started a small business, has he created an association in the course of his studies, the student having been member of association (Rajhi 2013).
Associative Life	LIFE	The operationalization of the associative life is expressed throug the following items: Student entrepreneurs' clubs, entrepreneuria activities (Locas, 2010) and associative activity (Rajhi, 2011).

Table 1. Description of the Variables

RESULTS AND DISCUSSION

Descriptive Statistics

Before starting the homogeneity tests required for the validation of our hypotheses, it is advisable to specify the properties of the data collected through the respondents' material safety data sheet concerning their gender, age and level of education. In fact, 80% of the respondents were males and 20% females, 60% were under 22 years of age while the remaining 40% were between 22 and 26 years of age and finally, concerning the academic level, 60% of the respondents had an applied bachelor's degree while 40% had a professional master's degree.

The Principal Component Analysis

Firstly, we used the Principal Component Analysis, which is an extremely powerful information synthesis tool. In our study, we used the five-point Likert scale for all questions because this scale is based on the idea that people's attitudes are measured through their opinions.

In our work, we applied the main component analysis technique for both the variable to be explained and the explanatory variables. Finally, we obtained 5 items for the students' previous experience, 3 items for their associative life and 5 items for the development of the entrepreneurial university. Therefore, at the end of this phase of our research, we obtained a set of 13 items that represent very good factor contributions (all greater than 0.65). In fact, the Principal Component Analysis enabled us to remove the items that have low factor contributions (all below 0.37), such as patents by the university department and the implementation of an entrepreneurial culture in the university curriculum

or if the student has a friend who started a business, or he was a member of an association. The PCA should be used primarily for reliability calculations. On the other hand, the Cronbach's alpha index is a measure of the internal consistency of a test or, in other words, a measure of the scale reliability. Table 2 shows the reliability measurement with high measurements well above 0.7, indicating a good reliability of the constructs. The scale is therefore internally consistent.

Variables	DEVELOP	PREVI	LIFE	Cronbach's Alpha	N of Items
DEVELOP	1			0.855	5
PREVI	0.730	1		0.715	5
LIFE	0.710	0.753	1	0.722	3

Table 2. Reliability and Correlation Analysis

Checking Regression Conditions and Model Quality

The verification of the conditions of multiple linear regression application is carried out with the SPSS software (version 21.0). These conditions, which relate to the linearity of the model, the normality of the residues, the homosedasticity of the residues and the absence of bivariate and multivariate multicollinearity, are well verified.

The empirical results show that 62.1% of the variation in the level of creation and development of the entrepreneurial university is explained by the level of education, the knowledge of the sector of activity, the origin of the entrepreneurial family and the presence of a leader team.

The Fisher (F) statistic confirms the good quality of the model (F = 66.822 and sig = 0.000). We can conclude that the model is statistically significant and explanatory of the studied phenomenon. Regarding the significance of the independent variables, we can see that all the variables are statistically significant.

Table 3 presents the explanatory power of the model, the beta coefficients, the t Student, the F statistic and its meaning, as well as a summary of the results of the multiple regression relative to the set of explanatory variables of this model.

Explanatory Variables	Coefficients	T- Student	Sig
Constant		3.666	0.000**
Previous Students' Experiences	s 0.199	4.355	0.000***
Associative Life	0.227	5.060	0.000***
$R^2 = 0.621$			
R^2 Adjusted = 0.613			
F = 66.822			
Sig. = 0.000			
***: Significant Level 1%; **:	Significant Level	5%	

Table 3. Results of Multiple Linear Regression Model

Analysis of the Impact of Students Previous Experiences on the Development of the Entrepreneurial University

Our first hypothesis states that past experiences of students positively influence the development of the entrepreneurial university. The examination of statistical tests shows that this variable has a positive and significant effect on the variation in the level of development of the entrepreneurial university. Indeed, the examination of the causal relationships shows that the coefficient associated with the link between the students' previous experiences and the development of the entrepreneurial university is positive (0.199) and statistically significant (the value of the associated t is 4.355 with a p = 0.000).

The results indicate that there is a strong positive relationship between the students' previous experiences and the development of the entrepreneurial university. Thus, the development of the entrepreneurial university is strongly associated with the students' past experiences. This corroborates the predictions of the hypothesis (H1).

Analysis of the Impact of Community Life on the Development of the Entrepreneurial University

The second hypothesis is used to verify if associative life positively influences the development of the entrepreneurial university. The examination of statistical tests shows that this variable has a positive and significant effect on the variation in the level of development of the entrepreneurial university.

Indeed, the examination of causal relationships shows that the coefficient associated with the link between associative life and the development of the entrepreneurial university is positive (0.227) and statistically significant (the value of the associated t is 5.060 with p = 0.000). The results indicate that there is strong positive relationship between associative life and the development of the entrepreneurial university is strongly associated with the associative life. This corroborates the predictions of hypothesis (H₂).

Discussion

Examining the variety of definitions related to the entrepreneurial university shows that there is not a clear consensus about a single definition. However, among these definitions, some standard features include interdependence with government and industry, different sources of income, the implementation of different strategies to improve the creation of new businesses, and readjustments in the university's organizational structure to become flexible and innovative. These features allow universities to adapt to the changes in the environment and meet different stakeholders' needs.

In addition, some definitions implicitly or explicitly express the phenomenon of entrepreneurship where the process that exists within this type of institution can lead not only to the creation of new businesses but also to other innovative activities such as the development of new products, services, technologies, administrative techniques, strategies and competitive positions (Guerrero et al., 2006).

In the current paper, we can formulate an original and new definition of the entrepreneurial university to advance research in this field. Thus, we can assume that an entrepreneurial university is an institution that sets the best strategies and procedures to organize student life properly. It also considers the student as a dynamic actor involved in developing an entrepreneurial university. Accordingly, it trains a student, not like the others but focuses primarily on the associative life of students and their previous experiences in order to have an entrepreneurial orientation.

For us, what distinguishes entrepreneurial universities from those that are not is student life organization. As our research indicates, a better definition of an entrepreneurial university should revolve around the student as the main agent responsible for transforming the university into an entrepreneurial institution. This focus was not thouroughly taken into account in previous theoretical and empirical studies (Guerrero et al., 2015; Hark, 2016; Etzkowitz, 2016).

In this sense, student life can play a crucial role in developing an entrepreneurial university as it can contribute to the improvement of student-environment relations and the strengthening of social ties. It can also enable him to take responsibility and initiative, discover the company and himself, reach personal fulfillment, discover his entrepreneurial spirit, and develop social skills. On this basis, the university must provide students with an environment where communication, open-mindedness, mobility, vocations, and responsibility are taken as strategies that promote the expression of talents, innovation, and creativity.

The organization of student life is strongly explained by the associative life as well as the previous students' working experiences. Indeed, for associative life, the estimated results confirm hypothesis 2. Based on these results, community life plays a very important role in developing an entrepreneurial university. It develops what has already been acquired, such as skills, self-knowledge, initiative, and commitment. It makes students accustomed to communicating with the outside environment. It offers the opportunity to take responsibility, assert oneself, and put the theories learned into practice. Again, it allows to exchange information and helps make the decision. Instigating the entrepreneurial spirit is made not through traditional education but informal channels. Using all means to pass the modern and illustrative information allows for giving the best results. This explains the extent to which mastery of knowledge in some cases can be acquired through specific work based on associative activity. Everyone discovers, reveals himself in this realm, better identifies his tastes and aptitudes, and thrives. For instance, the university has several clubs for scientific, economic, sports, cultural, fun, or charity vocations through which students contribute to the Institute's reputation. In the same sphere, Rajhi (2013) signals the importance of associative life as "a beautiful tradition to maintain, to follow and

develop because it helps and facilitates the professional integration of students. Thus, it helps to develop their entrepreneurial attitudes and skills."

Moreover, a recent study by Locas (2010) confirms these opinions. The author of this study emphasized the Student Entrepreneurs' Clubs' role in developing young people's entrepreneurial potential. In fact, through the organization of entrepreneurial activities (conferences, visits, activities with the local business community, commercial activities), young people involved in the Student Entrepreneurs' Clubs can create a bridge with the business world and develop entrepreneurial characteristics (leadership, autonomy, perseverance, creativity). These characteristics will later be highlighted in possible projects for the creation or takeover of companies or within an existing company (entrepreneurship) (quoted by Rajhi, 2011).

Régine et al. (2001) believe that entry into student life cannot be perceived only in academic and social affiliation to the university. It is the result of a meeting between a new academic culture and a new social status and a transformation of the frameworks and ways of life which, together, contribute to shaping the identity of the students. Therefore, being situated in a logic of learning, student life concerns them only to a limited extent because their exchanges with their fellow students are limited to academic objects (Le Bart & Merle, 1997).

Student life includes all the student activities inside and outside the regular course schedule. It must also include an integration of all aspects of his or her life, of all the activities that, in relation to the institutional program, call for their participation and complement their academic training (Sauriol, 1981).

The difference between universities that value associative life and those that do not the result is very viable. For universities to become entrepreneurial, it is vital to take into account the element of associative life. If we could capitalize on it in teaching, we have not yet found a formula to encourage students to undertake it. It must be valued and integrated into the student evaluation process in Tunisia and the world in general and especially in developing countries. We wish to strongly boost the associative life to develop a sense of belonging and reinforce the university's identity by setting up a service of associative life consisting of agents whose mission is to initiate activities that students can take in a second time. With respect to students' past experiences with the entrepreneurial university's development, the regression results confirm the hypothesis proposed in advance. Thus, following several authors, including Fayolle, 2000b; Tounès, 2003; Bachelet et al. (2004), Fayolle et al., 2006; Billet, 2007, and Rajhi, 2013, we think, that students who had previous work experience (internship or a small job) or who started a small business or created an association during their studies or had been member of association are expected to be more equipped than others who can be easily integrated into the professional and social life. Then, work experience can help students avoid or else easily solve problems previously encountered. However, it could also inhibit creativity and adaptability by pushing it to stick to proven solutions in the past. On the other hand, prior functional experience allows the development of expertise that can foster the development of entrepreneurship and the entrepreneurial spirit within the university. Students will have the opportunity to network and connect with creditors, suppliers, and clients, access information networks and gain encouragement through the use of professional counselors, such as lawyers, bankers, and accountants, as well as business associations. For example, a student from a family with one or more owner-managers will benefit from their experience. During his youth, he acquired the required skills to become more inclined to consider entrepreneurship as a viable career choice.

Therefore, we assume that the student's experience can help them participate more actively and benefit from the community life. Experiencing active success is an opportunity to increase one's feeling of self-efficiency. This experience is very professionalizing. Indeed, students feel able to create or take over a business and assess their skills in managing innovation and communication with others. Generally speaking, it can be said that students can rely on a high degree of self-confidence to start a business even though it is only a self-assessment. This self-confidence, which emerges, and the "ready to go" are likely to reduce the potential obstacles to starting a business. In this way, students learn to work in groups and manage projects. The diverse aspects of their experience represent a set of resources (business knowledge and personal networks) that can be used to guide universities towards the development of entrepreneurship and entrepreneurial spirit within themselves. Furthermore, the student's previous experience can help develop an entrepreneurial university.

On the other hand, the associative activity is essential and fundamental for the student's training. For this reason, it is essential to make efforts within the university to structure students' lives properly. In fact, throughout the academic year, students are caught up in an infernal cycle of studies and projects with a heavy workload. Therefore, the associative activities can help students get out of this stressful sphere into a world where they can rein in their imagination, creativity, innovation without worrying about evaluations, exams, marks. It is an environment that enables them to breathe, meet new people with different skills, vary their activities, and live! At the same time, they put out a lot of effort and energy to keep moving forward. Many clubs and associations have made a name for themselves on a national and even international scale, offering them the opportunity to develop their know-how and interpersonal skills and a sense of initiative to acquire new knowledge and apply what they have learned while enhancing their capacities and skills. Therefore, it is a real added value to transform the classical university into an entrepreneurial one.

Moreover, to facilitate and guarantee the development process of the entrepreneurial university, it is necessary to properly structure the students' lives in terms of capitalizing on their previous experience and supporting their associative life. The associative life is one of the keys to differentiating universities because it illustrates the feeling of belonging to the university community and the influence of its brand. Therefore, thanks to the diversity of its student association network, the university can benefit from this wealth, which contributes to its dynamism, its influence and its orientation towards an entrepreneurial university. It also improves the quality of the university education and subsequently affects the human capital (in terms of experience and productivity), which stimulates a country's economic growth. Furthermore, it is an important factor that encourages further education and helps better integration into the labour market, which reduces the risk of unemployment. Therefore, it is important to focus on the increasingly frequent role of entrepreneurial universities as a "talent magnet," i.e., highly skilled "knowledge workers" who can bring economic prosperity and social well-being to the regions.

The associative life is rich and favored by the Institute, which attaches great importance to it. Therefore, it should be mentioned that associative life differs according to the nature or type of the institution. For instance, in a school of engineering, business, management, and computer sciences with a practical curriculum, community life is very active, which is not the case for a faculty of arts or humanities. Again, a faculty is different from a school or an institute. For example, the Higher Institute of Management of Sfax has developed the student's life more than the Faculty of human sciences or economics and management of Sfax. On the other hand, in public faculties, students are fully involved in all the applied research studies, animation, tutoring, and teaching activities. The public university allows its students to invest and engage in many cultural, social, sporting and entertainment activities more than the private university.

The supporters encourage the universities to adopt an entrepreneurial approach to invest in innovation and commercialize their knowledge autonomously. In this context, the student's life differs according to the degree of the universities' support. It is richer, more active, more motivating, and well organized in the universities that have supported it, thus facilitating, guaranteeing, and increasing the orientation process of the university towards a more entrepreneurial one. However, in poorly supported universities, the student's life is less active, less rich, non-motivating, and mostly poorly organized, which could slow the development process of the classical university to become an entrepreneurial one.

Universities in major cities are most often ready to welcome students from diverse backgrounds. The Faculty shows more openness to international interactions through cooperation with universities and major schools in other countries. The big city brings a great support to the student's life: making premises available, awarding of grants, communication tools, and listening. The city is a well of culture and recreation... In our opinion, the student's life is rich, active, and motivating in universities located in a large city or close to the industry.

After our empirical investigation, five very important conclusions were drawn:

- 1. The student's life is rich in a public university more than in a private one.
- 2. An institute or a school of management develops more the student's life than a faculty.
- 3. The nature of the disciplines taught, such as economics, management sciences, commerce, engineering, and informatics, further develops the student's life than other disciplines, such as arts, languages, and humanities.
- 4. The student's life is very rich, very active, and well organized in universities that are well supported.

5. The student's life is very active and rich in universities located in a large city or close to industry. In addition, several factors allow the development of the entrepreneurial university: some authors emphasize formal and informal factors (Guerrero et al., 2006) others (Mora & Villarreal, 2001; Gibb et al., 2009) advocate transformations within the organization (organizational structures, management, governance style of leadership, leadership). Also, some others (Zaharia & Gibert, 2005) recommend the opening and internationalization of the university (university centers, multinational universities, international research networks, international projects).

In the same vein, other authors argue that the entrepreneurial culture is a cohesive variable needed to create the entrepreneurial university (Clark, 1998; Rinne and Koivula, 2005), and above all, it must have an entrepreneurial orientation (Todorovic & McNaughton, 2003; Todorovic, 2004, 2007; Boehm, 2008; Dabic et al., 2015; Kalar & Antoncic, 2015).

For our part, our proposed model is original and is presented for the first time in the literature through a quantitative study. It proposes two new variables that allow the development of an entrepreneurial university. First, they establish an associative life service and students' previous professional experiences. Organizing student life to develop an entrepreneurial university is the path by which each university can meet the challenges of young graduates' employability. Indeed, in an academic environment, the development of an entrepreneurial university is a complex task and a long-term process that requires the efforts of many people, notably students. So, knowledge is transferred to companies through students. The entrepreneurial universities tend to behave like entrepreneurs and pave the way for academic entrepreneurs. Today, entrepreneurial universities play a leading role in economic development and are considered the future workshops of society.

CONCLUSION

The main objective of this study is to analyze the impact of student life on the development of an entrepreneurial university. It relies on a sample of 230 Tunisian students. This analysis reveals positive correlations between students' previous professional experiences, associative life, and the development of entrepreneurial universities. Our study attempts to give new results that have not yet been detected by the authors who have studied the factors of creation and the development of the entrepreneurial university (Etzkowitz, 2013, Etzkowitz, 2016; Dabic et al., 2015, Guerrero et al., 2016; Guerrero et al., 2015).

However, the findings of our research are subject to certain limitations. First, the limited number of managers in the sample makes the results somehow weakly generalizable. Then, our methodological choice was limited to testing only two variables. In fact, introducing other factors related to student life could have promoted the development of an entrepreneurial university. We were content in this research to carry out a study on the heads of universities. So, another limitation of our research is that we have not conducted a longitudinal analysis of students throughout their schooling, where it is a matter of repeating the same survey to better understand the factors influencing their previous experiences. Despite the limitations already mentioned, we believe that this study makes a real contribution.

On the one hand, it first represents a first step in the entrepreneurial literature to notice the importance of the student as a dynamic actor who participates in the development of an entrepreneurial university. On the other hand, this study allows deepening the knowledge on new factors allowing the development of an entrepreneurial university. In addition, it is interesting to suggest that our formal definition of the entrepreneurial university enriches the theoretical literature in the field of entrepreneurship. It would be possible to extend our research by working on several routes. Several improvements can be made to this research work and extensions remain possible.

On the one hand the sample can be extended to all regions of Tunisia, which could reveal other specificities and improve the quality of the results. Thus, such a survey could be replicated on larger sample size. Another avenue of research that would enrich the knowledge of student life and its importance for the development of an entrepreneurial university would be to analyze a more in-depth qualitative study by introducing other related factors of student life. These factor scans include communication with and between students, pull-type motivations, and push motivations to better grasp and understand students' needs, expectations, opinions, motivations of students and to bring out unexpected new ideas for the researcher. On the other hand, our findings can not be considered a reference for designing entrepreneurial orientation policies, but this paper can be taken just as the first

step in a wider research process. An improvement of our measurement tools can prove judicious and thus improve the interest of such research. Therefore, understanding the developmental determinants of an entrepreneurial university is interesting, but understanding the process of fostering or stimulating the development of these entrepreneurial universities is still instructive. Our result then provides theoretical and empirical support for explanatory factors that significantly influence the development of an entrepreneurial university.

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Article correspondence should be sent to:

Sawsen Sidrat

Doctor at Faculty of Economics and Management, Department of Management, University of Sfax, Tunisia (sawsensidrat@yahoo.fr)

Recommended Citation:

Sidrat, S. & Boujelbene, Y. (2022). The Entrepreneurial University: Why Focusing on the Organization of Student Life? Journal of Business and Entrepreneurship, 10(1), 74-87.

This article is available online at:

http://ojs.sampoernauniversity.ac.id (ISSN: 2302-4119 Print, 2685-6255 Online)