Entrepreneurial, strategy and performance in restaurants and similars

Restaurants tend to be small businesses, operated almost in a self managed way, by their entrepreneur owners or a contracted manager. The way these managers conduct their business depends much on their individual abilities to run the company. This research aimed to investigate the possibly existing influences between individual entrepreneurial orientation (IEO), service strategy (SS) and business performance (BP). A construct was developed to run the study, including hypothesis joining the three influences. Questionnaires using Likert scale were built and validated. Survey was conducted with 260 restaurant, bars and hotel owners or managers. Data were analyzed through modeling of structural equations. Results confirmed the three hypothesis: H1: IEO positively influences SS; H2: IEO positively influences BP; H3: SS positively influences BP. Theoretical contributions were made through the construct building. Managerial implications are listed, in order to help restaurant management better run their business.

Keywords: Individual Entrepreneurial Orientation; Service Strategy; Business Performance; Restaurant; Hospitality.

Empreendedor, estratégia e desempenho em restaurantes e similares

Os restaurantes tendem a ser pequenos negócios, operados quase de forma autogerida, por seus empreendedores ou por um gerente contratado. A maneira como esses gerentes lidam com seus negócios depende de suas habilidades individuais para dirigir a empresa. Esta pesquisa teve como objetivo investigar as influências possivelmente existentes entre a orientação empreendedora individual (IEO), a estratégia de serviços (SS) e desempenho do negócio (BP). Um modelo foi desenvolvido para executar o estudo, incluindo hipóteses juntando as três influências. Os questionários usando escala Likert foram construídos e validados. O levantamento foi conduzido com 260 gestores de restaurantes, bares e hotéis. Os dados foram analisados através da modelagem de equações estruturais. Os resultados confirmaram as três hipóteses: H1: IEO influencia positivamente SS; H2: IEO influencia positivamente BP; H3: SS influencia positivamente a PA. As contribuições teóricas foram realizadas por meio do modelo proposto. As implicações gerenciais estão listadas, para ajudar o gerenciamento de restaurantes a funcionar melhor.

Palavras-chave: Orientação Individual Empreendedora; Estratégia de Serviços; Desempenho Empresarial; Restaurante; Hospitalidade.

Received: 08/06/2020
Approved: 30/07/2020

Reviewed anonymously in the process of blind peer.
INTRODUCTION

Three themes integrate this article: service strategy (SS), individual entrepreneurial orientation (IEO), and business performance (BP). SS represents a way for companies to establish their perception of services and how they intend to offer them to market, so as to gain competitive advantage to win and retain customers (ZATTAR et al., 2014; ZEITHAML et al., 2014; STEVEN et al., 2016). Entrepreneurial orientation (EO) systematizes and defines paths to individual entrepreneurs performance on promoting and innovating in business (STANLEY et al., 2012; SOININEN et al., 2013; STEVEN et al., 2016). BP is supposed to result from any type of private enterprise strategy and operation (HESKETT, 2002; SILVESTRO, 2014; PEREIRA, 2016).

Services, identified as evolution and future trends for companies and organizations, require definition of goods-services component, to formulation of a SS (GRÖNROOS, 2009; NÓBREGA, 2013; ZEITHAML et al., 2011; NEELY et al., 2016). A clear and defined SS is identified as competitive differential, and value innovation to customer requires SS linked to value-added goods and services to its main product (LOVELOCK et al., 2001; FISCHER et al., 2010; GRÖNROOS, 2009; JOHNSTON et al., 2010; NÓBREGA, 2013). Despite services growth, not always companies and organizations are clear about SS formulation (CORREA et al., 2010, GRÖNROOS, 2016; ZEITHAML et al., 2011).

If there is on the one hand, growth of services, it is expected that SS formulation generates contribution to BP, in terms of market achievement and receipt volumes (FITZSIMMONS et al., 2014; GRONROOS, 2016). This way, managers performance can be related to SS adoption.

Once great part of service enterprises are influenced by their managers, may them have been the founders or not, understanding entrepreneurs' ability to undertake seems to be something of academic and business interest. Understanding entrepreneurial orientation of these individuals represents an alternative to study this context. Understanding IEO relates to personal characteristics or attitudes necessary for a person to increase his propensity to participate and be successful in entrepreneurial activities (ARRUDA, 2015). Bolton et al. (2012), when replicating Lumpkin et al. (1996) research, in context of individuals, found that from five original entrepreneurial orientation (EO) dimensions, identified by Lumpkin et al. (1996) in their study - innovation, proactivity, risk assumption, competitive aggressiveness and autonomy, only three remained: capacity for innovation, proactivity and risk-taking. Then, they conceived and validated a scale for researching IEO.

Reseaches were done studying relationship IEO-SS (BOLTON et al., 2012; FREITAS et al., 2012; STEVEN et al., 2016); SS-BP (HESKETT, 2002; SILVESTRO, 2014; VIJ et al., 2016); and IEO-BP (JANTUNEN et al., 2005; NALDI et al., 2007). Therefore, understanding relationship between IEO, SS and BP has its importance and relevance. But, do this in a general view, or in a specific segment? There comes the option for choosing a segment allowing reflection in a sectorized way.

Among various economic segments offering services, hospitality, represented by restaurants, bars and hotels, stands out. This segment performance has grown strongly in Brazil in last five years as result of consumer demand for services with an acceptable standard and quality (ABRASEL, 2016; IBGE, 2016).
Brotherton (1999) has adopted the term “hospitality” in the sense typical of whoever hosts a traveler, providing accommodation, food or drink, with intention of generating entertainment effects.

Studies by Lee et al. (2016) on Australian restaurants showed positive influence of innovation activity and service strategy on service performance. In addition, variables developing new products and seeking market opportunity had stronger effects on restaurant performance. On the other hand, individual entrepreneurial orientation by restaurant managers did not significantly affect service performance. Boo (2017) argues that service-oriented restaurants have become an attractive business for Asian countries and, therefore, restaurant service performance should be well understood and managed. To the author, the main determinants for service delivery were people and price.

Restaurants interested in providing good services should focus on three elements: quality of service (responsiveness), price and quality of food (reliability), as well as the design of competitive services strategies consolidated in market (PAI et al., 2016). Their results indicate that hospitality organizations aiming to improve business performance will be successful by adopting service strategies. Barreto (2017) argues that hospitality organizations searching for business performance will succeed in adopting service strategies appropriate to their business, through manager’s individual entrepreneurial characteristics.

Based on this context, a question arises: are there influences between ‘IEO’, ‘SS’ and ‘BP’ in the perception of managers of brazilian hospitality industry? Therefore, this article objective was to investigate the possibly existing influences between IEO, SS and BP, according to perceptions of brazilian hospitality sector managers.

THEORETICAL REVIEW

Individual entrepreneurial orientation (IEO)

Researches developed by Bolton et al. (2012) present theoretical consistency to propose this research conceptual model. Contributions are found in Miller (1983), Lumpkin et al. (1996), Wiklund et al. (2005), Hughes et al. (2007) and Bolton et al. (2012). Among IEO observable variables, three were confirmed: risk assumption, capacity for innovation and proactivity. Exhibit 1 shows their description.

<table>
<thead>
<tr>
<th>Observable variables</th>
<th>Code</th>
<th>Description</th>
<th>Authors</th>
</tr>
</thead>
<tbody>
<tr>
<td>Risk taking</td>
<td>RISK1</td>
<td>I like to take bold action by venturing into the unknown</td>
<td>Miller (1983), Lumpkin et al. (1996), Wiklund et al. (2005), Hughes et al. (2007), Bolton et al. (2012)</td>
</tr>
<tr>
<td></td>
<td>RISK2</td>
<td>I am willing to invest a lot of time and/or money on something that might yield a high return</td>
<td></td>
</tr>
<tr>
<td></td>
<td>RISK3</td>
<td>I tend to act “boldly” in situations where risk is involved</td>
<td></td>
</tr>
<tr>
<td>Innovativeness</td>
<td>INNOV4</td>
<td>I often like to try new and unusual activities that are not typical but not necessarily risky</td>
<td>Miller (1983), Lumpkin et al. (1996), Wiklund et al. (2005), Hughes et al. (2007), Bolton et al. (2012)</td>
</tr>
<tr>
<td></td>
<td>INNOV5</td>
<td>In general, I prefer a strong emphasis in projects on unique, one-of-a-kind approaches</td>
<td></td>
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</table>
rather than revisiting tried and true approaches used before.

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<tbody>
<tr>
<td>INNOV6</td>
<td>I prefer to try my own unique way when learning new things rather than doing it like everyone else does.</td>
<td></td>
</tr>
<tr>
<td>INNOV7</td>
<td>I favour experimentation and original approaches to problem solving rather than using methods others generally use for solving their problems.</td>
<td></td>
</tr>
</tbody>
</table>

### Proactiveness

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<table>
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<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>PROACT8</td>
<td>I usually act in anticipation of future problems, needs or changes. Miller (1983), Lumpkin et al. (1996), Wiklund et al. (2005), Hughes et al. (2007), Bolton et al. (2012).</td>
<td></td>
</tr>
<tr>
<td>PROACT9</td>
<td>I tend to plan ahead on projects.</td>
<td></td>
</tr>
<tr>
<td>PROACT10</td>
<td>I prefer to “step-up” and get things going on projects rather than sit and wait for someone else to do it.</td>
<td></td>
</tr>
</tbody>
</table>

**Service Strategy (SS)**

Services strategy comprises a set of plans and policies to achieve business objectives and goals. However, Nóbrega (2013), about service strategy, points to adoption of the sense of serving as one of the main elements that somehow seeks to differentiate companies from their opponents by service strategies.

Corrê et al. (2002) relate some performance factors that contribute to add value to company service or product: access; service speed; less variation, consistency; attention, friendliness and willingness to attend; flexibility; safety; cost; integrity; ability to communicate; cleaning; comfort of facilities; and environment aesthetics. Fitzsimmons et al. (2014), in turn, related variables for service strategy: availability, competitors, convenience, reliability, price, personalization quality, reputation, safety and speed.

Grönroos (2009) classifies strategic perspectives as: product, in which the main competitive advantage is the central product or service; price, when price is the decisive criterion for decision making; image, when company uses its brand or image, as competitive advantage; Service, considering the services offered and the relation with the client as determinants. To Hoffman (2013), the stages of operational competitiveness determined indicate steps or paths to be followed: available for service; diarist; differentiated competence; excellence in services.

To Johnston et al. (2010), organizations assess organizational performance through operations, observing the potential and best training during operational tasks. To the, variables for service strategy are: attitude, competitors, performance, differentiation, availability, opportunity, price and security. Lovelock et al. (2001) argue for the importance in having integration of service strategy, human resources and operations, better customer service, because specific strategies can be adopted, working the "head" of each client and generating differential, so that focus may be of great relevance for companies, visualizing new opportunities with innovative strategies. The authors highlight the most relevant variables in their studies: capacity, competence, competitors, differentiation, willingness to attend, integrity, cleanliness, opportunity and price (cost). Teboul (1999) states that segmentation strategy can also be understood as a standardization strategy, demonstrating the importance of result, intensity of service and interaction between organizational processes. So, some variables highlighted in their approach are: competence, reliability, performance and...
price (cost). Nóbrega (2013), lists variables considered important in adoption of services strategy: access, competence, competitors, knowledge, differentiation, willingness to attend, opportunity and speed. The observable variables extracted from the SS are shown in Exhibit 2 and Exhibit 2a.

**Exhibit 2:** Observable Variables extracted from latent variable Strategy Service.

<table>
<thead>
<tr>
<th>Observable variables</th>
<th>Code</th>
<th>Description</th>
<th>Authors</th>
</tr>
</thead>
<tbody>
<tr>
<td>Access</td>
<td>SS1</td>
<td>Affordable location, easy and clear signage</td>
<td>Corrêa et al. (2002); Nóbrega (2013)</td>
</tr>
<tr>
<td>Attitude</td>
<td>SS2</td>
<td>Take initiative in fulfilling customer needs</td>
<td>Johnston et al. (2010)</td>
</tr>
<tr>
<td>Capacity</td>
<td>SS3</td>
<td>Ability of the service to be executed and fulfill its purpose</td>
<td>Lovelock et al. (2001)</td>
</tr>
<tr>
<td>Competence</td>
<td>SS4</td>
<td>Qualification and professionalism on providing service</td>
<td>Corrêa et al. (2002); Hoffman (2009); Lovelock et al. (2001); Nóbrega (2013); Teboul (1999); Zhang et al. (2011)</td>
</tr>
<tr>
<td>Communication</td>
<td>SS5</td>
<td>Ease for quickly, clearly and effectively inform customers</td>
<td>Corrêa et al. (2002); Heskett (2002);</td>
</tr>
<tr>
<td>Competitors</td>
<td>SS6</td>
<td>Opponents disputing the same market</td>
<td>Corrêa et al. (2002); Fitzsimmons (2010); Grönroos (2009); Johnston et al. (2010); Lovelock et al. (2001); Nóbrega (2013); Heskett (2002); Contador et al. (2004); Zhang et al. (2011).</td>
</tr>
<tr>
<td>Reliability</td>
<td>SS7</td>
<td>Provide service as promised</td>
<td>Grönroos (2009); Teboul (1999); Contador et al. (2004); Slack et al. (2003); Gebauer (2005); Parasuraman et al. (1985)</td>
</tr>
<tr>
<td>Comfort</td>
<td>SS8</td>
<td>Feeling of well-being due to environment</td>
<td>Corrêa et al. (2002); Heskett (2002);</td>
</tr>
<tr>
<td>Knowledge</td>
<td>SS9</td>
<td>Technical ability regarding information needed to provide services</td>
<td>Corrêa et al. (2002); Grönroos (2009); Nóbrega (2013); Parasuraman et al. (1985)</td>
</tr>
<tr>
<td>Consistency</td>
<td>SS10</td>
<td>Conformity with previous experience, lack of variability in process result</td>
<td>Corrêa et al. (2002); Victorino et al. (2005); Nóbrega (2013); Fitzsimmons et al. (2014)</td>
</tr>
<tr>
<td>Creativity</td>
<td>SS11</td>
<td>Creating new possibilities for goods and services</td>
<td>Slack et al. (2003); Gebauer (2005); Zhang et al. (2011) Ketchen et al. (2007);</td>
</tr>
<tr>
<td>Performance</td>
<td>SS12</td>
<td>Organization performance in meeting customer needs</td>
<td>Heskett (2002); Slack et al. (2003); Gebauer (2005); Zhang et al. (2011) Ketchen et al. (2007)</td>
</tr>
<tr>
<td>Differentiation</td>
<td>SS13</td>
<td>Demonstrate singularity to clients in provided services</td>
<td>Corrêa et al. (2002); Fitzsimmons (2010); Grönroos (2009); Hoffman (2009); Johnston et al. (2010); Lovelock et al. (2001); Nóbrega (2013); Zeithaml et al. (2011); Slack et al. (2003);</td>
</tr>
<tr>
<td>Serving promptness</td>
<td>SS14</td>
<td>Demonstration of interest from frontline employees in helping customers and willingness to serve</td>
<td>Lovelock et al. (2001); Nóbrega (2013); Heskett (2002); Slack et al. (2003); Contador et al. (2004); Victorino et al. (2005);</td>
</tr>
<tr>
<td>Aesthetics</td>
<td>SS15</td>
<td>Appearance of the environment</td>
<td>Corrêa et al. (2002);</td>
</tr>
<tr>
<td>Flexibility</td>
<td>SS16</td>
<td>Employees express willingness and ability to modify and change service according to requirements and needs.</td>
<td>Corrêa et al. (2002); Grönroos (2009); Slack et al. (2003);</td>
</tr>
<tr>
<td>Integrity</td>
<td>SS17</td>
<td>Honesty, sincerity and fairness in dealing with client</td>
<td>Corrêa et al. (2002); Johnston et al. (2010);</td>
</tr>
<tr>
<td>Tangible appearance</td>
<td>SS18</td>
<td>Appearance and organization of the physical aspects of the service package</td>
<td>Corrêa et al. (2002); Johnston et al. (2010); Parasuraman et al. (1985)</td>
</tr>
<tr>
<td>Opportunity</td>
<td>SS19</td>
<td>Find gaps in the service segment</td>
<td>Corrêa et al. (2002); Grönroos (2009); Johnston et al. (2010); Lovelock et al. (2001); Nóbrega (2013); Heskett (2002); Contador et al. (2004); Slack et al. (2003); Victorino et al. (2005); Zhang et al. (2011);</td>
</tr>
<tr>
<td>Response time</td>
<td>SS20</td>
<td>Agility in providing structure, personnel and services to client in a timely manner</td>
<td>Contador et al. (2004); Parasuraman et al. (1985)</td>
</tr>
<tr>
<td>Price</td>
<td>SS21</td>
<td>Evaluating how much clients will pay for service, time spent in the process, physical effort and psychological</td>
<td>Corrêa et al. (2002); Contador et al. (2004); Grönroos (2009); Zeithaml et al. (2011);</td>
</tr>
</tbody>
</table>
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Perceived Quality  SS22  Supplier Quality Image  Corrêa et al. (2002); Grönroos (2009); Zeithaml (2011);

Products Quality  SS23  Quality of goods and services offered to customer  Corrêa et al. (2002); Contador et al. (2004); Slack et al. (2003); Gebauer (2005);

Security  SS24  Demonstration of knowledge over the service that will be offered, showing skill in executing it  Corrêa et al. (2002); Johnston et al. (2010); Parasuraman et al. (1985)

Agility  SS25  Speed to start activities for service execution  Corrêa et al. (2002); Nóbrega (2013); Slack et al. (2003); Zeithaml et al. (1985)

Business Performance (BP)

In order to elaborate this construct, variables were searched on business performance and their respective dimensions. The precursor bases for business performance construct are derived mainly from Services-Profit Chain (HESKETT, 2002) and Balanced ScoreCard (KAPLAN et al., 1997). Exhibit 3 presents the synthesis for latent variable business performance and its respective observable variables.

<table>
<thead>
<tr>
<th>Observable Variables</th>
<th>Code</th>
<th>Description</th>
<th>Authors</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash flow</td>
<td>BP1</td>
<td>Financial management instrument that projects inflows and outflows of financial resources</td>
<td>Kaplan et al. (1997); Heskett (2002); Vij et al. (2016)</td>
</tr>
<tr>
<td>Profitability</td>
<td>BP2</td>
<td>Gain on realized sales</td>
<td>Kaplan et al. (1997); Heskett (2002)</td>
</tr>
<tr>
<td>ROI</td>
<td>BP3</td>
<td>Return on investment</td>
<td>Kaplan et al. (1997); Heskett (2002)</td>
</tr>
<tr>
<td>Customers</td>
<td>BP4</td>
<td>Key performance measures for customers with specific market segments and consumers</td>
<td>Bowersox et al. (2001); Heskett (2002); Mathias et al. (2003); Silestro (2014)</td>
</tr>
</tbody>
</table>

Source: Research, adapted from Pereira (2016) and Ramos (2016).

RESEARCH METHODOLOGY

Research scheme

The research was conducted according to the methodological scheme presented in Figure 1. The construct was developed using variables extracted from literature, evolving IEO, SS and BP. In the model, possible relationships between latent variables are presented, according to Figure 2.

Figure 1: Research methodological scheme.

In order to evaluate the conceptual model, three hypotheses were extracted from literature,
arranged as follow:

H1: IEO positively influences services strategy adoption
H2: IEO positively influences BP
H3: SS positively influences BP

The conceptual model incorporates latent variables and observable variables. In this model, least-squares model was adopted, by which latent variable receives the largest number of arrows or a greater number of predictors, by means of a causal relation (coefficient of path between variables latent and observed) of the research (RINGLE et al., 2014) can be evaluated.

The research instrument was based on two validated instruments: IEO (BOLTON et al., 2012), and BP (PEREIRA, 2016; RAMOS, 2016). Regarding Latent SS variable, the instrument was structured according to variables extracted from literature, as shown in Exhibit 1, 2 and 2a/ Figures 1 and 2. Responses were graded on a seven-point Likert scale (1: totally disagree; 7: totally agree). Revilla et al. (2014) affirmed that scales present better results with data between five and seven points, as well as, Weijters et al. (2010) state that studies using structural equation modeling method with scales between five and seven points present better result. Pre-test was performed with a sample of 260 respondents from the segment, by application of an online survey questionnaire, exceeding the recommended minimum sample of 250 respondents. The sample presents safety with confidence level (Cronbach Alpha) 97.5% and error 2.5%.

The research was conducted in hospitality services sector (restaurants, bars and hotels), located in Brazil, and associated to Abrasel, whose entrepreneurs’ or managers’ population is made up of 6.000. The sample size was determined by calculating 5 to 10 times the number of variables of the largest construct or latent variable (HAIR JUNIOR et al., 2005; RINGLE et al., 2015). As the largest construct presents 25 variables, the minimum sample size was calculated as 250 respondents. Sample was selected by convenience and 260 respondents were accessed.

Exhibit 4: List of analysis made for the research.

<table>
<thead>
<tr>
<th>Analysis</th>
<th>Objective</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Cronbach Alpha</td>
<td>Pre-test to instrument validation</td>
</tr>
<tr>
<td>2 Variance Inflation Factor (VIF)</td>
<td>Quantifies the severity of multicollinearity in an ordinary least squares regression analysis</td>
</tr>
<tr>
<td>3 Factorial Analysis</td>
<td>To evaluate the factor loads of constructs variables</td>
</tr>
<tr>
<td>4 Average Variance Extracted (AVE)</td>
<td>It’s a measure to assess convergent validity. AVE is the average amount of variance in indicator variables that a construct is managed to explain.</td>
</tr>
<tr>
<td>5 Discriminant Validity (DV)</td>
<td>Discriminant validity refers to the extent to which factors are distinct and uncorrelated; it evaluates the degree to which measures of different traits are unrelated.</td>
</tr>
<tr>
<td>6 Composite Reliability (CR)</td>
<td>CR is obtained by combining all of the true score variances and covariances in the composite of indicator variables related to constructs, and by dividing this sum by the total variance in the composite. It’s an alternative method for testing constructs’ reliability in research.</td>
</tr>
<tr>
<td>7 Cronbach Alpha (CA)</td>
<td>For testing constructs’ reliability in research.</td>
</tr>
<tr>
<td>8 R-squared (R2) - Coefficient of determination</td>
<td>To analyze how differences in one variable can be explained by a difference in a second variable</td>
</tr>
<tr>
<td>9 t-test (Student’s)</td>
<td>Used to determine if two sets of data are significantly different from each other.</td>
</tr>
<tr>
<td>Path coefficients</td>
<td>To examine possible causal linkage between statistical latent variables in PLS approach</td>
</tr>
<tr>
<td>10 Q-Square predictive relevance test or Stone-Geisser’s Q2</td>
<td>To test model’s prediction relevance</td>
</tr>
<tr>
<td>Cohen’s f2</td>
<td>Allows an evaluation of local effect size</td>
</tr>
</tbody>
</table>
Data were collected from August to December, 2016, through an online questionnaire, shared by email, and WhatsApp applicative. The collection was initiated in Rio Grande do Norte (RN) state, but, due to the low level of responses for more than two months, it was extended to Brazil, counting on the help of RN Abrasel's President. This explains the long period for data collection.

Selection of statistical techniques for applicable data treatment for the research is aligned with the objectives, the types of relationship between theory and data collection, and the nature of the variables contemplated by the research. Multivariate analysis offers the researcher more adequate technique, with the possibility of investigating how well predictor variables explain the dependent variable (Ringle et al., 2015), and it points which one is the most important. This can also occur with use of regression, although it should be remembered that there can be more than one dependent variable in a single model (Kock, 2015). Statistical analyzes are listed in Exhibit 4. SmartPLS 3.0 software was used to treat the data.

RESULTS AND DISCUSSION

This section presents the results, hypothesis acceptance, and discussion. The adjusted conceptual model with results obtained in this research is shown in Graph 1 (IEO, SS, BP). Values show determinant relations from modeling, in which adjusted indexes for latent variables model are confirmed.

First, data were subjected to multivariate analysis, through structural equations modeling. Variance Inflation Factor (VIF) was performed with the objective of verifying multicollinearity among variables. VIF results (1.279 and 1.000) indicated low multicollinearity among the variables, which is desirable for the model applicability. According to Ringle et al. (2014) and Kock (2015), VIF value should be less than 3.3. So, VIF results were acceptable for the proposed model.

Factorial analysis of observable variables was performed to evaluate valid factor loads. Results show acceptable values for latent variables, however, variables with values lower than 0.7 were identified, leading to eliminating variables SS01, SS02, SS10, SS11, SS15, SS16, SS18, SS19, SS21, SS25. Therefore, variables INNOV06, PROACT08, PROACT10 and RISK1, denote results lower than 0.7. It is concluded that despite the fact that they present loads slightly below the ideal, they should not be excluded, justifying the remain for
being part of a validated latent variable IEO, also because it does not present any problem to AVE.

In sequence, data convergence validity was explained by latent variables AVE, aiming to verify constructs validity, based on variables. However, in order to adjust the model, it was sought to adjust it through factorial loads and, consequently, improve AVE analysis results. Factor loads should be $\geq 0.7$ and AVE is expected to be $\geq 0.5$ (BIDO et al., 2010; HAIR JUNIOR et al., 2014; KOCK, 2015). Results ($BP = 0.827; SS = 0.620$ e $IEO = 0.520$) showed that all AVE values satisfy parameters $>0.5$, being, therefore, acceptable for the proposed model.

Then, to verify the indicators for discriminant validity pertaining to the model, it was necessary to compare individual AVEs by means of the square root. Results ($DES = 0.910, SS = 0.787$ and $IEO = 0.721$) were acceptable, once they were $\geq 0.5$. It can be deduced that discriminant validity of the model was attested (BIDO et al., 2010; KOCK, 2015; RINGLE et al., 2015). Therefore, they are acceptable for the model.

In sequence, composite reliability and cronbach alpha were analyzed. Composite reliability aims to evaluate the results from the model, as well as the consistency of the variables that compose latent variable through factorial analysis. Cronbach’s alpha aims to verify the research instrument reliability and consistency. Values obtained from composite reliability were equal to $BP = 0.950, SS = 0.961$, and $IEO = 0.915$, greater than 0.7. Cronbach’s alpha resulted in $DES = 0.930, SS = 0.956$, and $IEO = 0.899$, which are considered desirable. Values must be equal to or greater than $\geq 0.7$ (HAIR JUNIOR et al., 2014; KOCK, 2015; RINGLE et al., 2015). After analysis of composite reliability and discriminant validity, which showed acceptable results, adjustments in the model are finished, and the analysis of the structural model may be initiated.

Then, structural model analysis was performed to evaluate the hypotheses, and to validate the model. It was necessary to use data provided by the coefficients of determination ($R^2$), path coefficients, Cohen factor ($f^2$) and Stone-Geisser index ($Q^2$). $R^2$ square is used to explain significantly the relationship between endogenous latent variables. Data show that $R^2$ values of this model after regression were 0.521 and 0.215 for $p <0.001$. For Social and Behavioral Sciences areas, $R^2 = 2\%$ is of small effect, $R^2 = 13\%$ is of average effect and $R^2 = 26\%$ is of great effect (COHEN, 1988). Therefore, determinant coefficients $R^2$ and adjusted $R^2$ were accepted. Ringle et al. (2014) and Hair Junior et al. (2014) consider that the higher $R^2$, the greater the explaining power of the model. It was observed that the latent variables of the proposed model have the minimum number of four observable variables, contributing to a solution of their own. Thus, the number of variables influence the model in a nonlinear way. However, if variables decrease from 4 to 2, the improper solution increases significantly (COHEN, 1988; REINARTZ et al., 2009).

Afterwards, path coefficient and Student’s t were analyzed, to evaluate the significance levels of the correlations and regressions of the theoretical model. Path coefficients results show positive values closer to +1 and, considered acceptable. To Hair Junior et al. (2014), path coefficients may vary from -1 to +1, and the strongly positive relation of the values closest to +1 may be considered, and consequently, values closest to -1 are related to the strongly negative results. Student’s t test values ($IEO \rightarrow DES = 3.731; IEO \rightarrow SS = 6.503$ and $SS \rightarrow DES = 11.741$) were higher than parameter 1.96. However, Hair Junior et al. (2014) state that, for a significance of 95%, it is necessary Student t value be higher than 1.96. Results showed significant values for
the model. Thus, it can be stated that the paths between latent variables are significant for the adjusted structural model (HAIR JUNIOR et al., 2014; RINGLE et al., 2014).

Next, Q2 is represented by the relevance or predictive validity, which aims to show how much the proposed model approaches the expected one. To Ringle et al. (2014), the stage of analysis of the structural model through the equations is explained by Q2 or Stone-Geisser index. Data show that Q2 presents significant values (DES = 0.396; SS = 0.121), that is, they are greater than zero, and f² (DES = 0.642; SS = 0.530 and IEO = 0.400) show that effect sizes in paths of latent variables are great for social sciences. Therefore, observing the latent variables, statistical significances were verified in the relationships that lead to hypotheses acceptance. To Ringle et al. (2014), Q2 must be above zero and f² is the size of the effect for the adjusted model, that is, 0.02 is considered to be a small effect, 0.15 represents an average effect, and 0.35 is considered a great effect for social sciences. This means that the variables chosen for each latent variable are the most suitable to fit in the model (COHEN, 1988; HAIR JUNIOR et al., 2014). Conclusion is that values of Q2 and f² are acceptable for the conceptual model.

Hypothesis Acceptance

Table 1 shows the analyzes carried out in this research to confirm, or not, the conceptual model hypotheses.

<table>
<thead>
<tr>
<th>Hypothesis</th>
<th>Path</th>
<th>Path Coefficient</th>
<th>Signal</th>
<th>Teste student</th>
<th>t</th>
<th>p value</th>
<th>Hypothesis acceptance</th>
</tr>
</thead>
<tbody>
<tr>
<td>H1 IEO positively influences SS adoption</td>
<td>IEO → SS</td>
<td>0.467</td>
<td>+</td>
<td>6.503</td>
<td>&lt;0.000</td>
<td>Yes</td>
<td></td>
</tr>
<tr>
<td>H2 IEO positively influences BP</td>
<td>IEO → BP</td>
<td>0.182</td>
<td>+</td>
<td>3.731</td>
<td>&lt;0.000</td>
<td>Yes</td>
<td></td>
</tr>
<tr>
<td>H3 SS positively influences BP</td>
<td>SS → BP</td>
<td>0.621</td>
<td>+</td>
<td>11.741</td>
<td>&lt;0.000</td>
<td>Yes</td>
<td></td>
</tr>
</tbody>
</table>

Results show that hypotheses H1, H2 and H3 were confirmed. Hypothesis H1, which postulated positive influence of IEO on SS, was confirmed, since the path coefficient was 0.467, according to Cohen (1988), to whom, in social sciences, this value shows high explanatory power. Data indicate that there is positive influence, validated by significance of 95%, with values t = 6.503, value p <= 0.0001 and Q2 = 0.121, guaranteeing significance, explanation and validation. Researches carried out by Bolton et al. (2012) already indicated influences of individual entrepreneurial characteristics, through these individuals desire to become entrepreneurs. Although that research has been conducted with US business students, data validate the factors measured in IEO by taking risk, innovation capacity and proactivity, as well as driving these individual characteristics to draw competitive strategies in organizations. SS is considered to be a first background to successful operation (CORREA, 2010; ZEITHAML et al., 2011) helping to build a competitive strategy to service businesses (PORTER, 2005; MILES, 2013; GRÖNROOS, 2016).

This result is aligned with Lumpkin et al. (1996), to whom an organization EO consists in describing new entrannts, business environment strategies, through practices and activities that lead individuals to start business. However, differentiating itself from opponents through appropriate service strategies involves characteristics, and attributes executed through administrative practices with good organizational
performance, contributing to innovation of goods and services to satisfy customer's (GRÖNROOS, 2009; NÔBREGA, 2013).

Researchers such as Covin et al. (1989) argue that there is a mix of variables in studies on individual characteristics of entrepreneurs, but relationships between IEO and organizational decision making have been confirmed. To Zahra (2005), managers often run companies on their own, without paying attention to risks. Variables studied in H1 hypothesis permeate IEO and SS in organizations. Zhan et al. (2011) states that in a service environment where growth opportunities are plentiful, individual entrepreneurs are more prone to innovation capacity. In contrast, individual entrepreneurs who present a more competitive attitude tend to be more cautious and tend to follow segment rules (BOLTON et al., 2012; STANLEY et al., 2012; STEVEN, 2016).

Hypothesis H2, which posited positive influence of IEO on BP was confirmed, since path coefficient was 0.182, corroborating Cohen (1988), to whom, in social sciences, this value represents moderate explanatory power. Values indicate positive influence (IEO → BP) and may be validated with significance of 95\%, with values t = 3.731, p < 0.0001 and Q2 = 0.396, ie, BP is influenced by IEO. This fact supports validation for H2, since the research was conducted with individuals managing hospitality segment in Brazil.

Latent Variable IEO presented some variables with factorial loads slightly below 0.7, however, this did not affect conceptual model adherence, once that LV had been validated, tested and approved by Bolton et al. (2012) in a high number of subjects (1100). According to Zahra et al. (1995) and Zhao et al. (2010), risk assumption, ability to innovate and proactivity are positively associated with company’s financial performance, and the strength of this relationship tends to grow over time, even after controlling past performance. To Jogaratnam (2017), there is a direct influence of the characteristics innovation and cultural capacity of restaurant managers in BP. In addition, BP variables are better explained than those of SS. Results show that there is relationship between IEO and BP. Contrary to Wiklund (1999), managers individual characteristics can negatively influence BP, because taking risks is associated with adoption of strategies that necessarily require a lot of resources.

However, in a later study Wiklund et al. (2005) found that managers with the characteristics: risk assumption, innovation capacity and proactivity present a better performance than those who do not have these characteristics. Similarly, Steve et al. (2016) consider individual entrepreneur characteristics associated with an organizational (EO), presenting gains to adopted strategies. Previous studies have shown that risk taking, innovation capacity and proactivity can significantly improve BP (COVIN et al., 1989; ZAHRA et al., 1995; LUMPKIN et al., 1996; ZHAO et al., 2010). Thus, there is indication that IEO and BP are cause-effect related.

Hypothesis H3, which postulated positive influence from SS on BP, was confirmed. Values show path coefficient of 0.621, which presents strong positive influence of (SS→BP), at a significance level of 95 \%, with value t = 11.741 for a p value = 0.01 and Q2 = 0.121 and 0.396, respectively. To Cohen (1988), results show that SS was able to explain influence on BP, had a very high value for R2 determination coefficient, which was 0.521 for a significance factor of p <= 0.001.
The variable SS07 (reliability) was the most significant one, once it showed higher factor load. Therefore, it is evident that the proposed model is explained by the exogenous variables. Corrêa et al. (2010) report that some factors in BP that contribute to add value to service or product, as perceived by customer, are used by companies through services strategies.

The influence (SS→BP) was statistically significant, because values indicated high results, providing explanation to the conceptual model. However, according to model R2, SS is well explained by the conceptual model, whose R2 value was 0.218, representing 21% of the explanatory power for the model. The size of the effect for the path (f2) in the model was 0.642, and Q2 shows how much the observable variables are useful for the model, validating the hypothesis with a value of 0.396, what is considered of great effect for the model. R2 value was 0.524, representing 52% of model explanation. To Hair Junior et al. (2014), 0.02 is considered a small effect for the construct; 0.15 represents an average effect, and 0.35 is considered a great effect for social sciences. It can be concluded that the variables chosen for each construct are most adequate for fitting the proposed model.

So, the proposed relationship between latent variables (SS→BP) makes sense because they are statistically significant. This result is expressive and indicates that well-designed service strategies, planned, executed and supervised by managers, are likely to achieve greater BP (CHUANG et al., 2017). Victorino et al. (2005) report that the greatest influence on services offered in hotel segment is the ability to innovate, present itself attractively to clients, and demonstrating ease in business management, improving consequently, BP. Thus, understanding clients choices allow managers to better plan their service offerings, develop best strategy around customer needs, improving BP.

Therefore, the research results are represented in the extracted data, which consisted in investigating influences of IEO, SS and BP. Hypotheses results provide empirical evidence on positive influence from IEO on SS, as well as influence of SS on BP. It was noticed that in the proposed model there are influences between latent variables with indicators of medium and high explanation.

The latent BP variable was best represented through data, showing that it is influenced by the adoption of a good SS, corroborating Vij et al. (2016), who pointed about strategic decision, marketing measures and measurement of BP in financial terms, as well as operational indicators. However, IEO shows how significant it is for SS adoption, and data indicated that individual characteristics positively influence SS adoption, as well as, these strategies impact on organizations’ BP.

CONCLUSIONS

Understanding relationship between individual entrepreneurial orientation (IEO), service strategy (SS) and business performance (BP) in restaurants and similars motivated this research. The objective of investigating the possible influences between IEO, SS and BP according to the perceptions of the managers of restaurants and similar was reached. Results showed that there are influences among the three constructs.

More specifically, results show that there is a positive influence of IEO on SS, corroborating studies by Kasim et al. (2016). It was also observed that IEO positively influences BP, corroborating other studies Lee
The study shows that the latent variables SS and BP have a greater positive influence in relation to the other latent variables studied. The greatest influence occurred between SS → BP. IEO → SS also represents high power of influence. On the other hand, influences between IEO and BP presented moderate results for explanation in the model.

Understanding individual characteristics of managers based on a limited number of factors is important in order to define the ideal management model for each type of business. For latent variable IEO, the observable variable with the highest index of explanation was capacity for innovation. For SS, the most prominent observable variable was reliability. For BP, the most significant observable variables were profitability, return on profit, ROI and customer results.

Therefore, this research results indicate influence between IEO, SS and BP, agreeing with Barreto (2017), Bolton et al. (2012), Boo (2017), Grönroos (2016), Heskett (2002), Jogaratnam (2017), Lee et al. (2016), Nóbrega (2013), in disagreement, however with researches that do not confirm these influences or influence negatively (Hughes et al., 2007; Naldi et al., 2007; Zahra, 2008).

This research findings helped to better understand influences existing between IEO, SS and BP, as well as to advance the knowledge about the studied latent variables. It also helped to explain, disseminate, and popularize advanced statistical techniques and analyzes such as the modeling of structural equations, which are still very few in management studies published in Brazil. It should be noted that the research was applied to Brazilian managers of a specific segment (hospitality) and their individual entrepreneurial characteristics were identified through the use of an instrument already validated in the USA by Bolton et al. (2012). Thus, the proposition of a conceptual model relating latent variables IEO, SS and BP was an important finding among the several models referenced in this research.

Managerial implications of this research are an important beginning to understand in depth the studies related to IEO in the services segment in Brazil, but specifically in the hospitality segment. Better understanding of IEO dimensions allowed researchers to explore further the influences between the latent variables studied and other factors of interest. This research's results suggest that hospitality organizations in Brazil (bars, hotels and restaurants), in order to improve their performance, may succeed in adopting service strategies appropriate to their business model, however, considering the individual characteristics of managers, such as taking risks, capacity for innovation and proactivity. Such factors are important to building strong relationships between managers, organization and corporate performance.

The data show that, according to managers' perception, there are positive influences of the IEO in adoption of SS and in BP. Thus, a well-prepared and adequate SS may contribute to better financial gains. Understanding clients choices allow managers to better plan their service offerings, develop best strategy around customer needs, providing better BP.

One limitation relates to the fact that only the hospitality companies associated to Abrasel were considered. Another limitation is that the influence of the managers' perception of BP in the other latent variables was not addressed in the proposed model. Although this research has been limited to investigating the influences between latent variables IEO, SS and BP, there are possibilities to be explored, such as
analyzing the company's financial results, deepening the impact on BP.

For future research it is recommended to replicate this research in other segments or other contexts, testing the proposed structural model. It is also recommended to investigate the influences between IEO and BP, testing whether it actually generates financial gains for organizations, based on the analysis of the company's financial information. A third suggestion is to evaluate the financial impacts of SS adoption, as well as to evaluate the perception of customers regarding the adoption of SS in the light of the individual characteristics of managers. It is also suggested to evaluate the reasons for some influences to be stronger than others.

REFERENCES


HUGHES, M.; MORGAN, R. E.. Deconstructing the relationship between entrepreneurial orientation and business performance at the embryonic stage of firm


