

Study of circumvention of students of engineering courses of a higher education institution in southern Brazil

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Abstract: Circumvention in higher education is the subject of several studies, it is understood the concern because the same occurs in both public institutions as private. To escape, the academic, cause financial loss to the institution and himself. This work aims to identify the main factors motivating the circumvention in the courses of a higher education institution (HEI) in southern Brazil. The survey started in April 2018, has the theoretical foundation based on theses, dissertations, articles, digital repositories and other benchmarks. We opted for the quantitative approach, being the data collection carried out through a questionnaire applied to students. Data analysis was performed with the use of IBM software Statistical Package for the Social Sciences (SPSS). The quantitative variables were expressed through the median and interquartile range range when not presented with Normal distribution and mean values and standard deviation when followed this type of distribution. The qualitative variables were expressed by using frequency and percentage. Students classified as very important factors in the process of evading the financial difficulty and monthly fees too expensive. The factors are classified as relevant were: lack of quality and lack of professional perspective. How little relevance factors from the perspective of the students have: lack of time, difficulty in understanding the lessons, Deprecations and the incompatibility of work and study. The distance from home to campus, pregnancy, bad relationship with colleagues, bad relationship with teachers and the longing of the relatives are factors that academics ranked as not relevant.

Keywords - Evasion, Engineering, Students

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I. INTRODUCTION

Higher education offers a very great opportunity for personal development, especially in terms of preparing for the job market. Every year the number of undergraduate students is very high, but high levels of avoidance are observed, many of those who start the process fail to complete it. Therefore, it is proposed in this research to identify the reasons that have made engineering students give up their courses.

Observing this process of avoidance in the daily life of the university, the following question was raised: "What has made these students give up the graduation?". Knowing the answer to this questioning may lead to actions that avoid as much as possible new cases of withdrawal. The evasion of students during training is a matter of concern since the inefficiency in the students' fixation can provoke significant financial waste, both for the institution and for them.

In previous research, some factors are considered as relevant motivators in the evasion process, having as suggestions attitudes that go against minimizing these causes. In Campos' research (2016), students' disapproval, age and sex are considered important factors in relation to avoidance. Already in the study of Gómez (2015), the author makes a critical-social analysis. In addition, it is also mentioned the difficulty that many future engineers have in relation to the Exact Sciences, especially in relation to mathematics. So this would be a point that would need more investment. There are several authors who affirm that student's evasion and financial condition are interconnected, as well as the administration of work and study time. Therefore, in general, the ideal would be public policies and programs that help to fix the students in their courses and that diminish the relevance of these factors. (2006).

In this research some factors were classified by the academics as very relevant to the evasion process, they are the financial difficulty and the expensive monthly fee. This data can be justified by the fact that 71.1% of the students have a monthly income of up to two minimum wages. There were also other factors considered relevant, such as: lack of course quality and lack of professional perspective. It is hoped that these points will help the institution to take measures that minimize these factors that the students point out. Another important fact is that more than half (65.1%) of the academics said they had already thought about giving up the course, it is questioned, then, that these scholars have had some kind of support from the institution or the courses so that they do not materialize this thought?.

II. MATERIAL AND METHODS

The research was developed from May 2018 to February 2019. Contemplating a quantitative approach to data collection and analysis. It has its theoretical basis based on theses, dissertations, articles and other references.

The sample consisted of 301 academic students of the Engineering courses, where they should be regularly enrolled in the institution's system and did not present any cognitive deficit that would impede the understanding of the research items. The calculation of the sample followed the formulas presented by Barbetta, Reis and Bornia (2010) and Barbetta (2007).

The collection instrument was elaborated by the researchers based on questions used in several other studies on the same theme (OLIVEIRA, 2015; OLIVEIRA, 2016; PEREIRA, 2003). Since the questions were chosen and adapted according to the interests of the present research.

The questionnaire was composed of four domains: the first one consists of 8 general questions that served to identify the questionnaire; the second, for 6 personal questions of the academic where it was possible to ascertain their economic profile and graduation performance; the third, 5 questions regarding the socioeconomic profile of the family; and the latter, for 7 questions regarding satisfaction with the course.

The collected data were organized in spreadsheets, for analysis of SPSS software version 21.0. The quantitative variables were expressed by mean and standard deviation if they presented normal and median distribution and interquartile range if they did not meet this characteristic. The qualitative variables were expressed by means of frequency and percentage.

In accordance with the norms of the Resolution of the National Health Council (CNS 510/16), on research in Human and Social Sciences, the research was submitted to the Ethics and Research Committee. Thus the doubts of the participants were solved before the procedure of data collection.

III. RESULT

The inefficiency in fixing students to higher education can cause significant financial waste both for the institution and for students. In addition, the effects of evasion cover the personal, social and economic spheres. In the personal field such consequences can be demonstrated in feelings of frustration, intellectual incapacity, insecurity, fear and failure. They can still affect areas in the psychological, physical, school and interpersonal sphere of the student. Regarding the economic aspects, the student leaving higher education finds greater difficulties in entering the labor market, thus causing a significant impact on the growth of the economy and increasing social inequality.

This research aimed to identify the characteristics of engineering students, in order to identify the main factors that have led these students to avoidance. For this to happen, it is necessary to understand the student's perception of education, as well as to understand other factors that are relevant to the formation, which may be cultural or economic factors.

Firstly, it was observed that 178 (59.1%) of the students are male and only 123 (40.9%) female, that is, there is a slight predominance of men in these courses. According to Artes and Ricoldi (2016), this difference was already expected since little by little women have gained spaces in careers that until recently was mostly male.

When performing the sample plan, it was sought that the population be represented proportionally in relation to the number of students per course. Thus, the Civil Engineering course presents 141 (46.8) of the students of the sample, while the courses of Production Engineering, Chemical Engineering, Mechanical Engineering, Surveying Engineering, Environmental and Sanitary Engineering and Materials Engineering presented, respectively, 48 (15.9%), 39 (13.0%), 31 (10.3%), 18 (6.0%), 16 (5.3%) and 8 (2.7%) .

In addition to distributing the sample proportionally in relation to the course, the same procedure was performed in relation to the academic phase. It was noticed that the number of students in the last phases of the course is more expressive than in the initial phases. In the first phase, 3 (1.0%) individuals, in the second phase 27 (9.0%), in the third phase 9 (3.0%), in the fourth phase 43 (14.3%), on the 19th In phase VII (5.6%), in the eighth phase (13.0%), in the ninth phase (8.0%) and in the in the tenth phase 92 (30.6%). One thing that should

be thought of by the institution is how it will get new academics for these courses, since most are already in the more advanced stages and close to graduation.

The same procedure was performed to have a proportional sample in relation to the class shift. Of the participating students, 44 (14.6%) studied in the morning period and 257 (85.5) in the night period. According to the authors, in the Caldeira and Lemke-de-Castro (2018) research, there was also higher demand in the night period, due to the students' need to work towards the costs of the course.

Once the academic situation of the students has been raised, we will consider "non-regular" students who have outstanding subjects in previous phases that they attend according to the institution's registration. It was found that 233 (77.4%) of the students were non-regular, 66 (21.9%) were regular and 2 (0.7) did not answer this data. With this, it is evident that more than half of the academics have difficulties to finish their courses without having disciplines pending, being the reprobation the main reason for this.

Regarding the profile of this sample, it was noticed that on average the age of the students was 22.68 years (± 4.25). It was also observed that 8 (2.7%) claimed to have children, 287 (95.3%) reported not having and 6 (2.0%) did not respond to this questionnaire item. Thus, a sample was mostly young and without direct dependents.

In addition to these initial characteristics, we sought to identify information regarding the financial life of the academic. First of all, emphasis was placed on how much he receives monthly and later on in identifying potential scholarships and financial aid that would help students pay for their degree.

The first item to be identified was the monthly income of each participant, 107 (35.5%) receive up to one minimum wage, 108 (35.9%) between one and two minimum wages, 38 (12.6%) between two and three minimum wages, 18 (6.0%) between three and four minimum wages, eight (2.7%) between four and five minimum wages, 9 (3.0%) more than five minimum wages and 13 (4, 3%) do not receive salary.

It was later questioned whether the student had any type of scholarship, 117 (38.9%) said they had, 183 (60.3%) said they did not and 1 (0.3%) did not respond to this item. Of those who have some type of scholarship, 52 (44.4%) are PROUNI or FIES, 25 (21.4%) are NossaBolsa, Institution's Bolsa, 18 (15.4%) have Article 170, Pibic, PIC 170, 10 (8.5%) have a PMC or University Extension scholarship, 9 (7.7%) have an Employee, Athlete or business scholarship, and, lastly, 3 (2.6%) have Student Funding, PREVALER or FUMDES.

Next, it was asked whether the students received any financial aid, 108 (35.9%) said they received, 191 (63.5%) did not receive and 2 (0.7%) did not respond to this item. 65 (60.2% came from the parents or the family, 27 (25.0%) from the father or mother only, 8 (7.4%) received from the (5.6%) of SESCOOP, FAMPESC, company or INSS and 2 (1.9%) left this answer blank.

When analyzing that most of these students attend the night period, even though more than half of them receive up to two minimum salaries and a good part affirm that they do not receive financial assistance, it is understood the need for mechanisms and public policies that allow these subjects the permanence in higher education, through scholarships, monthly tuition discounts, paid projects, among others.

When questioning who the students live with, 222 (73.8%) reported living with their parents, 26 (8.6%) with their partner, boyfriend or spouse, 16 (5.3%) with college or job, 16 (5.3%) live alone, 12 (4.0%) with one parent and / or siblings, 7 (2.3%) with grandparents and / or cousins and 2 (0, 7%) with other people.

Other information raised was in relation to if they had failed and how many times. A total of 223 (74.1%) of the students said they had failed, 76 (25.2%) had not yet failed and 2 (0.7%) did not respond. Of the 223 who had failed, the median number of disapprovals was 4.00, with a range between 2.00 and 5.00.

To conclude this domain, we questioned the average of these students in the disciplines already studied. In total, 3 (1.0%) students have their average between 2.1 and 4.0, 37 (12.3%) between 4.1 and 6.0, 233 (77.4%) between 6.1 and 8.0, 24 (8.0%) between 8.1 and 10.0 and 24 (1.3%) did not respond.

It is notorious that although most academics still live with their parents, this fact does not prevent them from having difficulty obtaining approval in the disciplines. As can be observed most of the students have a performance close to what is necessary for approval, which in the institution in question is to obtain average 6.0. The worrying thing is the number of academics who have already failed, because according to Souza, Tabosa and Simonsassi (2015) the reprobation factor is directly linked to school dropout. Those students who achieve performance and are approved will hardly give up the course, on the other hand the greater the number of disapprovals, the more academic this may feel unmotivated and end up evading.

The characteristics related to the family of the students were also investigated. Regarding the educational level of the father, 74 (24.6%) had Fundamental Incomplete, 25 (8.3%) Full Fundamental, 23 (7.6%), Incomplete Medium, 97 (32.2%) (15.0%), the highest of which was completed in 2001, 15 (5.0%) of the Incomplete Superior, 42 (14.0% 3) the PhD and 5 (1.7%) did not know the degree of education of the father.

In relation to the formation of the mother, 71 (23.6%) have Fundamental Incomplete, 21 (7.0%) Full Fundamental, 18 (6.0%) Incomplete Medium, 97 (32.2%), 8 (2.7%), the Incomplete Superior, 56 (18.6%) the

Superior Completo, 22 (7.3%) have some specialization, 6 (2.0%) the Master, the PhD and 1 (0.3%) did not know the mother's education level.

Knowing the level of education of the parents of the academics is relevant because, according to Oliveira (2016: 52), "it is observable that the success rate in students with a graduate father and mother is greater than when only one of the relatives has a diploma." This fact is related to the perspective of success that the son will have, the mentioned author emphasizes that the family history of school failure can be a motivator in the future desistência of the academic. Based on the data obtained it is apparent that mothers tend to have a higher degree of education than their parents, although in both cases there were few and few who reached higher education, did a specialization, master's and doctorate. This fact is important because the lack of motivation can be a factor that causes evasion.

For students living with their parents, they questioned their monthly family income, 2 (0.9%) of families receive up to a minimum wage, 27 (12.2%) between one and two minimum wages, 51 (23.0%) between two and three minimum wages, 29 (13.1%) between three and four minimum wages, 45 (20.3%) between four and five minimum wages, 64 (28.8%) five minimum salaries and four (1.8%) did not respond.

It was also questioned how important the academic family attributed to the study, 220 (73.1%) consider it very important, 72 (23.9%) important, 7 (2.3%) is indifferent, 2 (0, 7%) not significant and 0 (0,0%) not significant. That is, for all some relevance the study has, whether little or a lot.

It is noticeable that there is a greater predominance of families that receive between two and three minimum wages, which can be considered a relatively low income, and also of those who receive more than five minimum wages, which can be considered a high income for the family . By joining these two tracks, more than 50% of the sample is added. Then, we can see that education is assessed with some degree of importance by both groups, and thus, a possible relation of this information is sought in Oliveira (2016). The mentioned author mentions that the most privileged families tend to favor methods for maintaining economic power, while families with larger cultural capital "will focus on the formation of children for this type of capital, conveying that the social position depends mainly on success school "(OLIVEIRA, 2016, 55).

In order to identify the scholar's view regarding his course, he questioned whether the course to which the student is enrolled had been his first graduation option, 192 (63.8%) answered yes, this was his first option , and 109 (36.2%) stated that they did not.

Regarding the students' satisfaction with the course, 29 (9.6%) were very satisfied, 148 (49.2%) satisfied, 101 (33.6%) partially satisfied, 19 (6.3%) were slightly dissatisfied and 4 (1.3%) were dissatisfied.

We sought to identify how the degree of relationship between academics is. Among the responses, 68 (22.6%) considered their relationships excellent, 196 (65.1%) as good, 34 (11.3) classified as regular, 2 (0.7%) as partially poor, 0 (0.0%) considered poor and only 1 (0.3%) did not respond.

Another question raised was whether these students had already thought about quitting, 196 (65.1%) confirmed that they already had this thought, 100 (33.2%) said they had never thought about it and 5 (1.7%) did not respond.

A considerable number of students had no intention of taking the course that is enrolled, there are students who have, at some level, a dissatisfaction with the course and that even with the relations between them being evaluated as positive, which prevails most of the time are the negative points, are factors that have led the scholars to the thought of desistência. According to Silva, Dias e Silva (2017), when the students are more motivated and the interaction between them is better, the less chance of avoidance.

To conclude, a series of factors that could be influential for evasion was presented, so that the academic should relate the factor to its degree of relevance.

The first factor: financial difficulty was assessed as not relevant by 40 (13.3%) of the academics, slightly relevant by 52 (17.3%), relevant by 102 (17.3%) and very relevant by 107 (35, 5%). As Santos et al. (2017) corroborate, and this is a factor that can influence avoidance, it is suggested that the student receive financial support from the institution, either with scholarships or financing, so that he can keep up the course.

The second factor: lack of quality of the course was assessed as non relevant by 57 (18.9%), slightly relevant for 76 (25.2%), relevant for 124 (41.2%) and very relevant for 44 (14.6%). According to Santo et al (2017), the quality of the course is also a factor that will define whether or not the student remains, and this is also a criterion when selecting which undergraduate course.

The third factor: lack of professional perspective was evaluated as not relevant by 48 (15.9%), slightly relevant for 77 (25.6%), relevant for 118 (38.2%), very relevant for 56 (18, 6%) and 2 (0.7%) did not respond. According to Junior et al. (2017), the lack of information about future possibilities, makes the academics feel unmotivated, and, in the absence of a solid professional perspective, contributes to their desistance.

The fourth factor: lack of time was evaluated as not relevant for 66 (21.9%), slightly relevant for 107 (35.5%), relevant for 88 (29.2%), very relevant for 37 (12, 3%) and 3 (1.0%) did not respond. Although the lack of time to develop their activities, is a relevant factor for Ribeiro and Moreira (2017), according to the data obtained in the research, this factor has no great relevance for the study sample.

The fifth factor: difficulty in understanding the classes was assessed as not relevant by 61 (20.3%), slightly relevant by 112 (37.2%), relevant to 88 (29.2%) and very relevant to 40 (13.3%). According to Navarro et al. (2016, p. 46), and the difficulty that many students have, they often introject this label "thus blocking their development in the learning process, triggering their failure and school dropout."

The sixth factor: distance from the residence to the campus was evaluated as non relevant by 137 (45.5%), slightly relevant to 110 (36.5%), relevant to 37 (12.3%), very relevant to 16 (5.3%) and only 1 (0.3%) did not respond. According to Lima and Zago (2018), the evaded subjects are, in many cases, those who live in places further away from the campus to which they study.

The seventh factor: disapproval was not relevant for 67 (22.3%), slightly relevant for 110 (36.5%), relevant for 77 (25.6%) and very relevant for 47 (15.6%). This may be a factor that drives evasion, and "most of the time, the lack of culture and literacy in the family, family disorganization, poor nutrition converge to a poor school performance" (SOUZA; TABOSA; SIMONSASSI, 2015, p. 6).

The eighth factor: diseases was evaluated as non relevant by 113 (37.5%), slightly relevant for 64 (21.3%), relevant for 87 (28.9%) and very relevant for 37 (12.3%). Borges (2015) corroborates affirming that there is a relationship between illness and evasion, since successive abstentions of classes can help to make the student feel unmotivated and, consequently, give up.

The ninth factor: pregnancy was assessed as non-relevant by 158 (52.5%), slightly relevant for 62 (20.6%), relevant for 51 (16.9%), very relevant for 27 (9.0%) and 3 (1.0%) of the students did not respond. Pregnancy can change many aspects of a person's life, whether in the life of the mother or the father, thus bringing new meanings. "This re-signification can both strengthen and reaffirm the choice as it can lead to change and abandonment of the option made" (SOUZA et al, 2017, p.87).

The tenth factor: poor relationship with colleagues was assessed as not relevant by 222 (73.8%), slightly relevant for 59 (19.6%), relevant for 16 (5.3%), very relevant for 3 (1.0%) and 1 (0.3%) did not respond. According to Matta, Lebrão and Heleno (2017: 587), "the interpersonal relationships of university students may still be decisive for postponing or confirming the decision to abandon the course."

The eleventh factor: poor relation with teachers, was assessed as not relevant by 155 (51.5%), slightly relevant for 89 (29.6%), relevant for 40 (13.3%), very relevant for 14 (4.7%) and 3 (1.0%) of the students did not respond. In their research, Melo and Naves (2017), conclude that among other reasons, the difficulty in access to the teacher and problems in the teacher-student relationship are factors that corroborate to the avoidance of the academics.

The twelfth factor: work and study incompatibility was evaluated as not relevant by 79 (26.2%), not relevant for 103 (34.2%), relevant for 78 (25.9%), very relevant for 38 (12.6%) and 3 (1.0%) of the academics did not respond. According to Batista (2018), students who are in the early stages tend to drop out if the course they are enrolled to have not been their first choice, since those in Phase 4 tend to shy away from lack of time to reconcile work and study.

The thirteenth factor: missing family members, was assessed as not relevant by 181 (60.1%), slightly relevant for 76 (25.2%), relevant for 31 (10.3%) and very relevant for 13 (4, 3%). According to Christo, Resende and Kuhn (2018: 162), "some students do not get used to living away from their parents and prefer to return to their city, even if it is to take a course that was not originally planned".

The fourteenth factor: a very expensive monthly rate, was assessed as not relevant for 33 (11.0%), slightly relevant for 54 (17.9%), relevant for 81 (26.9%), very relevant for 131 (43, 5%) and 2 (0.7%) did not respond. The difficulty of paying monthly tuition is one of the main reasons why scholars are reluctant to dodge, especially as the plots begin to accumulate without being able to earn enough to pay (SOECKI et al, 2018).

IV. CONCLUSION

Therefore it is concluded that the economic factor has been very relevant for the students of the courses studied. The importance of quality control of the course is emphasized, since this is relevant for academics, as well as demystify and elucidate possibilities of action for students. It is also understood the need to explore other possible factors related to evasion, so the present research is a starting point for understanding this phenomenon.

Since evasion is an extremely important factor, the continuity of this research is essential to a deeper understanding of this phenomenon. Some topics may be influencing academics and yet it has not been studied in this research, for example it would be interesting to understand how the relationships between academics are, especially in relation to prejudices that may be being silenced. Then, as a suggestion of continuity, he proposes the study of existing prejudices within the university. We highlight some points that should be studied such as machismo, misogyny, LGBTophobia, racism and sexism. According to Corrêa and Ferreira (2016), when the student who suffers some kind of prejudice does not receive an aid, he will hardly have the strength to continue his studies. Therefore it is important in an upcoming survey to be listening to the academics and to try to help them in case some biased situation is pointed out.

REFERENCES

- [1]. ARTES, Amélia; RICOLDI, Arlene Martinez. Mulheres e as carreiras de prestígio no ensino superior brasileiro: o não lugar feminino. E-book, p. 81-94, 2016.
- [2]. BARBETTA, Pedro Alberto. Estatística aplica às ciências sociais. 7. Ed., rev. Florianópolis: Ed. UFSC, 2007, 315 p.
- [3]. BARBETTA, Pedro Alberto; REIS, Marcelo Menezes; BORNIA, Antonio Cezar. Estatística: para cursos de engenharia e informática. 3. Ed. São Paulo: Atlas, 2010. 410 p.
- [4]. BATISTA, Washington Pagotto. Um Estudo sobre a evasão no curso de Engenharia de Computação da UEFS. Anais Seminário de Iniciação Científica, n. 20, 2018. Disponível em:< <http://periodicos.uefs.br/index.php/semic/article/view/3355/2740>>. Acesso em 30 jan 2019.
- [5]. BORGES, Anelise Aparecida DalsotoKrás. Relações entre abstenções escolares por doença, bem-estar subjetivo e satisfação com a escola em crianças gaúchas. 2015. Disponível em:< https://www.lume.ufrgs.br/bitstream/handle/10183/137270/Poster_42575.pdf?sequence=2>. Acesso em 29 jan 2019.
- [6]. CALDEIRA, Thamara Ashley Gonçalves; LEMKE-DE-CASTRO, Mara Lucia. PREFERÊNCIAS DOS ESTUDANTES DA REGIÃO DO SUL DE GOIÁS QUE PRETENDEM INGRESSAR NO ENSINO SUPERIOR. In: Anais do Congresso de Ensino, Pesquisa e Extensão da UEG (CEPE). 2018. Disponível em:<<http://www.anais.ueg.br/index.php/cepe/article/view/10484>>. Acesso em 12 jan 2019.
- [7]. CAMPOS, JansenDodo da Silva. Fatores explicativos para a evasão no ensino superior através da análise de Sobrevivência: o caso da UFPE. 2016. Disponível em:<<https://repositorio.ufpe.br/handle/123456789/18380>>. Acesso em 22 jul 2018.
- [8]. CHRISTO, Maria MarileiSoistak; RESENDE, Luis Maurício Martins de; KUHN, Talícia do Carmo Galan. POR QUE OS ALUNOS DE ENGENHARIA DESISTEM DE SEUS CURSOS—UM ESTUDO DE CASO. Nuances: estudos sobre Educação, v. 29, n. 1, 2018. Disponível em:< <http://revista.fct.unesp.br/index.php/Nuances/article/view/4391/pdf>>. Acesso em 30 jan 2019.
- [9]. CORRÊA, Júlio César da Silva; FERREIRA, Claudia Waleria da Silva. Homossexualidade masculina frente ao preconceito e discriminação, promovendo a evasão no espaço tempo escolar. Revista Internacional de apoyo a lainclusión, logopedia, sociedade y multiculturalidad, v. 2, n. 4, 2016. Disponível em:< <https://revistaselectronicas.ujaen.es/index.php/riai/article/view/4238/3463>>. Acesso em: 21 jan 2019.
- [10]. GÓMEZ, Magela RenyFonticiella. Acesso e permanência de alunos da UTFPR – Câmpus Medianeira. 2015. Disponível em:<<http://hdl.handle.net/11449/124112>>. Acesso em 16 jul 2018.
- [11]. JUNIOR, Carvalho et al. A evasão dos alunos no curso de tecnologia em secretariado do IFPI. 2017. Disponível em:<<http://bia.ifpi.edu.br/jspui/handle/prefix/118>>. Acesso em 23 jan 2019.
- [12]. LIMA, Franciele Santos de; ZAGO, Nadir. EVASÃO NA EDUCAÇÃO SUPERIOR: tendências e resultados de pesquisa. movimento-revista de educação, n. 9, p. 131-164, 2018. Disponível em:< <http://www.revistamovimento.uff.br/index.php/revistamovimento/article/view/481/474>>. Acesso em 25 jan 2019.
- [13]. MATTA, Cristiane Maria Barra da; LEBRÃO, Susana MarracciniGiampietri; HELENO, Maria Geralda Viana. Adaptação, rendimento, evasão e vivências acadêmicas no ensino superior: revisão da literatura. Psicologia Escolar e Educacional, v. 21, n. 3, p. 583-591, 2017. Disponível em:< <http://www.scielo.br/pdf/pee/v21n3/2175-3539-pee-21-03-583.pdf>>. Acesso em 28 jan 2019.
- [14]. MELO, Geovana Ferreira; NAVES, Marisa Lomônaco de Paula. Retenção e evasão: desafios para a gestão da educação superior. Acesso em, v. 20, 2017. Disponível em:< http://webcache.googleusercontent.com/search?q=cache:http://www.aforges.org/wp-content/uploads/2016/11/10-Geovana-Melo-et-al_Retencao-e-evasao.pdf>. Acesso em 30 jan 2019.
- [15]. NAVARRO, Lisienne et al. A DIFICULDADE DE APRENDIZAGEM E O FRACASSO ESCOLAR. Journal of Research in Special Educational Needs, v. 16, p. 46-50, 2016. Disponível em:< <http://www.anais.ueg.br/index.php/cepe/article/view/7831>>. Acesso em 24 jan 2019
- [16]. OLIVEIRA, Rogério Eduardo Cunha de. Vivências acadêmicas: interferências na adaptação, permanência e desempenho de graduandos de cursos de engenharia de uma instituição pública federal. 2015. Disponível em:<<http://hdl.handle.net/11449/123175>>. Acesso em 01 mai 2018.
- [17]. PEREIRA, Fernanda Cristina Barbosa et al. Determinantes da evasão de alunos e os custos ocultos para as instituições de ensino superior: uma aplicação na IES. 2003. Disponível em:<<http://repositorio.ufsc.br/xmlui/handle/123456789/86403>>. Acesso em 15 jul 2018.
- [18]. RIBEIRO, Jefferson Bruno Pereira; MOREIRA, Jonathan Rosa. FATORES SOCIAIS E ACADÊMICOS NA EVASÃO ESCOLAR DO CURSO TÉCNICO EM SEGURANÇA DO TRABALHO DO POLO ITAPOÃ DO INSTITUTO FEDERAL DE BRASÍLIA. REVISTA EIXO, v. 6, n. 3, p. 40-47, 2017.

- Disponível em:< <http://revistaeixo.ifb.edu.br/index.php/RevistaEixo/article/view/477/298>>. Acesso em 22 jan 2019.
- [19]. SANTOS, Bettina Steren dos et al. Educação superior: processos motivacionais estudantis para a evasão e a permanência. Revista Brasileira de Política e Administração da Educação-Periódico científico editado pela ANPAE, v. 33, n. 1, p. 73-94, 2017. Disponível em:< <https://seer.ufrgs.br/rbpae/article/view/64630/41186>>. Acesso em 25 jan 2019.
- [20]. SOECKI, Ana Márcia et al. Evasão no Ensino Superior. Nativa-Revista de Ciências Sociais do Norte de Mato Grosso, v. 7, n. 1, 2018. Disponível em:< <http://revistanativa.com/index.php/revistanativa/article/view/354/pdf>>. Acesso em 27 jan 2019.
- [21]. SOUZA, José Nailton Martins de; TABOSA, Francisco José. SIMONSASSI, Andrei. Principais fatores que impactam na reprovação e evasão dos alunos dos cursos tecnológicos no instituto federal de ciência e tecnologia do Ceará. XI Encontro de Economia do Ceará-IPECE, 2015. Disponível em:< <http://www2.ipece.ce.gov.br/encontro/2015/trabalhos/PRINCIPAIS%20FATORES%20QUE%20IMPACTAM.pdf>>. Acesso em 15 jan 2019.
- [22]. SILVA, Juana; DIAS, Paulo; SILVA, Maria Cristina da. Fatores de influência no processo de evasão escolar em três cursos técnicos do Instituto Federal de Educação, Ciência e Tecnologia de Brasília. Revista da UIIPS, v. 5, n. 3, p. 6-21, 2017. Disponível em:< <http://repositorio.ipsantarem.pt/handle/10400.15/1960>>. Acesso em 24 jan 2019.

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