


## HIGHER EDUCATION CENSUS 2023: AN ANALYSIS OF THE POTENTIALITIES AND CHALLENGES FOR DISTANCE LEARNING

 <https://doi.org/10.56238/sevened2024.038-021>

**Letícia Reginaldo Corrêa da Silva<sup>1</sup>, Juliano Reginaldo Corrêa da Silva<sup>2</sup>, Anderson de Assunção Medeiros<sup>3</sup> and Alexandre Marino Costa<sup>4</sup>.**

---

### ABSTRACT

The present study addresses the advancement of distance learning in undergraduate courses in Brazil, presenting the factors that drive this growth, as well as the opportunities and threats generated by the expansion of the pedagogical modality. The reference used to observe this scenario are the data released by the National Institute for Educational Studies and Research Anísio Teixeira (INEP) in the 2023 Higher Education Census, as well as theoretical foundations of the literature on the subject. The purpose of the study is to analyze the expansion of distance learning, identifying the strengths and weaknesses of this pedagogical modality of teaching.

**Keywords:** Distance Learning. Higher Education Census. Quality of Teaching. Sustainability.

---

<sup>1</sup> Digital Media Communication Specialist  
Estácio de Sá University Center  
Email: rcs.leticia@gmail.com

<sup>2</sup> Dr. in Business Administration  
Federal University of Santa Catarina  
E-mail: julianorcs@gmail.com

<sup>3</sup> Master of Communication Sciences.  
University of Vale do Rio dos Sinos.  
E-mail: anderson.medeiros@ifsc.edu.br

<sup>4</sup> Dr. in Production Engineering  
Federal University of Santa Catarina - UFSC  
E-mail: marinocad@gmail.com



## INTRODUCTION

For about a decade, distance learning has been leading a true transformation in the national academic panorama. According to figures compiled by the 2023 Higher Education Census, the total percentage of enrollments<sup>5</sup> in undergraduate courses was 9.9 million. Of this amount, 4.9 million students actually entered<sup>6</sup> a course, with 33.6% opting for the face-to-face teaching modality and 66.4% for distance learning (DE).

This thriving phenomenon is driven by a combination of factors linked to issues related to digital transformation, the economy, and society. The advancement of technological tools dedicated to the teaching-learning process (Kenski, 2015) and the need for Higher Education Institutions (HEIs) to adapt to the nomadic nature of the learner and learning (Costa, et al, 2020) are some of the main driving elements of this promising scenario.

Distance learning dates back to the eighteenth century, with the offer of a correspondence course in the United States of America (Oliveira, et al, 2019). In Brazil, the modality emerged in 1904, when North American schools launched some courses in this model (Hermida; Bonfim, 2006). Among the benefits of the pedagogical modality, flexibility stands out (Moore; Kearsley, 2013), reduced costs (Belloni, 2009), interactivity (Anderson, 2003), sustainability (Litto, 2008) and democratization of access to education (Guimarães et al., 2019).

However, the surpassing in the number of distance education entrants, to the detriment of the face-to-face modality, unveils the higher education scenario, exposing a change in student behavior and requiring attention to the quality and adequacy of the education offered. Thus, from this study, we will seek to understand the dynamics of this phenomenon, identifying potentialities and weaknesses.

In this section number 1, the introduction to the subject is made. In section 2 of this study, data from the higher education census will be analyzed. The factors that drive the growth of distance learning are discussed in section 3, while the challenges of expanding distance education are presented and discussed in section 4. In section 5, the opportunities generated by the expansion of the pedagogical modality will be presented. Final considerations are addressed in section 6. Finally, a list of references is provided, indicating the sources used to support the construction of this study.

---

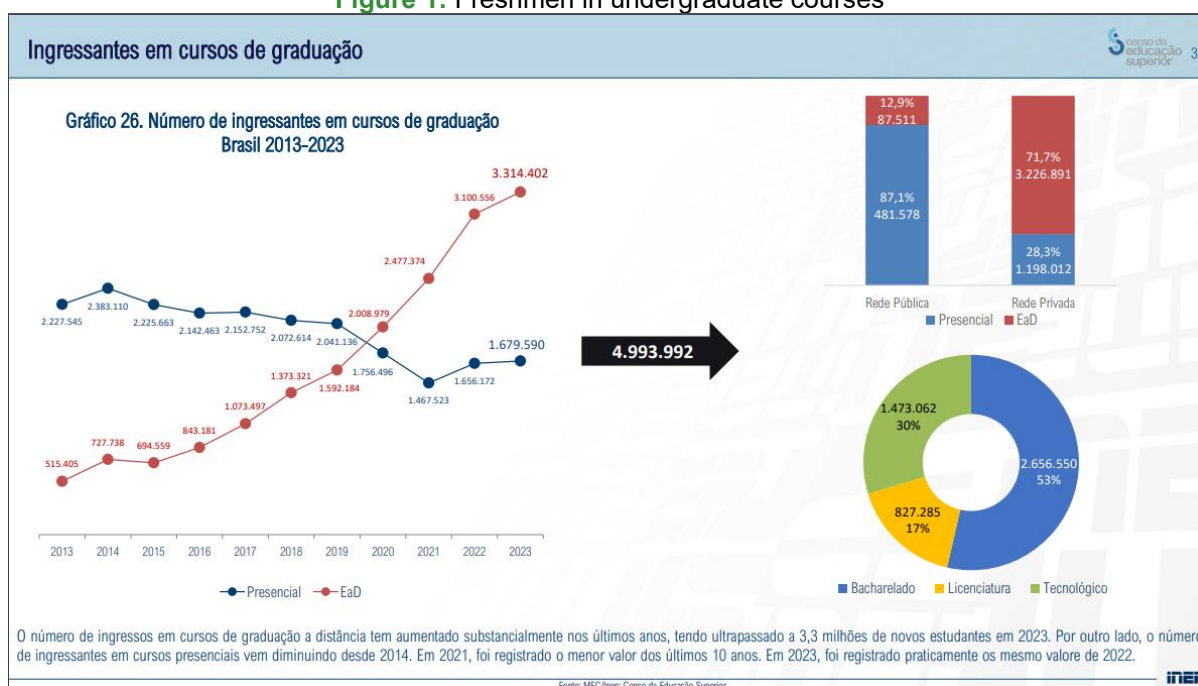
<sup>5</sup> The number of enrollments are the students who have enrolled in the course, which includes confirmation of interest and presentation of the documentation required to prove the data.

<sup>6</sup> The number of freshmen is relative to the number of students who have effectively started the course.

## ANALYSIS OF DATA FROM THE 2023 HIGHER EDUCATION CENSUS

According to data and information contained in the Higher Education Census, released by the National Institute of Educational Studies and Research Anísio Teixeira (INEP), since 2020 distance learning has exceeded the number of entrants registered by the pedagogical modality of face-to-face teaching. In 2023, distance education reached the mark of 3.3 million entrants, while face-to-face teaching registered approximately 1.6 million (INEP, 2023). Figure 1 shows the expansion in the number of new entrants since 2013.

**Figure 1:** Freshmen in undergraduate courses



**Source:** INEP, 2023

The transition and adaptation of HEIs to distance learning was not properly planned due to the COVID-19 pandemic, which required rapid adaptations to new tools and methodologies and revealed the need for greater flexibility in educational processes (Silva; Costa, 2021). However, the exponential growth of distance education has been pointed out in the Higher Education Census since 2016. Furthermore, even after the period marked by the restrictions imposed by the health crisis, the modality has already embraced more than 1 million new entrants (INEP, 2023).

The data in the report also warn of a predictable trend: in the next Census the number of students enrolled in distance undergraduate courses should surpass the face-to-face modality. According to the compiled numbers, the total percentage of enrollments in 2023 was 9.9 million. Of this amount, enrollments in distance education reached the mark of approximately 4.9 million, while face-to-face education registered about 5 million in the same period. The forecast gains strength due to the growth trend in distance education

since 2019, contrasting with the drop in enrollment in face-to-face education. The growth in the number of enrollments can be seen in Figure 2.

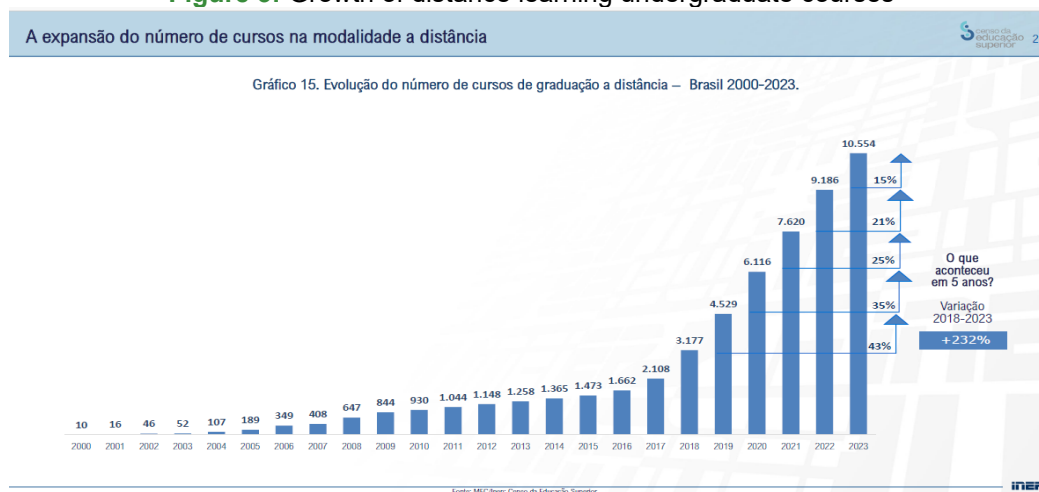
**Figure 2:** Enrollment in higher education



Source: INEP, 2023

Another point made tangible by the report is the expansion in the offer of courses. From 2018 to 2023, there was a 232% increase in the number of distance learning undergraduate courses, meeting the growing student demand for this learning modality. The growth in academic interest can be seen in Figure 3.

**Figure 3:** Growth of distance learning undergraduate courses

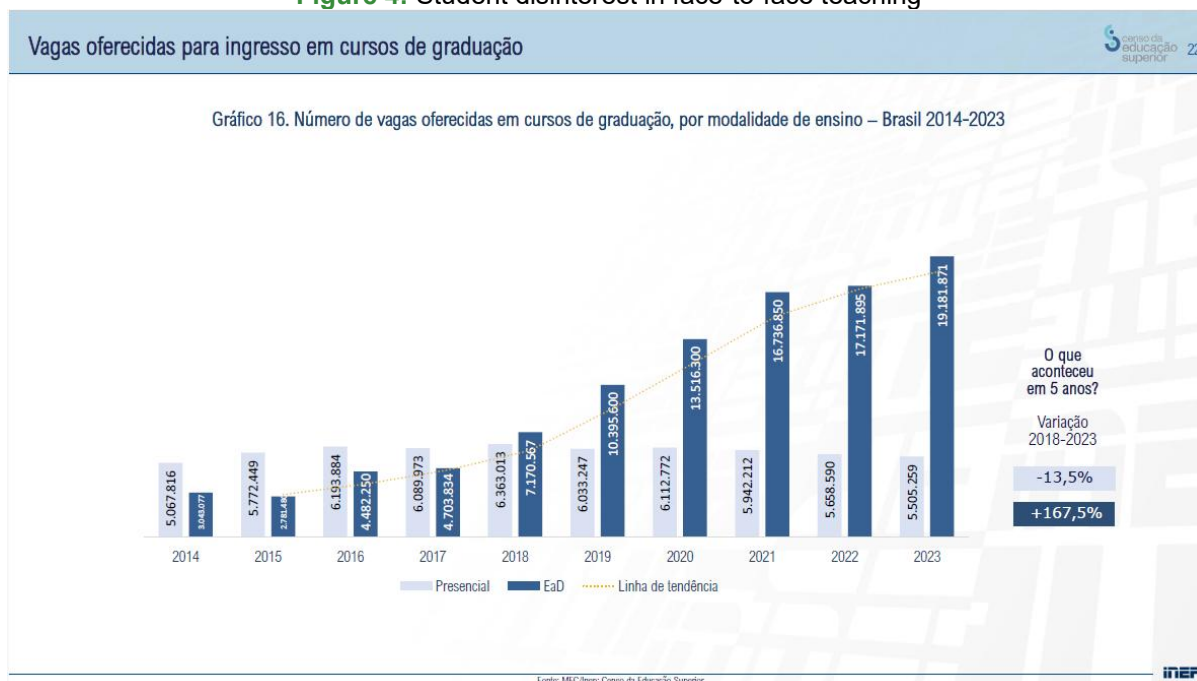


Source: INEP, 2023

In the same period, there was an increase of 167.5% in the number of vacancies offered in distance learning undergraduate courses. In contrast, face-to-face teaching

recorded a drop of 13.5% (INEP, 2023). The lack of interest of students in face-to-face undergraduate courses can be seen in Figure 4.

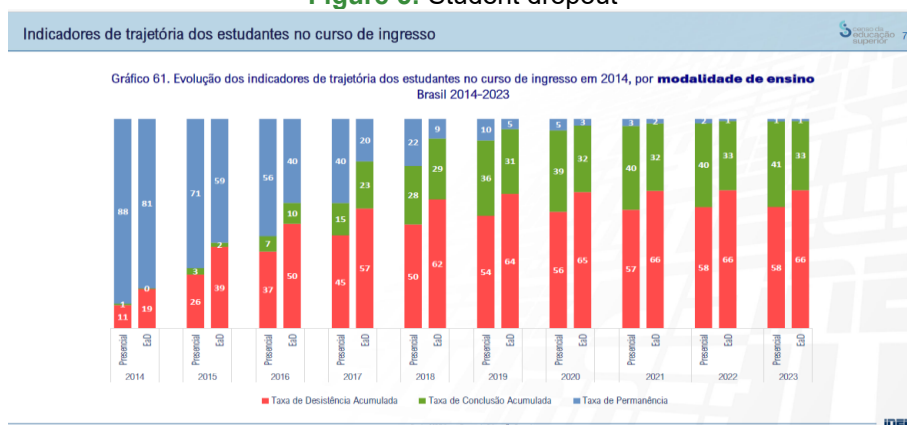
**Figure 4:** Student disinterest in face-to-face teaching



Source: INEP, 2023

Regarding the dropout of students from the courses, the rates between the two modalities are similar: 66% dropout in distance education against 58% in face-to-face teaching. When it comes to the number of graduating students, distance learning adds up to 33%, while in face-to-face it is 41%. This similarity in evasion can be seen in Figure 5.

**Figure 5:** Student dropout



Source: INEP, 2023

The data reflected in the Census raise a series of discussions about the distance learning scenario in Brazil. In the next topics, the factors that drive the growth of distance

education will be addressed, as well as the potentialities and challenges of expanding the pedagogical modality.

## FACTORS DRIVING THE GROWTH OF DISTANCE LEARNING

The exponential growth of distance learning in Brazil is related to a series of social, technological, and economic factors. The flexibility of distance education allows students to choose where, when, and how to study, adjusting the learning process to their individual needs (Costa, et al, 2020; Silva, 2024). In addition, this flexibility facilitates the reconciliation of studies with personal and professional commitments (Melo; Costa, 2022).

Other authors also agree on the economic advantages. Distance education eliminates the need to travel and enables the use of shared digital resources (Moore; Kearsley, 2013). In addition, distance education is a viable alternative in a country marked by socioeconomic inequalities (Melo; Costa, 2022).

In addition, the democratization of the education system is another preponderant factor. Distance education offers opportunities for people who face limitations, such as incompatibility of schedule with the offer of face-to-face teaching or living in regions far from public universities (Guimarães et al., 2019).

Technological advancement also plays a central role in this promising scenario. Kenski (2015) states that technologies in distance education are not just tools, but means that transform the way knowledge is produced, accessed and shared, expanding the possibilities of teaching.

Along these lines, Santos and Pereira (2023) argue that technologies not only expand the reach of teaching, but also promote more efficient and engaging learning, especially for audiences from different regions and socioeconomic realities. Accordingly, Anderson (2003) highlights that interactivity in distance education enables more meaningful learning, promoting the active engagement of students and improving knowledge retention through the exchange of ideas and constant *feedback*.

In addition, distance learning is an important tool in raising awareness about sustainable development (Litto, 2008). Distance education reduces the negative environmental impacts resulting from production processes, such as transportation, inputs necessary for learning (Impactos, 2021).

Finally, data from the 2023 Higher Education Census show the imminent need for attention to the pedagogical modality of distance learning, making it necessary and immediate to adapt academia to the needs of contemporary society.



## CHALLENGES OF EXPANDING DISTANCE LEARNING

The growth of distance education also brings challenges to the State and academia, the main one being to ensure the quality of the education offered. According to Silva (2024), quality in distance education is intrinsically linked to effective, efficient, and effective management, the engagement of teachers and students, adequate technological infrastructure, and the continuous evaluation of teaching and management processes.

As noted by Melo and Costa (2022), it is essential that HEIs invest in technological infrastructure and pedagogical practices that ensure quality training for a growing number of students. The training of teachers to deal with digital tools and the adoption of methodologies appropriate to *online platforms* are fundamental measures in this regard.

Another significant challenge is digital inclusion. Despite the expansion of the internet in the country, many regions still face difficulties in accessing a stable and quality connection, which can represent a barrier to quality and globalized education. Santos and Pereira (2023) point out that digital inclusion is a crucial issue to ensure the effective democratization of higher education in Brazil.

In the same vein, Tavares (2020) argues that the lack of access to quality internet and adequate devices represents a major obstacle to the success of distance education, especially in regions where connectivity is limited or non-existent. Moran (2016) also argues that the expansion of internet access is one of the fundamental factors for the success of distance education, as it allows more people, regardless of their geographic location or economic situation, to participate in modern and inclusive educational processes.

Another pressing challenge is a necessary review of the models for evaluating and auditing the quality of distance learning. Barreto (2017) states that quality monitoring in distance education is crucial to ensure that pedagogical practices, contents, and evaluation processes are aligned with educational objectives, thus contributing to the effectiveness of teaching and continuous improvement.

It is important to emphasize that adapting to a digital format requires not only the transfer of content to *online* platforms, but also the development of methods that ensure student interaction and engagement. Almeida (2019) states that the good use of technological tools in distance education is essential to ensure that learning is meaningful, as they promote interaction between students and teachers and provide a more dynamic and personalized learning experience.

In this context, it is essential to resume the precepts of the Federal Constitution of 1988, which establishes as a duty of the State the provision of quality education to the population. Article 206 establishes that education must be provided based on principles

such as equal conditions of access and permanence, the freedom to learn and teach, and the guarantee of a standard of quality (Brasil, 1988).

Finally, it is clear that HEIs need to adapt to this challenging, but inevitable scenario. Adequacy involves the necessary professionalization of institutional management, through the necessary administrative training and technical training to fill the positions, since meeting social desires is the main function of HEIs.

## **OPPORTUNITIES GENERATED BY THE EXPANSION OF DISTANCE LEARNING**

The expansion of distance learning also provides opportunities for the academic scenario and for the State, such as the democratization of access to higher education. The pedagogical modality allows individuals from different regions, including the most remote ones, to have access to study, providing opportunities for the reduction of educational and social inequalities and the formation of a more qualified workforce in various areas of the country (Litto; Formiga, 2009).

Distance education also allows for greater diversification in student profiles. With the possibility of studying at flexible times and offering lower costs, distance learning courses have become a financially interesting option. The pedagogical modality has been consolidated as a more accessible alternative, not only because of the reduction of costs for HEIs, but also for students, such as expenses related to travel and the acquisition of material (Belloni, 2009). Other research corroborates that distance learning is an important tool in raising awareness about sustainable development (Litto, 2008 and Impactos, 2021).

In addition, Moran (2015) argues that people inserted in the labor market or who have family responsibilities find in distance learning a more appropriate option for their routine. Distance education offers flexible schedules and accessibility, making it a viable option for professionals who seek to reconcile work and studies without compromising their work activities (Moran, 2015).

The advancement of distance education also stimulates pedagogical innovations. Educational technologies allow the development of new teaching formats and personalization of learning. Distance learning platforms, augmented reality, artificial intelligence, and gamification have proven to be valuable resources for promoting interactive learning and favor the development of cognitive and socio-emotional skills (Oliveira, et al. 2021).

These technological resources make the teaching process more attractive, in addition to preparing students for an increasingly digitized job market. The use of information and communication technologies in distance education has proven to be



fundamental for promoting more dynamic and efficient learning, facilitating interaction between teachers and students and contributing to the construction of knowledge in a collaborative way (Barros, 2022).

Finally, it can be inferred from the analysis that institutional management will be decisive for this transition from the analog era to the digital era of the teaching-learning process. Distance learning is a reality and a social demand, which HEIs cannot neglect, under penalty of succumbing and losing even more space in the educational scenario of citizens.

According to Guimarães, et al. (2021), it is possible to identify that distance education is not the end of education, but its future. Thus, the opportunities arising from the modality continue to arise, as the State and higher education institutions give space and prepare for a metamorphosis in the education system.

## FINAL CONSIDERATIONS

From the indexed literature and the conglomerate of reflections arising from this analysis, it is evident that the exponential growth of distance learning in Brazil has promoted a true revolution in the country's educational scenario. Driven by technological, social and economic factors, the modality shows why it is the one chosen by the newcomers.

By surpassing face-to-face teaching in number of entrants, the search for distance higher education courses not only reflects a transformation in student behavior, but also raises urgent questions about the quality of teaching and management. Several authors who deal with the theme have reached a consensus that distance learning has stood out as an accessible and inclusive option, especially with regard to geographical limitation, inflexibility of schedules and high costs associated with face-to-face teaching. By breaking these barriers, distance education proves to be more democratic and accessible.

The analysis of data from the Higher Education Census, combined with theoretical discussions on the growth of distance learning, demonstrate that, although there are challenges to be overcome - such as digital inclusion and pedagogical adaptation, distance education is an ally in order to democratize access to higher education and reduce regional and national socioeconomic inequalities.

The use of emerging technologies, such as augmented reality, gamification and artificial intelligence, play a crucial role in the development of more interactive and efficient methodologies, which contributes significantly to the improvement of the teaching-learning



process and to the successful adaptability of course content to the distance learning modality.

However, it is inferred that the professional performance of the State and Higher Education Institutions (HEIs) is essential, committing to investments in infrastructure and in the administrative training of civil servants, in order to foster the improvement of the service of HEIs with regard to the distance education modality. As corroborated by data from the Higher Education Census: investing in distance learning is investing in the future of the education system.

## REFERENCES

1. Almeida, M. G. de. (2019). O uso das tecnologias digitais no ensino a distância: Desafios e possibilidades (2nd ed.). Papirus.
2. Anderson, T. (2003). Getting the mix right again: An updated and theoretical rationale for interaction. *The International Review of Research in Open and Distributed Learning*, 4(2). <https://www.irrodl.org/index.php/irrodl/article/view/149/230> (Retrieved January 23, 2025)
3. Barreto, S. T. (2017). Monitoramento da qualidade no ensino a distância: Práticas e desafios. Editora Unesp.
4. Barros, R. (2022). O uso da tecnologia no ensino presencial e à distância: Contribuições para a prática docente e a aprendizagem. *Revista Ibero-Americana de Humanidades, Ciências e Educação*, 8(8), 80-95. <https://periodicorease.pro.br/rease/article/download/6621/2498/9588> (Retrieved January 27, 2025)
5. Belloni, M. L. (2009). Educação a distância. Autores Associados.
6. Brasil. (2021). Constituição da República Federativa do Brasil. Senado Federal. (Original work published 1988)
7. Costa, A. M., Pozzebon, E., & Lopes, L. M. D. (2020). Realidade aumentada e leitura: Uma possibilidade de inovação do ato de ler. In I. P. A. Veiga & R. C. A. Fernandes (Eds.), *Por uma didática da educação superior* (pp. 243-262). Editora Autores Associados.
8. Impactos da educação a distância na sustentabilidade. (2021). *Revista HSM*. <https://revistahsm.com.br/impactos-da-educacao-a-distancia-na-sustentabilidade/> (Retrieved January 29, 2025)
9. Guimarães, C. de C. O., Xavier, F. L., & Sylvino, M. M. (2021). Educação a distância: Uma ferramenta de redução da desigualdade social como forma facilitadora para o acesso ao ensino superior: Da correspondência ao correio eletrônico. *Seminário de Ciências Sociais Aplicadas*, 7(7), 1-15. <https://periodicos.unesc.net/ojs/index.php/seminariocsa/article/view/7122> (Retrieved January 27, 2025)
10. Guimarães, Í. J. B., Sousa, M. R. F. de, & Lima, I. F. de. (2019). Educação a distância como ferramenta de inclusão social e digital. *Encontros Bibli: Revista Eletrônica de Biblioteconomia e Ciência da Informação*, 24(56), 1-19. <https://periodicos.ufsc.br/index.php/eb/article/view/1518-2924.2019.e58846> (Retrieved January 23, 2025)
11. INEP. (2023). Censo da Educação Superior 2023: Análise dos dados de matrículas e ingressos. INEP.
12. Kenski, V. M. (2015). Educação e tecnologias: O novo ritmo da informação (6th ed.). Papirus.

13. Litto, F. M. (2008). Educação a distância e sustentabilidade. In 2º Encontro de Sustentabilidade em Projeto do Vale do Itajaí (pp. xx-xx). UNIVALI. <https://ensurus2008.paginas.ufsc.br/files/2015/09/Educa%C3%A7%C3%A3o-a-dist%C3%A2ncia.pdf> (Retrieved January 29, 2025)
14. Litto, F. M., & Formiga, M. (2009). Educação a distância: O estado da arte. Pearson Education do Brasil.
15. Melo, J., Silva, A., & Costa, R. (2022). Educação digital e as novas demandas da sociedade brasileira. *Revista Brasileira de Educação*, 27(3), 45-60.
16. Moore, M. G., & Kearsley, G. (2013). Educação a distância: Uma visão integrada. Cengage Learning.
17. Moran, J. M. (2015). Educação a distância: Pontos e contrapontos. Pearson.
18. Moran, J. M. (2016). Novas tecnologias e a educação: O impacto da internet nas instituições de ensino. Papirus.
19. Oliveira, A. F. P. de, Queiroz, A. de S., Souza Júnior, F. de A. de, Silva, M. da C. T. da, Melo, M. L. V. de, & Oliveira, P. R. F. de. (2019). Educação a distância no mundo e no Brasil. *Revista Educação Pública*, 19(17). <https://educacaopublica.cecierj.edu.br/artigos/19/17/ead-educacao-a-distancia-no-mundo-e-no-brasil> (Retrieved January 29, 2025)
20. Hermida, J. F., & Bonfim, C. R. de S. (2006). A educação à distância: História, concepções e perspectivas. *Revista HISTEDBR On-line*, (Special issue), 166-181. [https://www.fe.unicamp.br/pf-fe/publicacao/4919/art11\\_22e.pdf](https://www.fe.unicamp.br/pf-fe/publicacao/4919/art11_22e.pdf) (Retrieved January 29, 2025)
21. Santos, L., & Pereira, M. (2023). Inclusão digital no ensino superior: Avanços e desafios no contexto brasileiro. *Educação e Sociedade*, 44(2), 89-105.
22. Silva, J., & Costa, P. (2021). A pandemia e o ensino digital: Impactos e perspectivas. *Cadernos de Educação*, 20(1), 15-30.
23. Silva, J. R. C. da. (2024). Governança e gestão de instituições de ensino superior doravante o ensino digital: Perspectivas sob a égide das teorias institucional e do alto escalão [Doctoral dissertation, Universidade Federal de Santa Catarina]. Florianópolis.
24. Oliveira, A. M. de, Silva, R. L. de S., & Soares, F. (2021). Utilização da gamificação e da realidade virtual e aumentada no apoio ao ensino e aprendizagem na educação a distância em período de isolamento social. *Lynx: Revista de Educação, História e Humanidades*, 1(2). <https://periodicos.ufjf.br/index.php/lynx/article/view/35398> (Retrieved January 27, 2025)
25. Tavares, A. P. (2020). A desigualdade digital e os desafios do ensino a distância no Brasil (1st ed.). Editora Contexto.