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Self-destructive content in university teaching: new challenge in the Digital Competence of Educators

Abstract

The Z are the first digital native people gaining access to university. It is a generation that registers high rates of social media consumption, but their digital competence is not as outstanding as one might expect due to the training' deficiency they have acquired in previous educational levels caused, among other reasons, by the primary and secondary teachers' low digital competence. The current research aims to identify the demand for using social networks and messaging apps 2.0 in university teaching. A quantitative methodology was employed in order to know the technological prospects of the university Z in the Euroregion Galicia-North of Portugal, in the context of an Erasmus mobility. The results confirm the necessity to continue using social media, but only those within the students' technological comfort zone; thus, it is necessary to combine transmedia storytelling with the insertion of technological proposals in environments initially not conceived for learning. It is concluded that the Z are starting to claim the use of state-ofthe-art resources such as self-destructive content, which requires an immediate improvement in the university educators' digital competence by means of continuing training programmes, since only the pioneer educators with a C2 level can detect and pay attention to this type of demands.

Keywords

ICT skill, mobile technology, teaching innovation, digital natives, university students, learning networks, transmedia storytelling, continuing education.

1. Introduction and state of the art

Generation Z refers to the group of people born between 1995 and 2010 (Gutiérrez-Rubí, 2015; Knobel & Lankshear, 2014), although Schroer (2008) extends the period until 2012. Its members are between the ages of 23 and 8-6 years, so they are currently incorporated into the educational system, being the older ones the first of this generation to pursue university studies. These are the same students who were around ten years old when the Recommendation of the European Parliament and of the European Council (2006) demanded the inclusion of digital competence among the key competences for lifelong learning.

We know that this is a generation with "full time" connectivity, used to work in the cloud and with mobility devices because it has grown during the full development of the 2.0 models,

which, in parallel, have had to be adapted to the consumption needs that this generation demands: more social interaction, more audio-visual and multitask content, more geo-ubiquity and responsive technology, and more self-destructing content. Therefore, they constitute the first generation of university students constituted of *de facto* digital natives (Prensky, 2010), which also makes them more aware of the SWOT caused by the use of ICT. Indeed, it has been found that they are more concerned with privacy than Millennials (Llaneza, 2016), which justifies their preference for content that disappears after 24 hours, thus hindering the permanence of digital identity and favouring the development of media and supports convergence, the collaborative economy, social intelligence and the do it yourself culture (DIY):

Table 1: 20th and 21st century generations.

Denomination	Years	Origin	Expansion	ICT Evolution
Between wars generation or Lost Generation	1918-1929	Paris	North America and main European cities	Final de era End of Gutenberg's era: emergence of publics and authorship
Silent Generation	1920-1945	North America	West Europe, Australia, South America and Korea	Electronic Era beginning (radio and first TV broadcast emissions)
Baby Boomer Generation (Born after 1957 – Jones)	1946-1964	United States, Canada, Australia and New Zealand	Worldwide	Electronic Era (radio and commercial TV)
Generation X	1964-1979	United Kingdom and United States	Worldwide	Electronic Era's popularization (tape and videotape)
Generation Y or Millennials	1980-1995	United States	Worldwide	Emergence of the digital era (Internet opening and dot com bubble, floppy disk, DVD, USB)
Generation Z, Post-millennial or Centennial	1995-2010	United States	Worldwide	Digital Era and Cloud
Generation T, Technologic, Tactile or Alfa	2010 and forward	Worldwide	Worldwide	Digital Era, Tactile and Cloud

Source: Author's adaptation of data from Knobel & Lankshear (2014).

1.1. Generation Z digital competence

The incidence of ICT in the improvement of teaching-learning processes has been ratified at all educational levels, both in Generation Y (Ferro, Martínez & Otero, 2009; Badía & Monedero, 2008) and in Generation Z (García-Valcárcel & Tejedor, 2017), although the earlier and earlier use of technology requires paying more attention to the educational needs of different age groups (László *et al.*, 2016). The agents of the educational community (teachers, families and students) positively value the ICT projects implemented in schools (Bonilla-del-Río & Aguaded, 2018), also to promote inclusive (Sampedro & Maldonado, 2017; Marín-Díaz, 2017) and intercultural education (Garrote, Arenas & Jiménez-Fernández, 2018).

Children of Generation Z surf the Internet and use all kinds of devices before knowing how to read and write fluently, but the mere coexistence with technology does not imply the development of digital competence (Pérez-Escoda, Castro-Zubizarreta & Fandos-Igado, 2016). Already in other previous studies (Cobo & Moravec, 2011; Cabra-Torres & Marciales-Vivas, 2009) the fallacy of the digital native and of this generation digital insufficiency had been pointed out, which implies not overestimating the digital competence of the students of

the school 2.o. Indeed, Gallardo (2012) or Bennett, Maton and Kervin (2008) also identified very high expectations regarding the use of ICT in primary school students Z, despite the fact that this supposed technological domain did not reflect a sufficient digital competence. Amiama–Espaillat and Mayor–Ruiz (2017) analysed the digital reading and the reading proficiency of Generation Z Secondary Education students in the Dominican Republic and identified a much lower level of reading proficiency in public schools than in private ones, thus alerting to the emergence of digital neo-illiterates.

To the best of our knowledge, research on the digital competence of Z university students is scarce, with the exception of some works such as that of García-Valcárcel and Tejedor (2017) at the University of Salamanca and except some geographical areas such as Mexico or Latin America, because according to the meta-analysis of Navarro, Cuevas and Martínez (2017), this is where 46% and 62% of the inquiries that combine education and ICT are focused, respectively. However, we know that in virtual learning environments, university students improve their ability to share, transmit and exchange knowledge, achieving virtual cooperative work (Cano, Domínguez & Ricardo, 2018).

The combination of social media and networks, web and virtual education technologies allow creating more collaborative learning experiences within Generation Y (Gunawan, Prisca, Nurul & Sferianto, 2018), but for this, teachers must master transmedia and multiscreen tools (Aguaded & Guerra, 2012). Pérez-Escoda, García-Ruiz, Castro-Zubizarreta and Aguaded (2017) also warned to the need to promote critical thinking to achieve a real integration of digital skills in educational contexts in the scope of Europe's 2020 Strategy.

1.2. Generation Z teachers' digital competence

The insufficient preparation of current teachers to meet the technological needs in the teaching-learning processes is affecting the digital competence of the Z generation – which is not inherent, and requires education– (Fernández & Fernández, 2016) and, therefore, it is necessary not only to incorporate more techno–educational resources into teaching, but to use them from an active perspective where the role of a competent teacher is more than just a transmitter of information. The most recent studies confirm that, for example, in Madrid schools, teachers still do not have the necessary digital skills and that they do not conceive technology as an element of educational innovation (Fernández, Fernández & Rodríguez, 2018). Another case analysis carried out in Almería concludes that teachers need more practical training, since they are not able to promote the use of social networks used by adolescents for student–teacher relationships (Sefo, Granados, Lázaro & Fernández–Lagarreta, 2017).

When evaluating the digital competence of teachers in Aragon, it was found that initial and permanent training needs to be strengthened because teachers have a low level of educational use and a medium level for their personal use (Falcó, 2017). In the evaluation of the digital competences self-perceived by the teachers of Primary Education in Castilla y León, the results point to a lack of skills for the pedagogical use of ICT, which means that the problem is not the lack of technology in centres, but rather the fact that the teacher cannot develop the digital competences of the students because he does not possess them himself (Pérez-Escoda & Rodríguez, 2016). Amongst future teachers, the data shows an advance in the self-perception of their own digital skills (Maestre, Nail & Rodríguez-Hidalgo, 2017), but the need for more permanent training is also verified (Pérez-Escoda, Iglesias-Rodríguez & Sánchez-Gómez, 2017). On the other hand, in countries such as Portugal, it has been found that educators are unaware of much of 2.0 resources (García *et al.*, 2014) and that only 42% of primary school teachers use the computer in the classroom (Fartura, Pessoa & Barreira, 2014).

Ranieri and Bruni (2018) perceived that virtual environments were not attractive for students accustomed to using next-generation mobile and social media at the European university, while Shutenko and his collaborators (2018) noted the need to properly use ICT in

Russian university teaching to stimulate DIY culture and self-realization. The digital deficiencies of Ecuadorian university teachers are also reflected in the work of Orozco, Cabezas, Martínez and Mercado-Varela (2017), while Chaves, Matarrita and Cardoso (2017) proposed adapting the curriculum model to the Z and Alpha generations in the Costa Rica university. Even in the cases in which the educators self-perceived indicators are more encouraging, as it is the case in Colombia, the capacity for innovation to generate technological knowledge is affected (Viloria Del Valle, Pacheco & Hambuger, 2018; Tobar, 2017). The results also coincide with other previous studies such as those by Rangel (2015) or Vera, Torres and Martínez (2014) concluding that digital immigrants who dedicate themselves to teaching are using an obsolete language (Prensky, 2010).

The European Commission, aware of the insufficient digital competence of citizens (Lucas, Moreira & Costa, 2017), exposes the need for teachers to require an increasingly sophisticated set of competences, collected in the latest edition of DigCompEdu (Redecker, 2017), the scientifically sound and valid framework of reference for educators at all levels, established in the European Framework of the Digital Competence of Educators. The DigCompEdu contemplates 22 elementary competitions organized in six areas: (1) "Professional Engagement" in the use of ICT both in teaching and in daily life; (2) "Digital Resources" to create and share; (3) "Teaching and Learning" or the commitment to use technology in the classroom; (4) "Assessment", that is, the use of technologies to improve evaluation; (5) "Empowering Learnings", using technology to improve the inclusion and engagement of students; and (6) "Facilitating Learners' Digital Competence," encouraging students to use technology creatively and responsibly. Therefore, it is fundamentally areas 2, 3, 4 and 5 that directly affect teachers' digital competence and, consequently, those that they need to implement efficient, inclusive, innovative teaching adapted to the needs of Generation Z and the next Generation T.

The European Framework also proposes a progression model based on six levels of digital teaching competence: Newcomer (A1), Explorer (A2), Integrator (B1), Expert (B2), Leader (C1) and Pioneer (C2). The DigCompEdu philosophy is based on the fact that educators are models for the next generations, so it is essential that they are fully trained in digital competence, both to train students and to enable them to participate with guarantees in the digital society. The simple use of technology is not equivalent to innovation, as Sánchez-Martínez, Ricoy and Feliz-Murias (2018) verified when evidencing that the activities implemented with the Tablet did not imply the use of Apps and were always associated with traditional teaching. On the other hand, Ochoa and Neves (2017) developed, in Portugal, a collaborative learning experience based on MOOC that allowed improving the quality of teaching, although they pointed out gamification and integration of social networks as areas to be developed in future editions. Ballesta and Martínez (2015) concluded that an innovative use of the e-book favours media education and Gautam and Saurabh (2019) confirmed the potential of a YouTube channel as an innovative educational resource.

Hernández, Prada and Ramírez (2018) summarize the dimensions in which teachers consider ICT to be basic –information management, student support, relationship with other areas of training and construction of knowledge– and highlight the importance of using social networks to guarantee constant communication and group collaboration. However, none of these dimensions can be reached by teachers who are not very competent and lacking the capacity to evaluate the digital resources used (Escobar & Sánchez, 2018) according to their accessibility, interactivity, usability or instructional design (Marzal, Calzada & Ruvalcaba, 2015). However, it is true that the scientific community is highly sensitized and Educommunication experiences an annual increase in the amount of research collected on the Web of Science, especially in the United States, but also in Europe and especially in Spain (Gregorio–Chaviano, 2018).

1.3. Research justification

The latest data from the "Annual Study of Social Networks" (2018) indicate that in Spain Generation Z is the one that uses the largest number of social networks at the same time (5.6 compared to 5 for Millennials). They mainly choose YouTube (75%) and Instagram (72%) unlike their previous generation, whose most used networks are Facebook (89%) and YouTube (74%). All in all, WhatsApp is the site that concentrates the highest number of users both among Millennials (90%) and among Z (81%). Both generations are the ones that use social networks more frequently, although there is a higher frequency of use in Z (1:24 hours) than in Millennials (1:12 hours). WhatsApp (24%), Instagram (24%) and YouTube (19%) are the preferred spaces for Zs, while Ys opt for WhatsApp (41%) and Facebook (18%). In Portugal the most recent figures (Marktest Consulting, 2018) indicate that Instagram is the network most frequently used by Z (44.6%) –followed by Facebook (37.7%), YouTube (7.3%) and the WhatsApp App (5%)– and that its usage penetration among young people is three times higher than the average. On the other hand, it has been verified that most of the current storytelling on Instagram is carried out using self-destructing content, that is, short and ephemeral audio-visual products that self-destruct after 24 hours and that can be viewed both in streaming and live. Actually, 88.85% of users use stories in their daily communication, although in other spaces that incorporated these formats afterwards (stories on Facebook and YouTube or states on WhatsApp) the percentages are lower (Sixto, 2018).

Since the adaptability of the Z to technology is acknowledged and their deficiencies in digital competence at all educational levels are detected, caused in turn by a low technological competence of teachers, and the media in which this generation interacts frequently and mostly prefers are identified, we consider to ascertain the relevance of using those same social media in university teaching in order to improve the digital competence of the Z, which would mean, at the same time, an opportunity that affects the quality of life of young adults who failed to develop that basic competence during Primary or Secondary Education. We formulate the following research objectives:

O1. Identify the social networks and instant messaging apps most used by university students.

O2. Check which 2.0 spaces in common use would the university teaching staff like to use in teaching to establish a win-win scenario and assess their coexistence with the virtual classrooms implemented by the University.

O3. Evaluate the demand for use of the latest technological innovations related to self-destructing content in university teaching.

O4. Determine if permanent training programs for university teachers are needed to meet these technological expectations and, by extension, for the development of digital teaching competence according to the six areas established in the DigCompEdu.

It is important to emphasize that the demand for the use of the most advanced technological innovations used by the Z could only be met by a pioneering teacher with high technological training (C2), capable of questioning existing digital practices and experimenting and innovating with pedagogical approaches based on in highly complex technologies.

2. Material and methods

2.1. Sample

The research is part of an Erasmus + Spain-Portugal teacher mobility agreement (Staff Mobility for Teaching) established between the University of Santiago de Compostela (USC) and the University of Minho (UM) to encourage the use of ICT among university teachers in the Galicia-North of Portugal Euroregion (GNP, EGTC). The sample was made up of 131

students, 79 from the USC Degree in Law and 52 from the 2nd and 3rd year of the Bachelor's Degree (equivalent to a degree) in Communication Sciences from UM. The responses were collected between May and October 2018. All students belong to the Generation Z and the vast majority (90.83%) are under 20 years old. The gender variable was not considered as it was understood that it does not present any relevance for the study.

The choice of these degrees is justified, on the one hand, because during the academic years 2017/2018 and 2018/2019 the only digital resource used by students were the virtual classrooms provided by the Universities (not in other groups) and, on the other, because they are studies in which we would have the possibility of satisfying the technological demands detected in the analysis, regardless of whether the extrapolation of data is useful so that teachers from other specialties or countries become aware of their level of digital competence and adapt the resources used to the current needs of the students (for example, when extrapolating the sample probabilistically to the group of university students in Spain with a confidence level of 95%, the maximum margin of error is 8.6%).

2.2. Information collection instrument

A questionnaire designed to obtain final quantitative results was designed and structured in four blocks based on items typology: (1) location demographic data of location, age, course and studies; (2) use of social media and 2.0 resources in everyday life; (3) degree of interest in the use of these frequently used resources in university teaching; and (4) evaluation of the coexistence between these platforms and the virtual classrooms provided by the universities. To facilitate student responses, a closed-question questionnaire was established (Creswell, 2009), and the method of summary evaluations using Likert scales was used to measure the elements that require graduation, assigning a score to each item in order to detect positive, average or negative attitudes.

The validity and reliability of the instrument were verified following the model proposed by Lacave, Molina, Fernández and Redondo (2015). The validity of the construct reflected a KMO sample adequacy measure of o.8 (> 0.5), while the reliability was analysed using Cronbach's alpha and showed an internal consistency of o.88 in the sample as a whole (o.9 in Spain and o.87 in Portugal), which implies a level of scale reliability that approaches excellence. The evaluation of the applicability of the factor analysis of the variables studied using the Bartlett sphericity test allowed accepting the null hypothesis (Ho), as it was a level o (<0.05).

In order to achieve the highest degree of student involvement in the responses, we chose to adapt to their technological comfort zone and, therefore, we designed the forms in Drive, which allows responsive answers. Both the information collection method and the validation of the questionnaire content were examined in a pilot test with 20 law students. Taking that pre-test in consideration the final questionnaire was prepared.

3. Analysis and results

All Z university students (100%) use social networks. YouTube (93.3%) and Instagram (91.4%), two eminently audio-visual networks, are the most used, despite the fact that in Portugal everyone has Facebook (100%), a network that in Spain only half of the students still use (48.1%). Regarding messaging Apps 2.0, WhatsApp is the most used both in the set of available apps (84.6%) and in each of the countries (see Graph 1).

■ Spain
■ Portugal
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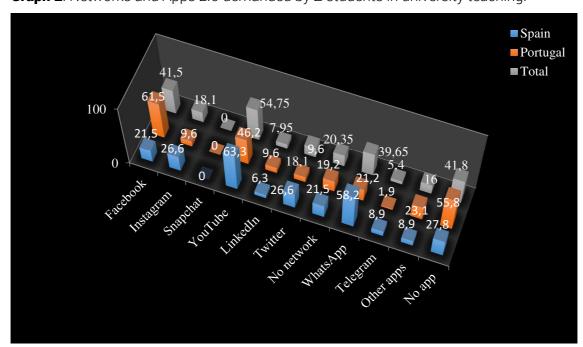
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Graph 1: Networks and Apps 2.0 used by Z university students.

Source: Own elaboration.

The vast majority of students (79.65%) would like the same social networks that they use in their daily lives to be used in teaching and 64.35% are convinced that this would improve their learning. More than half demand the use of YouTube (54.75%), although in Portugal the most requested network is Facebook (61.5%), which in Spain drops to fourth position (21.5%). Four out of ten (45.05%) request the use of messaging apps 2.0, but there is a significant difference between the two countries, since while in Spain 58.2% request the use of WhatsApp in teaching, in Portugal the percentage is reduced to 21.2% (see Graph 2).



Graph 2: Networks and Apps 2.0 demanded by Z students in university teaching.

Source: Own elaboration.

82.5% of Z university students consider that their learning would improve on average or more using YouTube, a trend that is reflected both in Spain (82.3%) and in Portugal (82.7%). However, in choosing the second platform that would have the most impact on the quality of the teaching-learning process, the data does not coincide between the two countries, since in Portugal they choose Facebook (76.9%) and in Spain WhatsApp (58.2%) (see Table 2).

Table 2: Learning improvement perception using social media in teaching.

Net/	Spain								Por	tugal				Euroregion					
арр																			
Likert Scale	Lo w	Mediu m low	Mediu m	Mediu m high	Hig h	Avera ge or	Low	Mediu m low	Mediu m	Mediu m high	Hig h o	Avera ge or >	Low	Mediu m low	Mediu m	Mediu m high	High	Averag e or >	
Facebook	46 .8	19	17.7	10.1	6.3	34.1	15. 4	7.7	28.8	26.9	21. 2	76.9	31.1	13.3 5	23.2 5	18.5	13.7 5	55.5	
Instagram	57	19	11.4	8.9	3.8	24.1	59. 6	13.5	21.2	3.8	1.9	26.9	58.3	16.2 5	16.3	6.35	2.85	25.5	
Snapchat	91 .1	3.8	3.8	0	1.3	5.1	92. 3	5.8	0	1.9	0	1.9	91.7	4.8	1.9	0.95	0.65	3.5	
YouTube	12 .7	5.1	20.3	27.8	34. 2	82.3	11. 5	5.8	15.4	38.5	28. 8	82.7	12.1	5.45	17.8 5	33.1 5	31.5	82.5	
LinkedIn	55 .7	10.1	17.7	7.6	8.9	34.2	50	13.5	17.3	7.7	11. 5	28.8	52.8 5	11.8	17.5	7.65	10.2	35.35	
Twitter	38	21.5	22.8	11.4	6.3	40.5	73. 1	9.6	13.5	1.9	1.9	17.3	55.5 5	15.5 5	18.1 5	13.3	4.1	35.55	
WhatsApp	30 .4	11.4	15.2	15.2	27. 8	58.2	63. 5	9.6	11.5	13.5	1.9	26.9	46.9 5	10.5	13.3 5	14.3 5	14.8 5	42.55	
Telegram	67 .1	11.4	12.7	5.1	3.8	21.6	90. 4	1.9	5.8	1.9	0	7.7	78.7 5	13.3	9.25	3.5	1.9	14.65	

Source: Own elaboration.

Even so, 35.4% of Z university students consider that it no longer makes sense to use social networks in university teaching without using self-destructing content, although half (51.6%) recommend materials to be also published in profiles. A fifth of the students (20.1%) believe that their learning will improve when using these formats and, actually, 18.15% think that the teaching quality will increase by using Instagram stories and 21% think the same will happen by incorporating YouTube stories. The preference for audio-visual content is also reflected in 75.7% who estimate that they would learn more using a YouTube channel, although there are also representative differences between the two countries, since in Spain 63.4% demand a WhatsApp number for inquiries and in Portugal 80.8% would prefer a group on Facebook:

Table 3: Learning improvement perception according to the 2.0 resources used in teaching.

Net/	Spain								Por	tugal	·		Euroregion					
арр			_															
Likert Scale	Low	Mediu m low	Mediu m	Mediu m high	High	Averag e or >	Low	Mediu m low	Mediu m	Mediu m high	High	Averag e or >	Low	Mediu m low	Mediu m	Mediu m high	High	Averag e or >
Facebook Page	44.3	24.1	13.9	11.4	6.3	31.6	25	15.4	23.1	23.1	13. 5	59.7	34.6 5	19.7 5	18.5	17.2 5	9.9	45.65
Facebook Group	51.9	20.3	10.1	10.1	7.6	27.8	7.7	11.5	21.2	30.8	28. 8	80.8	29.8	15.9	15.6 5	20.4 5	18.2	54.3
Stories Facebook	83.5	8.9	3.8	1.3	2.5	7.6	88. 5	7.7	3.8	0	0	3.8	86	8.3	3.8	0.65	1.25	5.7
Instagram Profile	64.6	13.9	15.2	1.3	5.1	21.6	65. 4	17.3	11.5	5.8	0	17.3	65	15.6	13.3 5	3.55	2.55	19.45
Instagram Stories	64.6	12.7	12.7	2.5	7.6	22.8	75	11.5	7.7	5.8	0	13.5	69.8	12.1	10.2	4.15	3.8	18.15
YouTube Channel	15.2	6.3	13.9	27.8	36. 7	78.4	11. 5	15.4	34.6	19.2	19. 2	73	13.3 5	10.8 5	24.2 5	23.5	27.9 5	75.7
YouTube Stories	64.6	12.7	11.4	2.5	8.9	22.8	67. 3	13.5	9.6	3.8	5.8	19.2	65.9 5	13.1	10.5	3.15	7.35	21
WhatsApp Number	22.8	13.9	15.2	24.1	24. 1	63.4	67. 3	11.5	15.4	3.8	1.9	21.1	45.0 5	12.7	15.3	13.9 5	13	42.25
WhatsApp Status	79.7	10.1	5.1	2.5	2.5	10.1	86. 5	7.7	3.8	1.9	0	5.7	83.1	8.9	4.45	0	0.65	5.1
Snapchat Stories	91.1	3.8	3.8	0	1.3	5.1	92. 3	5.8	1.9	0	0	1.9	91.7	4.8	2.85	0	0.65	3.5

Source: Own elaboration.

Regarding the content that the Z university students would like the teachers to provide in a self-destructive model, a dichotomy occurs between those who opt for supplementary class materials (47.55%) and those who opt for notices and notifications (43.2%). Yet, despite the fact that 52.25% recognize a greater utility for networks and apps than for virtual classrooms, the vast majority (89.75%) at the moment prefers to continue combining the use of 2.0 resources with the virtual classroom provided by universities, which implies resorting to transmedia narratives that unfold the story through the different spaces requested.

4. Discussion and conclusions

The social media that Z university students demand to be included in teaching coincide with those that they use in their daily lives, since they consider that only these, especially YouTube and WhatsApp, would contribute to improve their learning. There is a preference for audiovisual and instant content, although in Portugal the level of innovation is not as demanding as in Spain. However, in line with the most recent studies that warn that the virtual environments developed do not meet the technological needs of the students (Ranieri & Bruni, 2018; Shutenko *et al.*, 2018), there is an incipient trend indicating that the use of social media is no longer useful to improve teaching-learning processes if the most innovative versions of audio-visual and instant content, that is, self-destructing content, are not used.

This data should serve to alert university professors to the need for training the use of this type of format, since the Z students demand educational resources to be included in their technological comfort zone, which explains that only one quarter considers that Instagram, despite being the second most used social network, would help improve teaching quality if stories are not used. If we add to this the fact that already a fifth of the students consider that self-destructive content would contribute to optimize their learning, it is necessary for educators to stay ahead of the demand in order to satisfy it, because, although at the moment percentages are not high, one must avoid that the digital competence of this generation continues to be undeveloped due to the digital incompetence of teachers, as it happens in lower educational levels (Fernández, Fernández & Rodríguez, 2018; Sefo *et al.*, 2017; Falcó, 2017).

Only a pioneer C2-level teaching staff can detect and meet the technological expectations of Z students and of the next Alpha generation entering the educational system. Therefore, we agree that more and better teacher training and innovation programs are necessary (Pérez-Escoda, Iglesias-Rodríguez & Sánchez-Gómez, 2017) to allow them to anticipate the digital demands of the new generations or, at least, satisfy them as they appear. Students consider that social media is more useful than virtual classrooms to improve their learning, despite the fact that they continue to demand the coexistence of both platforms. This forces teachers to adequately master transmedia narratives to disseminate the teaching content in the most pertinent place –as Escobar and Sánchez (2018) point out– depending on the type of product and the possibilities of interaction.

Innovating consists of assessing habits in order to identify needs and, in this sense, it is confirmed that half of the university Z students value self-destructing contents as efficient to receive notices or complementary materials. It is essential, therefore, that university teachers who are already trained in digital competence evolve from leader to pioneer level to exploit all the communicative and educational potential offered by self-destructive content and to be able to establish win-win scenarios that allow them to insert knowledge in the Z comfort zone and, in turn, students learn in spaces that until now have been mostly seen as playful, also promoting mobile, responsive and multi-screen literacy as pointed by Bonilla-del-Río and Aguaded (2018).

The didactic materials designed to consume in a self-destructing format should be focused under the parameter of a limited and ephemeral duration aiming to foster collaborative learning networks among students and a need for following similar to that

generated by influencer accounts or, at least, to the one that the community of contacts is interested in. To achieve this, it is necessary to master the most advanced techniques to prepare audio-visual material both for streaming and live and professionally manage social media, including prospecting trends and creating storyboards creation that are not only visually attractive, but conceived as a storytelling that reinforces the subjects program content and contributes to the achievement of the required competences. From the evaluation point of view, the analytical tools provided by social media allow quantifying and qualifying participation in the group community according to the promotion of social intelligence, DIY culture and work in the cloud.

Although the amplitude of the sample is limited, the reliability of the instrument is very high and, therefore, we consider that the results obtained identify a consistent trend that teachers cannot let pass unnoticed and, therefore, they are valuable for the scientific and educational communities, not so much due to its diagnostic evaluation nature, but to sensitize teachers to the need to receive more permanent training and to start designing highly innovative ICT proposals that allow Z university students to achieve the digital competence that they did not achieve in the previous educational stages.

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