5 Professional development in English for specific purposes: designing the curriculum of an online ESP teacher education course

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Abstract

Despite the developments in the English for Specific Purposes (ESP) field, the field of ESP Teacher Education (TE) remains neglected. Research in the area of ESP TE has not been given much attention, and the opportunities ESP practitioners have for Professional Development (PD) are very limited. This chapter describes the development of a curriculum for an online ESP TE course, the ReTEESP Online. The process occurred in the context of a Technical Action Research (TAR) study, the purpose of which was to address the needs of a group of 24 language instructors in terms of ESP TE. The course was based on a literature review in ESP and ESP TE, including learning theories and TE models, and recent developments in curriculum design. The course was also informed by an analysis of the 24 language instructors’ needs in ESP TE and a pilot implementation of the course.

Keywords: English for specific purposes, teacher education, professional development, curriculum development, needs analysis, cloud technologies, social constructivism, connectivism.

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1. Introduction

In recent years, ESP has developed immensely; rapid internationalisation along with the predominance of English as a global language resulted in an increase in the numbers of students attending ESP courses. Due to the fact that ESP by definition focuses on the use of language for specialised purposes, there are many parameters that ESP practitioners need to take into consideration, which makes teaching ESP more challenging than teaching General English (GE). Therefore, ESP TE is more than necessary these days, and this intense need is expressed in the literature from different parts of the world (Abedeen, 2015; Basturkmen, 2010; Bezukladnikov & Kruze, 2012; Bracaj, 2014; Chen, 2012; Mahapatra, 2011). Nevertheless, research in the area of ESP TE has not been given enough attention, and the opportunities ESP practitioners have for PD are limited.

This chapter addresses the need for ESP TE. It describes the development of the curriculum for the ReTEESP Online, an Online Reflective TE course in ESP. The course was developed in the context of a TAR study; its purpose was to address the need of a group of 24 language instructors coming from different educational backgrounds in terms of ESP TE. The course was based on a literature review in ESP and ESP TE, including learning theories and TE models, developments in the field of curriculum design, an analysis of the 24 language instructors’ needs in ESP TE, and a pilot implementation of the course.

2. The theoretical background of the ReTEESP Online

Following Richards and Farrell (2005), who support that TE processes derive from an amalgamation of different assumptions on how teachers learn, this study embraces the view that ESP TE could be founded on a comprehensive review of different processes that carry implications on the things that ESP practitioners’ need to learn and the ways they could learn them. Such a review may involve the following: (1) research in ESP, (2) theories of learning, (3) TE models that resulted from theories of learning, including online TE, (4) suggestions for
ESP TE, and (5) recent developments in curriculum design. The subsections which follow briefly summarise the most important principles drawn from these aspects, which constitute the theoretical background of the ReTEESP Online.

2.1. Reviewing research in ESP

ESP emerged in the 1960s in an era of socioeconomic turbulence with growing numbers of university students, due to developments in science, business, and technology and an increasing number of migrants (Dudley-Evans & St John, 1998; Richards, 2001). ESP, as its name denotes, has a specialised nature. As Hutchinson and Waters (1987, p. 18) support, this does not refer to ‘specialised varieties’ of English, but rather to the different purposes for which the language might be used. Amongst the most important aspects of ESP are: (1) needs analysis, which is perhaps one of the foundations which ESP course design is based on (Belcher, 2009; Dudley-Evans & St John, 1998; Johns & Makalela, 2011; Flowerdew, 2013), (2) authenticity of material and tasks, which occupies a central role in ESP, even though it is a concept very often found in literature on language teaching in general (Benavent & Penamaria, 2011), and (3) the multifaceted and multidimensional role of the ESP practitioner (Dudley-Evans & St John, 1998; Johns, 2013).

Today ESP is thriving with more research studies being conducted in the field, more publications being released every year, and more ESP professional associations being established. Even though in the past, research in ESP related to genre and corpus studies, some of the topics that interest researchers in the ESP field nowadays deal with specific disciplines such as Business English (Alousque, 2016), students’ acquisition of employability skills (Álvarez-Mayo, Gallagher-Brett, & Michel, 2017), and the integration of new technologies in ESP (Selevičienė, 2020).

ESP TE needs to revolve around all the principles and specialised processes of ESP, and inform the practitioners on the latest developments in the field, including the release of new research, the existence of different professional organisations, and the organisation of various events in the field. This was the basis on which the content of the ReTEESP Online was built.
2.2. **Looking at theories of learning and TE models**

As far as learning theories are concerned, which have an important impact on how teaching is achieved, two of the most influential theories of learning emerging in the last decades are social constructivism (Vygotsky, 1978) and connectivism (Siemens, 2005). According to social constructivism, individuals construct knowledge through the interaction of their past experiences and what they already know and the ideas, experiences, and activities with which they come in contact, in other words their social surroundings (Richardson, 1997). Learning is achieved through social interaction, and students learn best when they collaborate and when they are engaged in problem-solving situations. In this sense, knowledge is actively constructed and not passively received. Connectivism, relies on technology and networking for the discovery of knowledge. For Siemens (2005), knowledge exists in networks, and the key to finding knowledge is knowing to which network one has to look for it. Both of these approaches to learning denote that learning occurs where there is communication, interaction, exchange of ideas, and collaboration.

Social constructivist and connectivist approaches to learning influenced the development of current TE models. The two theories of learning are connected with the evolvement of the reflective model for TE, a sociocultural perspective to TE, and the development of critical language TE, which influenced the TE field. Firstly, the reflective model for TE (Wallace, 1991, p. 14), which was based on constructivist approaches to learning and experiential learning, suggests that the teachers acquire two types of knowledge; the received knowledge, which involves all the ‘intellectual content’ received, and the experiential knowledge, which relates to knowledge acquired through experience and reflection. Through putting into practice the knowledge they acquire and through reflection on practice, teachers manage to reach professional competence. This TE model favours a ‘practising what you preach’ approach, in other words, the belief that every teacher training programme should reflect in its practice all the theories and approaches that it wishes to convey to the trainees (Wallace, 1991, pp. 18-20). Another TE approach, the sociocultural perspective to TE, is rooted in the social constructivist and connectivist theories of learning, emphasising
the value of professional networks. This perspective to TE was realised through the development of communities of practice (Wenger, 1998), which are formed by people who are learning together as part of a professional network. These professional networks usually operate online. Finally, another TE model, which is becoming popular nowadays, is that of critical language TE, which stems from critical pedagogy, concerned with social action and educational change, the results of global migration and social diversity (Hawkins & Norton, 2009). This TE model promotes the ideas of social equality and justice.

Following these developments in the area of learning in general, and TE in particular, ESP TE can adopt an inclusive approach that combines elements from all these current TE models, as suggested by Maggioli (2012). This idea was followed in the design of the ReTEESP Online, which was founded on social constructivism and connectivism and inspired by all TE models discussed in this section.

2.3. Considering online TE

Developments in the areas of learning and TE have led to the emergence of online learning and online TE (Dede, 2006). Researchers in the field emphasise the significance of teacher learning online built on sound pedagogical foundations; Henry and Meadows (2008), Maggioli (2012), and Powell and Bodur (2019) suggest principles through which online TE can be efficient. Some of the most important principles of online TE, as they were expressed by these researchers, involved the following realisations:

• online learning is different than regular classroom learning, therefore special adjustments need to be made, and constant and detailed guidance must be provided to the teachers;

• learning must be informed by pedagogy and teachers must engage in meaningful activities and interaction;

• teachers need to have a sense of presence and interaction with other colleagues and the facilitator, whom they need to perceive as real people;
technology is only a tool; and

assessment needs to be ongoing.

These principles are important in online TE, and were considered in the design of the ReTEESP Online.

2.4. Reviewing research in ESP TE

A review of the literature in the field of ESP TE, starting from 1983 with Ewer (1983) and reaching 2020 with Kavanoz (2020), reveals, first of all, lack of ESP TE, secondly research in the field and, thirdly, various suggestions regarding what ESP TE should involve. The suggestions for ESP TE expressed in the literature since 1983 are numerous and too many to refer to in this chapter. A thorough review of the literature in ESP TE can be found in Kakoulli Constantinou (2020). It is important to highlight though, the suggestions for ESP practitioners’ involvement in action research for PD (Kavanoz, 2020), Sharpling’s (2002) preference towards collaborative interaction in PD and lifelong learning, and Basturkmen’s (2014) suggestion for ESP TE focusing on the ESP practitioners’ needs in their own educational contexts. ESP TE endeavours should be based on a review of current ESP TE research. The online course that was designed in the context of this study was built on a thorough review of ESP TE literature.

2.5. Designing the curriculum

Through the years, different curriculum development processes appeared in the literature, such as the forward, the central, and the backward design of curriculum development (Richards, 2013). According to the backward design or understanding by design framework (Wiggins & McTighe, 2005), course designers should first decide on the desired results and then specify the content and methods of the curriculum. In other words, the learning outcomes are decided based on the learners’ needs, and these determine the curriculum. According to Wiggins and McTighe (2005), a backward design helps learners (or in this case teachers) and course facilitators gain a better understanding of the performance
goals, and makes them more aware of whether these goals have been achieved or not, and also how they can be better achieved. ESP TE programmes can be designed following the backward design so that teachers become more aware of the purposes of each course unit, activity, or resource. The ReTEESP Online was designed based on the backward design process as suggested by Wiggins and McTighe (2005, pp. 17-29).

3. Setting the scene

3.1. The purpose of the study

The purpose of the study was the design of an intervention, an online ESP TE course to address the neglected need for ESP TE among a group of 24 language instructors, who wished to educate themselves on issues pertaining to ESP teaching methodology or update their knowledge on the latest developments in ESP teaching practices.

3.2. Methodology

The methodology used was TAR developing in cycles of continuous improvement during the period 2017-2019. This chapter concentrates only on the first steps of the first cycle, which involve the design of the intervention, the ReTEESP Online. The other parts of the study which followed involved the implementation of the course, reflection, course refinement, reimplementation of the refined course, reflection, and drawing of final conclusions; those parts of the study are not described in the present chapter.

3.3. The participants

A total of 24 English language educators from different countries participated in the study. These language instructors were ESP educators representing different ESP fields or English as a Foreign Language (EFL) teachers; their common characteristic was their wish to receive education on issues related to ESP
teaching. Table 1 shows the 24 participants in the study for whom ReTEESP Online was designed.

Table 1. The participants in the study

| English language instructors | N=24 | %       |
|------------------------------|------|---------|
| Place of work                |      |         |
| Sudan                        | 1    | 4.16%   |
| Saudi Arabia                 | 4    | 16.6%   |
| Greece                       | 9    | 37.5%   |
| Spain                        | 2    | 8.33%   |
| United Kingdom               | 1    | 4.16%   |
| Cyprus                       | 5    | 20.8%   |
| Egypt                        | 1    | 4.16%   |
| Kosovo                       | 1    | 4.16%   |
| Sex                          |      |         |
| Male                         | 3    | 12.5%   |
| Female                       | 21   | 87.5%   |
| Age                          |      |         |
| 20-29                        | 3    | 12.5%   |
| 30-39                        | 8    | 33.3%   |
| 40-49                        | 8    | 33.3%   |
| 50-59                        | 3    | 12.5%   |
| No response                  | 2    | 8.33%   |
| Years of experience as an ESP practitioner |      |         |
| 0                            | 7    | 29.16%  |
| 1-5                          | 7    | 29.16%  |
| 6-10                         | 2    | 8.33%   |
| 11-15                        | 4    | 16.66%  |
| 16-20                        | 2    | 8.33%   |
| Over 20                      | 2    | 8.33%   |
| Current position             |      |         |
| Higher Education (HE)        | 16   | 66.66%  |
| Vocational Education (VE)    | 4    | 16.66%  |
| Secondary Education (SE)     | 1    | 4.16%   |
| Primary Education (PE)       | 1    | 4.16%   |
| PE, SE, VE                   | 2    | 8.33%   |

As Table 1 shows, most of the participants worked in Greece (37.5%, n=9), Cyprus (20.83%, n=5), Saudi Arabia (16.66%, n=4), and Spain (8.33%, n=2), and 66.66% of them (n=16) taught in HE. The majority (75%, n=18) had multiple duties to perform, such as course design, teaching, materials selection, materials development, course evaluation, and research. Teachers’ years of experience showed that 14 out of 24 participants were new in the ESP field. This implied that the course that would be designed had to cater for teachers at the beginning stages of ESP teaching.
Concerning the training in ESP teaching which they had received in the past, 58.33% of the participants (n=14) had received some form of ESP training, while 41.66% (n=10) had received no ESP training at all. The participants that had received training in ESP had done so as part of their Bachelor or Master of Arts (BA or MA) studies (n=5, 20.83%), through a combination of BA/MA/PhD studies and seminars, conferences and lectures on ESP (n=5, 20.83%), seminars, conferences, and lectures on ESP solely (n=3, 12.5%), or in-service training (n=1, 4.16%).

4. Method

4.1. Data collection tools

The data for the design of the ReTEESP Online were elicited through:

- a review of the literature on ESP, learning theories, language TE, ESP TE, and recent literature on curriculum development;

- an analysis of the 24 language instructors’ needs through (1) an online questionnaire distributed before the course and (2) the participants’ comments on the course platform (Google Classroom) at the beginning of the course. The questionnaire created was based on previous research in the field of ESP TE and language TE in general and consisted of 19 items in the form of closed-ended questions (multiple response and Likert scale) and open-ended questions. It was administered to the participants before the beginning of the course via Google Forms; and

- a pilot implementation of the course (Kakoulli Constantinou, Papadima-Sophocleous, & Souleles, 2019) that took place during May 2nd and June 29th, 2017 with six ESP practitioners from HE, who represented a convenience sample (inspired by Cohen, Manion, & Morrison, 2007). During this phase, data were gathered though the online questionnaire discussed above, participants’ reflective journals, the facilitator’s field notes, comments on Google Classroom, and focus groups.
4.2. Data analysis

Quantitative data elicited from the online questionnaire were analysed using IBM’s SPSS 22 software, and descriptive statistics were used to talk about the results. The qualitative data from the questionnaire and participants’ comments on the platform were analysed thematically using NVivo 12 software for qualitative data analysis. The review of the literature, the needs analysis, and the pilot study yielded a rich amount of data, which are briefly discussed in the next section.

5. Results and discussion

5.1. The results of the literature review

A brief summary of the literature review on which the ReTEESP Online was based is presented in Section 2 of this chapter. Being guided by the most important findings from the review, the course concentrated on the most important principles of ESP, such as its characteristics, the significance of needs analysis, authenticity, the complex role of the ESP practitioner, and the latest developments in the field, including the integration of new technologies.

Furthermore, following the latest developments in TE, the course adopted a sociocultural approach to TE with elements from the reflective model for TE and critical pedagogy, based on social constructivist and connectivist theories of learning. Moreover, since the participants in the course worked in different geographical locations, the course was designed to be offered online based on the principles of efficient online TE. The course also incorporated suggestions from previous research conducted in the field of ESP TE. These, as well as other aspects of the course, were also determined by needs analysis.

5.2. Needs analysis

The needs analysis process revealed details related to the profiles of the 24 language instructors, reasons for which they decided to attend the course,
the knowledge they wished to gain, and information on their Information Technology (IT) literacy. Due to the fact that 41.66% (n=10) of the teachers had received no ESP training and 58.33% (n=14) of them were new to the ESP field, the course had to familiarise them with basic ESP principles before moving to the latest developments in the field. The reasons for which they decided to attend the course are presented in Table 2.

Table 2. Reasons for attending an ESP TE course

| Reasons                                | N  | Percent | Percent of Cases |
|----------------------------------------|----|---------|------------------|
| Improvement of teaching methodology    | 22 | 22.7%   | 91.7%            |
| Professional development               | 21 | 21.6%   | 87.5%            |
| Improvement of syllabus design skills  | 16 | 16.5%   | 66.7%            |
| Sharing ideas with other ESP educators | 14 | 14.4%   | 58.3%            |
| Networking                             | 13 | 13.4%   | 54.2%            |
| Self-esteem increase                   | 6  | 6.2%    | 25.0%            |
| Employer satisfaction                  | 2  | 2.1%    | 8.3%             |
| Promotion                              | 2  | 2.1%    | 8.3%             |
| Salary increase                        | 1  | 1.0%    | 4.2%             |
|                                        | 97 | 100.0%  | 404.2%           |

The fourth column, which presents the percentage of cases, refers to the numbers of ticks each reason got by the participants in the study; in other words, how many times this response was selected by the participants. As Table 2 illustrates, language instructors wished to attend an ESP TE course mainly to improve their teaching methodology, develop professionally, improve their syllabus design skills, and share ideas with colleagues in the field. In their comments on the Google Classroom platform, participants stated that they wished to become members of a network of ESP practitioners that would provide them with the opportunity to exchange ideas on ESP issues (n=8, 33.33%), and upgrade their knowledge on ESP (n=7, 29.16%). Other reasons mentioned were PD (n=1, 4.16%), the facilitator’s acquaintance with one of the participants and her appreciation towards the institution she worked for and the training programmes they provided (n=1, 4.16%), and also the fact that the course appeared different and more interesting than other courses (n=1, 4.16%).
In relation to the knowledge they wished to gain from the course, the teachers stated that they wished to learn about issues of ESP teaching methodology including the integration of new technologies (n=8, 33.33%), the latest developments in ESP (n=5, 20.83%), and how to improve as ESP professionals (n=3, 12.5%). They also mentioned ESP course planning and syllabus design (n=3, 12.5%), assessment methods (n=1, 4.16%), new ESP material (n=1, 4.16%), and resources for continuous PD (n=1, 4.16%). Four participants (16%) also repeated that they wished to participate in a professional network dealing with ESP issues, where they could learn from each other’s experiences. These findings are very similar to the findings of Bocanegra-Valle and Basturkmen (2019), which proves that the needs of ESP practitioners are similar in different areas of the world.

Finally, the data revealed information on the teachers’ IT literacy, which was important, as the course would be offered online, since the participants resided in different countries. It was decided that the ReTEESP Online would be offered using the G Suite for Education, YouTube, email, Skype, and Facebook. The G Suite for Education was considered to be appropriate for the delivery of the course, since as a cloud-based technology it was cost effective, convenient, practical, flexible, with high scalability (González-Martínez, Bote-Lorenzo, Gómez-Sánchez, & Cano-Parra, 2015). For this reason, it was essential to ask the participants how familiar they were with technology and these tools in particular. The results are illustrated in Figure 1 and Figure 2.

Figure 1. Participants’ competency in using technologies in their teaching
Figure 2. Participants’ familiarity with technologies used in the ReTEESP Online
As illustrated in Figure 2, 25% of the participants (n=6) had no experience of attending an online course. Furthermore, even though 17 of them (70.83%) were extremely familiar with the use of Gmail, some participants had not been acquainted with Google Drive or Google Classroom in the past. Regarding Skype and Facebook, the majority of the participants were extremely and moderately familiar with the tools, possibly because they used them in their personal lives. These results indicated that the participants would need guidance regarding the use of the G Suite for Education tools, such as Google Classroom and the Google Drive, through the course, which meant that the facilitator should be in constant communication with the teachers, and that clear guidelines should be uploaded on the course platform.

5.3. ReTEESP Online pilot implementation

The findings from the trial implementation of the ReTEESP Online generated important implications for the design of the course and its actual implementation. With regard to the qualitative data that were received from ESP practitioners’ reflective journals, their comments on Google Classroom, facilitator’s field notes, and the focus groups conducted at the end of the programme, thematic analysis yielded three general thematic categories: (1) participants’ professional experiences, (2) the course experience, and (3) suggestions for improvement of the course. The analysis revealed many positive aspects of the course, such as the knowledge acquired, the participants’ high performance in the course, teachers’ positive perceptions on the technologies used, etc. It also revealed different challenges faced during the course, such as teachers’ failure to meet the deadlines, difficulties in collaboration in some cases, technical difficulties, etc. and suggestions for improvement, such as the course duration, the organisation of content, presentation of material, etc.

The findings from the pilot phase yielded useful results for the design and the actual implementation of the course. These findings are explained in detail in Kakoulli Constantinou et al.’s (2019) chapter in the edited volume ESP teaching and teacher education: current theories and practices.
5.4. ReTEESP Online: the curriculum design

Based on all the above, the ReTEESP Online was designed to be a flexible, online ESP TE course of three to six weeks, five hours per week, intended for ESP educators representing different ESP fields or EFL educators who would like to educate themselves on issues pertaining to ESP teaching methodology or update their knowledge on the latest developments in ESP teaching practices. The aim of the course was to engage educators in hands-on activities that would enable them to develop in areas associated with ESP teaching and give them the opportunity to implement their new knowledge in their ESP practice. A general overview of the course can be found in a brief weekly outline provided in supplementary materials, Appendix A. Additionally, a detailed description of the last session of course (Session 6 – Sharing thoughts and reflecting collaboratively) provided in supplementary materials, Appendix B, serves as an example of how the learning theories and the TE models the course was founded on were realised in the course. More specifically, the description of Session 6 shows the types of activities and the technology tools that were employed in the course, as well as the role of the facilitator and the active role of the participants in the course. The description of Session 6 was based on the backward design template, as suggested by Wiggins and McTighe (2005, p. 22).

The course was first of all based on the literature review, as this is discussed in Section 2 of this chapter. It was therefore led by social constructivism (Vygotsky, 1978) and connectivism (Siemens, 2005), adopting a sociocultural approach to TE (Belcher, 2004) with elements from the reflective model for PD (Wallace, 1991) and critical pedagogy (Hawkins & Norton, 2009), and it was also based on previous research conducted in the area of ESP TE. These theories and TE models were realised through interactive and collaborative activities, such as discussions on Google Classroom using the ‘Comment’ feature underneath posts, collaboration on Google docs for the design of ESP tasks and lesson plans, sharing of ideas, provision of feedback to peers, and through the compilation of reflective journals (see Session 6 in supplementary materials, Appendix B). The course was also based on a ‘practising what you preach’ approach (Wallace,
1991), since the techniques and methods of instruction which were used in
the course could be used by teachers in their language classrooms. ReTEESP
Online also incorporated principles of critical pedagogy, since it embraced and
respected the teachers’ different educational contexts providing teachers with
the opportunity to talk about their own educational realities and find solutions
to their own problems. Generally, the course was designed to be delivered
through interactive online lectures, online discussions, independent reading,
writing, listening, independent research, and individual and collaborative
online work. The tools used for the delivery of the course were the G Suite for
Education, YouTube, email, Skype, and Facebook, as these technologies had all
the affordances needed to serve the learning theories and TE models the course
was built on (Kakoulli Constantinou, 2018, 2019). In order to ensure that the
course would be implemented successfully, the principles of online TE (Henry
& Meadows, 2008; Magioli, 2012; Powell & Bodur, 2019), as discussed in
Section 2.3, were followed throughout the course.

Furthermore, the topics (as outlined in supplementary materials, Appendix
A) were based on a review of research in ESP (Section 2.1), and also aimed
at satisfying teachers’ needs, as these were identified by needs analysis
(Section 5.2). The literature review on ESP revealed that the core aspects of
ESP are (1) needs analysis (Belcher, 2009; Dudley-Evans & St John, 1998;
Flowerdew, 2013; Johns & Makalela, 2011), (2) authenticity of material and
tasks (Benavent & Penamaria, 2011), and (3) the multifaceted role of the ESP
practitioner (Dudley-Evans & St John, 1998; Johns, 2013). For this reason,
these aspects were incorporated in the themes that ReTEESP Online covered.
As far as needs analysis is concerned, since many of the teachers had limited
experience in teaching ESP, it was decided that they needed to be introduced to
ESP and its nature and the basic concepts of ESP had to be stressed in the course.
Moreover, the ESP lesson plan was regarded as a useful way of approaching
all aspects of the ESP lesson, from designing the lesson to setting the learning
outcomes, deciding on material and tasks. Moreover, the needs analysis revealed
that the teachers had to be provided with guidance on the use of technology. For
this reason, the first session was dedicated to an introduction to the course and
the technologies used for its delivery, and constant guidance was provided to
teachers through email, private messages on Messenger, and guidelines posted on Google Classroom. Being in line with the teachers’ wishes, the course also provided the teachers with knowledge on how they could continue developing professionally, even after the completion of the course, familiarising them with professional ESP associations and events, and also creating the appropriate conditions for sustaining the network of professionals that had been created (e.g. through keeping the Facebook private group created by the facilitator active). This was also in accordance with the connectivist approach governing the course.

Finally, the course pilot implementation helped in its fine tuning. More specifically, the course duration was made more flexible (ranging from three to six weeks), and the positive aspects of the course were strengthened, while the weaknesses were addressed taking into consideration the participants’ suggestions.

6. Conclusions

This chapter presented the design of an online ESP TE course, based on a review of the literature; an analysis of teachers’ needs and a pilot implementation of the course. As far as the literature review is concerned, the course was founded on the core principles of ESP, on social constructivism and connectivism, and TE models, such as the reflective model for TE, a sociocultural perspective to TE, and critical language TE. Moreover, the course was built on the principles of successful online TE, it was inspired by previous research conducted in the area of ESP TE, and the curriculum was based on the backward design model for curriculum development. Regarding needs analysis, this also played an important role in the design of ReTEESP Online, since it revealed the aspects on which the course should focus in order to satisfy the needs of the ESP practitioners. Lastly, the pilot implementation of the course, exposed the weaknesses and the strengths of the course, and it helped in its improvement, before its actual implementation.

Due to the limited research in ESP TE and the limited opportunities for ESP TE, this chapter could prove useful to ESP TE researchers, ESP practitioners, ESP
TE educators, course designers, and stakeholders. The value of this research lies in the way the particular intervention, the ESP TE course, was designed and delivered. Even though generalisations may not be possible, the fact that the participants of the study were language instructors from different countries of the world and different educational environments may allow the way the course was designed to be replicated in similar contexts, providing language instructors with the opportunity to receive education in ESP teaching.

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8. Supplementary materials

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