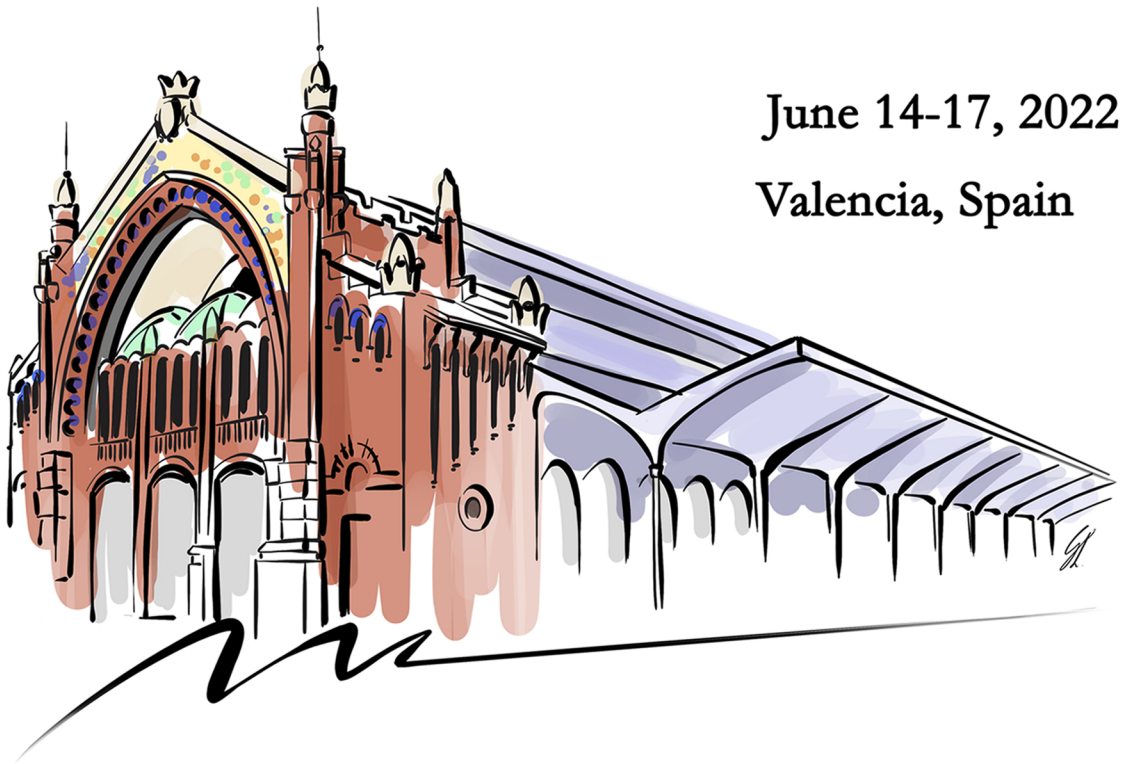




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## Some practical insights on teaching FL to visually impaired students

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### ***Abstract***

*This paper aims at discussing pedagogical practices within the area of inclusive and accessible language education, with a particular focus on visual impairment. Accessible education cuts across all aspects of education: physical and technological infrastructures, instructional modes, teaching strategies, learning materials, and assessment. The success in creating an inclusive learning environment depends on teacher training and professional development. After a brief clarification of the notion of accessibility in educational settings, the paper offers practical recommendations which address any instructor who is committed to planning and teaching an accessible foreign language course for visually impaired students within a mainstream university setting.*

**Keywords:** *Inclusive education; accessibility; visual impairment; foreign language education; foreign language teachers.*

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## **1. Introduction**

The actual implementation of inclusive practices in university teaching programs still represents an emerging phenomenon. In most cases, the success in creating an inclusive learning environment depends on the problem-solving skills and creativity of the single instructor, rather than on a conscious and shared strategy. One of the main problems lies in the lack of training, experience, as well as adequate methodology that can be employed for teaching students with special educational needs. In this paper I would like to provide practical insights and guidance concerning inclusive language education in higher learning institutions on the basis of my personal experience of teaching Russian as a foreign language (FL) to a group of Italian native learners, among whom some were visually impaired (VI). The experience was gained in the context of the project “Towards accessible and inclusive teaching practices in Russian FL. An experimental study” that was developed by the Department of Foreign Languages and Literatures of the University of Verona in 2019-2021.

## **2. “Accessibility” in education: what does this actually mean?**

Generally speaking, accessible education may be defined as the process of designing and delivering courses to encounter the comprehensive needs of people from different background and with different capabilities, cognitive characteristics, learning times and styles, and motivations. Concretely, this implies that every moment of the learning process must be accessible by each learner *with equal ease*. Given this assumption, when designing a course that aims to be inclusive, we must bear in mind that accessibility should be articulated at three levels: physical accessibility, technological accessibility and learning content accessibility. *Physical accessibility* pertains to those courses that are held (entirely or partially) in-person and consists in the actual access of students to the educational spaces, implying the removal of any environmental barrier, and the ensuring of a student-friendly spatial setting. *Technological accessibility* relates to any course that is delivered (entirely or partially) in e-learning mode and benefits from the use of one or more technological platforms (Moodle, Zoom, etc.). Technological accessibility may be pursued by meeting the “Web Content Accessibility Guidelines” standards (WCAG 2.0) elaborated by the W3C (see W3C 2008). Web accessibility depends on both accessible Web browsers and accessible content, which leads us to the concept of *learning content accessibility*. It concerns either in-person or e-learning courses and consists of designing contents in a way that is accessible to every learner. This level of accessibility encompasses both instructional materials and strategies.

## **3. Teaching an accessible FL course to VI students**

When planning a course, any instructor is required to make a series of choices that involve its design and delivery mode, instructional strategies and materials, as well as assessment

methods. In the following sections a set of recommendations is provided to support teachers in undertaking such choices in order to make their FL courses accessible to an audience that include VI students.

### ***3.1. What to do prior to classes: how to ‘prepare to be inclusive’***

An instructor who is committed to the delivery of an accessible FL course needs to get prepared to work in an inclusive setting by carrying out the following actions.

*Developing knowledge on visual impairment.* It is essential that the instructor gets aware of what visually impairment is so that s/he can be ready to respond to the diverse needs of his/her students. Here I shall limit myself in saying that ‘visual impairment’ is used as an umbrella term to refer to both low vision and blindness. When it comes to education, we must bear in mind that, while blind students cannot use their vision at all, the partially sighted are able to use their residual vision in the learning process aided by special equipment. It is equally important to gain knowledge on assistive technology for VI individuals in order to understand how VI students access print and digital information and produce written communications. The most frequently used assistive technology tools are the followings: screen readers, Braille readers, Braille bars, magnifying glasses, electronic magnifiers.

*Choosing the most inclusive delivery mode.* Conventionally, we can distinguish three different ways a class may be delivered: *in-person* (face-to-face (f2f) classroom instruction which may enjoy a limited use of technology); *online* (the so called e-learning, a computer enhanced learning); *blended* (a combination of f2f instruction with online instruction). When designing a course that aims to be accessible to VI learners, the choice of the instructional mode is a crucial one. We must consider that the traditional in-person mode can cause problems to the visually impaired, since it puts at risk the possibility for them to attend classes on a regular basis: mobility is a critical aspect for VI individuals. Given this, the online and blended modes are certainly a better option when planning an accessible FL course, for they ensure a more flexible form of training. The benefits of the e-learning mode in terms of inclusiveness for VI students have been discussed by a consistent number of authors (among others, see Kharade & Peese 2012, Leporini & Buzzi 2007). E-learning may be understood in a broad sense as “the delivery of a learning [...] program by electronic means covering a wide set of applications and processes, such as web-based learning, computer-based learning, virtual classrooms and digital collaboration” (Kharade & Peese 2012, 440). It should be noted that with the outbreak of the COVID pandemic the notions of e-learning and blended format have ended up being interchangeable, since, as Hartle (2020) underlines, “f2f is no longer considered simply to be a physical classroom alone but may also refer to f2f by remote teaching with video conferencing tools, where the blend becomes rather one of synchronous and asynchronous activity” (175). Based on my experience, I recommend delivering your inclusive language course remotely in blended mode, alternating between synchronous (f2f

live classes) and asynchronous learning (videos, quizzes, and various forms of assignments to carry out digitally). Another option is adopting the blended mode in its traditional sense, which means combining in-presence lessons (which should be recorded) and online work.

*Collecting information from your students.* Prior to classes it is essential for any instructor to organize an individual meeting with his/her future VI students in order to identify their needs and requirements. For example, before my course of Russian FL started, I scheduled an online meeting with each VI learner, during which I asked questions pertaining their visual difficulties, the tools and equipment they use to read and write, as well as the way they work with digital and/or printed (in the case of partially sighted) materials. If you are going to use any technological platform, as in my case, it is important to find out if your VI students are familiar to it, and if not to provide them with technical instructions. If your language course is addressed to beginners, ask your students whether they had any experience in FL training: do they know any foreign language? Where and when did they learn it? Did they have a positive experience? If their answer is no, ask them to explain what went wrong. If your students are not beginners, ask them about their previous learning experience in the target language. What was difficult for them to learn? In general, encourage students to provide any information that may help you in improving the effectiveness of your teaching. If your course, or part of it, will take place in a physical classroom, it is best to meet you students in person, give them a tour of the classroom, discuss the seating and the kind of light exposure they need in order to create an accessible setting.

*Predicting difficulties in language learning.* It is essential to detect *in advance* any possible problem that VI students may encounter when approaching the target language, especially if you are working with beginner learners. For example, with regard to Russian language, one of the main critical issues is represented by the Cyrillic alphabet. In my case, being the course held remotely, such criticality was doubled: how can you teach VI students the graphic asset of Russian letters without relying on tactile materials? And thus, how can you teach and train them to write in Russian via videoconference? (check out next section to see how I responded to such tasks). The identification of educational challenges prior to classes, will help us to figure out a whole set of techniques and materials to overcome future difficulties.

### ***3.2. What to do during classes: how to ‘perform inclusion’***

The presence of VI students in the classroom challenges us to creatively use and develop a whole set of inclusive teaching strategies and materials in FL education.

*Instructional strategies.* Inclusive education involves a shift from teacher-centeredness to student-centeredness. Applying a student-centred learning means to value learners’ diversity by encouraging each learner to actively contribute to the construction of knowledge. It is well established that “the communicative and collaborative approaches in language teaching offer valuable opportunities for inclusive learning” (Smith 2018). As instructors, structure your

course following a communication-oriented model that involves a high degree of interaction (both teacher-student and student-student). For example, in my course of Russian FL during live classes students were regularly required to carry out activities which consisted in understanding and producing the language, focusing on conveying the meaning rather than on forms (e.g. speaking about where they live, things they like, where to find something they need; ordering food at a restaurant, etc.). During the interaction students received corrective feedbacks – either explicit or implicit – aiming at improving their accuracy and further developing the discussion. In my experience, designing the lesson using the communicative approach enables the creation of a positive and inclusive setting (each learner takes part to the discussion in conformity with his/her personal characteristics, experiences, interests, and motivation) and facilitates students' socialization (which, in the case of a remotely held course, would be difficult to pursue otherwise). Another way to promote student-centred learning is that of flipping the classroom. The flipped classroom is an instructional mode that inverts the traditional learning experience: students must individually review lecture material prior to classes, so that class time can be used for practical activities in which students cement contents and construct knowledge with the help of the instructor and peers. During my course, at times I required my students to watch short video lessons I prepared prior to class – topics ranged from grammar to lexicon – so that live classes became the place to discuss and review concepts, as well as organize participatory activities. Despite the flipped classroom format is an effective methodology in terms of inclusiveness (when reviewing materials individually, each student works at his/her own pace!), I can not help reporting a criticality: the pre-class preparation of new contents demands students a significant commitment outside of lesson time, which is why the use of such strategy must be carefully rationed. The applying of a student-centred approach does not exclude teacher's explanations and presentations. More traditional activities can be organized via frontal teaching. We must always bear in mind that when introducing new lexical or syntactical items, it is essential to spell out the single letters so that VI student can become familiar with the new word(s) and possibly take note of them. If you write on the blackboard, use a large and neat handwriting and frequently repeat what is being written.

*Instructional materials.* The modern approaches in teaching a FL are still massively based on visual materials. In order to respond to the students' diverse needs, instructors should use, and possibly create anew, multisensory teaching materials, combining multimedia, digital materials, and tactile materials. This means that language inputs must be provided through multisensory channels (visual, audio-visual, auditory, tactile) so that everyone can enjoy them. If you are working in a physical classroom, consider using real objects (the so-called 'realia'): handling, smelling and seeing real objects can make the learning experience more memorable for learners, and ultimately be beneficial for all students (not only those who are visually impaired!). Bear in mind that you must not avoid visual resources just because of the presence of VI students in the classroom: if they are considered useful for your learning

purpose, continue to incorporate photographs, paintings, and pictures, making sure to provide an oral description of visual materials. When designing textual materials, it is essential to follow the guidelines for accessibility (see Microsoft 2022a and 2022b), remembering that, while blind students are prevented from reading without the support of a screen reader, partially sighted may work with written texts, as long as they meet specific requirements. For example, PowerPoint presentations should contain high contrast slides with a simple, non-graphic, black background and white letters. The font used should be 'sans serif' (e.g. Arial, Calibri, Verdana, Tahoma) in a big size. It is important to avoid the use of italics, which is harder to process, and limit the use of underlining to hypertext links only. Any textual content should be always accompanied by audio descriptions and/or saved in a screen reader-friendly format in order to ensure that students can alternatively use the sight and hearing channels with equal ease. We must be sure that all the materials can fully interact with screen readers. This is why, when drafting any digital textual material, it is preferable to avoid a multilingual situation (e.g. mixing Italian and Russian) that could cause the misreading of words. As concerns materials intended to individual work, it is important to design a set of homework that privileges listening and speaking activities. For example, we may ask students to record themselves when completing a speaking assignment, as so we will be able to give them feedback about their oral skills. At the same time, we must not exclude writing and reading activities. Again, when asking students to complete a writing assignment (e.g., a quiz in Moodle), we have to make sure it can be carried out with a screen reader. If students are asked to complete a reading activity, we can attach an audio file where we read the text; in doing so we will prevent any possible problems of misreading caused by the screen reader.

As a general principle, when working in an inclusive setting, we must be ready to develop our own materials so that to facilitate the access of each student to the learning content. As I mentioned in section 3.1, one of the main challenges I encountered in my course was to teach students the Russian alphabet and thus train them to write in a remote learning environment. To meet this challenge, I took the following actions: (1) I introduced the Russian alphabet by means of a PowerPoint presentation during live classes; for each letter, I provided a description of its graphic asset, stimulating sighted students to help; (2) at the end of the lesson I asked students to write some simple words – monosyllabic/disyllabic and 'transparent' words, such as *mama*, *sport*, etc. – on the Zoom chat using the phonetic/mnemonic Russian keyboard on their computers; (3) as a homework assignment, I asked students to watch a video summary and complete a series of exercises I designed *ex novo*, so that they could improve their skills in pronunciation (through listening and repeating activities) and in writing with the phonetic/mnemonic keyboard. In particular, I created an audio file where I dictated some simple sentences and assisted the students in the process of writing with the keyboard, specifically focusing on those letters whose position does not correspond with the Latin keyboard.



### 3.3. What to do after classes: how to ‘test inclusively’ and ‘evaluate inclusion’

Evaluation is an essential part of the teaching process since it allows students to get feedbacks from the instructor about their learning achievements. Together with it, it is equally important for teachers to get feedbacks from students about the efficacy of the learning process. Both these forms of evaluation must be led inclusively.

*Evaluating your students...* One of the most common misconceptions when working with students with special educational needs in general or VI students in particular is that our expectations on their learning outcomes should be reassessed. When I was planning the course of Russian FL for VI learners, I was suggested by a colleague to focus only on the development of their oral skills, as if being visually impaired prevents from mastering any written skill in a FL. There is nothing that could be more wrong: “as teachers we must above all hold the same high expectations for the blind [and partially sighted] student[s] as for the student without visual impairments” (Hamilton 2008, 26). Sighted and VI students must be equally tested in terms of language skills (with the only exception of reading). The assessment process of VI students must only *formally* adjust to their needs and working practices. It is easy to predict that VI students will have no difficulties in taking an oral test but when it comes to written activities (e.g. a multiple choice quiz, a fill-in-the-gaps test, or an open-ended task) or reading comprehension activities the issue becomes more complicated. We must alter the testing conditions so that VI students can fully participate to the assessment process just as their sighted peers. This implies a series of adjustments that pertains: timing (give VI students extra-time to complete the exam tasks and, if needed, change the way time is organized); setting (allow students to take the exam in a separate room); presentation (allow students to access exam materials in ways that do not require them to visually read); response (allow students to complete activities using assistive technology).

*...and being evaluated.* As Hamilton (2008) points out “we must seek out and incorporate the input of the student[s] before, during, and after class” (26). Throughout the course, ask your VI students if they are encountering any technical problems so that you can monitor the accessibility of the resources and materials you are providing. Once the course is over, prepare a questionnaire for students to take in order to evaluate your teaching in terms of accessibility. You can create a survey on Microsoft Form or Google Form (they are fully accessible to screen readers) which contains both multiple choice and open-ended questions. Organize your questions around the following main topics: attendance to classes (e.g. how often did you attend classes? If you did not attend class regularly, can you explain why?), instructional mode (e.g. on a scale of 1 to 5 how do you rate the fact that the course was held remotely/in presence/in blended mode? Justify your answer), learning materials (e.g. how do you rate the learning material used during live classes? And the material provided for individual work?) accessibility on the whole (e.g. where the technological platforms used accessible to you? And the materials, such as Word files, PowerPoint presentations, quizzes

on Moodle, etc.? In your opinion what can be improved?). The responses will help you identifying positive and critical aspects, as well as areas of future improvement.

#### **4. Conclusion**

In this paper I provided some tips on teaching FL to VI students within a mainstream university setting. Usually, teachers receive no formal education on how to teach students with special educational needs in general or VI students in particular, ending up developing their own 'know-how' by trial and error. We must invert this trend, by equipping instructors with the appropriate knowledge and training. It goes without saying that the implementation of a consistent inclusion system can be pursued only through active commitment of university administrations themselves that should sensitize, support and train their staff in how to carry out inclusive teaching.

#### **References**

- Hamilton, E. C. (2008). Teaching German to students who are blind: A personal essay on the process of inclusion. In T. Berberi, E. C. Hamilton, & I. M. Sutherlands (Eds.), *Worlds Apart? Disability and Foreign Language Learning*, (pp. 23–41). New Haven: Yale University Press.
- Hartle, S. (2020). Professional development for EMI: The choice of a blended learning format for training EMI lecturers at the University of Verona». *Iperstoria*, (16), 169-91. doi: 10.13136/2281-4582/2020.i16.920.
- Kharade, K., & Peese, H. (2012). Learning by e-Learning for visually impaired students: Opportunities or again marginalisation? *E-learning and Digital Media*, 9(4), 439–48. doi: 10.2304/elea.2012.9.4.439.
- Leporini, B., & Buzzi, M. (2007). Learning by e-learning: Breaking down barriers and creating opportunities for the visually-impaired. In C. Stephanidis *Universal Access in Human-Computer Interaction. Applications and Services*, (pp. 687–96). Berlin, Heidelberg: Springer, 2007. doi: 10.1007/978-3-540-73283-9\_75.
- Microsoft. (2022a). Make your PowerPoint presentations accessible to people with disabilities. Retrieved February 10, 2022, from: <https://support.microsoft.com/en-us/office/make-your-powerpoint-presentations-accessible-to-people-with-disabilities-6f7772b2-2f33-4bd2-8ca7-dae3b2b3ef25>.
- Microsoft. (2022b). Make your Word documents accessible to people with disabilities. Retrieved February 10, 2022, from: <https://support.microsoft.com/en-us/office/make-your-word-documents-accessible-to-people-with-disabilities-d9bf3683-87ac-47ea-b91a-78dcacb3c66d>.
- Smith, A. M. (2018). *Inclusive Practices in English Language Teaching*. Oxford: Oxford University Press. Retrieved from: <https://www.oup.com.cn/test/inclusive-practices-in-english-language-teaching.pdf>.
- W3C. (2008). *Web Content Accessibility Guidelines (WCAG) 2.0*. Retrieved from: <https://www.w3.org/TR/WCAG20/>.