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## REMOTE SPEECH THERAPY IN THE OPINIONS OF SPEECH THERAPISTS

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The article presents the findings of a study that aimed to explore the opinion of speech therapists regarding remote speech therapy. The study was conducted between January and March of 2023 and the data was collected through a quantitative method via a diagnostic survey. The sample comprised 62 speech therapists with varying levels of work experience and geographical locations. The outcomes indicated that speech therapists generally held a negative opinion of remote speech therapy, perceiving it as more problematic and limiting than beneficial. Most respondents had not participated in online training or courses aimed at improving their qualifications in remote speech therapy, which could potentially influence their attitudes towards it. The study suggests the need to develop and share practical tips on remote speech therapy to better prepare specialists for a possible transition to remote modes of service delivery.

**Key words:** speech development, speech disorders, speech therapy, mediated communication, new media, remote education, and remote speech therapy

### Introduction

Communication ability is important to functioning in society because it enables the transmission of information. Of particular importance is speech, the development of which is a complicated process, the correctness of which depends, among others, on cognitive, motor, social and emotional development as well as auditory and visual perception. During speech acquisition, there may be disorders or situations that negatively affect the development of language and communication skills.

One of the abnormalities related to communication is delayed speech development, which is characterised by slower development of language skills than in peers and different developmental dynamics. The literature on this topic also describes speech disorders caused by neurological abnormalities. These children do not have deficits in terms of intelligence and hearing, and their articulation apparatus enables the correct realisation of sounds. The most frequent participants in speech therapy are children with dyslalia, i.e., an articulation disorder consisting of incorrect production of at least one sound. The following types of dyslalia are distinguished in the literature:

- substitutions - replacing a sound or sounds by others, correctly implemented,
- elisions - dropping a sound or sounds in a word,
- deformations - distortion of a sound or sounds by changing the place or manner of production, resulting in the articulation of a sound that does not fit into the phonetic resources of a given language.

An important group of speech disorders is stuttering and cluttering, which are described as pathological disfluencies of speech that persist for a long time. People with these disorders repeat or drag out parts of the message they are broadcasting or block out in the middle, or use frequent pauses. All speech defects or disorders cause difficulties in sending or receiving messages and require the help of a specialist (Jastrzębowska, 1999, 2005; Panasiuk, 2021; Pąchalska, 2005; Pilarska, 2017; Jeżewska-Krasnodębska, 2017; Krakowiak, 2019; Pluta-Wojciechowska, 2018, 2019; Minczakiewicz, 1997; Skorek, 2001; Sołtys-Chmielowicz, 2005; Woźniak, 2020; Tarkowski, 1999, 2005).

Speech therapy is a specific and intended impact, whose purpose is to eliminate any abnormalities related to communication. It is possible to carry out this process both in the case of articulation disorders, delayed or disturbed speech development, as well as in any other problems related to communication. The effectiveness of therapy depends on the diagnosis of speech and communication disorders and the determination of the causes of their occurrence. The effectiveness of therapy is influenced by the early start of speech therapy, the individual and holistic approach to the patient. What is also important is the patient's conscious participation in therapy and the inclusion of his immediate environment in the whole process. It is important that the participants of speech therapy classes are motivated, but also that they take place systematically (Grabias, 2015; Jastrzębowska, Pelc-Pękała, 1999; Hamerlińska-Latecka, 2012; Małachowska, 2016; Panasiuk, 2021; Pluta-Wojciechowska, 2019; Demel, 1994; Pacura-Syrocka, 2016; Styczek, 1983; Banaszekiewicz & Walencik-Topińko, 2021).

Speech therapy is not only meetings between the patient and the specialist. Media are usually used to support and diversify this process. The issues

dealt with by media pedagogy are important, concerning, among others, education and learning with the use of media and communication with their use. In addition, they contribute to the development of polysensory cognition of the world and thus prepare for practical statements about the reality that surrounds us. Currently, one of the most popular media is digital media, i.e., those for which the Internet is used. These include, for example, interactive computer games, social networking sites, or digital telephony and instant messaging. It is important to teach the correct use of digital media to limit unwanted effects from an educational point of view. Therefore, the use of these measures also in speech therapy allows the transfer of information necessary to function in a remote reality. The outbreak of the COVID-19 pandemic forced the use of mediated communication in speech therapy. Currently, remote speech therapy may be the only form of conducting classes, but only to support traditional therapy. Even before the pandemic, there was a cybertheater, i.e. specialised classes conducted using mediated communication. It is used by people who do not want or cannot meet a specialist directly. However, it should be remembered that e-learning and specialist classes conducted remotely are not always able to replace face-to-face contact. However, it should be noted that the need for remote teaching has made remote communication, education, and therapy more accessible and tailored to the needs of its users. And some of them may want to use the online form in other circumstances, not forced by the pandemic (Bereźnicka, 2021; Lichota, 2015; Siemienicki, 2021; Juszczuk, 2021; Tanaś & Siemienicki, 2021; Makara-Studzińska & Madej, 2017; Plichta, 2020).

## **Literature review**

Remote speech therapy was used mainly by people who live far from a specialist who speaks their native language, e.g. outside of Poland. The COVID-19 pandemic and the closure of educational institutions and speech therapy offices contributed to the dissemination of this form. The treatment of a child's speech therapy using mediated communication has become a subject of scientific research, which I will quote in this part of the article (Skoczylas, 2020).

Between 2011 and 2013, Joanna Jatkowska conducted pilot studies that examined the effectiveness of using an e-learning platform, which supported therapy performed in a direct form. The researcher pointed out the increased involvement of parents and patients and the increased awareness of speech therapy. These studies also tested the effectiveness of therapy in the case of various speech defects. It turned out that this form of therapy yields

the best results in the case of single and multiple dyslalia. In children with total dyslalia and speech disorders caused by intellectual or hearing disabilities, speech therapy interventions were not very effective. It is important that some of the participants resigned from participation in the study due, for example, to technical difficulties, low competency of the guardian in the field of computer use, or individual characteristics of the child. According to the researcher, the low scores of people with profound speech impediments were influenced by materials that were not adapted to the needs of this group. Furthermore, it was observed that longer use of the platform reduces the interest and motivation of the children. However, it should be noted that none of the therapies performed turned out to be ineffective (Jatkowska, 2020ab).

The transition of schools to remote mode forced online classes for children with special educational needs. Beata Górnicka conducted a pilot survey among teachers to collect opinions on the subject of remote education. It concerned students covered by therapeutic interventions. The respondents expressed concerns about the decrease in the sense of security and community of children, which could increase their difficulties. Possibilities to provide additional support to those students who need it have also been a problem. The people covered by the pilot study also noticed the advantages of remote education. They exchanged, e.g. increasing students' independence, better contact with parents, and the ability to provide them with the necessary information about the exercises performed. Online classes facilitated individual conversations between the teacher and the student, who, feeling more confident than in the classroom, was more willing to seek help. Respondents emphasised that, as far as possible, therapeutic classes are conducted online, but in their opinion, they cannot completely replace face-to-face meetings (Górnicka, 2020).

Jolanta Gebreselassie conducted research in 2020, whose purpose was to determine how the guidelines for providing speech therapy changed during the COVID-19 pandemic and how speech therapists managed to carry out mandatory classes during the suspension of stationary classes. She analysed documents and Internet discourse. It turned out that official announcements, which were supposed to normalise and facilitate the work of speech therapists during the pandemic, were published with delays and contained general information. The study showed that online self-help groups provided particular support for speech therapists. There were many doubts about copyright and the quality of services provided remotely. The development of this social group was also noticeable, as they initially limited their activities to sending materials asynchronously, and over time they also began to conduct activities in a synchronous form (Gebreselassie, 2022).

Also in 2020, Anna Karowicz studied the security measures used by speech therapists to minimize the possibility of contracting COVID-19. 340 speech therapists were surveyed using an online survey. It turned out that most speech therapists felt the negative impact of the pandemic on their psychological comfort and negatively assessed the change in working conditions. During the pandemic, more than 85% of the speech therapists surveyed decided to conduct classes using mediated communication, and for more than 40% it was the only form of work. The study also showed that the majority of the respondents believe that it is not possible to perform fully safe speech therapy work during a pandemic. One of the mentioned factors was the inability to keep a safe distance from the patient or parents who brought sick children to classes. Furthermore, respondents noticed the limitations of remote therapy, which prevents the use of, for example, speech therapy massage, which makes it difficult to provide effective interactions. Although most speech therapists negatively evaluated remote therapy, the time of the pandemic allowed them to develop their skills in using technology and expand their knowledge in the field of speech therapy (Karowicz, 2021).

Researchers pay special attention to forced and sudden change in therapy, which was a challenge for specialists who had previously worked only in a direct form. Research conducted by Michał Mazur in 2020 shows that despite initial reluctance, most speech therapists decided to perform remote speech therapy (Mazur, 2021).

Remote speech therapy of a child cannot replace all direct specialist interactions. Moreover, not everyone can participate in this form of influence. However, it is an alternative to traditional forms, for which it can also be an effective support. During the pandemic, these interactions became the only way to provide speech therapy. However, it should be remembered that the effectiveness of this form is influenced by many factors, such as the type of speech defect, the participation of parents, or the individual characteristics and competences of the child, guardian, and speech therapist.

## **Methods**

The subject of my research is to examine the opinions of speech therapists about the use of remote speech therapy. In the study, I used the diagnostic survey method with the use of a questionnaire. Due to the chosen research method and technique, I used a questionnaire prepared in an online form in my own research. The survey was conducted between January and March 2023 using a survey form posted on the Internet. The link to the questionnaire was placed on a social networking site in groups whose mem-

bers are speech therapists and sent to members of the Polish Association of Logopedists.

The study involved 62 people, including a man who worked as a speech therapist. Almost half of the respondents were over 46 years of age. The 36-46 age group constitutes 33.9% of the respondents and 11.3% are people aged 25-35. Among the respondents, 6.5% were under 25, i.e. they had just graduated from university. 25.8% of the respondents work in a large provincial city, 8.1% in a large city, 24.2% in a medium city, and 25.8% in a small city. 11.3% of the respondents work in the village to the suburbs of the city, and 4.8% in the village. 61.3% of the respondents have at least 16 years of professional experience. Groups with 11-15 and 6-10 years of work experience were equal and represented a total of 23.6%. People with 1-5 years of work experience accounted for 14.5% of the respondents, and only one respondent worked for less than 1 year. Only 8 people among the respondents participated in trainings/workshops on work or remote education. Most of these trainings concerned the use of platforms, e.g. Teams or mobile applications.

In my research, the following goals were set:

- Cognitive objective: Examine the opinion of speech therapists about the use of remote speech therapy.
- Theoretical goal: Making theoretical studies and conclusions based on literature and own research on speech therapy with the use of digital media.
- Practical objective: Developing guidelines and recommendations for speech therapists on remote speech therapy.

In my research, the following main research problem was set:

How do speech therapists perceive the possibilities of using online speech therapy?

I also formulated the following specific problems:

1. How often do speech therapists conduct or have performed remote speech therapy?
2. Do speech therapists decide to conduct speech therapy remotely and for what reasons?
3. Do speech therapists give up remote speech therapy, and for what reasons?
4. What media do speech therapists use during remote speech therapy?
5. Do and if so, what difficulties do speech therapists notice in remote speech therapy?
6. Is there and if so, what are the benefits, according to speech therapists, of remote speech therapy?
7. Does the type of speech defect/speech disorder affect the decision to start online therapy, and if so, to what extent?

8. What speech defects/disorders do patients undergoing remote speech therapy have?

9. How do speech therapists evaluate the experience of remote speech therapy during the COVID-19 pandemic?

## **Results**

Remote speech therapy was conducted mainly during the COVID-19 pandemic. Currently, it is run by a few speech therapists, only 8 people among the respondents. They decide on this form of therapy only for individual patients or occasionally. It is interesting that up to 19.4% of the respondents did not conduct online therapy during the pandemic. It is important that these are people with little experience and people with more than 16 years of experience. It is puzzling whether these people did not work during the pandemic or performed therapy directly. This is confirmed by the research conducted by Michał Mazur and Anna Karowicz in 2020, indicating that not all speech therapists decided to switch to remote work. Karowicz's research indicated a group of 85% of respondents who undertook remote speech therapy, which is similar to the result obtained in my research – 80.6%.

92% of respondents out of 50 people who have ever conducted remote speech therapy indicate a pandemic and / or war as the reason for taking this form of classes. Given previous research and the negative attitude of speech therapists toward online therapy, this is not a surprising result. This indicates that most specialists choose this form only for reasons beyond the control of specialists and patients. The patient's illness was an argument for 8 respondents and 2 people also considered their illness as a reason. For some people, the reasons for choosing this form of therapy were the imposed work duties, difficulties with the patient's travel, interviewing the parent, supplementing the therapy in the office, and an additional source of income. Only six people decided to undergo online therapy due to the patient's departure abroad. This is one of the most frequently mentioned arguments for the activity of remote therapies, which was mentioned on websites and articles prior to the pandemic. The study was probably carried out in a group in which this experience was not so frequent or the departing patients changed speech therapists. The patient's illness was the reason for remote therapy for eight speech therapists. This allows for the continuity of speech therapy with safety, which can keep the patient and their parents/carers motivated and engaged.

26 respondents resigned from remote speech therapy due to the type of speech defect. This is related to the specificity of a given disorder and the methods used to eliminate them. However, it should be noted that a speech

impediment is the reason for leaving remote therapy for 52% of respondents who have ever completed this form. 19 people indicated poor cooperation with parents during classes. As I mentioned in my work, the parent/guardian is an important participant in therapy, especially in the online form. In this case, the speech therapist must support activities that are only possible in direct or hindered by the quality of the equipment. This is an important aspect, because the difficult access to equipment and the Internet was the reason why 7 people resigned from remote speech therapy. The respondents also mentioned the end of the pandemic and the return to stationary education. For speech therapists, limitations related to remote therapy were also important, eg, the inability to use speech therapy massage. This is a significant limitation of this form of interaction, because some of the methods used in speech therapy assume direct contact with the patient. Some of the activities can be performed by a parent or guardian, but they may have a significant problem with their application. According to patient No. 7: "In my opinion, nothing can replace individual contact with the patient, sometimes this is the only way I can lie down, how to do exercises, palpate the type of problem, flaccidity, other problems with the speech apparatus." The sentence of respondent No. 11 is also interesting: "Remote "speech therapy" is only a necessity during a pandemic or in exceptional situations of contact restrictions. Therapists should be aware of the negative consequences of excessive use of technology in the child's development. This sentence contradicts the research that indicates the need for digital education, also during specialist classes. However, this opinion may be due to the speech therapist's low digital skills or lack of awareness of the importance of teaching children to use these tools. Subject 16 stated: 'I don't recognise remote therapy. The basis of therapy is live contact with the patient. This shows a very negative attitude towards remote therapy, the existence of which cannot be denied. At the same time, it should be noted that although direct contact may be necessary, especially in the case of some working methods, it is not the basis of speech therapy.

During remote speech therapy, 39 people use or have used video meeting tools. In their work, 36 speech therapists used email and 29 made phone calls. 26 respondents used mobile or Internet applications. Individuals also used the blog and Messenger. It follows that the same media are used in remote speech therapy as in the case of education and remote work.

85.5% of the respondents stated that difficulties in remote speech therapy may result from limitations in access to equipment and 77.4% also pointed out poor internet connection. 69% of the respondents also pointed to the limited possibilities of using speech therapy methods. 66% say that contact with a parent/guardian is worse during remote therapy than in direct ther-

apy, and half of the respondents say that such cooperation is more difficult. 74% of the respondents cite lower patient participation and 64.5% to reduced involvement of the speech therapist during remote therapy than in direct contact. Additionally, 64.5% of the respondents claim that patients are less bold during online meetings. 43.5% of the respondents claim that patients are less motivated than during stationary therapy, and 33.9% note reduced motivation from the speech therapist. In addition, 33.9% of the respondents claim that there are too few available materials that can be used in online therapy. 45% of the respondents believe that remote therapy allows for the continuation of therapy after the patient moves. Half of the respondents say that remote therapy saves time to commute and 51% say that it eliminates the costs associated with travelling to therapy. When analysing these results, it can be seen that most of the respondents see the negative aspects of remote therapy. Only a few aspects seem to be in favour of online therapy. This may be due to both the negative attitude towards this form of work and the experience of working with patients whose cases were not suitable for conducting such interactions.

According to 56.5% of the respondents, dyslalia is a speech impediment that lends itself to online therapy. It is worth recalling Joanna Jatkowska's research, which indicates a higher effectiveness of remote interactions among children with dyslalia than with other defects or disorders. 38.7% of the respondents indicated speech fluency disorders. This may be due to the possibility of conducting remote activities, for example, breathing exercises, which are often used in the therapy of this disorder. 12 people believe that aphasia is also suitable, 10 respondents indicated delayed speech development, and 7 people pointed to selective mutism. Individuals indicated other speech defects or speech disorders suitable for remote therapy. 11 respondents stated that no speech defect or disorder is suitable for remote management. It is interesting that 3 people indicated that the type of defect or disorder does not matter to them and that they accept everyone for remote therapy. A comparison of these statements shows a large diversity of opinions among speech therapists. At the same time, taking into account research on the effectiveness of online therapy, this may indicate bad experiences of specialists or a negative attitude towards deviations from traditional therapy.

The assessment of the experience of remote speech therapy during the COVID-19 pandemic is interesting. As many as 58% of the respondents consider it definitely or rather negative, although 30% of the respondents consider this experience definitely or rather positive. This shows that although most specialists are still negative about remote speech therapy, a large group of respondents see positive aspects of this experience.

## Discussion and recommendation

The results of the research indicate the persistent negative opinions of speech therapists about remote speech therapy. Most of the respondents see mainly the negative sides of this form of work, and single benefits cannot compensate for them. It is also important that the study group did not include people for whom remote therapy is the main form. It is necessary to carry out the second part of the research devoted to examining this professional group.

Remote speech therapy has significant limitations due to the specificity of work and recognised therapeutic methods. Another problem is the lack of education of specialists in the field of online therapy. According to research by Jolanta Gebreselassie, during the COVID-19 pandemic, a significant difficulty was the problem with access to guidelines and guidelines for conducting online therapy. Also, my research indicates little knowledge of therapists, which can also affect negative opinions (Gebreselassie, 2022).

Speech therapists decide to perform remote therapy primarily for reasons beyond their control, such as a pandemic. We cannot predict whether, and if so, when, another threat will appear that will force you to switch to remote mode. For this reason, it is reasonable to educate both those already working in the profession and speech therapy students in this area. The Polish Association of Speech Therapists has created rules for conducting remote speech therapy, but practical advice and tips that would help specialists conduct online classes are also necessary.

As Michał Mazur noted in his research, during the COVID-19 pandemic, speech therapists were suddenly forced to switch to remote mode, for which they were not prepared. Therefore, such negative opinions of speech therapists are worrying, because in the event of a possible return to remote work, their attitude will not change. Therefore, it is necessary to inform this professional group that remote speech therapy can at least partially replace or support traditional therapy. It is important to take action, such as speeches at conferences, publications, that would help change the opinion of speech therapists about online therapy (Mazur, 2021).

It is not about forcing or persuading speech therapists to change the form of work, but about becoming better acquainted with the possibilities and methods of remote work. This would be a preventive measure, preparing specialists for the possible next forced remote work. Due to proper preparation and a less negative attitude, there is a better chance of conducting effective therapy in a calm atmosphere.

## **Conclusions**

In conclusion, the research indicates that the negative opinions of speech therapists about online therapy are still persistent. It is necessary to take action to improve remote speech therapy, in the opinion of therapists. It is also important to develop and disseminate practical tips on how to conduct online speech therapy classes. It is also worth considering education in this area during speech therapy studies. The experience of the COVID-19 pandemic and the problems associated with the transition to remote mode should be an argument to prepare for a similar circumstance. It should be remembered that it is not about forcing speech therapists to change their working mode, but rather about better preparation for the use of remote therapy in their practise.

### **Author contributions**

The author confirms being the sole contributor of this work.

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