DOI: 10.22122/jrrs.v16i.3529 Published by Vesnu Publications

This is an open-access article distributed under the terms of the Creative Commons Attribution-NonCommercial 4.0 Unported License, which permits unrestricted use, distribution, and reproduction in any medium, provided the original work is properly cited.

Exploring the Experiences of Parents of Children with Cerebral Palsy about Therapists' Rehabilitation Services in Ahvaz, Iran: A Qualitative Study

Fatemeh Saber-Jahromi[1], Mohammad Khayatzadeh-Mahani[2], Roya Ghasemzadeh[3], Shadab Shahali[4]

Original Article

Abstract

Introduction: Dealing with a child with cerebral palsy (CP) is often accompanied by numerous limitations and troublesome parenting and long-term rehabilitation services may impose high pressure on parents. The therapists should understand the needs and expectations of parents to provide appropriate services to them. So, this study is conducted aiming to explore the experiences of parents of children with CP about therapists' rehabilitation services in Ahvaz, Iran.

Materials and Methods: In this qualitative study, 10 parents of children with CP were selected through purposive sampling. Semi-structured interviews were used for data gathering. Interview questions were about the experience of parents about therapists' rehabilitation services. The data were analyzed by qualitative content analysis through constant comparative method.

Results: The data analysis led to a category named "characteristics of therapists providing rehabilitation services" that was divided into three subcategories including "clinical competency, adherence to professional duties, and adherence to professional ethics". Clinical competency consisted of being scientifically certified, being experienced in the field, and masculine attitude and adherence to professional duties included parent training, understanding the parents' conditions, and attention to parents' therapeutic priorities. Finally, the adherence to professional ethics was comprised of consideration of ethical issues regarding children and parents.

Conclusion: Parents of children with CP stressed the need for therapists with clinical competencies, perform professional duties, and adhere to professional ethics. Therefore, therapists could provide better services through applying and implementing these principles.

Keywords: Cerebral palsy; Parents; Therapist; Rehabilitation

Citation: Saber-Jahromi F, Khayatzadeh-Mahani M, Ghasemzadeh R, Shahali S. **Exploring the Experiences of Parents of Children with Cerebral Palsy about Therapists' Rehabilitation Services in Ahvaz, Iran: A Qualitative Study.** J Res Rehabil Sci 2020; 16: 126-34.

Received: 30.04.2020 Accepted: 05.07.2020 Published: 05.08.2020

Introduction

Cerebral palsy (CP) is a non-progressive abnormality in the developing brain that causes neurological, motor, and postural problems in the affected child (1). This disorder limits the daily life activities and the participation of these children in social activities, in addition to making most of the children with CP need more care than normal children (2). In addition to the overwhelming care duties, the parents also bear the responsibility of a variety of long-term rehabilitation treatments for children with CP (3,4). In order to improve their physical and cognitive condition, these children need extensive rehabilitation services and continuous and long-term training, which requires a high amount of money and time (5).

Parental involvement is essential in the treatment of children; this is because it has been observed that parents' initial attitude about their child's treatment may have positive consequences in participatory therapy and also be effective in treatment outcomes (6). In a family-oriented approach, it is very important to pay attention to the opinions and recommendations of families and clients (7). The family-oriented approach involves listening to the family members

1- MSc Student, Department of Rehabilitation Management, School of Rehabilitation Sciences AND Ahvaz Musculoskeletal Rehabilitation Research Center, Ahvaz Jundishapur University of Medical Sciences, Ahvaz, Iran
2- Assistant Professor, Department Occupational Therapy, School of Rehabilitation Sciences AND Ahvaz Musculoskeletal Rehabilitation Research Center, Ahvaz Jundishapur University of Medical Sciences, Ahvaz, Iran
3- PhD Candidate in Rehabilitation Counseling AND Lecturer, Department of Rehabilitation Management, School of Rehabilitation Sciences AND Ahvaz Musculoskeletal Rehabilitation Research Center, Ahvaz Jundishapur University of Medical Sciences, Ahvaz, Iran
4- Assistant Professor in, Department of Midwifery and Reproductive Health, School of Medical Sciences, Tarbiat Modares University, Tehran, Iran
Corresponding Author: Mohammad Khayatzadeh-Mahani, Email: mahany@ajums.ac.ir

and responding to their priorities and needs, in addition to creating an appropriate interaction between parents and therapists to increase parental involvement in treatment (8). People with CP, as well as their parents, gain different experiences during the treatment period, such as communicating and interacting with various therapists and different specialties, receiving various treatment programs, and visiting different clinics and treatment centers (9). Therapists need treatment decisions in order to provide appropriate services. This decision is influenced by various factors such as the therapist's expertise and the experience of the service recipient (5). Therefore, it is necessary to pay attention to the experiences of the service recipients.

The basis of providing rehabilitation services on the one hand depends on the correct knowledge of the treatment team of the expectations and needs of these children and their families, and on the other hand, on a thorough and comprehensive examination of the individual by specialists (10). Therefore, rehabilitation service providers may not be able to provide the desired services due to a misunderstanding of the needs of children and their families, and this leads to a waste of resources, time, and manpower (11). Poor understanding and knowledge is a common barrier among service providers, children, and their families that is faced by the rehabilitation system and this barrier can lead to delayed referral and non-follow-up of the rehabilitation services. Failure to continue the rehabilitation services may lead to unpleasant consequences for the family and the child with CP and impose costs on the health system (12).

Given the referral-oriented approach in most rehabilitation services, including occupational therapy, it is very important to understand the opinions of clients to design and target treatment programs using their opinions. If the therapist is not aware of the experience and understanding of his clients in relation to the services he provides, he may not choose the right treatment goal and may not be able to obtain the satisfaction of his clients. In other words, in the client-oriented approach, a correct understanding of the experiences of the parents of these children of the rehabilitation services provided by the therapists can lead to a review of the goals and treatment plans of these children by identifying the views and perspectives of the parents regarding the rehabilitation services. Therefore, the present qualitative study is conducted to explain the experiences of parents of children with CP about rehabilitation services for therapists in Ahvaz, Iran.

Materials and Methods

This qualitative study was conducted in 2019-2020 and its results were obtained using the conventional content analysis and continuous comparison of data. In order to achieve the study goal, the participants who met the inclusion and exclusion criteria were selected using the purposive sampling method with maximum diversity and sampling was continued until data saturation. The inclusion criteria included the parents who had the most communication with the rehabilitation services of the child or adolescent with CP (1-18 years old), at least six months of experience in receiving continuous rehabilitation services, appropriate expressive power (one of the inclusion criteria in qualitative studies is the expressive power to convey rich and profound information during an interview. Thus, the purposive sampling method was applied and individuals with good knowledge and experience were identified and interviewed. These individuals did not necessarily have a high academic degree and could be related to any socio-economic strata of society who could express things well) to convey the necessary information, and were living in Ahvaz. Lack of willingness to participate in the study and inability to understand the nature of the questions were also considered as the exclusion criteria.

Data were collected after obtaining the approval of the ethics committee of Ahvaz Jundishapur University of Medical Sciences. After explaining the objectives of the project to the participants and receiving their informed written consent, demographic information including parent and child age, parent and child gender, parent education, parents' income, marital status, duration of rehabilitation services, and type of services received were obtained. Then, semi-structured interviews were used to collect qualitative data. All interviews were recorded by a digital recorder. The interviews were conducted one or more times according to environmental and temporal factors, the interviewee's willingness to continue the interview, and the full presentation of ideas. The interviews were conducted considering the comfort of the parents in different places, including the rehabilitation clinic (7 cases) or their home (3 cases) and ranged from 30 to 70 minutes.

The interview began with a general question such as "How was your experience as a therapist and rehabilitation service provider?" or "Tell me about a day you go to the clinic," and they were allowed to freely share their experiences. The interview was deepened with exploratory questions such as "What do you mean?, Why and how?" or "Explain it to me by giving an example." Immediately after each interview, the entire audio file was typed. In the present study, in addition to interviews, field writing was also used as a data collection method, which was used during interviews with participants and based on observations, in cases such as non-verbal behaviors that needed to be recorded. After each interview, its

content was completed with the field notes.

The content analysis steps adopted by Graneheim and Lundman (13) were used to analyze the data; in such a way that after each interview, the audio file was carefully implemented and typed and the script of the interviews was reviewed several times to gain a general understanding of its content and to avoid drowning in the data. Then, the semantic units were extracted and based on the summary of these semantic units and with a description close to the interview scripts, the initial codes were formed. In the next step, after preparing a list of codes and reviewing them semantically, taking into account the similarities and differences in meaning, similar codes were placed in a more abstract level by reducing and inductive methods, and by continuous comparison, acceptable subclasses and classes were obtained.

The Lincoln et al.'s criteria including validity, verifiability, and transferability were used to ensure the accuracy of the findings (14). Spending enough time to collect data and review them frequently, sampling with maximum diversity (selection of participants from different public and private centers, different demographic situations, and different experiences of use of services), increasing the number of interviews and feedback to participants, and confirmation of the categories obtained from the text of the interview by the participants were performed in order to enhance validity. Given the purposive sampling method, the subjects were selected according to the therapists and with the knowledge they had of the mothers (good expressive power). The next subject was selected according to the first subject and the therapist, and similarly, sampling was performed to ensure data saturation. In order to verify the data, we clarified our ideas and assumptions in advance in order to prevent their impact on the data analysis and bias. Moreover, the data were analyzed and reviewed by two faculty members familiar with qualitative studies, and thus, the verifiability of the data was also considered. Although the findings of qualitative studies are not generalizable (13), the present study was compared with other studies and similar results obtained from the present study with other studies showed the data transferability.

In order to comply with ethical considerations, with the approval of the ethics committee of Ahvaz Jundishapur University of Medical Sciences and obtaining the ethics code IR.AJUMS.REC.1397.486, a permit was from obtained first the officials of the medical and rehabilitation centers to implement the project. Besides, sufficient explanations about the importance and objectives of the study, confidentiality of information, permission to use audio recordings during the interview, not being forced or threatened to participate in the study, and the right to withdraw at any stage of the study were given to each eligible participant. Moreover, the participants completed and signed an informed consent form to participate in the study.

Results

In this study, 10 semi-structured interviews were conducted with 9 mothers and 1 father of children with CP with a mean age of 32.5 years (saturation was provided with 10 samples and no new code was added and sampling was completed by repeating the codes). The demographic characteristics of the participants are presented in table 1. Accordingly, half of the participants had a university degree and the other half had a degree below diploma. The children were between 3 and 12 years old and most of them were boys. The participants with the age range of 2 and 11 used a variety of rehabilitation services, including occupational therapy. In addition to the occupational therapy, some of them used other services, including technical orthopedics, physiotherapy, speech therapy and audiology, respectively.

The results of data analysis led to the formation of 131 primary codes, 8 subcategories, 3 main subcategories, and a category called "characteristics of therapists providing rehabilitation services", which is presented in table 2. Based on the results, it was found that parents had the highest contact with the therapists as providers of the rehabilitation services and the way of communication and activity of these individuals had a direct impact on parents' views towards them, which led to the formation of the *characteristics of therapists providing rehabilitation services*. This category included three sub-categories: "clinical competency, adherence to professional duties, and adherence to professional ethics".

Clinical capability: According to the parents participating in the present study, rehabilitation therapists must have a set of necessary characteristics and be sufficiently qualified to fulfill the profession. This main subcategory was classified into three subcategories: "having a relevant degree, having sufficient experience, and a masculine outlook".

Having a relevant degree: In this case, the parents mentioned the need for the therapist to graduate and have a degree related to that field.

On the need for the therapist not to be a student, one of the participants declared: "I used to take my child to an occupational therapy center. The person in charge there was very experienced and skillful, but he/she only had his/her students to visit the children." "A student who has not yet finished his studies is not able to work and has no experience of working."

Another parent said of some centers using unskilled technicians: "A woman came from a center to see my child. She was a technician who could only do what she was told and could not make the child able to walk;" "Because it wasn't her job, it wasn't related to her degree, she had a bachelor's degree in another field."

Table 1. Demographic characteristics of study participants

Subject	Parent gender/Marital status	Parent age (year)	Parent's degree	Parent's income (Million tomans)	Child gender	Number of children/Birth order	Child age (year)	Type of services received	Duration of service received (year)
1	Female/Married	33	Below diploma	4	Boy	2/1	7	Occupational therapy, physiotherapy, speech therapy, technical orthopedics	4
2	Female/Married	38	Masters	7	Boy	4/2	3/5	Occupational therapy, technical orthopedics	2
3	Female/Married	38	Bachelors	5	Girl	3/2	5	Occupational therapy, technical orthopedics	3/5
4	Female/Married	40	Bachelors	4	Boy		4/5	Occupational therapy, technical orthopedics, physiotherapy	4
5	Female/Married	38	Below diploma	3	Girl	3/1	3	Occupational therapy, physiotherapy, speech therapy	2/5
6	Female/Married	30	Below diploma	3	Boy	2/1	4	Occupational therapy, technical orthopedics	3/5
7	Female/Married	28	Elementary	Less than 2	Boy	1/1	9	Occupational therapy, physiotherapy, speech therapy, technical orthopedics, audiology	8
8	Female/Married	38	Below diploma	Less than 2	Boy	1/1	12	Occupational therapy, physiotherapy, speech therapy, technical orthopedics	11
9	Female/Married	30	Bachelors	5	Boy	2/2	3	Occupational therapy, technical orthopedics	2
10	Male/Married	40	Bachelors	3	Boy	2/2	3/5	Occupational therapy, technical orthopedics	2

Table 2. Category, main subcategories, and secondary subcategories of study findings

Category	Main subcategory	Secondary subcategory
Characteristics of therapists providing rehabilitation services	Clinical competency	Having a relevant degree
		Having experience
		Necessity of the therapist's physical ability
	Adherence to professional duties	Parents' education and guidance
		Understanding parents' circumstances
		Paying attention to parents' treatment priorities
		Coordination and reference to other specialists
	Adherence to professional ethics	Observance of ethics towards the child
		Observance of ethics towards parents

Another parent said: "The therapist of the center I used to take my kid who was an occupational therapist did not work himself, and had taught a few common people who had no qualifications at all and had learned experimentally."

Having experience: Based on the findings of the study, parents pointed to the effect of the therapist's experience on how to treat the child, manage the treatment session, and proceed the treatment program. The parents considered the therapist's work history as a component of the experience; in a way that they regarded the more experienced therapists to be more experienced. Regarding the necessity of being experienced, one of the parents said: "I went to an occupational therapist, I had heard she was a good and fit woman ... she was about 50 years old, she had several years of work experience and she seemed very experienced."

Another parent, on the subject of the therapist's experience, noted the importance of the orthopedic technician's experience in making medical shoes: "They have made a pair of shoes which are not cheap at all, his occupational therapist says they are useless. The kid's feet are crooked, but if the technical orthopedic had the experience, he would make a good one and it would really work."

Need for therapist physical fitness: In this subcategory, some parents pointed to the need for minimal physical strength for occupational therapists and the greater physical ability of male occupational therapists to exercise. One of the participants said, "In the beginning, the therapist only did sit-down work and then worked with the kid mentally. Of course it was my daughter; Because the girls' bodies are weak and they don't have much power, I did not give them a hard time, but if a man with more power worked, I was sure that it would work; Because she's growing up, it's rare and difficult to get a result."

Adherence to professional duties

Parents in this subcategory considered therapists responsible for performing a range of professional tasks. This sub-category was divided into four secondary sub-categories: "Parent education and guidance, understanding of parents' conditions, attention to parents' treatment priorities, and coordination and referral to other specialists."

Parent education and guidance: In this subcategory, parent education and guidance was considered as one of the most important tasks of the therapists' profession from the parents' point of view. One of the issues regarding the parent education was on how to prepare assistive devices. Given the importance of choosing appropriate devices, in some cases, therapists guided parents in providing the appropriate assistive devices. In this case, one of the parents shared his/her experience: "For example, if I want to buy something for my baby, about his aids such as a walker, the occupational therapist orders himself. Well, they themselves know better where to order it, and where a better one can be found, they say such a thing is good for your child, they give us a lot of guidance."

Another finding of this subcategory was the importance of parents' awareness of the prognosis of the child's problem. One parent said: "Our occupational therapist told us that the treatment was too long; with a week, two weeks, two months, three months, or even a year, I don't think it could work. It needs persistence, it takes willpower to really stand up and go on until the end ... Well, these words of the therapist were very important, because we didn't know anything about occupational therapy at all, and if he didn't say that, we thought we had to reap the rewards quickly."

Due to the parents' participation in the child's treatment, explaining and teaching rehabilitation services to the family, how to give practices properly at home, teaching exercises specific to the client, and informing about the wrong consequences of training the child were very important. In this regard, one of the participants said: "His occupational therapist tells him to do that work at home, for example, and he also teaches us." "He tells us how to do it so that, God forbid, he does not hurt his feet."

Understanding the parents' situation: Parents expressed understanding of the situation in the form of proper communication with the family and the child. One of the parents stated in this regard: "Thank God, Our occupational therapists understand my condition and are very kind to me, for example." "I think the first thing that a therapist learns at university is psychology, communication, the therapist because he/she has to be with a family for a very long time, for example a few years ... he/she has to behave in a way that he/she fully understands the family."

Attention to parents' therapeutic priorities: Under this subcategory, parents expected their therapeutic demands and priorities be addressed by therapists. One participant said: "For example, I tell the therapist to work on my kid's hands and neck, but he works on all over his/her body... for example, he works on his/her legs and on back. He tells me that these parts should be worked on as well. My priority is his/her sitting down so that he/she can eat on his own and do his/her personal stuff."

Coordination and referral to other specialists: In this subcategory, the importance of teamwork and coordination between different specialists and therapists was mentioned. "The therapist told me that you should make an aid for your child and referred me to a technical orthopedist who would guide me and make it for us," said one parent about the need to refer other therapists.

Another parent spoke about the importance of performing physiotherapy and speech therapy alongside occupational therapy: "The occupational therapist told me that in order for the kid to walk, he/she had to go through a few sessions of physiotherapy and we had to work all together to make him/her able to walk. He also said that you should start his/her speech so that it is not too late ... I think when these things are done together,

we will get more results."

Adherence to professional ethics

According to parents, therapists must adhere to a set of ethical principles. This main subcategory was classified into two secondary subcategories: "Ethics towards children and ethics towards parents".

Observance of ethics towards the child: In this sub-category, according to the experience of most of the participants, especially those who had been in contact with therapists for many years, the therapist's calmness towards the child and lack of aggression were mentioned. "The therapist should not yell at the child, he/she should be normal," said one parent. "Now I am satisfied with my child's therapist, because I have not seen anger nor screaming of him...".

The parents stated that therapists should be tolerant enough to work with the child, take into account the child's emotional state, and pay attention to the their needs. In this regard, one of the parents stated: "For example, when the child is crying, some people may hit the child ... Anyway, he/she is a child, he/she cannot stand it, he/she has exercised, his/her body gets tired, so he/she may cry or fuss," "The therapist must be patient, calm, and control his temper, it must take some time for the child to come to terms with it."

Observance of ethics towards the parents: Another sub-category in relation to professional ethics was ethics towards parents. Observance of ethics towards parents was expressed by the therapist inattention to answering family questions, the need for the therapist to deal appropriately with parents, the aimlessness of treatment and careless rejection of clients, appropriate clothing of the therapist, abuse of clients' ignorance, and inattention to confidentiality. Regarding the therapists lack of working properly and their abuse of parents' ignorance, one of the parents pointed out: "Sometimes they do something on their own, for example, they say with themselves we got our money and let everything happen ... for example, this mother is not aware of what we want to do and so on", we were doing something in front of her, as if he was pulling the wool over someone's eyes, they were somehow shirking."

"For example, once I went somewhere for my child, the therapist screamed at me," said another parent about the lack of response from some therapists and their mistreatment of the parents. I cried then. I threw the file away and stormed out. I had not gone there for free, I had paid for it. I don't have the knowledge to do it myself, it's your duty to answer. Well, you swore against God, when you got your degree, you made a covenant with God that you, who are getting your degree, want to be at the disposal of your people."

Discussion

The participants in the present study identified characteristics such as clinical competency, adherence to professional duties, and professional ethics for therapists. Regarding the clinical competency, they pointed out cases that are close to clinical competency from a professional point of view. There is a direct relationship between the level of clinical competence and the level of skills utilization; in a way, the more competent a person is, the more likely he or she is to use the skills in the clinic (15). Therapists must have undergone specific courses of therapy and accurately articulate their abilities, training, experience, degrees, or specializations, and perform their duties only on the basis of the specialization and skills learned (16). Having a degree is the first step towards achieving clinical competence, and then the therapist must increase his or her clinical skills by spending time, practice, and gaining experience and knowledge.

Some parents considered the work experience and duration of clinical activity to reflect an experienced therapist. In their study, Rassafiani et al. stated that effective clinical experience results from work experience and seeing a large number of patients, reputation and credibility, obtaining the necessary certificates, success at work, and appropriate clinical decision-making and reasoning (1) and is not achieved only from work experience and activity duration; Perhaps there are cases that, despite a long history of work, have lower clinical experience and reasoning (17). The therapist's clinical ability was important in that some therapists used technicians and students to provide treatment. Some parents pointed to the inefficiency and unstable effect of their treatment. At the beginning of the clinic visit, parents are not able to diagnose a skillful and competent therapist due to their inexperience and ignorance of rehabilitation services. Moreover, since the process of motor recovery in children with CP is slow and over a long period of time, they are likely to spend a lot of time with an inexperienced therapist or non-therapist, and this will waste the money, energy, and golden opportunity for the child's recovery.

Some parents had a masculine view of therapists working with children with CP, attributing it to the greater physical strength of men in applying the techniques. It seems that in a field such as occupational therapy, where the prevalence of admission and graduation is dominated by women (18), this view can be problematic and challenge the provision of services. Some male therapists seem to reinforce this view in families to make their own work more visible, and some female therapists encourage this belief to relieve work stress (19). Use of exercises and active involvement of the child in the treatment program, application of new approaches to motor control and neurological rehabilitation, proper use of clinical equipment and devices, getting help from parents in the treatment session, and using ergonomic principles and energy conservation minimize the need to use high force and pressure, followed by harm to the therapist (20), and it is necessary to gradually reduce this misconception with the right information and awareness to pave the way for female therapists to work in the physical realm of children.

Regarding the need for parents' education and guidance, the parents mentioned the need for parents'

guidance in providing assistive devices, knowing the prognosis of the child's problem, and teaching exercises to do at home. Proper training of the therapist to parents is one of the most important tasks of the therapist in a family-centered approach (8). Because parents have the most involvement in their child's treatment and the basis of children's rehabilitation work is defined based on parental activities at home (6,7), these trainings, in addition to exercises, should include the correct way of caring and handling the child and how to use the aids (21). Participants in the present study did not mention handling training, which may be due to the ignorance of their therapists of this issue. To care for their child, parents need information and training in a variety of areas, including how to move, bathe, feed, dress, and position the children (22). Teaching parents can be performed in a variety of ways, such as hands-on training by an expert, training and transfer of experience by other parents, training through a workshop, video presentation, and an educational booklet. There is evidence that educating parents of children with CP is effective on parents' knowledge and use of those educations (2). There is some evidence suggesting that the level of knowledge and awareness of most caregivers about care methods are weak and moderate (22). Therefore, it is necessary for therapists to pay special attention to the teaching of child handling and care so that the quality of life (QOL) of parents is not harmed by the process of heavy care of these children.

Assistive devices are very important in improving the performance of children with CP (23) and the provision of appropriate assistive devices is an important part of the duties of a therapist, including occupational therapist and physiotherapist. If parents are not well guided in this regard and the appropriate means are not provided, it may lead to non-use and, consequently, lack of therapeutic effect of the device (24).

Another finding of the present study was the need to understand family conditions, which was mentioned by the parents. This finding indicates empathy and sympathy, which is one of the main tasks of all rehabilitation therapists towards clients (16). In occupational therapy, empathy is a part of the therapeutic use of self that allows occupational therapists to strengthen and manage their therapeutic relationship with clients using empathy and client-centered approaches (25). By understanding the conditions of clients and companions, therapists can help solve various problems of clients to provide the ground for more active participation and its continuation in the treatment program.

On the other hand, the lack of attention to the treatment priorities of clients and parents was raised by the participants. This finding is consistent with the client-oriented issue. Emphasis on client-centeredness and consideration of the views of the client and companions is very important in evaluation, goal setting, planning, and treatment intervention (26). One of the tasks of therapists in rehabilitating children with CP is to involve the child and his family in the treatment process (27). This involvement leads to more cooperation of the child in treatment sessions and better achievement of treatment results, which is in line with client-centered and family-centered approaches (6). On the other hand, one of the most important aspects of considering the satisfaction of the patient and his companions is paying attention to his wishes and points of view in a client-centered approach. Therefore, it is appropriate for therapists to pay attention to the demands and expectations of parents according to the client-centered approach in order to increase their satisfaction with the treatment.

Another finding related to the professional duties of therapists was the expectation of team coordination and referral to other specialists. The parents' statements indicate that some therapists refused referrals due to lack of knowledge of other colleagues or personal interests. The results of the study by Jahanbin et al. indicated that teamwork helps to provide high quality rehabilitation services (28); however, teamwork is rarely performed in Iran and there is rarely a team that supports the patient, and many doctors and therapists have not received adequate and formal training on teamwork and are generally negative about teamwork. Additionally, in the study of Stratil et al., cooperation among rehabilitation specialists was reported weak (29), which was consistent with the findings of the present study on poor cooperation among rehabilitation staff.

The last category of the present study was adherence to the principles of professional ethics, which included observing ethics towards children and parents. The ethical codes of each profession are the general principles used to promote and maintain the high standards of work in each profession, which therapists are required to observe in clinical settings in order to protect the rights of clients in accordance with the Patients' Rights Charter (16). In their study, Saloojee et al. concluded that key components of appropriate rehabilitation services include respectful care and treatment, and that rehabilitation services that are accompanied by inappropriate behaviors can have a negative impact on the implementation of rehabilitation services (12). Aspects of professional ethics include altruism, respect for clients, honesty and integrity, justice, empathy, benevolence, competence, confidentiality, and giving authority to clients (30). The experience of parents in the present study showed that some of these aspects are not well observed by therapists. The results of a study by Vahidi et al. revealed that some occupational therapists commit immoral aspects such as neglecting the patient's interests, not paying attention to communication principles, emphasizing financial benefit, and deviating from treatment (31). In the study by Kalantari et al., cases such as organizational factors such as work stress, insufficient training, low supervision and work

and management space, therapist-related factors such as personality traits, concerns, and low clinical competence, client-related factors such as low awareness and beliefs, and social factors such as weak support systems and disregard for moral values in society were cited as factors in the immoral behaviors of occupational therapists in the field of children in Iran (32). Therefore, in order to improve the ethical performance of therapists in clinical settings, it is necessary that all of the above items be considered by policy makers, managers, and therapists.

Limitations

In the present study, the experience of parents of children with CP in relation to therapists' rehabilitation services was examined; while the real recipients of the rehabilitation services were children who could not be interviewed and the interviewed were conducted with the parents as their guardians. Due to the absence of fathers in the treatment sessions, lack of access to them, their low awareness of the child's condition, and the child's problems, or their unwillingness to be interviewed, the presence of fathers was low and was limited to only one person. Given the cultural circumstances, mothers did not enter the study without their husbands' permission, and some mothers initially consented and then refused to give an interview, which made it difficult and limited to find a new participant.

The present study included therapists in various fields; while the requirements for dealing with and working with a child with CP differ in different areas of rehabilitation. All study participants benefited from occupational therapy and most of them were related to occupational therapy and had limited experience with other services, and for this reason, the study focused mainly on the occupational therapy services that are consistent with the field reality in these children.

The main goal was to find out parents' understanding and experience of rehabilitation services provided by therapists and their expectations of the therapists were determined. Parents' knowledge, insight, and awareness are very important in this regard, which will be discussed elsewhere.

On the other hand, half of the participants had university education and half had less than a diploma (including fifth grade). In qualitative studies, for purposive sampling, samples must be able to conduct interviews and expressions, otherwise the interview will lack the content and quality that can be cited. For this reason, qualitative research, despite the greater depth of information than quantitative methods, has low generalizability and the experiences of the samples cannot be generalized to all individuals with the same problem.

Recommendations

It is suggested that a qualitative study be conducted on the experiences of rehabilitation service providers.

Conclusion

Having minimum clinical competencies creates a patient's sense of trust in the therapy and the therapist. Therapists can provide more desirable services if they perform their professional duties by teamwork and considering ethical principles, client-orientation, and understanding of client conditions. The managers of the centers are advised to periodically consult the clients in order to increase their satisfaction and to improve the quality of the services.

Acknowledgments

We would like to appreciate all the parents who participated in the study, as well as the officials and experts of the rehabilitation centers in Ahvaz, for their help in carrying out this project.

Authors' Contribution

Fatemeh Saber-Jahromi: study design and ideation, providing study equipment and samples, data collection, analysis and interpretation of results, manuscript preparation, specialized evaluation of manuscript in terms of scientific concepts, approval of the final manuscript to be sent to the journal office, responsibility for maintaining the integrity of the study process from the beginning to publishing, and responding to referees' comments; Mohammad Khayatzadeh-Mahani: study design and ideation, attracting financial resources for the study, study support, executive, and scientific services, providing study equipment and samples, analysis and interpretation of results, manuscript preparation, specialized evaluation of manuscript in terms of scientific concepts, approval of the final manuscript to be sent to the journal office, responsibility for maintaining the integrity of the study process from the beginning to publishing, and responding to referees' comments; Roya Ghasemzadeh: analysis and interpretation of results, manuscript preparation, specialized evaluation of manuscript in terms of scientific concepts, approval of the final manuscript to be sent to the journal office, responsibility for maintaining the integrity of the study process from the beginning to publishing, and responding to referees' comments; Shadab Shahali: analysis and interpretation of results, manuscript preparation, specialized evaluation of manuscript in terms of scientific concepts, approval of the final manuscript to be sent to the journal office, responsibility for maintaining the integrity of the study process from the beginning to publishing, and responding to referees' comments.

Funding

The present study was extracted from an MSc thesis of rehabilitation management with design code PHT-9718 and ethics code IR.AJUMS.REC.1397.486, approved by Ahvaz Jundishapur University of Medical Sciences. All funds for this project have been provided by the Ahvaz Musculoskeletal

Rehabilitation Research Center, Ahvaz Jundishapur University of Medical Sciences.

Conflict of Interest

The authors have no conflict of interest regarding this project.

References

1. Rassafiani M, Ziviani J, Rodger S. Perceived level of disability: factors influencing therapists' judgment for clients with cerebral palsy. Hong Kong J Occup 2008; 18(1): 12-9.
2. Jalili N, Goodarzy M, Rassafiani M, Farzi M. Effectiveness of a parent training program on knowledge of mothers regarding the proper care of children with cerebral palsy. J Res Rehabil Sci 201; 8(3): 502-10. [In Persian].
3. Alaee N, Mohammadi-Shahboulaghi F, Khankeh H, Mohammadkhan Kermanshahi S. Effective factors on caring role of parents of children with cerebral palsy. Avicenna J Nurs Midwifery Care 2019; 27(1): 55-63. [In Persian].
4. Mokhtari M, Abootorabi F. Lived experiences of mothers of children with cerebral palsy in Iran: A phenomenological study. Child Youth Serv 2019; 40(3): 224-44.
5. Babaei M, Rassafiani M, Ghahari S, Hosseini M, Fatourechi S. Rehabilitation experiences of people with cerebral palsy: A literature review. J Res Rehabil Sci 2014; 9(3): 1309-22. [In Persian].
6. Dalvand H, Rassafiani M, Bagheri H. Family centered approach: A literature the review. J Mod Rehabil 2014; 8(1): 1-9. [In Persian].
7. King G, Chiarello L. Family-centered care for children with cerebral palsy: Conceptual and practical considerations to advance care and practice. J Child Neurol 2014; 29(8): 1046-54.
8. Mohamadian F, Sourtiji H, Hosseini SMS. A new approach in rehabilitation of children with cerebral palsy. J Res Rehabil Sci 2011; 7(5 Suppl): 758-65. [In Persian.
9. Rosenbaum P. Cerebral palsy: What parents and doctors want to know. BMJ 2003; 326(7396): 970-4.
10. Kruijsen-Terpstra AJ, Ketelaar M, Boeije H, Jongmans MJ, Gorter JW, Verheijden J, et al. Parents' experiences with physical and occupational therapy for their young child with cerebral palsy: a mixed studies review. Child Care Health Dev 2014; 40(6): 787-96.
11. Kruijsen-Terpstra AJ, Verschuren O, Ketelaar M, Riedijk L, Gorter JW, Jongmans MJ, et al. Parents' experiences and needs regarding physical and occupational therapy for their young children with cerebral palsy. Res Dev Disabil 2016; 53-54: 314-22.
12. Saloojee GM, Rosenbaum P, Stewart A. Using caregivers' perceptions of rehabilitation services for children with cerebral palsy at public sector hospitals to identify the components of an appropriate service. S Afr J Physiother 2011; 67.
13. Graneheim UH, Lundman B. Qualitative content analysis in nursing research: concepts, procedures and measures to achieve trustworthiness. Nurse Educ Today 2004; 24(2): 105-12.
14. Lincoln YS, Lynham SA, Guba EG. Paradigmatic controversies, contradictions, and emerging confluences, revisited. In: Denzin NK, Lincoln YS, editors. The Sage handbook of qualitative research. 4thed. Thousand Oaks, CA: Sage; 2011. p. 97-128.
15. Adib Hajbaghery M, Eshraghi Arani N. assessing nurses' clinical competence from their own viewpoint and the viewpoint of head nurses: A descriptive study. Iran J Nurs 2018; 31(111): 52-64. [In Persian].
16. Occupational Therapy Code of Ethics and Ethics Standards (2010). Am J Occup Ther 2010; 64(6-Suppl): S17-S26.
17. Rassafiani M. Is length of experience an appropriate criterion to identify level of expertise? Scand J Occup Ther 2009; 16(4): 247-56.
18. Maxim AJM, Rice MS. Men in occupational therapy: Issues, factors, and perceptions. Am J Occup Ther 2018; 72(1): 7201205050p1-7.
19. Khaytzadeh-Mahani M, Hassani-Mehraban A, Kamali M, Parvizi S. Identification of attitude and experience of Iranian occupational therapists about occupation based practice, development and validation of its measurement scale: A sequential mixed method [PhD Thesis]. Tehran, Iran: Iran University of Medical Sciences; 2015. [In Persian].
20. Khayyatzadeh-Mahani M, Hassani-Mehraban A, Kamali M, Parvizi S. Declination from occupation based practice: experience of iranian occupational therapists. J Rehab 2015; 16(2): 156-67. [In Persian].
21. Dalvand H, Rassafiani M, Hosseini SA, Khankeh HR, Samadi S. Handling challenges in the children with cerebral palsy: A qualitative content analysis. J Res Rehabil Sci 2014; 9(8): 1267-80. [In Persian].
22. Razavi ZA, Rassafiani M, Sarfaraz Z, Malekpour M, Salehi M. A survey on caregivers' knowledge about special caring for 1-to-5 year-old children with cerebral palsy and their compliance with these practices. J Res Rehabil Sci 2013; 9(4): 618-28. [In Persian].
23. Huang IC, Sugden D, Beveridge S. Assistive devices and cerebral palsy: Factors influencing the use of assistive devices at home by children with cerebral palsy. Child Care Health Dev 2009; 35(1): 130-9.
24. Copley J, Ziviani J. Barriers to the use of assistive technology for children with multiple disabilities. Occup Ther Int 2004; 11(4): 229-43.
25. Taylor RR. The intentional relationship: Occupational therapy and use of self. Philadelphia, PA: F.A. Davis Company; 2020.
26. Cameron D, Craig T, Edwards B, Missiuna C, Schwellnus H, Polatajko HJ. Cognitive Orientation to daily Occupational Performance (CO-OP): A new approach for children with cerebral palsy. Phys Occup Ther Pediatr 2017; 37(2): 183-98.
27. DeGrace BW. Occupation-based and family-centered care: A challenge for current practice. Am J Occup Ther 2003; 57(3): 347-50.
28. Jahanbin P, Abdi K, Khanjani M S, Hosseini M A. Exploring barriers of teamwork in providing rehabilitation services: A qualitative content analysis. J Rehab 2019; 20(3): 210-21. [In Persian].
29. Stratil JM, Rieger MA, Volter-Mahlknecht S. Cooperation between general practitioners, occupational health physicians, and rehabilitation physicians in Germany: What are problems and barriers to cooperation? A qualitative study. Int Arch Occup Environ Health 2017; 90(6): 481-90.
30. Kalantari M, Kamali M, Joolaee S, Rassafiani M, Shafarodi N. Perception of professional ethics by Iranian occupational therapists working with children. J Med Ethics Hist Med 2015; 8: 8.
31. Vahidi H, Shafaroodi N, Joolaee S. Occupational therapists' perception of unethical practice in adults' physical dysfunction field. Rehabilitation Medicine 2015; 4(2): 70-8. [In Persian].
32. Kalantari M, Kamali M, Joolaee S, Shafarodi N, Rassafiani M. Factors affecting ethical behavior in pediatric occupational therapy: A qualitative study. Med J Islam Repub Iran 2015; 29(1): 1076-82.