



Lenguaje y funcionalidade por la CIF y grupo fonoaudiológico en la percepción de personas con Enfermedad de Parkinson

Linguagem e funcionalidade pela CIF e grupo fonoaudiológico na percepção de pessoas com Doença de Parkinson

Language, functioning by ICF and SLP group intervention in the perception of people with Parkinson Disease

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Abstract

Introduction: Aging and the presence of chronic diseases such as Parkinson's Disease (PD) can generate disability and affect a person's life, and the International Classification of Functioning, Disability and Health (ICF), from a biopsychosocial perspective, allows studying the functioning in PD. **Objective:** To investigate the functioning of people with PD in a speech-language pathology (SLP) group, taking the ICF as a conceptual basis. **Method:** Cross-sectional study, approved by the Ethics Committee, with 10 participants with PD, in SLP group. An interview script was developed to collect the sociodemographic profile and a self-administered questionnaire to collect self-perception in the ICF categories in interviews with participants in three videotaped group meetings, lasting 35 minutes each. To establish a reference parameter, two SLP with experience in the ICF (judges) classified the answers in the same categories. **Results:** Participants reported impairments in Body Functions (voice, articulation, fluency and rhythm of speech, involuntary movements), difficulties in Activities and Participation (speech, conversation, fine use of the hand, walking, dressing, performing household chores, and recreation and leisure) and

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TCP: Study conception, data collection instrument design and application, statistical analysis and critical review

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barriers in Environmental Factors. In 60% of the cases, the agreement between participants and judges was slight, 30% regular, and in one case (10%) it was strong. **Conclusion:** The results showed language and functioning difficulties in the perception of people with PD, giving an original character to the research by giving them a voice and bringing subsidies to person-centered care, thus transposing the biomedical view of disease-centered care.

Keywords: International Classification of Functioning, Disability and Health; Parkinson Disease; Models, Biopsychosocial; Group Practice; Speech, Language and Hearing Sciences.

Resumo

Introdução: O envelhecimento e a presença de doenças crônicas como a Doença de Parkinson (DP) podem gerar incapacidade e afetar a vida da pessoa, sendo que a Classificação Internacional de Funcionalidade, Incapacidade e Saúde (CIF), na perspectiva biopsicossocial, permite conhecer a funcionalidade na DP. **Objetivo:** Investigar a funcionalidade de pessoas com Doença de Parkinson em atendimento fonoaudiológico grupal, tomando a CIF como base conceitual. **Método:** Pesquisa transversal, aprovada pelo CEP, com 10 participantes com DP, em atendimento fonoaudiológico grupal. Foi elaborado roteiro de entrevista para coleta do perfil sociodemográfico e questionário autoaplicável para coleta da autopercepção nas categorias da CIF em entrevistas com os participantes em três encontros grupais videogravados, com duração de 35 minutos cada. Para estabelecimento de parâmetros de referência, duas juízas fonoaudiólogas classificaram as respostas nas mesmas categorias. **Resultados:** Os participantes relataram prejuízos em Funções do Corpo (voz, articulação, fluência e do ritmo da fala, movimentos involuntários), dificuldades em Atividades e Participação (fala, conversação, uso fino da mão, andar, vestir-se, realização de tarefas domésticas, e recreação e lazer) e barreiras nos Fatores Ambientais. Em 60% dos casos a concordância entre participantes e juízas foi discreta, 30% regular, e em um caso (10%) foi forte. **Conclusão:** Os resultados mostram as dificuldades de linguagem e de funcionalidade na percepção das próprias pessoas com DP, conferindo um caráter original à pesquisa por dar voz a elas e trazer subsídios para o cuidado centrado na pessoa, transpondo, assim, a visão biomédica da atenção centrada na doença.

Palavras-chave: Classificação Internacional de Funcionalidade, Incapacidade e Saúde; Doença de Parkinson, Modelos Biopsicossociais, Prática de Grupo; Fonoaudiologia.

Resumen

Introducción: El envejecimiento y la presencia de enfermedades crónicas como la Enfermedad de Parkinson (EP) pueden generar incapacidad y afectar a la vida de la persona, siendo que en la Clasificación Internacional del Funcionamiento, Incapacidad y Salud (CIF), en la perspectiva biopsicossocial, permite conocer el funcionamiento en la EP. **Objetivo:** Investigar el funcionamiento de personas con EP en la intervención fonoaudiológica grupal, tomando la CIF como base conceptual. **Método:** Estudio transversal aprobado por el CEP (Comité de Ética) con 10 participantes con EP, en tratamiento fonoaudiológico grupal. Se elaboró un guion de entrevista para colección de perfil sociodemográfico y un cuestionario autoaplicable para recopilar la autopercepción en las categorías de la CIF en entrevistas con los participantes en tres encuentros grupales videograbados, con una duración promedio de 35 minutos cada uno. Para establecer parámetros de referencia, dos juezas fonoaudiólogas clasificaron las respuestas en las mismas categorías. **Resultados:** Los participantes informaron déficit en las Funciones del Cuerpo (voz, articulación, fluidez y ritmo del habla, movimientos involuntarios), dificultades en las Actividades y Participación (habla, conversación, uso fino de la mano, caminar, vestirse, realizar las tareas domésticas, y recreación y ocio) y barreras en Factores Ambientales. En el 60% de los casos la concordancia entre participantes y juezas fue discreta, en el 30% fue regular y en un caso (10%) fue fuerte. **Conclusión:** Los resultados mostraron las dificultades de lenguaje y funcionamiento en la percepción de las propias personas con EP, dando un carácter original al estudio por darles voz y traer subsidios para el cuidado centrado en la persona, transponiendo así, la visión biomédica de la atención centrada en la enfermedad.

Palabras clave: Clasificación Internacional del Funcionamiento, de la Discapacidad y de la Salud; Enfermedad de Parkinson; Modelos Biopsicosociales; Hospitales de Práctica de Grupo; Fonoaudiología.

Introduction

There has been a shift in the demographic profile of Brazil, with an aging population, resulting in a higher prevalence of pathologies in this population group, such as Parkinson's Disease (PD). In this context, aging and the presence of chronic diseases like PD can result in disability and impact a person's life¹. PD is a chronic progressive neurodegenerative condition and the second most prevalent neurodegenerative disease with a long lifespan worldwide².

PD may cause motor difficulties such as resting tremor, postural instability, gait disturbances, rigidity, bradykinesia, and can also impair swallowing, speech, and voice^{3,4}. Communication impairments affect approximately seven million individuals with PD (89%), making it increasingly important to understand how individuals cope with and address their communication difficulties⁵. In addition to the changes in body structures and functions, as per the International Classification of Functioning, Disability and Health⁶, the health condition also impacts functionality and influences the daily activities of these individuals⁷. PD can impact the performance of activities of daily living, such as difficulties in speaking, talking, interpersonal relationships, dressing, shoe-wearing, feeding, and using public transportation, among others⁸.

Functionality is a concept of the ICF that similarly considers the components of body functions, activities, and participation, and can be influenced by environmental factors⁶. With the conceptual basis of the ICF, in the context of PD understood from a biopsychosocial approach, it is essential to consider with equal importance the impairments in biological functions, limitations in activities, and restrictions in the person's participation. Due to its clinical and progressive characteristics, PD can lead to isolation, depression, dependence, as well as the need for specific disease-related care⁸. In this context, a comprehensive health approach is necessary, which should include the contextual factors (environmental and personal) of their lives, as addressed in the ICF⁶, the conceptual framework adopted in this study.

As individuals with PD have speech difficulties, reduced vocal intensity, voluntary and involuntary hesitations, and accelerated speech rate⁹, multidisciplinary care is recommended, including speech-language pathology. Despite the literature

addressing the symptoms of voice, speech, and language in this population group, few studies focus on these individuals' perception of their own difficulties. Studies using the ICF with other target populations, such as the perception of children with language impairments¹⁰ and their families¹¹, have been published in the last five years, with findings that enable a biopsychosocial approach in speech-language pathology practice. Understanding aspects of functionality beyond those related to speech and language from the perspective of the individuals themselves contributes to a better understanding of their needs and provides important insights for health intervention in a person-centered biopsychosocial approach. Thus, this study aims to address aspects that are still underrepresented in the literature but are fundamental for the comprehensive and humanized healthcare of these individuals.

By considering functionality and contextual aspects, the ICF⁶ constitutes an important classification for understanding the perceptions of individuals with PD. The ICF is part of the family of classifications of the World Health Organization (WHO) and aims to establish a unified and standardized language. Among its specific objectives, the ICF provides a scientific basis for understanding and studying health, its determinants, and effects, and it provides a coding scheme for health information systems. It can be applied as a tool for social policy in the planning of social security systems, as well as in the design and implementation of public policies⁶.

Considering the importance of understanding functionality from the perspective of individuals with PD, this study aimed to investigate the functionality of people with Parkinson's Disease in group speech-language pathology sessions, using the ICF as a conceptual framework.

Material and method

This is a cross-sectional study approved by the Research Ethics Committee under the CAAE [Certificate of Presentation for Ethical Consideration] No. 79692417.1.0000.5404. The study was presented to the participants by the researchers, and their consent was obtained through the signing of an ICF.

The study included a total of 10 individuals with PD, of both sexes, in a group setting, referred to as P1, P2, P3, P4, P5, P6, P7, P8, P9, and P10.

The group sessions for individuals with PD were conducted on a weekly basis, lasting one hour each, and the participants presented varying degrees of dependency and symptoms. The group aimed to provide a space for the participants to be heard, while also addressing the symptoms related to voice, speech, language, and communication.

The inclusion criteria for participants in the study were as follows: individuals with PD undergoing group speech-language pathology treatment at a university clinic for at least six months, willingness to participate in the research, and signing of the Informed Consent Form (ICF). Despite individuals

who chose to withdraw from participating in the research being excluded, there were no dropouts in the present study.

The data collection began with a study of the ICF in PD based on a literature review of the aspects affected by PD; a thorough reading of the ICF was conducted to create a checklist based on it, and the authors selected 33 categories related to PD, described in Chart 1. The checklist was used to develop an interview script to understand the participants' perceptions of PD and its repercussions, as well as a self-administered questionnaire to classify self-perception in the selected categories.

Chart 1. Categories Checklist of the International Classification of Functioning, Disability and Health for Parkinson's Disease

Body functions	
b144- Memory functions	b167- Mental functions of language
b230- Hearing functions	b234- Vestibular functions
b280- Sensation of pain	b301- Motivation
b310- Voice functions	b320- Articulation functions
b330- Fluency and rhythm of speech functions	b765- Involuntary movement functions
Activities and participation	
d230- Carrying out daily routine	d240- Handling stress and other psychological demands
d330- Speaking	d350- Conversation
d440- Fine hand use	d445- Hand and arm use
d450- Walking	d470- Using transportation
d520- Caring for body parts	d540- Dressing
d550- Eating	d560- Drinking
d570- Looking after one's health	d640- Doing housework
d710- Basic interpersonal interactions	d730- Relating with strangers
d760- Family relationships	d920- Recreation and leisure
Environmental factors	
e410- Individual attitudes of immediate family members	e420- Individual attitudes of friends
e425- Individual attitudes of acquaintances, peers, colleagues, neighbours and community members	e540- Transportation services, systems and policies
e580- Health services, systems and policies	

Source: xxxxxx (confidential)

ICF codes consist of categories accompanied by a qualifier that assesses the magnitude of the problem. In the Body Functions component, the qualifiers used are: 0 (no disability), 1 (mild disability), 2 (moderate disability), 3 (severe disability), 4 (complete disability). In the Activities and Participation component, the qualifiers used are: 0 (no difficulty), 1 (mild difficulty), 2 (moderate difficulty), 3 (severe difficulty), 4 (complete difficulty). In the Environmental Factors component, the categories are classified as barriers (.) or facilitators (+): .4

(complete barrier), .3(severe barrier), .2 (moderate barrier), .1(mild barrier), 0 (no enabler), +1 (mild enabler), +2 (moderate enabler), +3 (severe enabler), +4 (complete enabler).

Then, the participants' self-perception was assessed through three group sessions, each lasting an average of 35 minutes, being conducted by one of the researchers supported by a guiding script, and they were video recorded for later transcription and analysis. Initially, the participants were asked to share their experiences and insights regarding

each category from the checklist. Following, as an example, are the questions from the “conversation (d350)” category: “How is it for you to talk with people? Do you have difficulty in talking? Who are the people you enjoy talking to? With whom do you find it difficult to talk?” In the “auditory functions (b230)” category: Do you have difficulty hearing softer sounds? Do you usually watch TV at a high volume? Do you ask people to speak louder?

After the narrative of each group member, the participants were asked to report, on a self-administered questionnaire, their perceptions regarding the degree of magnitude they experienced in these aspects. The self-administered questionnaire included the names of the categories and the qualifiers. This strategy was used for all 33 categories in the checklist.

Two judges, experienced speech-language pathologists who had worked with the PD group and were familiar with the ICF, were invited to assign a qualifier to the 33 categories in the checklist. Each judge assigned the qualifiers separately, based on the videos from stage 2 and their previous experience with this PD group. The judges had worked with the same group six months before the start of the research. In two categories where there was disagreement between the judges, the interviewers/researchers analyzed the cases to reach a consensus on the qualifiers, facilitating statistical analysis. The use of judges in this research is justified by the lack of a reference standard in the literature regarding functionality in PD.

In the quantitative data analysis, the self-assigned qualifiers by individuals with PD and the judges were entered into the Statistical Package for the Social Sciences (SPSS) software for Windows (version 21.0). The qualifiers of the ICF from both groups were compared using the Kappa coefficient to assess the degree of agreement between the qualifiers assigned by individuals with PD and the judges. The interpretation of the degree of agreement followed the following classification¹²: a) almost perfect: 0.81 to 1.00; b) strong: 0.61 to 0.80; c) moderate: 0.41 to 0.60; d) fair: 0.21 to 0.40; e) discrete: 0 to 0.20; f) poor < 0.: a)

The video recordings of the three group sessions were transcribed to analyze the difficulties experienced by individuals with PD. Excerpts from the transcriptions will be presented in the results section to illustrate the participants’ experiences in the ICF categories addressed in this study. Content analysis was used for the qualitative analysis of the transcriptions, which was based on relevance and repetition criteria¹³.

Results

Most participants in this study (n=7) were male, with ages ranging from 41 to 71 years (Chart 2). Five participants were engaged in various professions (homemaker, singer, company administrator), and five were retired (P1, P3, P5, P9, and P10).

Chart 2. Characterization of Participants with Parkinson’s Disease

Participants	P1	P2	P3	P4	P5	P6	P7	P8	P9	P10
Age	74	63	71	62	57	41	43	67	50	67
Sex	M	M	M	F	M	M	F	M	F	M
Educational level	EFI.I	EM.C	ES.C	EFII. C	EFI.C	EM.C	EM.C	ES.C	ES.C	ES.C
Profession	A	Singer	A	Home-maker	A	A.E	Home-maker	A.E	A	A
Disease duration (years)	8	6	8	11	5	4	10	10	13	8
Follow-up time in the group	3 years	3 years	3 years	8 years	3 years	1 year	7 years	7 years	7 months	6 months

Abbreviations: EFI.I- Incomplete Primary School I; EFI.C- Complete Primary School I; EM.C- Complete High School; ES.C - Complete Higher Education; EFII.C- Complete Primary School II; A- Retired; AE – Business Administrator; M- Male; F-Female;.

All participants had a disease duration of at least four years, with four individuals living with the disease for 10 years or more. Two participants

had been attending the speech-language pathology group for less than a year.

Table 1. Comparison between the perceptions of people with Parkinson's Disease and the qualifiers of the judges in the Body Functions component

Body Functions / Qualifiers*		0	1	2	3	4
b301- Motivation	People with PD (n)	7	1	2		
	Judges (n)	5	1	4		
b144- Memory functions	People with PD (n)	2	3	3	1	1
	Judges (n)	2	5	2	1	
b167- Mental functions of language	People with PD (n)	3	2	4	1	
	Judges (n)	3	3	3	1	
b230- Hearing functions	People with PD (n)	2	5	2		1
	Judges (n)	4	5	1		
b235- Vestibular functions	People with PD (n)	1	5	4		
	Judges (n)	8	2			
b280- Sensation of pain	People with PD (n)	5	1	4		
	Judges (n)	7	3			
b310- Voice functions	People with PD (n)	1	4	4	1	
	Judges (n)	4	4	1		1
b320- Articulation functions	People with PD (n)	2	6	2		
	Judges (n)	3	3	1	2	1
b330- Fluency and rhythm of speech functions	People with PD (n)	2	4	4		
	Judges (n)	3	3	1	2	1
b765- Involuntary movement functions	People with PD (n)	3	3	4		
	Judges (n)	4	2		2	2

Abbreviations: 0 (no disability), 1 (mild disability), 2 (moderate disability), 3 severe disability), 4 (complete disability), n (number of participants).

In the Body Functions component (Table 1), the categories reported with the greatest impairment by individuals with PD were: voice functions (b310), articulation functions (b320), fluency and rhythm of speech functions (b330), involuntary movement functions (b765), and memory functions (b144). There were reports of functions related to memory, in addition to categories directly related to speech-language pathology practice, as illustrated in the following report:

"I am not able to explain the route to my new house, I used to know it perfectly / nowadays I forget the way in my head / I try, but it doesn't work" (Participant P4).

Other aspects, such as involuntary movements and motivation, were also mentioned with a higher degree of impairment by individuals with PD, as in the following example:

"Suddenly the object slips from my hand, you know? / Especially when I'm washing dishes" (Participant P7)

When asked about motivation to travel, be with family and friends, go out, and other activities:

"I've lost some / I'm less sociable now // This medication gives me symptoms of depression // It's... that feeling of... I won't make it past that day... I'm going to die. Sometimes I even lack the enthusiasm to go to work... and then I find myself in a bad situation." (Participant P6)

"For me, Parkinson's only gets worse. When I started feeling the symptoms of Parkinson's, it was a blow to my life... I stopped working. Stiffness was what bothered me the most back then, and nowadays with physical therapy, it's no longer my problem. It's my memory that doesn't work anymore. It's very difficult for me to write a text... a letter or send an email, that's why I couldn't and can't work anymore..." (P3)



Furthermore, participants reported voice impairment, as exemplified by a speech excerpt from one of the participants:

“I have to make an effort to produce enough volume in my voice to be heard.” (Participant P3)

Table 2. Comparison between the perceptions of people with Parkinson’s Disease and the qualifiers of the judges in the Activities and Participation component

Activities and Participation / Qualificators*		0	1	2	3	4
d230- Carrying out daily routine	People with PD (n)	5	3	2		
	Judges (n)	5	3		1	1
d240- Handling stress and other psychological demands	People with PD (n)	4	3	3		
	Judges (n)	1	7	2		
d330- Speaking	People with PD (n)	2	2	5	1	
	Judges (n)	4	3	2		1
d350- Conversation	People with PD (n)	2	4	3	1	
	Judges (n)	4	3	2		1
d440- Fine hand use	People with PD (n)	1	4	1	4	
	Judges (n)	3	2	2	1	2
d445- Hand and arm use	People with PD (n)	4	2	4		
	Judges (n)	3	3	1	1	2
d450- Walking	People with PD (n)	1	6	2	1	
	Judges (n)	4	2	3		1
d470- Using transportation	People with PD (n)	4	4	2		
	Judges (n)	5	3	1		1
d520- Caring for body parts	People with PD (n)	4	4	1	1	
	Judges (n)	7	2		1	
d540- Dressing	People with PD (n)	3	3	3	1	
	Judges (n)	7	1	1		1
d550- Eating	People with PD (n)	4	4	1	1	
	Judges (n)	5	2	2		1
d560- Drinking	People with PD (n)	6	3		1	
	Judges (n)	4	4	1		1
d570- Looking after one's health	People with PD (n)	6	1	2	1	
	Judges (n)	7	1	1		1
d640- Doing housework	People with PD (n)	3	4	1	1	1
	Judges (n)	3	4	1	1	1
d710- Basic interpersonal interactions	People with PD (n)	3	3	3	1	
	Judges (n)	2	6	2		
d730- Relating with strangers	People with PD (n)	3	5	1	1	
	Judges (n)	4	4	2		
d760- Family relationships	People with PD (n)	4	2	4		
	Judges (n)	6	3	1		
d920- Recreation and leisure	People with PD (n)	3	5	2		
	Judges (n)	4	4	1		1

Abbreviations: 0 (no difficulty), 1 (mild difficulty), 2 (moderate difficulty), 3 (severe difficulty), 4 (complete difficulty). n (number of participants).

In the Activities and Participation component, participants self-assigned qualifiers indicating greater difficulties in the categories of talking (d330), conversation (d350), fine hand use (d440), walking (d450), dressing (d540), doing housework (d640), interacting with strangers (d730), and recreation and leisure (d920) (Table 2). Below are excerpts from the interview between the interviewer (E) and participants (P4, P5, and P8) that exemplify difficulties in speaking and conversation:

P5: "...sometimes I feel lazy to talk... so I have to say it two or three times for the person to understand!"
E: And are there times when you give up on talking?

Does that happen?

P4: It does! (nods) **E:** And who do you give up on talking to?

P4: With my husband... Sometimes I want to talk, but my voice doesn't come out. It's like my mouth won't open. I have difficulty in speaking.

E: So, the difficulty in speaking also affects your ability to talk to someone?

P8: People don't listen to what I say. It seems like I'm speaking loudly, but when I look around, no one understood me. So, I started articulating excessively so they could hear me. Reading is a good practice (looks at everyone at the table).
P5: Sometimes I just don't feel like talking.

Table 3. Comparison between the perceptions of people with Parkinson's Disease and the qualifiers of the judges in the Environmental Factors component

Environmental Factors / Qualificators*		4	3	2	1	0	+1	+2	+3	+4
e410- Individual attitudes of immediate family members	People with PD (n)					1	2	2		5
	Judges (n)				1			3	2	4
e420- Individual attitudes of friends	People with PD (n)					2	1	2	1	4
	Judges (n)					1	3	3	2	1
e425- Individual attitudes of acquaintances, peers, colleagues, neighbours and community members	People with PD (n)					2	3	2		3
	Judges (n)					3	3	1	2	1
e540- Transportation services, systems and policies	People with PD (n)	2		3		1	1	1		2
	Judges (n)		2	3	1	1		3		
e585- Health services, systems and policies	People with PD (n)	2	1			1			4	2
	Judges (n)	2	2	3	1		1		1	

Abbreviations: .4 (complete barrier), .3(severe barrier), .2 (moderate barrier), .1(mild barrier), 0 (no enabler), +1 (mild enabler), +2 (moderate enabler), +3 (severe enabler), +4 (complete enabler). n (number of participants).

In the Environmental Factors component (Table 3), transportation-related services and policies (e540) were classified as moderate and complete barriers by most individuals with PD due to restricted schedules, long waiting times at bus stops, and lack of empathy from municipal bus staff, as expressed by one of the participants:

"...the bus didn't wait for me to sit before starting the journey. I almost fell several times, and sometimes the driver lacks patience when they see that we're moving slowly"(P2).

Regarding group speech-language pathology intervention, individuals with PD considered it to

be a facilitator. According to them, group members shared experiences and difficulties that the health condition brings in daily life, and motivated and encouraged the performance of voice exercises and stretching.

The results of the quantitative comparison between the perceptions of individuals with PD and the judges' ratings are presented in Table 4. The degree of agreement was discrete (60%) in six cases, while in three cases it was fair (30%), and in one case (10%) it was strong. In the majority of cases in this study, there was discrete agreement, indicating discrepancies.

Table 4. Agreement between perceptions of people with Parkinson's Disease and the judges' qualifiers

Participants	Cohen's kappa coefficient	Degree of Agreement
P1	0.166	Discrete
P2	0.135	Discrete
P3	0.257	Regular
P4	0.077	Discrete
P5	0.220	Regular
P6	0.191	Discrete
P7	0.195	Discrete
P8	0.759	Strong
P9	0.093	Discrete
P10	0.248	Regular

*Cohen's Kappa Coefficient

The application of the ICF checklist, together with the interviews, provided participants with an opportunity to reflect on their conditions, as illustrated by an excerpt from one of the interviews:

"These conversations were very interesting, as I was able to stop and think more deeply about my problems... I really liked it." (Participant P5).

Discussion

This study aimed to understand the functionality of individuals with Parkinson's disease (PD). Disabilities and difficulties were reported in the components of Body Functions, Activities and Participation, and Environmental Factors of the ICF, analyzed through the 33 categories of the developed checklist, which, in interaction with environmental factors, resulted in disabilities for people with PD.

In the Body Functions component, mental functions related to language were reported as a disability by the participants with PD. Communication impairments are prevalent in seven million individuals worldwide with PD, and it is increasingly important to understand how they cope with and face such difficulties in order to provide them with a better quality of life⁵.

Involuntary movements, also known as tremors, are one of the classic and frequent symptoms of PD, used for clinical diagnosis in PD patients¹⁴, and it was reported by most participants as a disability that hinders socialization. The magnitude of motor symptoms in PD affects the functional performance of individuals¹⁵, and the impact on daily activities needs to be investigated.

In the Activities and Participation component, individuals with PD self-classified themselves with difficulty in the categories of "speaking" and "conversation," reporting instances where they give up on speaking with family members, friends, and strangers due to fatigue and difficulty finding words to express themselves. The difficulties in these categories affect interpersonal relationships and opportunities to establish bonds and social connections in the environments they are¹⁶. Participants also discussed the role of group therapy provided by Speech-Language Pathology, describing it as a potential factor for improving communication. In caring for and rehabilitating individuals with PD, speech-language pathologists should consider functionality according to the biopsychosocial approach of the ICF, where the body, activities and participation, environmental factors, and personal factors are all given equal importance by the professional⁶.

In the Environmental Factors component, the classified categories were reported as barriers by individuals with PD. The category related to Public Transportation Policies was classified as a complete barrier, posing challenges throughout Brazil². There are few buses and public transportation options adapted for bodily disabilities, which are seen as a barrier to mobility, accessing healthcare services, engaging in leisure activities, and everyday life for these individuals. Such environmental and architectural barriers can also result in reduced participation¹⁷.

Participants reported that the group therapy sessions motivated them to perform voice exercises and facilitated the formation of new friendships. These results are in line with authors who empha-

size that therapeutic group strategies contribute to participants' motivation¹⁸ and their own perception of their difficulties. Thus, the group becomes a potential space for greater acceptance of the diagnosis and improved self-regulation for the development of more functional communication¹⁹.

Another potentiality of the group, also reported by the participants in this study, was the exchange of experiences among individuals with PD as a form of support, promoting a sense of belonging and assisting in aspects of mental health and self-esteem of the participants⁸.

Due to the absence of a reference standard in the literature regarding the functionality of individuals with PD in the 33 ICF categories used in this study, agreement analysis was performed between the participants' self-perception and the judges. The results indicated a slight agreement in the majority of cases (60%), followed by regular agreement (30%). The slight and regular agreement suggests that individuals with PD and the judges chose different qualifiers. The analysis of agreement indicators is influenced by the representativeness of each analyzed class²⁰, since individuals with PD and the judges (who are trained in Speech-Language Pathology) have different representativeness, which may justify the discrete and regular agreement.

Most studies characterize language from the perspective of healthcare professionals^{21,22}, and few works analyze functionality from the perspective of the individuals themselves in speech-language pathology therapy or their family members^{11,12,22}. Understanding the self-perception of individuals receiving healthcare services will provide data for a comprehensive health perspective and allow for the evaluation of the effects of therapeutic procedures²³.

The findings of this study reaffirm the importance of understanding the perception of the individuals involved in care (individuals with PD, family members, caregivers and healthcare professionals), integrating different knowledge into speech-language pathology, thus enabling a comprehensive and humanized approach in line with the biopsychosocial model of the ICF.

By using the biopsychosocial model of the ICF⁶, it becomes possible to broaden the perspective of the individuals involved in care (professional, patient, family members and caregivers) regarding health and functionality. By considering activity from the individual's perspective, performance is being analyzed, which means

examining the person's involvement and the way they carry out actions in their home, work, leisure settings, and environment. Identifying the profile of functionality is important for analyzing more individualized therapeutic goals and approaches¹⁷. Thus, speech-language pathology will consider categories beyond Body Functions and Structures, as well as aspects of the Activities and Participation component, and how Environmental and Personal Factors influence functionality⁷.

Final Considerations

People with PD reported disabilities in voice functions, articulation functions, fluency and rhythm of speech, functions related to involuntary movements, and memory functions; difficulties in speech, conversation, fine hand usage, walking, dressing, performing household tasks, interacting with strangers, and engaging in recreation and leisure activities; and barriers in transportation services, systems, and policies, as well as in health-care, highlighting the disabilities they experience. Participation in the Speech-Language Pathology group was reported as an enabling environmental factor for participants with PD.

The findings showed little agreement between the self-perception of individuals with PD and the judges regarding functionality in Parkinson's Disease. Understanding the self-perception of individuals with PD will enable person-centered care, transcending the traditional biomedical view of disease-centered rehabilitation.

In this sense, information about performance in the Activities and Participation component, self-perception of body function deficiencies, and barriers and facilitators in Environmental Factors will allow professionals to understand the profile of functionality and define individual-centered therapeutic goals. Therefore, the findings indicate the potential applicability of the ICF for data analysis in a comprehensive approach to individuals with Parkinson's Disease and their health and functionality conditions.

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