The access and rehabilitation working process in Primary Health Care

O acesso e o fazer da reabilitação na Atenção Primária à Saúde

El acceso y la práctica a la rehabilitación en la Atención Primaria de Salud

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ABSTRACT | For adequate rehabilitation service offer in Brazil, it is necessary to understand the availability of access to Rede Assistencial de Saúde (RAS) [Brazilian Health Care Network (HCN)] and develop practices to meet health needs. The objective was to estimate the distribution trend of rehabilitation human resources in HCN between 2007 and 2015, especially in Primary Health Care (PHC) and get to know the practice of Clínica Ampliada (CA) [Extended Clinical Care (ECC)], Projeto Terapêutico Singular (PTS) [Singular Therapeutic Project (STP)], and Apoio Matricial (AM) [Matrix Support (MS)] of speech therapists, physical therapist, and occupational therapists. We searched for professionals from the Health Care Network using Cadastro Nacional de Estabelecimentos de Saúde (CNES) [Brazilian National Register of Health Establishments (NRHE)], and the monthly trend was elaborated through Prais-Winsten linear regression models. Aiming at knowing the practices of ECC, STP, and MS, “Discourses of the Collective Subject” were made from interviews held with 12 professionals. Medium complexity services had higher concentration of professionals, except for the hospitals in São Paulo city, and PHC had the lower possibility of access. Though shy, healthcare increased for all three professionals, with emphasis on physical therapists in hospitals in São Paulo city, in a comparison between the state (0.73%) and city (0.95%). In PHC, the highest raises were for occupational therapists of São Paulo city and physical therapists in Brazil. For MS, ECC and STP, besides the difficulty of the working process itself, ideas such as “plurality of concepts,” “biopsychosocial perspective,” and “possibility of adaptation” of care were predominant. Despite the growing numbers, the availability of professionals is still low and uneven, concentrated in specialty, and emphasising the expansion of physical therapy in hospitals and occupational therapy in PHC.

Keywords | Health Services Accessibility; Rehabilitation; Primary Health Care; Human Resources.

RESUMO | Para a adequada oferta de serviços de reabilitação no Brasil é preciso conhecer a disponibilidade de acesso existente na Rede Assistencial de Saúde (RAS) e desenvolver práticas que atendam às necessidades de saúde. Buscou-se estimar a tendência da distribuição de recursos humanos de reabilitação na RAS 2007-2015, especificamente na Atenção Primária à Saúde (APS) e conhecer a prática de Clínica Ampliada (CA), Projeto Terapêutico Singular (PTS) e Apoio Matricial (AM) para fonoaudiólogos, fisioterapeutas e terapeutas ocupacionais. Buscou-se profissionais na Rede Assistencial pelo Cadastro Nacional de Estabelecimentos de Saúde (CNES). A tendência mensal foi construída por modelos de regressão linear Prais-Winsten. Para conhecer as práticas de CA, PTS e AM, construiu-se discursos do sujeito coletivo a partir de entrevistas de 12 profissionais. Média complexidade teve a maior concentração de profissionais, exceto em hospitais na cidade de São Paulo. A APS, por sua vez, teve a menor possibilidade de acesso. Mesmo tímido,
INTRODUCTION

Recently Primary Health Care (PHC) expanded the dimension and effectiveness of rehabilitation services supported by Núcleo de Apoio à Saúde da Família (Nucleus of Support for Family Health (NSFH)), which comprises the preferred access to Brazilian Unified Health System (UHS), with the challenge of coordinating rehabilitation care in HCNs of the country and making rational use of medium and high complexity services. In practice, the current model is still being structured, affecting accessibility, effectiveness and also the interaction between health care levels. The access to rehabilitation – “set of measures that help people who have some disability or are about to acquire it to have and maintain optimal functionality in interactions with the environment” – in relation to health equipment are limited, as well as the access to professionals that contribute to the rehabilitation of people with disabilities, particularly speech therapists, physical therapists and occupational therapists.

Despite rehabilitation having started and upheld tradition when it comes to specialized services, understanding access as the availability of professionals during the users’ admission and referral to rehabilitation services according to their needs and medical histories is essential in the care of human functionality.

In 1991, 1.5% of the Brazilian population had some disability; by 2010, 14.5%, and by 2012 this number was around 24%. Understanding the adequacy of the access to rehabilitation is essential to consolidate health care services. In UHS, NRHE is responsible for recording the number of health establishments and professionals in duty, and considering this information is a prerequisite to pay the establishments, we assume the number reported is close to reality.

In addition to access, understanding the working process of these professionals and the development of primary tools to organize it in PHC – ECC, STP and MS – is urgent to reorganize rehabilitation care in the country. MS is seen as an optimizer of interprofessional actions, place of co-responsibility and exchange, calling attention to individuality and biopsychosocial
factors\textsuperscript{14}. STP – interprofessional interactions to address complex cases – is appropriate to users regarding longitudinal care\textsuperscript{15}.

Considering that these are recent practices for rehabilitation professionals graduated according to the biomedical logic, whose proceedings are traditionally focused on specialized services, there is need to understand how these technological tools are being used, and the distribution of jobs at health assistance levels to develop appropriate policies, reduce access barriers and promote integrity in UHS\textsuperscript{16}. Once recent public policies for the reorganization of UHS care model have been aiming to extend the scope of actions in PHC\textsuperscript{1,16-19}, it is expected that the access to rehabilitation in PHC will grow and, similarly, the organization of the working process of such professionals will corroborate these initiatives. Thus, the objective of this study was to verify the access to rehabilitation professionals in HCN from 2007 to 2015 according to NRHE, especially in PHC, and to know and reflect on the perceptions and experiences of ECC, STP and MS for speech therapists, physical therapists and occupational therapists from PHC.

\textbf{MATERIALS AND METHODS}

This study is divided into two parts: a cross-sectional research with the distribution of rehabilitation human resources, speech therapists, occupational therapists and physical therapists in Brazilian HCN, in the State and in the city of São Paulo. We obtained our data from NRHE between August 2007 and October 2015. HCN was considered as the following:

- **PHC:** Health academy program, Family health program, Basic health units, Indigenous health care units, Fluvial mobile unit, Land mobile unit;
- **Specialized Ambulatory Care (SAC) – Hematologic:** psychosocial and normal birth care centers, specialized clinic/ambulatory of specialties, health clinic, cooperative, pharmacy, health centers, orthopedic workshop, isolated clinic, home care units, diagnosis and therapy support service;
- **Hospital Care (HC):** specialized hospital, day hospital and general hospital.

To test growth rate tendencies or annual decay, linear Prais-Winsten regression models were built (significance level = 0.05), adjusted to the time series of each rehabilitation professional number per 1,000 inhabitants in the studied regions and at assistance levels from 2007 to 2015\textsuperscript{20-22}. Statistical procedures were performed in the program Stata 13.

The second part of this study is a qualitative and descriptive research, including all 12 rehabilitation professionals of the two NSFH staff from the West region of São Paulo city who support four Basic Health Units. There was no exclusion. The staff is responsible for 63,595 users and support 21 Family Health staffs. Information such as age, sex, education and professional experience was considered to describe professionals’ profile by calculating the main trend measures, dispersion and frequency distributions.

The qualitative approach made it possible to understand the meaning of ECC, STP and MS to rehabilitation professionals who have experienced the beginning of the work carried out by NSFH, allowing the description of singular practices in these services. The choice for this method was due to the fact that it allowed us to consider meaning and intentionality as inherent in social acts and relationships. To observe the data, a “semi-structured interview” was adopted and the open questions were recorded in audio\textsuperscript{24}.

The data analysis of reports followed the “Discourse of the Collective Subject” methodology\textsuperscript{23}. This “Discourse…” was elaborated with key expressions – with parts from the interviews that show the testimonial essence, and the main ideas with similar or complementary sense – with formulae that show the meaning in these testimonials.

The Ethics Committees from the São Paulo Municipal Health Department (297/11 – CEP/SMS) and from the Medical School, Universidade de São Paulo, (Research protocol 352/11) approved the project.

\textbf{RESULTS}

\textbf{Distribution of rehabilitation professionals in HCN}

Figure 1 shows the number of rehabilitation professionals per 1,000 inhabitants. From these, there is higher access to physical therapists. SAC had higher concentration of these three professionals, except for HC in the city of São Paulo in 2015. Despite the increase in professionals in PHC, from 2007 to 2015, this is the assistance level with the smaller chance of access.
Figure 1. Active rehabilitation professionals per 1,000 inhabitants in PHC, SAC and HC, in Brazil and in the state and the city of São Paulo in 2007 and 2015.
The access to all three professionals increased on all levels of care in Brazil and in the state and the city of São Paulo (Table 1). For physical therapists, the highest annual increase was in HC with 0.73% (IC\textsubscript{95%}: 0.59-0.86%) in the state of São Paulo, 0.95% (IC\textsubscript{95%}: 0.82-1.08%) in the city, and 0.85% (IC\textsubscript{95%}: 0.65-1.06%) in PHC in Brazil. The access to speech therapists in HCN also increased; the highest raise was observed in HC in Brazil and the lowest in PHC in the state of São Paulo. There was a significant increase of around 1.14% in the number of occupational therapists in PHC in the city of São Paulo (IC\textsubscript{95%}: 0.57-1.71%) compared to SAC and HC, and a lower growth in HC in the state of São Paulo with 0.26% (IC\textsubscript{95%}: 0.12-0.39%).

Table 1. Regression coefficient of professionals rate per 1,000 inhabitants. Brazil, São Paulo (State and city), 2007-2015.

<table>
<thead>
<tr>
<th></th>
<th>Brazil</th>
<th>São Paulo (State)</th>
<th>São Paulo (city)</th>
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<tbody>
<tr>
<td><strong>PHYSICAL THERAPIST</strong></td>
<td></td>
<td></td>
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<tr>
<td>Primary Health Care</td>
<td>0.85 (0.65 - 1.06) *</td>
<td>0.36 (0.24 - 0.47) *</td>
<td>0.45 (0.06 - 0.83) 0.025</td>
</tr>
<tr>
<td>Ambulatory Care</td>
<td>0.40 (0.32 - 1.06) *</td>
<td>0.30 (0.9 - 0.22) *</td>
<td>0.19 (0.09 - 0.29) *</td>
</tr>
<tr>
<td>Hospital Care</td>
<td>0.76 (0.66 - 0.86) *</td>
<td>0.73 (0.59 - 0.86) *</td>
<td>0.95 (0.82 - 1.08) *</td>
</tr>
<tr>
<td><strong>SPEECH THERAPIST</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Primary Health Care</td>
<td>0.69 (0.50 - 0.87) *</td>
<td>0.40 (0.18 - 0.62) 0.001</td>
<td>0.42 (0.17 - 0.68) 0.001</td>
</tr>
<tr>
<td>Ambulatory Care</td>
<td>0.56 (0.41 - 0.71) *</td>
<td>0.48 (0.32 - 0.64) *</td>
<td>0.68 (0.52 - 0.68) *</td>
</tr>
<tr>
<td>Hospital Care</td>
<td>0.83 (0.62 - 1.05) *</td>
<td>0.71 (0.41 - 1.01) *</td>
<td>0.80 (0.39 - 1.22) *</td>
</tr>
<tr>
<td><strong>OCCUPATIONAL THERAPIST</strong></td>
<td></td>
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<td></td>
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<tr>
<td>Primary Health Care</td>
<td>0.86 (0.50 - 1.23) *</td>
<td>0.76 (0.40 - 1.12) *</td>
<td>1.14 (0.57 - 1.71) *</td>
</tr>
<tr>
<td>Ambulatory Care</td>
<td>0.49 (0.33 - 0.65) *</td>
<td>0.57 (0.49 - 0.64) *</td>
<td>0.49 (0.43 - 0.55) *</td>
</tr>
<tr>
<td>Hospital Care</td>
<td>0.26 (0.16 - 0.36) *</td>
<td>0.26 (0.12 - 0.39) *</td>
<td>0.33 (0.19 - 0.46) *</td>
</tr>
</tbody>
</table>

\* p<0.000 
\) p<0.005

The practice of ECC, STP and MS in PHC

This part had the participation of 12 professionals with average age of 34.1 years (standard deviation = 6.5 years), with 11 of them being female (91.5%). From these, two speech therapists (16.7%), four occupational therapists (33.3%), and six physical therapists (50.0%). Figure 2 shows the ratio of these professionals per 1,000 inhabitants.

These professionals have graduated between 1981 and 2007, 91.7 % of them reported having received training for PHC and 91.7% attended the initial training in NSFH. The average of working in NSFH was 29.6 months (standard deviation = 8.5 months) and average of months in the current staff was 25.1 (standard deviation = 5.1 months), as regular employees according to the Brazilian Labor Laws. For physical therapists (6), and occupational therapists (4), all of them had a workload of 20 hours and seven also had another job, two of them being in other NSFH.

The practice of ECC, STP and MS was addressed in the interviews to collect information on their actions towards rehabilitation care (Table 2)
In MS, ECC, and STP, “PRACTICAL DIFFICULTIES” were common among professionals. For MS, we had:

“When you think you got it, that the staff is more united, [...] the staff is changed. So we start it all over again. In theory, the MS is super nice, but in practice [...] we’re not used to do it [...] because I don’t think neither the staff from NSFH [...] nor the one from Family Health Care are prepared for that. We unconsciously [...] end up only carrying out the same care procedures” (41.6%).

As for the ECC, 41.6% believed that “in practice, ECC is a challenge [...] due to questions that depend on the nucleus of knowledge of each professional”, pointing out the lack of “opportunity of going to appointments with other members of the staff, considering our workload of 20 hours is very tight.”

In STP, 58.3% said that “it is a little difficult to follow the [...] things we [...] had planned. Sometimes there is miscommunication and it turns out we end up getting lost because [...] we end up doing it in a very informal way.

We organize ‘blocks’ and we want to offer the same thing to everyone, (...) it would be nice if each person had a therapeutic project.”

On THE “PLURALITY OF CONCEPTS” of ECC, we noted how professionals judge each other, since “some people use matrix support to do several other things except for matrix support. (...) There is no common sense on what it is.” (33.3%)

Despite the difficulties of the ECC, most of them (75%) have a “BIOPSYCHOSOCIAL VIEW” on the user, which “allows us to look at subjects from their own contexts, everyday lives and relationships, (...) and go further than that one individualized issue.”

Finally, in STP, flexibility and “POSSIBILITY OF CONSTANT ADAPTATION” of therapeutic objectives: “staffs bring up the cases, then we think about them, set our goals and come up with a plan, but it is always dynamic, (...) we always have to reassess and renegotiate” (50%).

**DISCUSSION**

Even with increased availability of rehabilitation professionals from 2007 to 2015, it is still low and unequal (from 0.002 to 0.34 professionals per 1,000 inhabitants) to promote universality, accountability and integrality of care. There is still no clear recommendations on the minimum or ideal number of rehabilitation professionals to deliver integral care to users who need it. However, the “World report on disability” makes clear the lack of human resources for rehabilitation. Traditionally, rehabilitative care is developed in Specialized Care. We observed such situation in this study; SAC in Brazil, in the state and in the city of São

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Table 2: Frequency of main ideas of rehabilitation professionals from FHSC, MS, ECC and STP. West region of São Paulo, 2012.

<table>
<thead>
<tr>
<th>Main Ideas</th>
<th>MS</th>
<th>ECC</th>
<th>STP</th>
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<tr>
<td>Working</td>
<td></td>
<td></td>
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</tr>
<tr>
<td>Importance</td>
<td>5 (41.6)</td>
<td>3 (25.0)</td>
<td>6 (50.0)</td>
</tr>
<tr>
<td>Difficulty</td>
<td>5 (41.6)</td>
<td>5 (41.6)</td>
<td>7 (58.3)</td>
</tr>
<tr>
<td>Biopsychosocial perspective</td>
<td>4 (33.3)</td>
<td>9 (75.0)</td>
<td>3 (25.0)</td>
</tr>
<tr>
<td>Interdisciplinary action</td>
<td></td>
<td></td>
<td>4 (33.3)</td>
</tr>
<tr>
<td>Exchange of knowledge</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Interprofessional</td>
<td>4 (33.3)</td>
<td>5 (41.6)</td>
<td>-</td>
</tr>
<tr>
<td>Professional-user</td>
<td>1 (8.3)</td>
<td>-</td>
<td>4 (33.3)</td>
</tr>
<tr>
<td>Concepts</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Definition</td>
<td>5 (41.6)</td>
<td>2 (16.6)</td>
<td>5 (41.6)</td>
</tr>
<tr>
<td>Plurality</td>
<td>4 (33.3)</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Intervention facilitator</td>
<td>-</td>
<td>2 (16.6)</td>
<td>-</td>
</tr>
<tr>
<td>Possibility of adaptation</td>
<td>-</td>
<td>-</td>
<td>6 (50.0)</td>
</tr>
</tbody>
</table>
Paulo, was the care level with the highest number of physical therapists, speech therapists, and occupational therapists, but also the one that had the lowest physical therapists availability growth from 2007 to 2015.

Despite Brazilian public policies on health recognizing the expansion in the access – with user’s admission and referral from PHC to rehabilitation actions based on their needs, both in PHC and in HC, professionals are still scarce, accounting for less than 0.1 per 1,000 inhabitants, except for physical therapists in HC, especially regarding the growth in the state and in the city of São Paulo. Probably this fact was induced by Resolution no. 7/2010 concerning the minimum requirements for intensive care units, considering it demands at least one physical therapist every 10 beds during 18 hours a day.

In PHC, with NSFH since 2008 to support its consolidation in Brazil, healthcare provision from interprofessional staffs have increased, especially when it comes to the increase of occupational therapists in the state and in the city of São Paulo, and partially concerning physical therapists in Brazil and in the state of São Paulo, which contrast with the moderate change in the access to speech therapists in PHC. In theory, the difference in composition of human resources is given based on the priorities defined by municipal administrators. In general, it is possible to observe a higher growth trend in PHC to the access to occupational therapists, which is not the same for the other two professionals who have this same trend in HC.

The uneven access to rehabilitation in PHC, particularly featured in this study for physical therapy and speech therapy, highlights not only the challenge of seeking greater rationalization of resources, but also of having to deal with inequality in the overvaluation of specialization, which concentrates hard equipment and technology, prevailing values in society that guide the background of many professionals. Once professionals – mainly physical therapists – are traditionally trained for specialties and rehabilitation with individualized treatments, this can be a challenge in the professional practice of support in Primary Health Care.

In fact, this study pointed out that in PHC rehabilitation professionals have several conceptions on how to do their job, show difficulties in the application of organization tools in their work processes in PHC, in addition to the challenge to develop the teamwork. On the other hand, they report a better biopsychosocial view on the work with the user and understand the possibility of adapting therapeutic projects according to the user.

Despite the NSFH’s short period of existence, time is essential to a proper integration between staff and community considering the work of PHSC’s professionals requires this connection between users and staff. And the increasing service outsourcing by partner institutions is responsible for constant changes in staffs. Without effective relationships among professionals and between professionals and users, the longitudinal care of populations is undermined. Despite the fact that most professionals have knowledge on MS, regarding health care support and technical-pedagogical support, the lack of understanding of the concepts and its practice affect the communication between professionals and consequently their actions.

Even exposed in guidelines, the main difficulty regarding ECC is putting it into practice. Considering that this aspect is little addressed in the formation of traditional rehabilitation professionals, their testimonials highlight the gap between what is proposed to reorganize PHC and what is actually necessary during daily activities. A possibility would be adapting the minimum content covered by the Brazilian National Health Care Policies (NHCP) in health professional’s formation, considering these professionals tend to only deal with questions that tap into their nucleus of knowledge, which, as previously reported, makes the practice of ECC even more difficult. Due to the complexity of extended care, the understanding and intersection of each profession is necessary for a smooth teamwork, maintaining the autonomy of professional specificities without weakening complementarity and interdependence.

The articulation among professionals is also essential to STP, which is affected by the different demands and schedules of NSFH and Family Health Care staffs – fact already observed in São Paulo. Considering the recurrent informal communication without records or agreement among all professionals, and the consequent difficulty of sticking to what had been previously planned, the organization of the user’s care tends to not follow a pattern. On the other hand, STP flexibility allows a more appropriate use, which adapts health care to the context of user’s needs. With the appropriate articulation between NSFH professionals and others, more complex adaptations emerge in STP as a result of the understanding of the case and more personalized intervention strategies.
The access to and the work process of physical, speech and occupational therapists and their in rehabilitation care, mainly in PHC, still face challenges to consolidate NHCP and the population care needs. This increase in the PHC effectiveness, which prioritize co-responsible actions, demands a change in the logic of practice. Once available in PHC, the difficulty of rehabilitation professionals in following this logic makes the consolidation of these tools and methods of organization even harder, which, consequently affects the effectiveness of their work in PHC.

Finally, it is important to remember that this article refers to the trend of distributing human resources in HCN and that, according to NRHE, with restrictions concerning information accuracy. Despite the specificity of putting MS, ECC and PTS into practice, the 12 professionals of the studied regions are responsible for the actions and rehabilitation services in PHC of 63,595 people, which corresponds to 90.9% of the Brazilian cities.

CONCLUSION

Although increasing, the availability of physical, speech and occupational therapists is low and uneven among health care levels in Brazil and both in the state and the city of São Paulo. SAC has the highest concentration of professionals, and there is emphasis on the expansion of physical and occupational therapists in HC in PHC. As for MS, ECC, and STP, this study highlighted the ideas of “plurality of conceptions”, “biopsychosocial perspective” and “possibility of adaptation” of care. It also pointed out that there have been “difficulty in the practical application” of these tools also concerning “teamwork”, both seen as common challenges of these health professionals’ routines, regardless of the guidelines described in some documents. For still being considered new technologies that require change in its form of action, we highlight the need for better rehabilitation consolidation in PHC.

REFERENCES


