

### **ORIGINAL ARTICLE**

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# HEALTH LITERACY AND SOCIOECONOMIC CHARACTERISTICS OF ELDERLY PEOPLE: A COMMUNICATION APPROACH IN THE UNIFIED HEALTH SYSTEM

LETRAMENTO EM SAÚDE E CARACTERÍSTICAS SOCIOECONÔMICAS DA PESSOAS IDOSAS: UMA ABORDAGEM DA COMUNICAÇÃO NO SISTEMA ÚNICO DE SAÚDE

# ALFABETIZACIÓN EN SALUD Y CARACTERÍSTICAS SOCIOECONÓMICAS DE LOS ADULTOS MAYORES: ABORDAJE DE LA COMUNICACIÓN EN EL SISTEMA ÚNICO DE SALUD

Amanda Namibia Pereira Pasklan<sup>1</sup>, Joelmara Furtado dos Santos Pereira<sup>2</sup>, Michelline Joana Tenório Albuquerque Madruga Mesquita<sup>3</sup>, Yara Maria Cavalcante de Portela<sup>4</sup>, Sara Fiterman Lima<sup>5</sup>

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#### **ABSTRACT**

**Objective**: To analyze the association of socioeconomic characteristics with the level of literacy of elderly people assisted in the Unified Health System in the municipality of Pinheiro, Maranhão, Brazil. **Method**: 121 aged people qualified to participate in the study were selected. **Results**: Most were female, aged between 60 and 64 years old, with basic education, and without occupation after retirement. 60.3% have low literacy. There is a statistically significant difference in low literacy with the variables sex, age, education, and type of occupation. Women have a higher level of literacy, and the more advanced their age, the lower their literacy. The retired elderly population showed a higher level of literacy. The most cited type of reading material was the bible. There is a high number of aged people who reported not enjoying reading, influencing the high prevalence of low literacy. **Conclusions**: It is proposed here that interventions aimed at guaranteeing health promotion should check the literacy level of individuals.

**Descriptors**: Health Communication; Aged; Health Education.

<sup>&</sup>lt;sup>1</sup> Phd in Collective Health - UFMA. Assistant Professor of the Medical Course of the Federal University of Maranhão - Pinheiro-MA, UFMA.

<sup>&</sup>lt;sup>2</sup> RN, Phd student in Collective Health - UFMA. Federal University of Maranhão, Department of Public Health, São Luís-MA.

<sup>&</sup>lt;sup>3</sup> Doctor, Master in Medical Sciences - UERJ. Federal University of Maranhão, Medical Course, São Luís-MA

<sup>&</sup>lt;sup>4</sup> Master in Adult and Child Health - UFMA. Federal University of Maranhão, Medical Course, Pinheiro-MA

<sup>&</sup>lt;sup>5</sup> Phd in Collective Health - UFMA. Federal University of Maranhão, Medical Course, Pinheiro-MA

#### **RESUMO**

**Objetivo**: Analisar a associação de características socioeconômicas com o nível de letramento de pessoas idosas atendidas no Sistema Único de Saúde do município de Pinheiro, Maranhão, Brasil. **Método**: Foram selecionados 121 pessoas idosas aptas a participarem do estudo. **Resultados**: A maioria era do sexo feminino, com idade entre 60 e 64 anos, escolaridade básica, e sem ocupação após a aposentadoria. 60,3% possuem letramento baixo. Há uma diferença estatisticamente significante no baixo letramento com as variáveis sexo, faixa etária, escolaridade, e o tipo de ocupação. As mulheres possuem maior nível de letramento, e quanto mais avançada a idade, menor o letramento. A população idosa aposentada demonstrou maior nível de letramento. O tipo de material para leitura mais citado foi a bíblia. Destaca-se um número alto de pessoas idosas que relatou não gostar de ler, influenciando a alta prevalência do baixo nível de letramento. **Conclusões**: Propõe-se aqui, que intervenções que visem garantir a promoção da saúde, devem verificar o nível de letramento dos indivíduos.

Descritores: Comunicação em Saúde; Idoso; Educação em Saúde.

#### **RESUMEN**

Objetivo: Analizar la asociación entre las características socioeconómicas y el nivel de alfabetización de los adultos mayores atendidos en el Sistema Único de Salud en el municipio de Pinheiro, Maranhão, Brasil. Método: se seleccionaron 121 adultos mayores aptos para participar en el estudio. Resultados: la mayoría era de sexo femenino, tenía entre 60 y 64 años, educación básica y no tenía ocupación después de jubilarse. El 60,3% tiene baja alfabetización. Hay una diferencia estadísticamente significativa entre la baja alfabetización y las variables sexo, edad, educación y tipo de ocupación. Las mujeres tienen mayor nivel de alfabetización, y cuanto más avanzada es su edad, menor es su alfabetización. La población de adultos mayores jubilados mostró un mayor nivel de alfabetización. El tipo de material de lectura más citado fue la Biblia. Hay un gran número de personas mayores que informaron no disfrutar de la lectura, lo que influye en la alta prevalencia de baja alfabetización. Conclusiones: se propone que las intervenciones dirigidas a garantizar la promoción de la salud verifiquen el nivel de alfabetización de las personas.

**Descriptores**: Comunicación en Salud; Adultos Mayores; Educación para la salud.

#### INTRODUCTION

The elderly person is considered, in Brazil, every individual with 60 years or more, while in developed countries, it is the one who is 65 years old or more. The population aging is understood as a natural phenomenon, which is irreversible and occurs worldwide. When speaking at the national level, we emphasize that the elderly Brazilian population has grown rapidly and in proportional terms. Within this group, those with more advanced age,

above 80 years old, have also been increasing proportionally and at a more accelerated rate.<sup>1</sup>

According to statistical estimates by the World Health Organization (WHO), in the period from 1950 to 2025, the group of elderly people in Brazil is expected to increase by fifteen times, while the total population in general, is expected to increase by five. This demonstrates the importance of providing actions aimed at promoting the health of these individuals, as

well as learning specific language skills, with the adoption of information and activities that are geared to each one's reality, that is, acquiring health education practices (HE) for the elderly.<sup>2</sup>

Since 2006, the health of the elderly person is considered a priority in health care services, being advocated in the Public Health Policies, which enabled health actions aimed at this group. Among these cares, it is necessary to consider an appropriate communication carried out by health professionals so that care is understood and, thus, performed by the client himself.

According to the National Curriculum Guidelines for medical courses, the communication is one of the general competences to be developed and reinforces that the curricula must include the human and social sciences, referring specifically to contents that involve communication. Thus, health professionals must have language skills that meet the dynamics of the language, that is, the adequacy and narrowing of the communication process.<sup>3</sup>

Research on health education with elderly people, concluded that improving health learning can be an effective strategy to improve health status and to reduce hospital stay and the need to use emergency services among elderly patients.<sup>4</sup> Identify the level of individual HE is an arduous task, which can occur due to the individual's

limitation and / or the professionals difficulty in identifying the level of learning of their patients, sometimes, overestimating, their understanding in the information provided.

Thus, most doctors are unable to identify the problem and are not prepared to deal with the patient who has inadequate HE. This deficit is perpetuated by other health professionals in the Unified Health System because they are unprepared or due to the same difficulty in passing on information such as what happens to the doctors. In HE, an approach created from the concept emerged from two different roots, in clinical care and public health, in which the individuals need to present efficiently a functional competence to use and interpret texts, numerical values and documents.<sup>5</sup> It would be the ability of the person to understand elderly the information passed on a drug prescription, or other information prescribed by health professionals.

The successful control of many acute and chronic diseases is influenced by the understanding of health information and, by offering additional support to individuals who may have difficulty understanding it, will make it possible to obtain an influence on clinical outcomes.<sup>6</sup>

Thus, one realizes the importance of quantifying the HE level of elderly people with a chronic condition, and seeking to qualify the ability to understand health information. This experience is made possible by using tools that may be possible to be accessible to those who will pass on the information, and to those who will receive it.

Considering the provision of adequate health learning to the elderly, it is understood the importance of this being carried out by health professionals who are in direct and frequent contact with the elderly. It is essential to assist the elderly in their cognitive growth based on an adequate training of these professionals. Researchers claim that a low HE on the part of patients can pose a risk to their lives, as there is no clear understanding of the information passed on.<sup>2,5-7</sup> The authors then recommend three proposals: universal precautions that assume health education for all health users, expanding the use of communication technology, and clinical incentives that count for health education.

A research is then outlined in order to provide health promotion for the elderly person parallel to a practice of specific communication within a humanized approach and the importance of health education.

Thus, the object of study is the association of health education in hypertensive and/or diabetic elderly people with their socioeconomic characteristics. As a hypothesis that instigated us to carry

out this project, we had: "The level of health education of hypertensive and / or diabetic elderly people is directly associated with unfavorable socioeconomic conditions".

In view of this, the research problems that we seek to clarify were constructed as follows: What is the level of health education of elderly people assisted in the Unified Health System? Is this level of health education associated with the socioeconomic characteristics of this group? This article aims to analyze the association of socioeconomic characteristics with the level of health education of elderly hypertensive and / or diabetic people seen in the Unified Health System in the municipality of Pinheiro, Maranhao, Brazil.

#### **METHODS**

This is a cross-sectional study that sought to analyze the association of socioeconomic characteristics with the level of health education of elderly people attended in the Unified Health System of the municipality of Pinheiro, Maranhão, Brazil, in 2019.

The research had as inclusion criteria individuals aged 60 years or older, registered at *e-SUS* (Health Unified System) with a diagnosis of hypertension and / or diabetes mellitus, accompanied by a local public health service, active, with apparent cognitive capacity and preserved

visual acuity, analyzed by the Snellen test. As an exclusion criterion, elderly people who are not undergoing treatment and follow-up by a local public health service will not participate in the research.

For the formation of the results, convenience sampling was chosen due to the low acceptance of elderly people to invitations to participate in research. Thus, the data were collected in a referral unit for the care of elderly people with systemic arterial hypertension and / or diabetes. The collection period was from September 2018 to February 2019. As older people attended, the test was carried out to assess their education learning.

The Health Education Test (HET) was applied, together with a questionnaire with closed questions related to socioeconomic The **HET** data. understood as a questionnaire in Portuguese that assesses health education, which was developed based on the translation and adaptation of the TOFHLA (Test of Functional Health Literacy in Adults) to the Brazilian reality, which considers the aspects of language and cultural. With the HET, it is possible to assess the impact of low health education on the Brazilian population, as well as to identify individuals who need special instructions.<sup>8</sup>

Research highlights that, if there is a goal of carrying out health education, the best tool to be worked on is the simplified version of TOFHLA, called S-TOFHLA.<sup>9</sup> The readability level of the text will be calculated according to the Gunning Fog Index, through an online free software tool (which calculates the readability of passages), identified as "Online-Utility org: Utilities for Online Operating System: Tests Document Readability".<sup>10</sup>

The S-TOFHLA is an instrument that was designed to meet the need for a smaller and faster measure for screening Functional Health Education. The test consists of 36 reading comprehension questions, containing only TOFHLA Passages A and B. The instrument was timed in 7 minutes. The aforementioned correlation of r = 0.91with the long TOFHLA guarantees the S-TOFHLA a good estimate of Functional Health Education in terms of reading comprehension, which can therefore be considered an instrument capable of measuring such capacity<sup>8</sup>. The use of the reduced version is also justified due to the profile of the research participants, who are elderly people with a chronic condition.

Together with the S-TOFHLA, an instrument considered to be of great importance for the evaluation of education, called the Cloze Technique, was also worked on. In it was presented a worked text of thesis that is a paragraph extracted from a manual of the Ministry of Health on healthy eating. 9,11

This chosen Cloze modality is called "Cloze Lexical". 12 In this case, lexical items (nouns, adjectives, adverbs, etc.) were omitted. In this technique, a text was presented with gaps to be filled by the elderly person. The filling could be done by the participant or, if he / she preferred, the interviewer could write what the elderly person informed. In the selected text, there were 5 gaps filled in "Fats are sources of energy. The frequent and large consumption of \_\_\_\_\_ fats \_\_\_\_\_, and salt increases the risk of \_\_\_ diseases \_\_\_ such as obesity, high blood pressure, diabetes and \_\_\_\_\_ of the heart. Always use salt fortified with iodine (iodized salt). Reduce the consumption of foods and beverages concentrated in fats, sugar and salt". 11

After data collection, a sum of the numbering scores (S-TOFHLA) and text comprehension scores (Cloze Technique) was performed. In the numbering score, each correct answer had a weight of 2 points in the score, and each correct answer in the Cloze technique had a weight of 7 points, which added up to a total of 100 score points.

In case of reaching 0 to 53 points, it was considered Inadequate Functional Health Education; from 54 to 66 points, Marginal Functional Health Education, and from 67 to 100 points, the participant was

considered to have Adequate Functional Health Education.

Absolute and relative frequencies were estimated for the variables of interest and the association of these variables with the level of education was verified using Pearson's chi-square or Fisher's exact tests. Significant differences were considered when the p-value <0.05.

Data were analyzed using the *Stata®* version 14 program (*StataCorp LP*, *College Station*, *Texas*, *United States*).

The study met the ethical criteria, determined in Resolution No. 466/12 of the National Health Council, being submitted to Platform Brazil, for consideration and receiving a favorable opinion number 2,364,412.

#### RESULTS

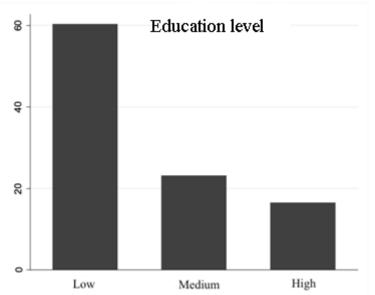
In this research, 121 elderly people who were able to participate in data collection were selected. Of these, the majority were female (61.2%), and aged between 60 and 64 years (39.7%), had only elementary schooling (75.2%), and this educational background was developed in public schools (89.3%), and without occupation after retirement (57%) (TABLE 1).

**Table 1**: Socioeconomic characteristics of elderly people assisted in the Unified Health System, Maranhao, Brazil, 2019.

VARIABLES	n (121)	%	
Gender			
Male	47	38,8	
Female	74	61,2	
Age group (in years)			
60 to 64	48	39,7	
65 to 69	30	24,8	
70 to 74	19	15,7	
75 to 79	16	13,2	
≥80	8	6,6	
Education level			
No schooling	5	4,1	
Elementary School	91	75,2	
High school	20	16,5	
Incomplete higher	2	4,1	
Type of school you attended			
Never been to school	5	4,1	
Public	108	89,3	
Particular	5	4,1	
Others	3	2,5	
Type of occupation			
Rural or field worker	29	24,0	
Trade or construction worker	7	5,8	
Public sector worker	3	2,5	
Service sector worker	3	2,5	
Education sector worker	4	3,3	
Home worker	6	5,0	
Pensioner	69	57,0	

As for the level of education, 60.3% of the elderly have a low level of education, 23.1% have a medium level and only 16.5% had a high level of health education. This shows that, in general, the elderly people

studied have an inadequate level of health education, in which, the higher the level of education, the lower the proportion of elderly people (FIGURE 1).



**Figure 1**: Education level of elderly people assisted in the Unified Health System, Maranhao, Brazil, 2019.

The data also shows that there is a statistically significant difference in the low level of education with the variables sex, age group, scholarity, and the type of occupation. When relating the level of education with socioeconomic variables, it was observed that the female sex is the one with the highest level of education. As for the age group, the more advanced the age,

the lower the level of education, so that this variable demonstrates that, in an elderly population, senility is a factor with a greater influence on the level of learning than the education of the elderly person. The retired elderly population, that is, without occupation during the third age, showed a higher level of education (TABLE 2).

**Table 2**: Distribution of education level according to socioeconomic characteristics of elderly people attended in the Unified Health System, Maranhao, Brazil, 2019.

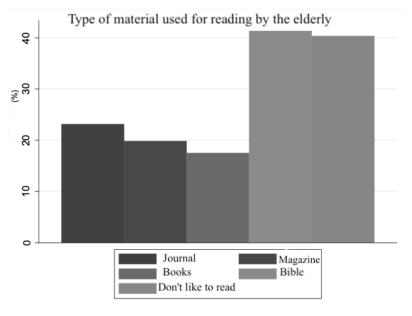
	Education Level			
VARIABLES	Low	Medium	<b>High</b> 16,5	p-value
	60,3	23,1		
Gender				
Male	28,4	10,9	7,8	0.024*
Female	44,6	17,1	12,2	0,034*
Age group (in years)				
60 to 64	29,0	11,1	7,9	
65 to 69	18,1	6,9	5,0	
70 to 74	11,5	4,4	3,1	0.041**
75 to 79	9,7	3,7	2,6	
≥80	4,8	1,9	1,3	
Education level				
No schooling	3,0	1,2	0,8	
Elementary School	54,9	21,1	15,0	0.001**
High school	12,1	4,6	3,3	0,001**
Incomplete higher	3,0	1,2	0,8	
Type of school you attended				
Never been to school	3,0	1,2	0,8	0,099**
Public	65,2	25,0	17,9	
Particular	3,0	1,2	0,8	0,099***
Others	1,8	0,7	0,5	
Type of occupation				
Rural or field worker	17,5	6,7	4,8	
Trade or construction worker	4,2	1,6	1,2	
Public sector worker	1,8	0,7	0,5	
Service sector worker	1,8	0,7	0,5	0,009**
Education sector worker	2,4	0,9	0,7	
Home worker	3,6	1,4	1,0	
Pensioner	41,6	16,0	11,4	

Notes: \* Pearson's Chi-square test; \*\* Fisher's exact test.

As for the type of reading material used by the public studied, most cited the Bible as the main one. However, there is a high number of elderly people who reported

not liking to read, which may have an influence on the high prevalence of individuals with low level of health education (FIGURE 2).

**Figure 2**: Type of material used for reading by elderly people seen in the Unified Health System, Maranhão, Brazil, 2019.

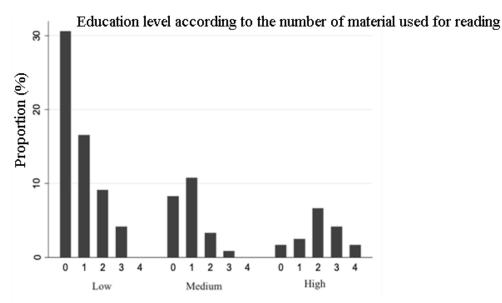


**Notes**: \* Fisher's exact test.

**p-value** \*: 0.001

This data can be confirmed by analyzing the level of education according to the number of material used for reading, in which those elderly people who reported not having a reading habit were those who had a low level of education, while those who had a greater reading habit. had a high level of health learning (FIGURE 3).

**Figure 3**: Education level according to the number of material used in reading (newspaper, magazine, books and bible) by elderly people assisted in the Unified Health System, Maranhão, Brazil, 2019.



**Notes**: \* Fisher's exact test.

**p-value** \*: 0.001

## **DISCUSSION**

Reporting the percentage of the population with inadequate HE is a major challenge. The Brazilian population, in general, has difficulties in reading and understanding information, especially in the health area. 13 Surveys carried out by the Education **Functional** Indicator. instrument that deals with the evaluation of education in Brazil in general, revealed that, among Brazilians in the 15 to 64 age group, 27% classified were as functional illiterates. 14-15

In this study, it was observed that a high percentage of people with chronic

conditions had an inadequate HE level. Most patients presented some level of difficulty when they needed to read the entire sentence, process some information within the context of the questionnaire and identify the word that completed its meaning, as well as understand the text presented. Studies point to an association between the individual's cognitive and chronic disease, such as arterial hypertension and diabetes.<sup>4, 16-17</sup>

As for the best way to work with the information given to the patient, a study revealed that working with people with a chronic condition through written information and reading techniques are better accepted than information that

individual requires the to perform mathematical calculations.<sup>16</sup> Contrary to this study, authors observed that there were no differences in the average score obtained between the numerical part and the reading sections. This suggests, then, that the degree of difficulty in a patient occurs both to understand reading health texts and to interpret numbers or perform calculations are necessary for the proper understanding, for example, of medical prescriptions and results of laboratory tests.8 Thus, new alternatives must be considered so that care is guaranteed in this profile of patients.

The results of this research demonstrated that the participants were predominantly in the most advanced age groups and with less education, given that this is similar to another study. 16 This result reveals that the inadequate HE is related to factors such as age and years of study, and not just because the fact of having a chronic condition. Regarding the age variable, the result presented may reflect what the underlying disease itself and physiological process of aging provide to the individual's cognitive.<sup>17</sup>

As for the gender variable, it was noticed that women had the highest levels of education. However, this variable brought contrasts in other studies, in which they did not identify an association between sex and health education. The divergence

between the association between education level and gender can be due to the sociocultural differences of the places where the research was carried out.<sup>2,5,18</sup>

However, it is suggested that women have a better level of education due to the functions they perform, in addition to better adherence and frequency of attendance to health services. All of this could contribute to better performance in health learning skills, although this fact has not been confirmed in studies.<sup>5</sup>

It is noticed, then, that an inadequate HE demonstrates an association with health care of worse quality and higher cost, in addition to being associated with greater difficulties to adhere to drug treatment.<sup>8</sup>

This article started from the hypothesis that less education is associated with inadequate health learning. Research also points out that lower health education is more commonly seen in low-income population groups, as also observed in the results.<sup>5,19-20</sup>

This study demonstrates the need for greater attention to the health of the researched public. This is due to the importance of the role of patients in their health care, which must be based on changes in lifestyle, regular physical activity and diet control, in addition to adequate guidance on the therapeutic itinerary that involves medications.<sup>16</sup>

When it comes to health care, it is essential that professionals develop communication skills that ensure patients acquire minimal learning skills. It is worth remembering that actions that involve the training of users for self-care include professionals and the current health system. Thus, knowing whether there was quality in health care, in order to guarantee success in care, depends on understanding about the information that is relevant to the conditions of patients with chronic conditions. <sup>16</sup>

These efforts to improve the quality of teaching to the user must occur in conjunction with access to formal education and longer schooling. Thus, those patients with less education demand more attention, as they have a greater possibility of difficulty regarding HE. Even though this study did not show that people with a higher level of education had inadequate HE, it is possible that this will happen.<sup>5</sup>

The use of simpler terms and language, adapted to the local reality, is important when providing guidance to especially those with patients, schooling or those who have inadequate HE. Performing the HE test can be a useful tool in this health education process, since a better understanding produces a greater ability to promote self-care and. consequently, better quality of life and less morbidity or worsening of the chronic condition.8,19

It is proposed here, that interventions that aim to guarantee health promotion, should, first of all, check the individual's HE level. This is due to the understanding that the HE seeks to develop skills and knowledge on the part of the user so that he promotes his self-care, becoming responsible for the control of his health and factors that can harm it.<sup>19</sup>

#### **CONCLUSION**

In view of the results presented, there is an expectation that the use of HE together with health technologies makes it possible to promote health, improve the quality of life of the individual, mediate the care that the individual promotes to himself, with the awareness of healthier practices in life.

There is a need for the information passed on and taught to be adapted for each elderly person, according to their level of education, so that the principle of equity proposed by *SUS* is respected and practiced in health units. And, when seeking integrality in the care of the elderly people, one observes the importance of the role of all health professionals, who can come to help the population to be caregivers of their own health, in addition to maintaining the bridge service of community health.

Studies focused on the education level of elderly people with a chronic condition need to be expanded, since this only covered the local reality, which is a limitation in the study. Despite the use of the instrument in its reduced version, there were many dropouts and refusals on the part of some guests to participate in the study, requiring future studies to review a possible

#### REFERENCES

- Ministério da Saúde (Brasil), Secretaria de Atenção à Saúde, Departamento de Ações Programáticas e Estratégicas. Atenção à saúde da pessoa idosa e envelhecimento. [Internet]. Brasília, DF: Ministério da Saúde; 2010 [citado em 04 nov 2021]. 44 p. Disponível em: https://bvsms.saude.gov.br/bvs/publ icacoes/atencao\_saude\_pessoa\_idos a\_envelhecimento\_v12.pdf.
- 2. Rocha PC, Lemos SMA. Aspectos conceituais e fatores associados ao letramento funcional em saúde: revisão de literatura. Rev CEFAC. [Internet]. 2016 [citado em 07 mai 2021]; 18(1):214-55. Disponível em: https://www.scielo.br/j/rcefac/a/MFFTcTVRh8PWNFvh88GSWdC/?lang=pt&format=pdf. doi: 10.1590/1982-021620161819615
- 3. Ministério da Educação (Brasil). Resolução nº 3, de 20 de junho de 2014. Institui Diretrizes Curriculares Nacionais do curso de graduação em Medicina e dá outras providências. Diário oficial da União [Internet], Brasília, DF, 23 jun 2014 [citado em 14 out 2019]; Seção 1:8-11. Disponível em: http://portal.mec.gov.br/index.php? option=com\_docman&view=downl oad&alias=15874-rces003-14&category\_slug=junho-2014-pdf&Itemid=30192

approach with this elderly target public. There is also a need for studies aimed at analyzing whether health guidelines provided by the education level of each individual brings positive impacts on the health of the target public.

- 4. Ng TP, Feng L, Nyunt MSZ, Feng L, Gao Q, Lim ML, et al. Metabolic syndrome and the risk of mild cognitive impairment and progression to dementia: follow-up of the Singapore longitudinal ageing study Cohort. JAMA Neurol. [Internet]. 2016 [citado em 07 mai 2021]; 73(4):456-63. Disponível em: https://jamanetwork.com/journals/j amaneurology/fullarticle/2491655. doi: 10.1001/jamaneurol.2015.4899
- 5. Marques SRL, Lemos SMA.
  Letramento em saúde e fatores
  associados em adultos usuários da
  atenção primária. Trab Educ Saúde.
  [Internet]. 2018 [citado em 07 fev
  2020]; 16(2):535-59. Disponível
  em:
  http://www.scielo.br/scielo.php?scr
  ipt=sci\_arttext&pid=S198177462018000200535&lng=en&nr
  m=iso. doi:
  https://doi.org/10.1590/1981-7746-

sol00109

6. Santos LTM, Bastos MC.
Desenvolvimento de material
educacional sobre doença renal
crônica utilizando as melhores
práticas em letramento em saúde. J
Bras Nefrol. [Internet]. 2017
[citado em 25 dez 2020]; 39(1):558. Disponível em:
http://www.scielo.br/scielo.php?scr
ipt=sci\_arttext&pid=S010128002017000100055&lng=en&nr
m=iso. doi:
https://doi.org/10.5935/01012800.20170009

- 7. Pinhat RR, Tavares PL, Marsicano EO, Fernandes NS, Colugnati FAB, Bastos MG, et al. Low health literacy in older patients with uncontrolled blood pres-sure at secondary care. HU Rev .[Internet]. 2019 [citado em 23 dez 2020]; 45(1):13-21. Disponível em: https://pesquisa.bvsalud.org/gim/re source/en/biblio-1048137.
- 8. Maragno CAD, Mengue SS, Moraes CG, Rebelo MVD, Guimarães AMM, et al. Teste de letramento em saúde em português para adultos. Rev Bras Epidemiol. [Internet]. 2019 [citado em 20 jan 2020]; 22:e1900025. Disponível em:
  - https://www.scielosp.org/pdf/rbepi d/2019.v22/e190025/pt. doi: 10.1590/1980-549720190025
- 9. Passamai MPB, Sampaio HAC, Dias AMI, Cabral LA. Functional health literacy: reflections and concepts on its impact on the interaction among users, professionals and the health system. Interface (Botucatu, Online). [Internet]. 2012 [citado em 07 mai 2021]; 16(1):301-14. Disponível em:
  - https://www.scielo.br/j/icse/a/yWpr LXc57D8G4jM5DpVH68c. doi: https://doi.org/10.1590/S1414-32832012005000027
- 10. Online-utility.org. Utilities for online operating system. Tests document readability. [Internet]. 2016. [citado em 07 mai 2021]. Disponível em: http://www.online-utility.org/english/readability\_test\_and\_improve.jsp. Acesso em: 27 out 2019.
- 11. Ministério da Saúde (Brasil),
  Secretaria de Atenção à Saúde,
  Departamento de Atenção Básica,
  Coordenação-Geral da Política de
  Alimentação e Nutrição. Guia
  alimentar para a população
  brasileira: promovendo a

- alimentação saudável [Internet] Brasília, DF: Ministério da Saúde. 2008 [citado em 07 mai 2021]. 210 p. Disponível em: https://bvsms.saude.gov.br/bvs/publ icacoes/guia\_alimentar\_populacao\_ brasileira.pdf.
- 12. Condemarín M, Milicic N. Test de Cloze: procedimiento para el desarrollo y la evaluación de la comprensión lectora. Santiago: Editorial Andrés Bello; 1988. 175 p.
- 13. Lima MFG, Vasconcelos EMR, Borba AKOT. Instrumentos utilizados para avaliar o letramento funcional em saúde de idosos com doença renal crônica: revisão integrativa. Rev Bras Geriatr Gerontol. [Internet]. 2019 [citado em 06 fev 2020]; 22(3): e180198Disponível em: http://www.scielo.br/scielo.php?script=sci\_arttext&pid=S1809-98232019000300301&lng=en&nrm=iso. doi: https://doi.org/10.1590/1981-22562019022.180198
- 14. Bezerra JNM, Lessa SRO, do Ó MF, Luz GOA, Borba AKOT. Letramento em saúde dos indivíduos submetidos à terapia dialítica. Texto Contexto Enferm. [Internet]. 2019 [citado em 20 jan 2020]; 28: e20170418. Disponível em: http://www.scielo.br/pdf/tce/v28/pt
  - \_1980-265X-tce-28e20170418.pdf. doi: http://dx.doi.org/10.1590/1980-265X-TCE-2017-0418
- 15. Instituto Paulo Montenegro.
  Indicador de Alfabetismo
  Funcional INAF: estudo especial
  sobre alfabetismo e mundo do
  trabalho [Internet]. 2016 [citado em
  19 jan 2020] Disponível em: http://
  acaoeducativa.org.br/wpcontent/uploads/2016/09/INAFEstu

- dosEspeciais\_2016\_Letramento\_e\_ Mundo\_do\_Trabalho.pdf.
- 16. Borges FM, Silva ARV, Lima LHO, Almeida PC, Vieira NFC, Machado ALG. Letramento em saúde de adultos com e sem hipertensão arterial. Rev Bras Enferm. [Internet]. 2019 [citado em 06 fev 2020] 72(3):646-53. Disponível em: http://www.scielo.br/scielo.php?scr ipt=sci\_arttext&pid=S0034-71672019000300646&lng=en&nr m=iso. doi: https://doi.org/10.1590/0034-7167-2018-0366
- 17. Oliveira MFB, Yassuda MS, Aprahamian I, Neri AL, Guariento ME. A hipertensão, o diabetes e a obesidade estão associados ao menor desempenho cognitivo em idosos residentes na comunidade: dados do estudo fibra. Dement Neuropsychol.[Internet]. 2017 [citado em 12 jan 2020]; 11(4):398-405. Disponível em: https://www.scielo.br/j/dn/a/c7TwP pwCvW5DqqM3wQBn7gt. doi: https://doi.org/10.1590/1980-57642016dn11-040009
- 18. Sampaio HAC, Carioca AAF, Sabry MOD, Santos PM, Coelho MAM, Passamai MPB. Letramento em saúde de diabéticos tipo 2: fatores associados e controle

- glicêmico. Ciênc Saúde Coletiva. [Internet]. 2015 [citado em 07 mai 2021]; 20(3):865-74. Disponível em: https://www.scielo.br/j/csc/a/M7DP XvrQjjb6P8qRSQP9nwx. doi: https://doi.org/10.1590/1413-81232015203.12392014
- 19. Chehuen Neto JA, Costa LA, Estevanin GM, Bignoto TC, Vieira CIR, Pinto FAR, et al. Letramento funcional em saúde nos portadores de doenças cardiovasculares crônicas. Ciênc Saúde Coletiva. [Internet]. 2019 [citado em 20 jan 2020]; 24(3):1121-32. Disponível em: https://www.scielosp.org/article/csc/2019.v24n3/1121-1132/. doi: https://doi.org/10.1590/1413-81232018243.02212017
- 20. World Health Organization,
  Regional Office for Europe. Health
  literacy: the solid facts. Denmark:
  WHO Regional Office for Europe;
  2013 [citado em 20 jan 2020].
  Disponível
  em: htttp://euro.who.int/\_data/asset
  s/pdf\_file/0008/190655/e96854.pdf

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