

Study on the relationship between active ageing activities and the degree of satisfaction in older adults during Covid-19

Estudio sobre la relación entre las actividades de envejecimiento activo y el grado de satisfacción en los adultos mayores durante el Covid-19

*María José Flores-Tena, **Carlos Sousa Reis

*Universidad Autónoma de Madrid (España), **Universidad de Coimbra (Portugal)

Abstract. This research aimed to study the relationship between the frequency of participation of older adults in active ageing programs and the satisfaction they obtain from this experience. The research was quantitative, cross-sectional, and relational; and an intentional non-probability sampling was applied to select 800 persons over 65, corresponding to users of various senior centres located in four districts of Madrid, Spain. The data collection instrument consisted of 29 easy-to-understand questions grouped into six dimensions. Results of the questionnaire indicate that users are satisfied with the activities and services offered by the centres since they manage to establish new relationships and learn new skills through group workshops that contribute to their personal enrichment. According to 78% of the respondents, participation in workshops and other group activities contribute to a better quality of life in the elderly, and no statistically significant differences were found between the users' degree of satisfaction and gender. This research provides possible improvements in areas that will contribute to preventing dependence; for example, those in which there is a greater demand from users. As proposals for improvement, we suggest designing specific strategies to obtain more male participation in senior centre workshops.

Keywords: Active ageing; free time; life expectancy; leisure; permanent education.

Resumen. Esta investigación tuvo como objetivo estudiar la relación entre la frecuencia de participación de los adultos mayores en programas de envejecimiento activo y la satisfacción que obtienen de esta experiencia. La investigación fue cuantitativa, transversal y relacional; y se aplicó un muestreo no probabilístico intencional para seleccionar a 800 personas mayores de 65 años, correspondientes a usuarios de varios centros de mayores ubicados en cuatro distritos de Madrid, España. El instrumento de recogida de datos consistió en 29 preguntas de fácil comprensión agrupadas en seis dimensiones. Los resultados del cuestionario indican que los usuarios están satisfechos con las actividades y servicios que ofrecen los centros ya que consiguen establecer nuevas relaciones y aprender nuevas habilidades a través de talleres grupales que contribuyen a su enriquecimiento personal. Según el 78% de los encuestados, la participación en talleres y otras actividades grupales contribuyen a mejorar la calidad de vida de las personas mayores, y no se encontraron diferencias estadísticamente significativas entre el grado de satisfacción de los usuarios y el género. Esta investigación aporta posibles mejoras en áreas que contribuirán a prevenir la dependencia; por ejemplo, aquellas en las que existe una mayor demanda por parte de los usuarios. Como propuestas de mejora, se sugiere diseñar estrategias específicas para conseguir una mayor participación masculina en los talleres de los centros de mayores.

Palabras clave: Envejecimiento activo; tiempo libre; esperanza de vida; ocio; educación permanente.

Introduction

Greater longevity of the population is considered one of the defining characteristics of the 21st century, which is reflected in the notable increase in the elderly population that has occurred in the last two decades (United Nations [UN] 2020). Statistics issued by the United Nations (UN) in its report «World Population Prospects 2019», indicate that by 2050, 16% of the world's population, or one in six people, will be over 65

years old. This is an important increase compared to the year 2019, in which 9% or one in 11 people were over 65 years old. The UN also notes that by 2050 the number of people aged 80 or over will reach 426 million, a considerable increase to the existing 143 million by 2019 (UN 2020). For this reason, international interest in measuring the quality of life of older adults has increased, as well as the design of international action plans that ensure the quality of life of older adults and better ageing. These plans take into account the things those older adults consider important in life, to align the objectives with the expectations of the beneficiaries (Van Leeuwen et al. 2019).

In the 60s, articles about life satisfaction were

published, in the 70s the concept of quality of life emerged; and later in the 80s, the concept of subjective well-being became dominant (Fernández 2009). In parallel, the idea that these concepts would be connected to active ageing has been developed, giving new meanings to the understanding of both concepts. In the 1990s, the World Health Organization (WHO) presented a seminal definition that understood the concept as «the process of optimizing opportunities for health, participation and security in order to enhance the quality of life as people age.» (2002, 12) However, we should not forget the contribution given by the renowned Jacques Delors Report (1996, 40). At the same time, several other initiatives of governmental and non-governmental organizations have offered a policy framework that emphasizes the link between activity, health, independence and healthy ageing. Being of unquestionable importance as a key policy concept, efforts to add some empirical evidence on its operational definition and criteria are still scarce. The WHO (2015, 5), more recently, has come to define active ageing as «the process in which opportunities for health, participation and security are optimized in order to improve the quality of life of people as they age.» Although some authors argue that there is no encompassing definition for active ageing, many agree that it is a multidimensional concept, which involves physical and cognitive fitness, social participation, health, affection, and positive control (Fernández et al. 2017; Dumitrache et al. 2017). Synthesizing, one could say that, active ageing corresponds to an adaptation process through which optimal physical, psychological and social development is achieved (Rodríguez et al. 2013; Hulya, et. Al. 2015).

Active ageing requires the progress of society in political, social, and cultural aspects; greater investment in social security, pensions, and health systems; and a greater number of activities that promote a better quality of life, autonomy and health in older adults (Dumitrache et al. 2017). In Latin America and the Caribbean, countries such as Argentina, Mexico, Costa Rica and Uruguay have begun to evaluate the implementation of agreements in the areas of health, legislation, labour and social security, focusing on the elderly. These countries give great importance to healthy ageing and health in general, the aim being to provide a better quality of life through policies and programs.

In Europe, the concept of active ageing contains the idea that ageing involves, rather than the acceptance of dysfunctions and alterations associated with ageing, the

optimization of the potentialities and possibilities of growth and personal development (Flores-Tena, 2020). International and Spanish institutions demand the implementation of policies, initiatives and programs that improve health and well-being throughout life, allowing active ageing to be maintained and implemented as a routine (Caprara et al. 2013).

Sociocultural animation is an educational practice that seeks to promote the integration and active participation of people, in search of their social development and a better quality of life (Pérez et al. 2020). Chavero-Tapia (2020) mentions the four fundamental pillars of the education of human beings: learn to know, learn to do, learn to live together and learn to be; indicating that these must be included effectively in educational environments so that education can evolve positively in the human being. Leisure, as a social and cultural element, does not remain foreign to such evolution and, in turn, contributes from the personal, social and economic point of view to the configuration of certain habits, lifestyles, different ways of understanding rest and recreational development of new activities. Lima, A., et al. (2021) and Breheny and Stephens (2017) point out that active leisure generates expectations around healthy ageing, which is necessary for active ageing. It seems also important to work through different projects to establish affective bonds that gratify the curiosity to learn and establish relationships between them (Mérida-Serrano, et al. 2018, 329). In particular, the activities that are developed in senior centres benefit the methodologies of play and movement as the transversal axis for the integration of participants obtaining better physical conditions, motor skills, prevention of sedentary lifestyles and mental health (Padiál-Ruz et al. 2019, 396).

Currently, older adults have a greater social role, thanks to inclusion in the environment where they live. Old age is an irreversible definitive state, a natural process of every living being (Zieliński, 2015) where each individual ages differently (Bruno and Alemán, 2016). It is important to consider ageing and old age from a psychosocial perspective and not only from a biological perspective (Fernández, 2011).

In senior centres, it is perceived that many older women are afraid to give their opinion or explain their way of thinking since they easily fall into the inertia, routines and stereotypes of traditional social practices. Another major problem faced by older women alone regarding leisure is that they do not know how to use their free time (Gu, 2018).

Regarding the relationship between personal

perception of ageing and longevity, there is evidence that positive perceptions, attitudes, and thoughts in the elderly increase their life expectancy (De Haro et al., 2015). On the contrary, discrimination based on perceived age tends to generate dissatisfaction and unhealthy sequelae in older adults (Fernández et al., 2017).

Because of the above, the following research questions and hypotheses are presented that will facilitate the exploration of the relationship between active ageing activities and the satisfaction experienced by older adults:

How often do older adults participate in recreational activities aimed at promoting active ageing?

What are the active ageing activities that they enjoy the most?

What is the total degree of satisfaction of older adults who participate in active ageing activities?

Similarly, the following research hypothesis is proposed:

Hypothesis 1: There is a relationship between active ageing activities and the satisfaction of older adults.

Hypothesis 2: The degree of satisfaction experienced is different in men and women.

Thus, the main purpose of this article was to study the relationship between the frequency of participation of older adults in active ageing programs, and the satisfaction they obtain from this experience.

Theoretical framework

In Spain, one of the challenges that our society must face, to alleviate social inequalities, is the coverage of the welfare and economic needs of the retired and elderly population, the preparation for the retirement of people between 55 and 65 years, and the creation or development of resources for the occupation of free time (Hernández 2009).¹

The universality in the access of all people in a situation of dependency, in conditions of effective equality.

Attention to people in situations of dependency in an integral and integrated way.

The participation of people in a situation of dependency and, where appropriate, their families and entities that represent them in the terms provided in this Law.

The inclusion of the gender perspective, considering the different needs of women and men.

The World Health Organization (WHO) defines active ageing as the process of opportunities, about the

physical, social, and emotional spheres, which improve the quality of life of the elderly (World Health Organization 2002).

In 2012, the *European Year of Active Ageing and Intergenerational Solidarity* was celebrated. In Spain, the organization was the responsibility of the Ministry of Health, IMSERSO. The activities covered different areas: awareness, training and information. Recently in 2017, the II International Congress «Active ageing, quality of life and gender» was held.

Therefore, ageing should not be considered a problem, but a challenge for everyone, both for society and the ageing individual (Abellán and Esparza 2009). To achieve active ageing, it is essential to have a positive vision of ageing (Limón and Chalfoun 2017) which can be achieved through education and social participation (Fernández et al. 2017). The older people have abilities and resources, where they are «subjects of the future, active protagonists, willing to redefine themselves through their ability to be mentally open to new experiences, to the changes and opportunities they can develop themselves» (Escotorin and Roche 2011 pp. 18). In any case, it is not about «prescribing» or «imposing» a unique pattern of active ageing, given the heterogeneity of ageing and the variability that exists in the way of ageing from one person to another. The educational action must be developed in a consensual, reflective and dialogic way and respecting their autonomy.

Materials and Methodology

Study design

This study is quantitative and cross-sectional. The data collection instrument consisted of 29 easy-to-understand questions, given that the recipients were elderly people. Questions were grouped into six dimensions: personal information; knowledge and access to senior centres; organizational structure and operation; service use, frequency and abilities development; benefit obtained and degree of satisfaction; and improvement proposal. Se usó una escala Likert de cinco valores para medir los reactivos. Questionnaire content was validated by five experts, who assessed the dimensions and verified that the questions were formulated according to the objectives set. Reliability was calculated with Cronbach's Alpha, which gave a value of 0.821, considered acceptable according to George and Mallery (2003 pp. 231), who argue that after 0.7 the questionnaire is acceptable. Data were

analyzed using the SPSS statistical package.

The sampling was of a non-probabilistic-intentional type, in which four districts of Madrid were selected: Carabanchel, Tetuán, San Blas and Villaverde. Two hundred users from the senior centres were chosen from each district. A series of inclusion criteria were established, which are mentioned below: Be at least 65 years old. Be autonomous and physically able to participate in the activities carried out in the senior centres. Have good cognitive performance and be able to answer the questions of the questionnaire on its own. For this, a mental state test was previously applied (Lobo et al. 2002) whose approval requirement was to obtain a minimum of 24 points.

The sample consisted of a total of 800 people over 65 years of age, corresponding to users of various centers for the elderly located in four districts of Madrid, Spain. There was a greater female presence in the sample, with a total of 488 women, and 312 people belonging to the male gender. On the other hand, 200 older people from each of the districts studied participated, which guaranteed an equivalence in the results obtained for the rest of the variables analyzed in this study

Results

Table 1 shows that most of the participants in the sample knew about the senior centre through the recommendation of relatives and neighbours, who offered their recommendations for the admission of older adults (70.8%). A smaller percentage of older adults (25.6%) knew about the senior centres on their initiative.

Table 1.
Knowledge about the senior center

	Frequency	Percentage	Valid percentage	Accumulated percentage
Relatives/neighbors	566	70.8	70.8	70.8
Own initiative	205	25.6	25.6	96.4
Seniors agenda	3	.4	.4	96.8
Social services	26	3.3	3.3	100.0
Total	800	100.0	100.0	

Regarding the frequency with which older adults attend the senior centre (Table 2), 31.8% make visits once a week. Only 7.6% visits the centre once a month, while the rest do so more frequently: daily (30.1%) and twice a week (30.5%).

Table 2.
Frequency of attendance at the senior center

	Frequency	Percentage	Valid percentage	Accumulated percentage
Daily	241	30.1	30.1	30.1
Weekly	254	31.8	31.8	61.9
Twice a week	244	30.5	30.5	92.4
Once a month	61	7.6	7.6	100.0
Total	800	100.0	100.0	

Regarding the satisfaction of older adults with the

schedule of activities proposed to promote active ageing (Table 3), 61.6% of surveyed subjects indicated that they were highly satisfied with the proposed schedule.

Table 3.
Satisfaction with the schedule of activities

	Frequency	Percentage	Valid percentage	Accumulated percentage
More or less satisfied	1	.1	.1	.1
Highly satisfied	493	61.6	61.6	61.8
Very satisfied	306	38.3	38.3	100.0
Total	800	100.0	100.0	

Similarly, we studied the degree of satisfaction of older adults concerning the active ageing activities carried out in the senior centre. As can be seen in Table 4, participants were quite satisfied (85.3%), which indicates that the study subjects feel comfortable with the activity programs that are planned and carried out at the centre.

Table 4.
Degree of satisfaction with activities

	Frequency	Percentage	Valid percentage	Accumulated percentage
More or less satisfied	27	3.4	3.4	3.4
Highly satisfied	682	85.3	85.3	88.6
Very satisfied	91	11.4	11.4	100.0
Total	800	100.0	100.0	

Regarding the frequency with which older adults participate in recreational activities aimed at promoting active ageing, Table 5 shows that there is regular participation.

Table 5.
Contingency table, frequency of activity and activity in which older adults participate

Participation frequency	Activity					Total
	Celebrations	Conferences	Dance	Excursions	Trips	
Nothing	0	5	0	0	0	5
A little	7	0	0	19	100	126
Regular	173	25	67	157	94	516
Quite	25	3	60	63	0	151
A lot	0	0	0	2	0	2
Total	205	33	127	241	194	800

Regarding the active ageing activities most enjoyed by older adults, 34.8% of the subjects in the sample indicated that they enjoyed excursions more (Table 6). On the other hand, 21.6% indicated that the celebrations at the senior centre were satisfactory, while 20.1% of the sample said they enjoy more of the dances organized by the centre.

Table 6.
Most satisfactory activities

Activity	Frequency	Percentage	Valid percentage	Accumulated percentage
Celebrations	173	21.6	21.6	21.6
Conferences	31	3.9	3.9	25.5
Dance at the center	161	20.1	20.1	45.6
Excursions	278	34.8	34.8	80.4
Trips	157	19.6	19.6	100.0
Total	800	100.0	100.0	

Regarding the total degree of satisfaction that older adults experience when participating in active ageing activities carried out in the senior centre, 58% indicated that they were quite satisfied (Table 7). Only 47% said they were regularly satisfied.

Tabla 7.

Degree of satisfaction				
Satisfaction	Frequency	Percentage	Valid percentage	Accumulated percentage
Not at all satisfied	5	.6	.6	.6
More or less satisfied	328	41.0	41.0	41.6
Highly satisfied	464	58.0	58.0	99.6
Very satisfied	3	.4	.4	100.0
Total	800	100.0	100.0	

When studying the relationship between the frequency of participation of older adults in activities to promote active ageing and the degree of satisfaction experienced (Table 8), a positive Spearman's Rho correlation was found, with a bilateral asymptotic significance of $p = 0.038$, which confirms the research hypothesis, that the greater the frequency of participation of older adults in the activities programmed for active ageing, the greater the degree of satisfaction they perceive.

Table 8.

Correlation between activity frequency and degree of satisfaction.

Activity frequency	Correlation coefficient	Satisfaction degree
	Sig. (bilateral)	.073*
	N	800

*The correlation is significant at the 0.05 level (bilateral)

Then, we analyzed the existence of statistically significant differences between the degree of satisfaction of older women and men about active ageing activities. Table 9 presents the results of the Mann Whitney U test, whose bilateral asymptotic significance $p = 0.539$ ($>p = 0.05$) indicates that there are no differences between older men and women. Therefore, the null hypothesis of the research is approved, based on the results obtained in the statistical test.

Table 9.

Differences between degree of satisfaction and gender

	Degree of satisfaction
Mann-Whitney U test	74448,500
Z	-.614
Asymptotic significance (bilateral)	.539

In summary, the results obtained from answer the questions raised, and it was possible to analyze the two hypotheses about the relationship between the frequency of participation of older adults in active ageing activities and the degree of satisfaction, resulting in a positive and statistically significant correlation. On the other hand, the second hypothesis of the research was rejected when verifying that the degree of satisfaction presented by older adults is not dependent on gender.

Discussion

The extensive participation in the activities in senior centres reflects the satisfaction among the participants, and this allowed to achieve to plan new workshops in the coming years; where the education obtained is

reciprocal and generates great personal enrichment.

It was observed that women were more participatory and open to learning as they found benefits, although it has to be noted that the activities carried out at the centre were more related to women than to men. Concerning this finding, Pinzón et al. (2017) found greater participation of women in a group of 170 older adults, in a study that aimed to identify their occupational interests and expectations in social participation.

In this sense, Montero et al. (2011) also reported greater participation of elderly women in activities to stimulate leisure and entertainment as a strategy for the active development of this stage of life. Therefore, it is necessary to implement specific strategies to obtain more male participation in the workshops, as their absence deprives them of receiving a series of benefits such as: the pleasure of learning, feeling motivated, self-satisfaction, being up to date with new technologies, and improve their quality of life. However, it should be noted that as we did not find differences in the degree of satisfaction in older women and men, satisfaction should be equivalent for both, regardless of the activity carried out.

On the other hand, the older adults who participated in the study showed interest in several of the activities, with excursion activities and celebrations generating the greatest satisfaction. These findings confirm the results of Fernández (2011), which reported that in Spain, much of the elderly perceived ageing in a positive way when carrying out activities related to sharing with their peers and family. Therefore, the involvement of loved ones can be an important factor in understanding the enjoyment that older adults experience in each activity in which they participate, which in turn is evidenced by the increased frequency of participation in the activities programmed.

In Fernández's (2011) study, 90% of the elderly who participated in active ageing programs were satisfied with their family relationships and 78.8% were satisfied with their friendly relationships, and they felt safe and confident with the people around them. This agrees with that explained by Abellán and Esparza (2009), who stated that the ageing process should not be a problem, but a challenge for everyone, both for society and the ageing individual.

Urquijo et al. (2008) concluded that older adults who use active, cognitive, and behavioural coping strategies improve their quality of life and explore alternatives for action to overcome the obstacles they face in life; whereas those with personality styles characterized by

preservation, accommodation, and protection are generally interested in meeting the needs of others and are prudent, reserved, and not intending to actively intervene in the course of events. In this research, we identified a high frequency of participation of older adults in the activities promoted in the senior centres, which would represent, according to Urquijo et al. (2008), a positive coping and the guarantee of a higher quality of life.

This would explain the high satisfaction experienced by a part of this group, as according to the results of the questionnaire applied by Monteagudo et al. (2016), about 78% of older adults state that participation in workshops and other group activities contribute to improving their quality of life. The same authors also indicate that older people can prevent dependency through active ageing programs that promote quality of life (Monteagudo et al. 2016). In fact, older adults can actively age by taking the initiative to participate in intergenerational programs (Teater 2016).

When there is a negative perception of old age, the opposite effect occurs, as demonstrated by Levy and Myers (2004), who, after carrying out several experimental and longitudinal studies in older people, concluded that negative stereotypes about old age influence memory, cause stress and poor coping strategies and even predict less longevity. However, the findings of this research show a weekly and daily frequency of attendance at the senior centre and participation in active ageing activities, producing an effect contrary to that found by Flores Ferro et al (2020a). Therefore, our results could be equivalent to those found by Pedrero et al. (2018) who showed in their study that older people who face ageing positively enjoyed better functional health than those who had a more negative opinion.

Conclusions

This study was undertaken during the Covid-19 pandemic, between January and April which functions as a limitation regarding any intent of comparison to other studies. One should bear in mind that the sample was of convenience. So, the results of this study should be taken into consideration such shortcomings.

Overall, the study answered the general objective and the research questions raised. The study focused on the opinions of older adults, through a questionnaire that gave different evaluations regarding the activities carried out in the senior centres, as well as through personal perceptions about the quality of the services

and the treatment they receive from professionals.

Regarding active ageing, it was observed that participation in workshops improves self-esteem and family relationships and expands new social relationships. The reinforcement of social, emotional Abellán A., & Esparza C. (2009). Perception of Spaniards on different aspects related to the elderly and ageing.

IMSERSO. skills, and cultural training as a guide in leisure time highlights the importance of non-formal education for leisure and free time. This points to the, above mentioned, the relation between active ageing and life satisfaction. In fact, it became clear that the activities promoted by the senior centres that were part of this study facilitate all the training programs designed for the elderly, ranging from competencies related to active ageing to concern for the development of quality of life, which represented a common concern of agencies and specialized professionals (Flores-Tena, 2019)

Regarding the participation of older adults in the activities that are programmed in the senior centres as part of active ageing programs, regular participation of male subjects was observed. In general, we can indicate that the senior centres have improved their service; however, we are aware that more favourable results can still be obtained. Therefore, we consider it important to guarantee the opportunities and spaces necessary for the enjoyment of leisure activities that take into account the interests of men, which would guarantee a complete service that promotes satisfaction, motivation and learning in both men and women.

Likewise, regarding the general objective of this study, the relationship between the high frequency of participation of the elderly in the activities programmed by the senior centre and the satisfaction experienced, indicate the importance of these activities in increasing the quality of life of the elderly. Therefore, it is necessary to guarantee access to services offered by senior centres to promote well-being and happiness in this age group.

Similarly, the need to continue deepening the requirements of older adults about their participation in active ageing programs is evident. This study contributes to the line of research on understanding the care needs of older adults during their stay in specialized senior centres. However, it is necessary to address the satisfaction and frequency of participation in active ageing activities in future studies, which should take into account important variables such as the timing of the options and perceptions of the group that makes up the sample. In this way, the changes that occur regarding

satisfaction and the number of times that older adults participate in recreational activities could be studied through a timeline.

With this limitation, this study only allows addressing the results obtained considering a single moment. However, the data that was obtained constitutes an important advance given the current interest of researchers in the concept of active ageing.

References

- Águila C. (2007). *Sobre el ocio y la posmodernidad*. Sevilla: Wanceulen.
- Breheny, M. & Stephens C. (2017) Spending time: The discursive construction of leisure in later life. *Annals of Leisure Research*, 20(1), 39-54. <https://doi.org/10.1080/11745398.2016.1191360>
- Bruno, F., Alemán J.A. (2016). Vejez y sociedad en México: Las visiones construidas desde las Ciencias Sociales. *Forum Sociológico*, Série II(29), 7-20. <https://doi.org/10.4000/sociologico.1453>
- Caprara, M., Molina, M.A., Schettini, R., Santacreu, M., Orosa, T., Mendoza-Núñez, V.M., Rojas, M., & Fernández-Ballesteros, R. (2013). Active ageing promotion: results from the Vital Ageing Program. *Current Gerontology and Geriatrics Research*, Volume 2013, Article ID 817813, <https://doi.org/10.1155/2013/817813>
- Chavero-Tapia, R. M. de los A. (2020). Los cuatro pilares de la educación. *Conciencia Boletín Científico De La Escuela Preparatoria*, 7(13), 11-15.
- Escarbajal De Haro, A., Martínez de Miguel López, S., & Salmerón Aroca, J. A. (2015). La percepción de la calidad de vida en las mujeres mayores y su envejecimiento activo a través de actividades socioeducativas en los centros sociales. *Revista de Investigación Educativa*, 33(2), 471-488. <https://doi.org/10.6018/rie.33.2.213211>
- Delors, J. (Coord.) (1996). *Learning: The Treasure Within*. UNESCO.
- Dumitrache, C. G., Rubio Rubio, L., Bedoya, I., & Rubio Herrera, R. (2017). Promoviendo el envejecimiento activo en entornos rurales: un programa de intervención implementado en Orense, España. *Universitas Psychologica*, 16(3), 1-12. <https://doi.org/10.11144/Javeriana.upsy16-3.paar>
- Escotorin P, Roche R (2011). *Cómo y por qué prosocializar la atención sanitaria: reflexiones, desafíos y propuestas*. Conclusiones del Proyecto Europeo. Change. La Edicions Fundació Martí L'Humà.
- Fernández-Ballesteros, R. (2009). *Envejecimiento activo*. Madrid: Pirámide, D.L.
- Fernández-Ballesteros R. (2011) Limitaciones y posibilidades de la edad. In *Libro Blanco del envejecimiento activo* (pp. 113-148). IMSERSO.
- Fernandez-Ballesteros R., Olmos R., Santacreu M., Bustillos A., & Molina, M.A. (2017). The role of perceived discrimination on active ageing. *Archives of Gerontology and Geriatrics*, 71, 14-20. <https://doi.org/10.1016/j.archger.2017.02.004>
- Ferro, E. F., Escobar Ruiz, N., Jara Rojas, P., Maureira Cid, F., Gutiérrez Duarte, S., Cárdenas Begazo, S., Muñoz Lara, M., & Díaz Magallanes, V. (2020). Análisis del perfil de egreso de la carrera de pedagogía en educación física de Chile: un estudio cuantitativo. *Retos*, 39, 532-538.
- Flores-Tena, M.J. (2020). The use of educational technology during Covid-19 Increases the use of MOOCs as a training tool in education. *European Journal & Medicine*, 7(7):457-465, 2020
- Flores-Tena, M.J., Navas, C. O. & Reis, C.; (2018) *Active ageing and emotional intelligence in elderly*. Salamanca. *Familia*, v(n), x-y.
- George, D., Mallery., P. (2003). *SPSS for Windows Step by Step: A Simple Guide and Reference. 11.0 Update* (4th ed). Boston: Allyn and Bacon.
- Gu, M.K. (2018). Factors Affecting the Participation in Leisure Activities by Elderly Women Living Alone. *Journal of Korean Academy of Community Health Nurse*, 29(3), 257-266. <http://doi.org/10.12799/jkachn.2018.29.3.257>
- Rodríguez, G. H. (2009). Jubilación y alternativas para un ocio creativo. In J. Giró (coord.), *Envejecimiento, tiempo libre y gestión del ocio* (pp.43-64). La Rioja: Universidad de La Rioja.
- Hulya, T. D., Sevi, Y., Serap, A. & Ayse, O. (2015). Factors affecting the benefits of a six-month supervised exercise program on community-dwelling older adults: interactions age, gender and participation *Journal of Physical Therapy Science*, 27(5), 1421-1427.
- Levy, B.R., & Myers, L.M. (2004). Preventive health behaviors influenced by self-perceptions of ageing. *Preventive Medicine*, 39(3):625-9.
- Spain (2006). Ley 39 de 15 de diciembre de 2006, Promoción de la Autonomía Personal y Atención a las personas en situación de dependencia. In *Boletín Oficial del Estado* (p. 299). Madrid: Spain.
- Lima, A., Marques, A., Peralta, M., Henriques-Neto, D., Bordado, J., Faber, M., & Gouveia, E. R. (2021). Functional fitness in older people: a population-based

- cross-sectional study in Borba, Amazonas, Brazil. *Retos*, 39, 731-736.
- Limón M., & Chalfoun, M. (2017). La Biblioteca como agente social en el proceso de empoderamiento de los adultos mayores en un ambiente intergeneracional e intercultural. *Congreso Internacional de Pedagogía Social*. Sevilla.
- Lobo, A., Saz P., & Marcos, G. (2002). *MMSE Examen Cognoscitivo Mini-Mental*. Madrid: Tea Ediciones.
- Monteagudo, A. M. R., García, M. Y., & Ramos, M. Á. M. (2016). El envejecimiento activo: importancia de su promoción para sociedades envejecidas. *Revista Archivo Médico de Camagüey*, 20(3), 330-337. Recuperado en 30 de septiembre de 2021, de [http://scielo.sld.cu/si.php?i=art&f=si\(250255201600800048\)g=s&g=s](http://scielo.sld.cu/si.php?i=art&f=si(250255201600800048)g=s&g=s)
- García, I. M., Mínguez, J. G., & Moreno, M. B. (2011). Ciudadanía activa y personas mayores. Contribuciones desde un modelo de educación expresiva. *Revista Iberoamericana De Educación*, 55(5), 1-13. <https://doi.org/10.35362/rie5551567>
- OMS (2015). *Informe mundial sobre el envejecimiento y la Salud*. Geneva: Switzerland. Retrived from https://apps.who.int/iris/bitstream/handle/10665/186466/9789240694873_spa.pdf
- OMS (2002). *Active ageing: A policy framework*. Geneva: Switzerland.
- Pedrero-García, E., Moreno-Crespo, P., & Moreno-Fernández, O. (2018). Sexualidad en adultos mayores: Estereotipos en el alumnado universitario del grado de Educación Primaria. *Formación universitaria*, 11(2), 77-86. <https://dx.doi.org/10.4067/S0718-50062018000200077>
- Pérez, I. P.; Valero, X., Alcántara, A., Teulón, M. P. L. (2020). Asociacionismo, participación y animación sociocultural: el caso ANRIE_ASC. *Quaderns d'animació i educació social. Revista semestral para animador@s y educador@s sociales*, 31, 1-15. <http://hdl.handle.net/10459.1/67871>.
- Pinzón, E.Y., Bustos, S. C. C., & Herrera, M. J. M. (2017) Intereses de ocio y tiempo libre de los adultos mayores del municipio de Guachucal, Nariño. *Revista Univmar*, 35(1), 151-162.
- Rodríguez, G., Rodríguez, P., Castejón, P., & Morán, E. (2013). *Las personas mayores que vienen. Autonomía, solidaridad y participación social*. Madrid. Fundación Pilares para la autonomía personal.
- Mérida-Serrano, R., Olivares-García, M. Á., & Alfaya, M. E G. (2018). Descubrir el mundo con el cuerpo en la infancia. La importancia de los materiales en la psicomotricidad Infantil. *Retos*, 34, 329-336
- Rosario Padial-Ruz, R., Ibáñez-Granados, D., Hervás, M. F., & Ubago-Jiménez, J. L. (2019). Proyecto de baile flamenco: desarrollo motriz y emocional en educación infantil. *Retos*, 35. 396-401.
- Teater, B. (2016). Intergenerational programs to promote active ageing: The Experiences and Perspectives of Older Adults. *Activities, Adaptation & Aging*, 40(1), 1-19.
- United Nations (UN) (2020) *Perspectivas de la población mundial*. 2019. <https://www.un.org/es/sections/issues-depth/ageing/index.html>
- Urquijo, S., Monchietti, A., & Krzemien D. (2008). Adaptación a la crisis vital del envejecimiento: Rol de los estilos de personalidad y de la apreciación cognitiva en adultas mayores. *Anales de Psicología*, 24(2), 299-311.
- Van Leeuwen, K.M., Van Loon. M.S., Van Nes, F.A., Bosmans, J.E., De Vet, H.C., Ket, J.C., Widdershoven, G.A.M., & Ostelo, R.W. (2019) What does quality of life mean to older adults? A thematic synthesis. *Plos One*, 14(3). <https://doi.org/10.1371/journal.pone.0213263>
- World Health Organization (2002). Active ageing: A policy framework. *World Health Organization*. 02.(8). <https://apps.who.int/iris/handle/10665/67215>
- Zieliński, A. (2014). Ageing individuals and ageing populations. *Przeegl Epidemiol*, 68(3):399-404.

(Footnotes)

¹ In 2006, the Organic Law of Education in its Article 5 «Lifelong Learning», provided: 1) All persons must have the possibility of training throughout life, inside and outside the education system. 2) The educational system has as its basic principle to promote permanent education. 3) To guarantee universal and permanent access to learning, the different public administrations will identify new skills and provide the training required for their acquisition. On December of the same year, law 39/2006 (Bill 39/2006) was approved, whose article 3 focuses on the promotion of personal autonomy and care for people in dependency. This law inspires the following principles, which take effect in Article 27 of the Constitution.