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Original article

ARGENTINIAN VALIDATION OF THE ATTITUDES TOWARDS EUTHANASIA SCALE

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Abstract

Introduction: Although euthanasia is an issue on the Argentinean parliamentary agenda, there is still confusion about its conceptualisation and limitations to its study. Attitudes towards euthanasia among the seriously ill remain under-researched.

We aimed to validate the Attitudes Towards Euthanasia scale in Argentina by cross-culturally adapting to the Spanish-Argentine language and exploring psychometric characteristics.

Materials and methods: A cross-sectional study used the Attitudes Toward Euthanasia Scale on a non-probabilistic sample of short-life expectancy patients. We selected Argentina's sample from seven healthcare centres to recruit a broad socio-demographic spectrum of patients. Inclusion criteria were patients with advanced disease, over 18 years of age, aware that the disease was probably incurable, and able to sign an informed consent form.

Results: The selected sample comprised 167 very sick patients. Among them, 72.5% had cancer. The average age of the participants was 68 (SD= 14.03), and 50.9% were female; 34.7% held university degrees; 58.7% reported being affiliated with a religious organisation.

The scale's psychometric properties, including reliability and validity, were assessed using an exploratory and confirmatory factor analysis. The internal consistency throughout Cronbach's Alpha was 0.837. The range of items of homogeneity was from 0.179 to 0.745. The study found no significant differences in perceptions concerning euthanasia between variables such as diagnosis, gender, university studies level, and religious affiliation.

Discussion: The validation of the Attitudes Towards Euthanasia scale to a sample of seriously ill Argentinean patients has shown adequate psychometric properties, with some limitations.

Key words: euthanasia, psychometric properties, attitudes, end-of-life care, palliative care

Resumen

Validación argentina de la escala Actitudes hacia la Eutanasia

Introducción: Aunque la eutanasia es un tema de la agenda parlamentaria argentina, sigue habiendo confusión sobre su conceptualización y limitaciones para su estudio. Las actitudes hacia la eutanasia entre los enfermos graves siguen siendo poco investigadas.

Nos propusimos validar la escala Actitudes hacia la Eutanasia en Argentina, adaptándola transculturalmente al idioma español-argentino y explorando sus características psicométricas.

Materiales y métodos: Se realizó un estudio transversal utilizando la Escala Actitudes hacia la Eutanasia en una muestra no probabilística de pacientes con una

corta esperanza de vida. Seleccionamos la muestra argentina en 7 centros sanitarios para reclutar un amplio espectro sociodemográfico de pacientes. Los criterios de inclusión fueron pacientes con enfermedad avanzada, mayores de 18 años, conscientes de que la enfermedad era probablemente incurable y capaces de firmar un consentimiento informado.

Resultados: La muestra seleccionada comprendió 167 pacientes gravemente enfermos. Entre ellos, el 72.5% padecía cáncer. La edad media de los participantes era de 68 años (DE= 14.03), y el 50.9% eran mujeres; el 34.7% tenían estudios universitarios; el 58.7% declararon estar afiliados a una organización religiosa.

Las propiedades psicométricas de la escala, incluidas su fiabilidad y validez, se evaluaron mediante un análisis factorial exploratorio y confirmatorio. La consistencia interna medida a través del Alfa de Cronbach fue de 0,837. El rango de homogeneidad de los ítems fue de 0,179 a 0,745. El estudio no encontró diferencias significativas en las percepciones relativas a la eutanasia entre variables como el diagnóstico, el sexo, el nivel de estudios universitarios y la afiliación religiosa.

Discusión: La validación de la escala Actitudes hacia la Eutanasia a una muestra de pacientes argentinos gravemente enfermos, ha mostrado propiedades psicométricas adecuadas, con algunas limitaciones.

Palabras clave: eutanasia, propiedades psicométricas, actitud, cuidados al final de la vida, cuidados paliativos

KEY POINTS

- The research validated the Attitude Towards Euthanasia scale in Spanish, as there is no gold standard for studying attitudes towards euthanasia among seriously ill patients, highlighting the need for further research.
- The ATE scale was found to be a valid tool for assessing attitudes towards euthanasia and assisted dying practices in an Argentinian sample of life-limiting patients. It systematically and protocolized addressed information in patient interviews.
- This project aims to have a clinical, scientific, and socio-political impact on end-of-life care and promote open discussion about death and dying in Argentina.

Technological progress in the preservation of life, as well as the suffering associated with an advanced illness, could threaten human person dignity at the end of life, inviting, among other debates, euthanasia, assisted suicide or medical assistance in dying to become public issues[1]. The term euthanasia is coloured by social, cultural and, of course, religious factors[2].

Several countries, like The Netherlands, Belgium, Luxembourg, Spain and Canada have euthanasia laws in place[3]. In Latin America, in Colombia, euthanasia has been a constitutional right since 1998[4]. Ecuador has also recently experienced its legalisation[5]. In Chile and Uruguay, initiatives are underway to decriminalise the practice. Euthanasia, understood as the voluntary action exercised to produce death at the request of the patient, is not admitted in Argentine legislation[6]. Nevertheless, treatment refusal or withdrawal is already contemplated within the regulatory framework of Law No. 26549 on the Rights of the Patient[7] and the recently enacted Law 27678 on palliative care[8]. However, although euthanasia is a topic on the parliamentary agenda, there is still confusion as to its conceptualisation, as well as limitations to its study.

Euthanasia is defined as "consensual mercy killing, that is, to procure the death of the patient, at his request and with his consent, to spare him suffering that he finds intolerable"[9]. It is a defended and rejected practice that continues to generate controversy[10,11]. The reasons justifying the practice are patient autonomy, relief of pain and suffering, and the tranquillity it would bring[12,13]. Arguments against the practice stress that, in addition to the defence of the sanctity of life, causing the death of another is an immoral act, a fact that seriously erodes trust in doctors and/or facilitates justification for ending the lives of capable persons. The International Association of Hospice Palliative Care (IAHPC) rejects euthanasia as an attack on medical ethics, arguing that accessibility to palliative care can deter it[14-16]. However, the European Association of Palliative Care (EAPC) published a position paper in 2016 that states that euthanasia and assisted suicide should not be included in the practice of palliative care[11]. The EAPC white paper does not include attitudes toward assisted suicide or euthanasia. Arguments against legal regula-

tion include principled arguments and negative consequences, such as undervaluing the lives of the elderly or those with chronic illnesses or disabilities[17].

Within the comprehensive concept of euthanasia, a distinction has historically been made between active and passive euthanasia. The term "passive" is erroneously equated with the process of adequacy of therapeutic effort, which implies abstention or withdrawal of life support in situations of disproportionality, futility or terminal condition[6]. Whether a person is killed medically without their agreement, it is still murder and not euthanasia when it occurs when the individual is incapable of giving consent. Euthanasia can thus only be voluntary and is active by definition, so "passive" euthanasia is a contradiction in terms[11].

Wasserman J. et al. proposed the Attitudes Toward Euthanasia (ATE) scale, which was systematically designed to measure attitudes, understanding this as a construct that could include different dimensions that could influence the degree of agreement an individual expresses with euthanasia[18]. We are unaware of any gold-standard tool for the assessment of attitudes towards euthanasia in Spanish-speaking populations.

The Attitudes Toward Euthanasia scale has been validated in several samples[2,19,20]. We aimed to validate an Argentinean version that maintains semantic, idiomatic, conceptual and experiential equivalence with the original scale. Cross-cultural adaptation to the Spanish-Argentine language was performed, and psychometric characteristics were explored in patients with advanced chronic diseases with short life expectancy, included in the iLIVE project (EU HORIZON 2020 GA 825731)[21]. We have enriched the analysis with a relational autonomy framework[22,23].

Materials and methods

The iLIVE study was an international cohort prospective study in 13 countries that aimed to inquire about care preferences in patients with advanced disease and a short-life prognosis. (2019-2023)[21]. As this work is part of an international study, we decided to write this article in English.

Argentina was the only Latin American country involved. From June 2020 to September 2023, we selected Argentina's sample from 7 healthcare centres in the two largest cities, Buenos Aires and Córdoba. Three public hospitals, a non-profit home care program, a long-term chronic respiratory care private centre, a private hospice and a palliative care home care program based in a private hospital participated. Non-probabilistic convenience sampling was used. The inclusion selection criteria were a patient with an advanced illness condition, older than 18 years, knowing that the disease was probably incurable, and capable of signing an informed consent form. Within the framework of this project, one of the tools used in data collection was the Attitudes Toward Euthanasia scale.

The Attitudes Toward Euthanasia scale is a ten-item questionnaire with a Likert options response from 1 (strongly disagree) to 5 (strongly agree) to assess attitudes towards euthanasia (Table 1). A higher score (4 or 5 marks) indicates a more positive attitudes towards euthanasia, while a lower score (1 or 2 marks) indicates a negative attitudes. Reverse coding was used in Questions 6 and 9 of this scale as the original authors designed it[18]. The original internal consistency (Cronbach's Alpha) was 0.87. The original scale was composed of four dimensions: severe pain [Q1, Q3, Q9], no recovery [Q4, Q6], patient request [Q8, Q10] and doctor´s authority [Q4, Q5, Q7]. Some items had cross-loaded with several factors[18]. The questions (items of the ATE scale) combine different dimensions of the scale structure. Each one of the ten items combines two or three dimensions. Behind these combinations are expressed the concepts of euthanasia, withdrawal of life support, and "life-ending acts without explicit patient request" (when the decision to support death was based on the doctor's authority and without the patient's request), as these concepts are defined in the palliative care field[24]. For instance, item 3 states: "If a patient in severe pain requests it, a doctor should prescribe that patient enough medicine to end their life" combining the dimensions of "patient request" and "severe pain" behind this statement is the concept of euthanasia stays.

Socio-demographic variables, age, gender, educational level, professional status, and other variables related to religious practices were also collected.

Two competent translators in both languages translated and back-translated the instrument from English to Spanish, following the guidelines and principles for developing questionnaires[25]. The scale was tested and piloted on nine Argentinian patients with the same iLIVE study inclusion criteria (May-June 2020)[21]. A cognitive and comprehension test and participants' open opinions were considered, and a final ATE version in Spanish was established for usage in the iLIVE study.

Table 1 | Attitudes Toward Euthanasia (ATE) Scale - Items and dimensions18

Item	Dimensions
1. If a patient in severe pain requests it, a doctor should remove life support and allow that patient to die	SP/PR/ Passive
2. It is okay for a doctor to administer enough medicine to end a patient's life if the doctor does not believe that they will recover	NR/DA/Active
3. If a patient in severe pain requests it, a doctor should prescribe that patient enough medicine to end their life	SP/PR/Active
4. It is okay for a doctor to remove life-support and let a patient die if the doctor does not believe the patient will recover	NR/DA/Passive
5. It is okay for a doctor to administer enough medicine to a suffering patient to end that patient's life if the doctor thinks that the patient's pain is too severe	SP/DA/Active
6. Even if a doctor does not think that a patient will recover, it would be wrong for the doctor to end the life of a patienta	NR
7. It is okay for a doctor to remove a patient's life-support and let them die if the doctor thinks that the patient's pain is too severe	SP/DA/Passive
8. If a dying patient requests it, a doctor should prescribe enough medicine to end their life	NR/PR/Active
9. Even if a doctor knows that a patient is in severe, uncontrollable pain, it would be wrong for the doctor to end the life of that patientb	SP
10. If a dying patient requests it, a doctor should remove their life support and allow them to die	NR/PR/Passive

SP: severe pain; NR: no recovery; PR: patient requests; DA: doctor's authority; Active: active euthanasia; Passive: passive euthanasia
[a]Indicates items that need to be reverse-coded

In seven Argentinian healthcare centres, the adapted Surprise Question asked whether the treating physician would be surprised if a patient died within six months, and the SPICT tool criteria were used to identify eligible patients with a short life expectancy[26]. Patients with a known illness were invited, signed informed consent, and interviewed in person to understand their preferences, values, and perspectives on end-of-life decisions, including their opinions on euthanasia, during a more extensive face-to-face interview.

Data analysis

The statistical analysis (exploratory and confirmatory factor) was applied with JASP .0.16.2. Before that, assumptions were checked to apply a factorial analysis: for instance, sample size, normality with Kolmogorov test, linearity, KMO index, the Bartlett test of sphericity[27], and correlations between the variables included in the

Table 1 | Attitudes Toward Euthanasia (ATE) Scale- Spanish version

Item
1. Si un paciente con un dolor grave lo solicita, el médico debería retirar el soporte vital y permitir que el paciente muera.
2. Es correcto que un médico administre la suficiente medicación para terminar con la vida de un paciente si el médico cree que no se va a recuperar
3. Si un paciente con un dolor grave lo solicita, el médico debería prescribir a ese paciente la suficiente medicación para terminar con su vida.
4. Es correcto que el médico retire el soporte vital y deje morir a un paciente, si el médico cree que el paciente no se va a recuperar.
5. Es correcto que un médico administre suficiente medicación a un paciente que está sufriendo para terminar con su vida, si el médico cree que el dolor del paciente es demasiado grave.
6. Incluso si el médico piensa que el paciente no se va a recuperar, no sería correcto que el médico terminara con la vida del paciente.
7. Es correcto para el médico retirar el soporte vital del paciente y dejarlo morir si el médico cree que el dolor del paciente es demasiado grave.
8. Si un paciente moribundo lo solicita, el médico debería prescribir la suficiente medicación para terminar con su vida.
9. Incluso si un médico sabe que el paciente tiene un dolor grave e incontrolable, no sería correcto para el médico terminar con la vida de ese paciente.
10. Si un paciente moribundo lo solicita, el médico debería retirarle el soporte vital y permitirle morir.

model[28]. For the Exploratory Factor Analysis, the rotation method was varimax, and Horn's parallel analysis was the criteria to identify the number of factors[29]. Internal consistency was assessed through Cronbach Alpha and Omega McDonald and homogeneity indices.

The Kolmogorov-Smirnov test was applied when the sample size exceeded 50 participants, evaluating the normal distribution of the ATE scale. Further analyses were conducted in cases where the p-value was less than 0.05, indicating a deviation from normality. Therefore, the Mann-Whitney U and Kruskal-Wallis H tests were used to compare ATE and the sociodemographic variables included in this study. The significance level (α) for all comparison procedures was established at 0.05.

Each institutional ethics committee approved the study protocol.

Results

This study's selected sample comprised 167 patients from a healthcare context. Among them, 50.9% (85/167) were female. The average age of the participants was 68 (SD= 14.03). Concerning diagnosis, 72.5% (121/167) had a cancer diagnosis.

Regarding religious affiliations, 58.7% (98/167) reported to profess any religion; thus, 75% (73/98) identified as Catholic, 12.2% (12/98) as Evangelist and 2.2% (2/98) as Jewish. The 11% (11/98) identified with "Other" affiliations. According to their level of education, 1.8% (3/167) had no formal education, 17.4% (29/167) completed primary schooling, and 24% (40/167) finished secondary education. Additionally, 22.2% (37/167) had tertiary qualifications, while the largest group, 34.7% (58/167) held university degrees. Regarding job status, the majority, 61.7% (103/167), are retired, followed by 13.2% (22/167) employed in dependent relationships. Additionally, 7.8% (13/167) are unemployed, while 5.4% (9/167) reported being on long-term sick leave. A small percentage of those identified as housewives/husbands (1.8%, 3/167), and 3% (5/167) receive a disability pension.

Table 2 includes the descriptive results. In this sense, means, standard deviation, kurtosis, skewness, and homogeneity indices were calculated for the ATE items. Regarding homogeneity indices, the lowest homogeneity values were in item 6, with no recovery (0.055), and in item 9, with severe pain (0.179). The internal consistency throughout Cronbach's Alpha was 0.837.

Table 2 | Descriptive results, homogeneity indices and factorial solutions for patients

Items	M	SD	SK	Kurt	IH	F1	F2	F3
ATE 1	3.64	1.24	-0.717	-0.406	0.518		0.552	
ATE 2	2.57	1.37	0.394	-1.11	0.740	0.916		
ATE 3	3.09	1.36	-0.193	-1.20	0.686		0.657	
ATE 4	2.66	1.26	0.270	-0.938	0.674	0.740		
ATE 5	2.70	1.29	0.185	-1.08	0.745	0.842		
ATE 6	3.12	1.32	-0.144	-1.09	0.055			0.956
ATE 7	2.78	1.29	0.086	-1.09	0.683	716		
ATE 8	3.34	1.29	-0.461	-0.794	0.610		0.796	
ATE 9	3.05	1.21	0.010	-0.932	0.179			0.457
ATE 10	3.56	1.24	-0.604	-0.599	0.488		0.806	
Alpha	0.837	0.895	0.823	0.60				
McDonalds		0.898	0.828	-				
Variance explained		27.9	22.3	11.7				

**n = 167; standard kurtosis error = 0.374; standard skewness error 0.188*

Three factors were identified in the exploratory factor analysis. The first dimension comprised items 2, 4, 5 and 7 (α = 0.895). According to the original structure, it could be considered as related to doctor's authority (without consent); the second factor was composed of 1,3,8 and 10 (α = 0.823). This factor was called patient requests; the third factor, consisting of 6 and 9, was called no recovery (α = 0.60). Table 3 includes Mann-Whitney U and for Euthanasia, its dimensions, and affiliation with religious organisations and types of religion. In this sense, there were meaningful relationships between affiliation with religious organisations and euthanasia (U= 2639.50, p< 0.05) and the factor of doctor's authority without consent (U= 2631.50, p< 0.05) and patients' requests U= 2696.0, p< 0.10). There was no significant relationship with the factor of no recovery (p> 0.05). Although the results have not been included in a table, H Kruskall Wallis test between euthanasia and its dimensions was applied with the type of religion. No significant relationships existed for any variables (p >0.05).

Finally, Table 4 shows the Mann-Whitney test for euthanasia and the educational level. There were meaningful relationships between the level of studies and Euthanasia (U= 2340.50, p<0.01) and the factor of doctor's authority without consent (U= 2379.50, p< 0.01) and patients requests (U= 2696.0, p < 0.05). There was no significant relationship with the factor of no recovery (p >0.05).

We analysed the association of variables: diagnosis, gender, level of university studies, and religious affiliation with perceptions concerning euthanasia and found no statistically significant differences.

Discussion

This study was part of a larger observational project focused on patients' end-of-life concerns, values and preferences[21]. We explored attitudes toward euthanasia, validating the ATE scale in Spanish for an Argentinian sample. Using the scale was feasible in our study population of very sick patients. The validation of the ATE scale to a sample of seriously ill Argentinean patients has shown adequate psychometric properties, with some limitations.

In Spain, Fernández-Martínez E et al., 2021, translated, adapted and validated the Attitudes Toward Euthanasia scale in Spanish[2]. They conducted a cross-sectional study with a non-probabilistic sample of Spanish healthcare professionals. The study has shown adequate psychometric properties for the population studied. Another precedent is the validation of the instrument, carried out by an Iranian study group[19]. Also, in Hong Kong in 2022, Lau AM et al. examined medical students' attitudes towards

Table 3 | The distribution of Attitudes Towards Euthanasia and its factors according to the results of the Mann-Whitney U test for religious organisations

Variables	Religious organisations	N	Average Range	Sum of ranks	U	p
Euthanasia	Yes	98	76.43	7490.50	6039.50	0.046*
	No	66	91.51	6039.50		
Doctor´s authority	Yes	98	76.35	7482.50	2631.50	0.042*
(without consent)	No	66	91.63	6047.50		
Patients requests	Yes	98	77.01	7547.50	2696.00	0.069
	No	66	90.65	5983.00		
No recovery	Yes	98	83.72	8204.50	3114.50	0681
	No	66	80.69	5325.50		

** p < 0.05 **<0.01*

Table 4 | The distribution of Attitudes Towards Euthanasia and its factors according to the Mann-Whitney U test results for the level of studies

Variables	Level of studies	N	Average Range	Sum of ranks	U	p
Euthanasia	No university	106	89.42	9740.00	2340.00	0.01**
	University	58	69.84	4051.00		
Doctor´s authority	No university	106	89.06	9440.00	2379.00	0.01**
(without consent)	University	58	70.52	4090.00		
Patients requests	No university	106	88.03	9331.50	2487.50	0.04*
	University	58	72.39	4198.50		
No recovery	No university	106	84.30	8935.50	2883.50	0.502
	University	58	79.22	45940.50		

** p < 0.05 **<0.01*

euthanasia as measured by the Attitudes Toward Euthanasia scale and identified associated factors[20]. Simultaneously and independently from the Fernández-Martínez team, Argentina and Spain coordinated the process of validation, exploration of the psychometric characteristics and cross-cultural adaptation of the Attitudes Toward Euthanasia scale, carried out in the iLIVE project (EU HORIZON 2020 GA 825731)[21].

Previously, Esquivel's and Irrazabal's study explored our country's opinions[30]. However, their sample was taken from a general population, and they used three non-validated questions to elicit attitudes about euthanasia. As in the Spanish study[2], we validated the instrument's psychometric properties in our study. To our knowledge, this scale is so far the only one validated in Spanish, and there is no gold standard to explore attitudes towards euthanasia in seriously ill patients. The fact that we focused on this specific population could be valuable in future research and parliamentary debates in Argentina and other countries in the region. According to opinion surveys, the general public in most Western nations is increasingly supportive of adopting and regulating euthanasia and physician-assisted suicide[17]. Nevertheless, no research explored seriously ill patients' opinions.

However, the items and the conceptual structure created by the original author showed marked differences in interpretation in patients from a different culture than in the original study[18]. It was noted that, in addition to attitudes, the ATE scale measures constructs that value, for example, the dimension of autonomy in patient decision-making. The study high-

lights the importance of relational autonomy in subjective aspects, particularly in a population aware of their limited life prognosis, contrasting with a Spanish study that relied on healthcare professionals[2].

Like ours, there is a pioneering Malaysian study from 2014 that, although it does not use a validated tool to assess attitudes toward euthanasia, analyses the population of patients with long-standing chronic disease and also physicians. Coincidence with Wasserman, incessant pain appears to be a central aspect of this study. Still, it adds other factors that influence the inclination towards euthanasia: financial difficulties, scarce social support and the belief of being a burden for their families. The study affirms, and we strongly concur, the importance of exploring the preferences of chronically ill patients who are directly affected by and share the experience of chronic illness, suffering, and the knowledge of their impending death[31].

Taking into account the different populations studied, the Malaysian, Spanish and Iranian studies observed a direct relationship between the perception of euthanasia and religion. It differs from our study, which yielded insignificant data regarding this variable[2,19,31].

Wasserman's original work with the scale was to add several dimensions to the concept of euthanasia. However, to not continue with the confusion about passive or active, voluntary or involuntary euthanasia, we consider the scale as a valuable tool for measuring opinions about euthanasia (Q3, Q8) and other practices (more than euthanasia dimensions) that aid or allow dying (withdrawal of life support and involuntary medicalised killing). In this line, our study contributes with a validated tool to elicit opinions about different controversial medical practices. Like a sensitive patient communication tool, this exploration allowed them to express their concerns more openly under challenging conversations. Severe ambivalence in clinical practice often leads to oscillations between patients' desire for hastened death and their determination to live, influenced by complex end-of-life experiences and moral insights, challenging the traditional paternalistic role of healthcare professionals[32,33].

This study presents some limitations. First, the data collection procedure was non-probabilistic. Second, a confirmatory factor analysis was not applied to the available data. Third, in our sample, most participants were highly educated and not strictly representative of the country's population.

Future studies should develop a validated scale and verify its validity with other samples, such as relatives or healthcare professionals, to assess attitudes towards euthanasia and address issues with the original scale and other validations.

To conclude, the ATE scale, adapted for Argentinian life-threatening patients, demonstrated appropriate psychometric properties and was valid in assessing attitudes towards euthanasia and other aid-in-dying practices. This work can serve as a foundation for future scale implementation involving patients, family members, healthcare professionals, and the general population.

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