Advanced Directives: Knowledge, Attitudes and Behaviors Among Palliative Care & Non-Palliative Care Health Care Professionals

Natan Gropper[1], Dr. Adir Shaulov[2], and Dr. Anna Woloski-Wruble[3]

[1] The School of Medicine, Faculty of Medicine, Hadassah Medical Center, Hebrew University of Jerusalem, 9112000 Israel
[2] Department of Hematology, Hadassah Medical Center and Faculty of Medicine, Jerusalem, 9112000 Israel
[3] Henrietta Szold Hadassah Hebrew University School of Nursing in the Faculty of Medicine, Jerusalem, 9112000 Israel

ABSTRACT

Background: Advanced directives (AD) enable dying patients to retain autonomy at the end-of-life (EOL). Although the "Dying Patient Act" was enacted in Israel in 2005, the number of registered AD remains extremely low. A known barrier to AD completion is limited knowledge, however it is unknown whether the behaviors and attitudes of health professionals with experience and knowledge of palliative care (PC) are different from those without such experience and knowledge.

Objective: To compare the AD knowledge, attitudes, and behaviors (AD completion, discussion and intention) of PC clinicians and faculty (PC-CF) with non-PC-CF.

Methods: This study used a cross sectional, descriptive, comparative correlational research design. The study tool was a self-report, web-based questionnaire developed by the researchers and distributed to physicians and nurses in a tertiary academic teaching medical institution and via social media groups of health professionals using snowball sampling.

Results: 129 participants completed the questionnaire. 78 participants were PC-CF and 51 participants were non-PC-CF. PC-CF had significantly greater AD knowledge [76.3/100 vs 69.0/100, $P<0.001$] and significantly more positive attitudes towards AD compared to non-PC-CF [3.9 vs 3.6, $P<0.023$]. AD behaviors were low in both PC-CF [27.6%] and non-PC-CF [12.8%], however PC-CF had more AD behaviors than non-PC-CF [$P=0.053$, approaching significance].

Conclusions: PC-CF nurses and physicians have more AD knowledge, attitudes and behaviors. Though they had more behaviors, the overall completion rate is low. This study has personal and professional implications for PC-CF and non-PC-CF, and may have ramifications for the quality of patient care.

JIMS 2023; 04: 1–6

KEY WORDS Advanced Directives, Advance care planning, Health professionals, End of Life, Palliative Care

INTRODUCTION

With medical care advancement, the decline of health through disease until death has altered completely over the past century. Many life-threatening diseases have become chronic, while others have been cured, with people living longer than at any other time in history [1]. These advances have presented a new set of dilemmas. For some, the pursuit of longevity might not be at any price. Many who suffer from a gradual health decline may prefer palliative care (PC) to life-prolonging interventions, especially if these come at the expense of quality of life [2, 3]. The ability to retain autonomy over end-of-life (EOL) medical decisions has therefore become a matter of great importance, both ethically and legally [4].

The "living will" was first suggested in the US during the late 1960's [5] as a legally binding document with the purpose of granting the opportunity to express one's EOL care choices to be implemented in the event that a person becomes unable to communicate their wishes [6]. It was later coined advanced directives (AD) and received the status of a legally binding document [7]. The term "advance care planning" (ACP) refers to the psychological, theoretical and practical aspects of EOL care planning and is a process that is meant to culminate with the documentation of one's wishes in the form of AD [8]. AD dictate more than a do-not-resuscitate order [9]. They are meant to guide the family and medical staff through the decision-making processes of EOL care, clearly presenting the patient's predefined requests.

The benefits of AD have been well documented. Patients who have AD spend more time in hospice care, are less likely to receive aggressive life-prolonging treatment at EOL, are less likely to die in a hospital or intensive care setting, and are more likely to die at home or in a long term care facility [10–13]. Family members are less likely to suffer from stress, anxiety, depression, and report that AD improve the care of loved ones at the EOL [14, 15]. However, some studies have reported the contradictory findings that AD do not necessarily reduce aggressive measures at EOL or reduce hospital/ICU admissions [16–19].

Although AD are an international tool for EOL care planning, each country defines the purpose and use of AD differently. The "Dying Patient Act" was enacted in Israel in 2005 in order to guarantee that patients' preferences for EOL care would be respected and fulfilled [20]. This law dictates that AD are to be applied to dying patients who have an estimated prognosis of less than 6 months despite medical care [20]. A Ministry of Health (MOH) AD is the only legally binding document, although there are other AD that may be taken into consideration clinically, such as the Health Maintenance Organization (HMO) AD and private AD. According to a study conducted in Israel in 2014, less than 0.03% of the population and less than 0.3% of those above 65 years of age have registered an official MOH AD [21]. Low AD completion rates are common in many other countries around the world [22]. Researchers have studied patients' AD knowledge and attitudes, however there is a dearth of literature examining PC clinicians' and faculties' (PC-CF) AD knowledge, attitudes, and behaviors.

RESEARCHERS HAVE STUDIED PATIENTS' ADVANCED DIRECTIVES (AD) KNOWLEDGE AND ATTITUDES, HOWEVER THERE IS A DEARTH OF LITERATURE EXAMINING PALLIATIVE CARE CLINICIANS' AND FACULTIES' (PC-CF) AD KNOWLEDGE, ATTITUDES AND BEHAVIOR.

In this study, PC-CF are defined as clinicians and faculty staff who either provide or teach PC in hospital or community settings, including hospices, consultation service, etc. PC-CF are presumed to have better AD knowledge, advocate for AD completion, and theoretically act as role models for AD behaviors. AD behaviors in this population should therefore differ from the general population.

One study in Germany examined the knowledge, intentions and behaviors towards AD of cancer/healthy patients and physicians and nursing staff and found that physicians and nursing staff had more knowledge, that the groups did not vary in their attitudes, and that the AD completion rate was low in all groups (10-20%) [23]. A US study focused on nurses' knowledge, attitudes and experience with AD and found that nurses' knowledge of AD was low and attitudes were positive [24]. In both of these studies the personal behaviors of clinicians and faculty staff were not examined.

PC-CF HAVE MORE KNOWLEDGE OF AD AND MORE POSITIVE AD ATTITUDES THAN OTHER PHYSICIANS AND NURSES

The aim of this study was to compare the AD knowledge, attitudes, and behaviors of health care clinicians and faculty staff with and without professional PC experience. Our hypotheses were that there would be a difference between PC-CF and non-PC-CF in AD knowledge and attitudes and yet there would be no difference between PC-CF and non-PC-CF AD behaviors.

METHODS

STUDY DESIGN

To assess AD knowledge, attitudes, and behaviors, we developed a web-based, self-report questionnaire based on extensive literature review. The questionnaire comprised 74 items examining knowledge [graded from 1 to 100], attitudes [Cronbach's alpha=.716], and behaviors including AD completion, EOL discussions, and AD behavior intentions. The questionnaire was then translated to Hebrew by the researchers and received both content expert validity and translation validity. Demographic data obtained included age, gender, country of birth, religion, religiosity, relationship status and family status. In order to assess PC experience, the participants answered questions regarding professional and AD background. MDs and nurses had tailored questionnaires assessing place of education, profession, specialty, primary work setting, years of experience, and professional experience with PC and AD as educators of healthcare profession students or clinicians working with patients.

Primary outcomes included differences between PC-CF and non-PC-CF groups in AD knowledge, attitudes, and behaviors. Additional outcomes included predicting AD behaviors with demographic and study variables. The research was conducted between April and June 2022.

PARTICIPANTS

A convenience sample was generated employing two methods: approach by email to physicians and nurses in a teaching tertiary academic medical institution in the center of the country, and snowball sampling via social media groups of health professionals. Physicians and nurses licensed to practice in Israel were included. Physicians on fellowship programs and lacking an Israeli license were excluded. Sample size estimation was based on the expected difference between the study groups assuming small effect sizes.

DATA COLLECTION

The online questionnaire was generated using Qualtrics software and circulated using an anonymous web link. Participants were able to complete the questionnaire in English or Hebrew.

DATA ANALYSIS

Effect size assessment was determined using G-power software version 3.1.9.7, showing power of 90% for the study hypothesis with 78 participants in PC-CF group and 51 in non-PC-CF group, assuming a small effect size. Statistical significance was defined as a *P*-value less than 0.05. Descriptive statistics were used for describing the sample and for the primary analysis of the questionnaire using frequencies and percentages, means, and standard deviations. Mann Whitney U analyses were used for PC-CF and non-PC-CF comparisons on knowledge and attitudes. Behavioral differences between groups were measured using Chi-Squared tests. Behaviors were grouped as follows: AD document completion (Item 1-4), EOL discussions (Item 8-10), and AD intentions (Item 11-13) (Tables 3 and 4).

An additional analysis using multiple logistic regressions was performed in an attempt to predict AD behavior in terms of demographic and study variables.

ETHICAL CONSIDERATIONS

Approval was obtained by the Institutional Ethics Committee Board of the Faculty of Medicine at the Hebrew University in Jerusalem, Israel (No: IEC 06072021).

RESULTS

PARTICIPANTS

A total of 193 participants opened the online link to the questionnaire with 129 participants [66.8%] completing and submitting their responses between April 14th and June 4th 2022. Participants were predominantly female [86.0%], nurses [72.9%], born in Israel [77.1%], obtained their professional license in Israel [91.7%], PC-CF [60.5%], and the mean age was 47.6 [+/- 1.94] (Table 1). No statistically significant differences were found between PC-CF and non-PC-CF in age, sex, country of birth, and religiosity.

Table 1. Characteristics of Participants

Variable	PC-CF % (*n*)	Non-PC-CF % (*n*)	Total % (*n*)
Group	60.5 (78)	39.5 (51)	100.0 (129)
Gender			
Female	64.3 (63)	35.7 (35)	86.0 (98)
Male	56.2 (9)	43.8 (7)	14.0 (16)
Profession			
Nurse	60.6 (57)	39.4 (37)	72.9 (94)
Physician	60.0 (21)	40.0 (14)	27.1 (35)
Country of birth			
Israel	61.9 (52)	38.1 (32)	77.1 (84)
Other	64.0 (16)	36.0 (9)	22.9 (25)
Country of professional license			
Israel	64.6 (64)	35.4 (35)	91.7 (99)
Other	66.7 (6)	33.3 (3)	8.3 (9)
Religiosity			
Secular	67.3 (35)	32.7 (17)	45.6 (52)
Traditional	47.1 (8)	52.9 (9)	14.9 (17)
Religious	60.0 (27)	40.0 (18)	39.5 (45)
Participated in PC course			
Yes	92.1 (58)	7.9 (5)	57.8 (63)
No	19.6 (9)	80.4 (37)	42.2 (46)
Main workplace			
Hospital	55.6 (40)	44.4 (32)	64.3 (72)
Community	78.6 (22)	21.4 (6)	25.0 (28)
Other	58.3 (7)	41.7 (5)	10.7 (12)

PC-CF- palliative care clinicians and faculty

KNOWLEDGE AND ATTITUDES

PC-CF had significantly greater AD knowledge [76.3/100 vs 69.0/100, $P<0.001$] and significantly more positive AD attitudes compared to non-PC-CF [$P=0.023$] (Table 2). In addition, Spearman correlation analysis showed that better knowledge was associated with more positive attitudes [rs=.18, $P=0.043$].

Table 2. Knowledge and Attitudes Between Groups (N=129)

Variable	PC-CF n=78		Non-PC-CF n=51		Standardized Mann Whitney U
	M	SD	M	SD	
Knowledge	76.83	12.83	69.02	12.63	3.61***
Attitudes	3.90	0.50	3.65	0.67	2.27*

*$P<.05$, ***$P<.001$

PC-CF- palliative care clinicians and faculty, **EOL**- end-of-life, **M**- mean, **SD**- standard deviation

BEHAVIORS

PC-CF had significantly more AD behaviors than non-PC-CF for most items (Table 3). There was no difference between PC-CF and non-PC-CF with regard to completion of the official MOH AD with both groups having a low rate of completion of MOH AD [14.5% vs 6.4%, $P=0.170$] (Table 3). Nevertheless, PC-CF had more EOL discussions [80.3% vs 40.4%, $P<0.001$], more AD intentions [85.5% vs 63.4%, $P=0.012$], and more completion of AD documents, approaching significance [27.6% vs 12.8%, $P=0.053$] compared to non-PC-CF (Table 4).

ADDITIONAL FINDINGS

Multiple logistical regression models were conducted in an attempt to predict PC-CF vs non-PC-CF behaviors (AD documents, EOL discussion and AD intentions) in relation to demographic predictors such as age, gender, country of birth, religiosity, country of original professional licensure, with knowledge and attitudes as independent variables. None of the demographic predictors and independent variables had statistically significant relationships with "AD document completion" (Supplementary Table 1). Participants who obtained their original professional license abroad had significantly more EOL discussions compared to participants who obtained their professional license in Israel [77.8% vs 62.6%, $P=0.012$]. In addition, secular participants, PC-CF and participants with positive attitude towards AD had significantly more discussions about EOL care wishes [$P=0.014$, $P<0.001$, $P=0.015$ respectively] (Supplementary Table 2). Positive attitudes predicted more AD intentions [mean of 3.8 +/- 0.58, $P<0.001$] (Supplementary Table 3).

Table 3. Clinicians and Faculty AD Behaviors

Behavior	PC-CF Yes % (n)	Non- PC-CF Yes % (n)	Chi-Squared value
1. Ministry of Health AD	14.5 (11)	6.4 (3)	1.88
2. Private AD	17.1 (13)	2.1 (1)	*6.46
3. Completed an HMO document	7.9 (6)	0	*3.90
4. Other formal document that can be used as an AD	15.8 (12)	4.3 (2)	*3.83
5. AD/HCP registered at the MOH	14.3 (3)	50 (3)	3.44
6. AD updated or reviewed in the past 5 years	42.9 (4)	66.7 (4)	1.06
7. Told a loved one that completed an AD	81 (17)	83.3 (5)	0.018
8. Have a HCP	23.7 (18)	10.6 (5)	3.25
9. Discussion about EOL care wishes with family or loved ones	78.9 (60)	40.4 (19)	***18.75
10. Discussion about EOL care wishes with physician	11.8 (9)	0	*5.88
11. Intend to fill out an AD	85.5 (47)	63.4 (26)	*6.26
12. Intend to register AD with the MOH	80.9 (38)	76.9 (20)	0.16
13. Intend to tell a loved one about completing an AD	97.9 (46)	100 (26)	0.56

*$P<0.05$, ***$P<0.001$
PC-CF - palliative care clinicians and faculty, **AD** - advanced directives, **HCP** - health care proxy, **HMO** - health maintenance organization, **MOH** - Ministry of Health, **EOL** - end-of-life

Table 4. Clinicians and Faculty AD Behaviors Categories

Behavior	PC-CF Yes % (n)	Non- PC-CF Yes % (n)	Chi-Squared value
1. AD documents	27.6 (21)	12.8 (6)	3.75
2. EOL discussion	80.3 (61)	40.4 (19)	***20.27
3. AD intentions	85.5 (47)	63.4 (26)	*6.26

*$P<0.05$, ***$P<0.001$
PC-CF - palliative care clinicians and faculty, **AD** - advanced directives, **HCP** - health care proxy, **HMO** - health maintenance organization, **MOH** - Ministry of Health, **EOL**- end-of-life

DISCUSSION

This study is the first investigation of health care professionals and faculty in Israel regarding AD knowledge, attitudes and behaviors, and to the author's knowledge, the first study worldwide to focus on the PC-CF AD behaviors as well as comparing them to non-PC-CF. We hypothesized that PC-CF would have greater AD knowledge and more positive attitudes, which may not result in a difference in AD behaviors.

PC-CF EXHIBIT MORE AD BEHAVIORS, ALTHOUGH BOTH GROUPS HAD LOW RATES OF AD COMPLETION.

This study found statistically significant differences in knowledge and attitudes between PC-CF and non-PC-CF groups, with the former having better knowledge and more positive AD attitudes, supporting the first hypothesis. The average score of PC-CF was strikingly lower than expected for health professionals working in this field, with a score of 75/100. This suggests that even PC-CF lack sufficient AD knowledge, and may need better training. Indeed, many PC-CF in our study were not PC licensed. The positive association between PC experience and knowledge and attitudes towards AD corresponds to previous studies of critical care and oncology nurses which found a positive correlation between experience and knowledge of AD [24, 25].

Overall, both PC-CF and non-PC-CF groups were found to have very low rates of AD completion [27.6% and 12.8% respectively] and even lower rates of MOH AD completion [14.5% vs 6.4%]. Although significant differences between the groups was found for overall AD behaviors categories, the completion rates of both groups were much lower than one would expect, and no difference was found for MOH AD, the single legally binding AD document in the country. The literature has shown barriers to AD completion despite knowledge of AD and PC experience. These include: feeling "too healthy", being "too busy", procrastination, reluctance of health professionals to initiate EOL discussions, and potential fear of AD abuse [23, 26–28]. Further research is required to better understand the barriers to AD completion of those who have experience and knowledge of PC and AD.

The low completion rate of MOH AD noted above as well as finding no statistical difference between the groups regarding MOH AD completion, suggests that there are barriers specifically

affecting the completion of MOH AD. It is possible that MOH AD are too complex with too much "legalese" for most people to fully understand and complete, in comparison with private AD or HMO documents which simplify and shorten the AD. In the present study in which health professionals were sampled, the proportion of participants who reported having completed the MOH AD, although low, is higher than the proportion who completed MOH AD in the general population [21]. This may be attributed to the study population being better informed of AD and their benefits than the average patient, and having higher education, which has been found to be positively associated with more AD completion [7, 28].

NO SIGNIFICANT DIFFERENCE IN COMPLETION OF OFFICIAL MINISTRY OF HEALTH AD WAS FOUND BETWEEN THE TWO GROUPS.

Though AD completion rates were low for both groups, we did find that PC-CF had more AD behaviors than non-PC-CF. When grouped into behavior categories, PC-CF had more AD behaviors in all three categories of completion, discussions, and intentions, than non-PC-CF. Although some have studied PC clinicians' behaviors in terms of patient care as their health care providers, we have not found literature on the AD behaviors of PC providers. There is evidence of a positive correlation between patients experiencing severe illness (such as major surgery or life threatening cancer diagnosis), and more AD behaviors [7, 28]. In addition, exposure to PC of friends and family was found to positively correlate with more AD intentions [29].

Additionally, we found that secular participants have more EOL discussions, but do not have more AD behaviors or intentions. This correlates with literature that found that religiosity is negatively associated with ACP [30], perhaps because of a religious taboo surrounding topics related to death. Alano *et al.* also found no association between religiosity and AD completion [28]. In contrast, there is evidence that religiosity is negatively associated with AD [30]. Past literature has discussed the role of religion in AD behaviors. This study's additional finding highlights the need for further research on the role of religiosity and AD behaviors.

To conclude, despite greater AD knowledge and attitudes among PC-CF, AD behaviors remain low and MOH AD completion rates were no different than those among non-PC-CF. The results of this study offer evidence of how crucial it is to address barriers not only for patients but also for professionals in order to raise the completion rates. The results of this study could serve as the basis for the development of evidence-based recommendations to further encourage ACP and AD behavior in all populations. This study has personal and professional implications for PC-CF and non-PC-CF, and may ultimately affect the quality of patient care.

STUDY LIMITATIONS

Though a pioneering study with important implications, the convenience and snowball sampling methods may have lent themselves to self-selection bias (due to greater/lesser motivation to participate in this study, in those who have previous experience in PC and AD), which may have affected our findings. The majority of the participants were female nurses, which while reflecting the national nurse population, which is predominantly female [31], may limit generalizability. Physician and nurse subgroups were not compared because this was not part of the study questions and therefore the study was not powered for statistical analysis of these subgroups. Since these two subgroups differ in many aspects of work, this may affect the generalizability of the findings and we suggest this comparison in future research. Since there is limited formal training in PC in Israel, many clinicians and faculty who define themselves as PC-CF may have received minimal formal training, which may have affected participants' understanding of terminology as well as their responses. In addition, studies originating from different countries define ACPs and construct AD dissimilarly, limiting the ability to compare our conclusions to other settings. Finally, this study was cross-sectional and therefore was only able to determine associative relationships and not causative ones.

ACKNOWLEDGMENTS

The authors thank all study participants for contributing their time to this research. Special thanks to Shir Lerner for statistical analysis.

The reported research is part of the final requirements for the primary author's MD degree at the The School of Medicine, Faculty of Medicine, Hadassah Medical Center, Hebrew University of Jerusalem.

AUTHORSHIP CONTRIBUTION

N.G.: Conceptualization (equal); methodology (equal); data curation (lead); writing – original draft (lead); review and editing (equal). A.S.: Conceptualization (supporting); methodology (equal); writing – review and editing (equal). A.W.W: Conceptualization (equal); methodology (equal); writing – review and editing (equal).

AUTHORS' DISCLOSURE STATEMENT

The authors have no conflicts of interest relevant to this article to disclose. No competing financial interests exist.

FUNDING INFORMATION

No funding was received for this article.

Corresponding Author

Natan Gropper
The School of Medicine, Faculty of Medicine, Hadassah Medical Center, Hebrew University of Jerusalem
P.O. Box 12271, Jerusalem, 9112102 Israel
Telephone: +972-547223283
Email: natangropper1990@gmail.com

References

1. Riley JC. Estimates of Regional and Global Life Expectancy, 1800–2001. *Popul Dev Rev* 2005; 31: 537–543.
2. McCarthy EP, Phillips RS, Zhong Z, et al. Dying with Cancer: Patients' Function, Symptoms, and Care Preferences as Death Approaches. *J Am Geriatr Soc* 2000; 48: S110–S121.
3. Marchi LP e S, Neto MF dos S, Moraes J de P, et al. Influence of advance directives on reducing aggressive measures during end-of-life cancer care: A systematic review. *Palliat Support Care* 2021; 19: 348–354.
4. Billings JA, Krakauer EL. On Patient Autonomy and Physician Responsibility in End-of-Life Care. *Arch Intern Med* 2011; 171: 849–853.
5. Kutner L. Due Process of Euthanasia: The Living Will, A Proposal Comment. *Indiana Law J* 1968; 44: 539–554.
6. Hinders D. Advance Directives: Limitations to Completion. *Am J Hosp Palliat Med* 2012; 29: 286–289.
7. Lovell A, Yates P. Advance Care Planning in palliative care: A systematic literature review of the contextual factors influencing its uptake 2008–2012. *Palliat Med* 2014; 28: 1026–1035.
8. Conroy S, Fade P, Fraser A, et al. Advance care planning: concise evidence-based guidelines. *Clin Med* 2009; 9: 76–79.
9. Bergman-Evans B, Kuhnel L, McNitt D, et al. Uncovering Beliefs and Barriers: Staff Attitudes Related to Advance Directives. *Am J Hosp Palliat Med* 2008; 25: 347–353.
10. Ache K, Harrold J, Harris P, et al. Are Advance Directives Associated with Better Hospice Care? *J Am Geriatr Soc* 2014; 62: 1091–1096.
11. Hoverman JR, Taniguchi C, Eagye K, et al. If We Don't Ask, Our Patients Might Never Tell: The Impact of the Routine Use of a Patient Values Assessment. *J Oncol Pract* 2017; 13: e831–e837.
12. Cappell K, Sundaram V, Park A, et al. Advance Directive Utilization Is Associated with Less Aggressive End-of-Life Care in Patients Undergoing Allogeneic Hematopoietic Cell Transplantation. *Biol Blood Marrow Transplant* 2018; 24: 1035–1040.
13. Silveira MJ, Kim SYH, Langa KM. Advance Directives and Outcomes of Surrogate Decision Making before Death. *N Engl J Med* 2010; 362: 1211–1218.
14. Detering KM, Hancock AD, Reade MC, et al. The impact of advance care planning on end of life care in elderly patients: randomised controlled trial. *The BMJ* 2010; 340: c1345.
15. Bakitas M, Ahles TA, Skalla K, et al. Proxy perspectives regarding end-of-life care for persons with cancer. *Cancer* 2008; 112: 1854–1861.
16. Halpern NA, Pastores SM, Chou JF, et al. Advance Directives in an Oncologic Intensive Care Unit: A Contemporary Analysis of their Frequency, Type, and Impact. *J Palliat Med* 2011; 14: 483–489.
17. Elsayem AF, Bruera E, Valentine A, et al. Advance Directives, Hospitalization, and Survival Among Advanced Cancer Patients with Delirium Presenting to the Emergency Department: A Prospective Study. *The Oncologist* 2017; 22: 1368–1373.
18. Patel MI, Bhattacharya J, Asch SM, et al. Acceptance of Advance Directives and Palliative Care Referral for Veterans With Advanced Cancer: A Retrospective Analysis. *Am J Hosp Palliat Med* 2016; 33: 742–747.
19. Hill LA, Waller CJ, Borgert AJ, et al. Impact of Advance Directives on Outcomes and Charges in Elderly Trauma Patients. *J Palliat Med* 2020; 23: 944–949.
20. The Dying Patient Act; Israel, 2005. Availble from: https://www.health.gov.il/LegislationLibrary/Zchuyot_03.pdf [Last accessed 08/08/2022], https://www.health.gov.il/LegislationLibrary/Zchuyot_03.pdf.
21. Shvartzman P, Reuven Y, Halperin M, et al. Advance Directives—The Israeli Experience. *J Pain Symptom Manage* 2015; 49: 1097–1101.
22. Andorno R, Brauer S, Biller-Andorno N. Advance Health Care Directives: Towards a Coordinated European Policy? *Eur J Health Law* 2009; 16: 207–227.
23. Sahm S, Will R, Hommel G. Attitudes towards and barriers to writing advance directives amongst cancer patients, healthy controls, and medical staff. *J Med Ethics* 2005; 31: 437–440.
24. Jezewski MA, Brown JK, Yow-Wu Bill Wu, et al. Oncology Nurses' Knowledge, Attitudes, and Experiences Regarding Advance Directives. *Oncol Nurs Forum* 2005; 32: 319–327.
25. Scherer Y, Jezewski MA, Graves B, et al. Advance Directives and End-of-Life Decision Making: Survey of Critical Care Nurses' Knowledge, Attitude, and Experience. *Crit Care Nurse* 2006; 26: 30–40.
26. Schickedanz AD, Schillinger D, Landefeld CS, et al. A Clinical Framework for Improving the Advance Care Planning Process: Start with Patients' Self-Identified Barriers. *J Am Geriatr Soc* 2009; 57: 31–39.
27. McDonald JC, du Manoir JM, Kevork N, et al. Advance directives in patients with advanced cancer receiving active treatment: attitudes, prevalence, and barriers. *Support Care Cancer Off J Multinatl Assoc Support Care Cancer* 2017; 25: 523–531.
28. Alano GJ, Pekmezaris R, Tai JY, et al. Factors influencing older adults to complete advance directives. *Palliat Support Care* 2010; 8: 267–275.
29. Kim E, Lee KS. Factors associated with willingness to complete advance directives in older adults. *Geriatr Nur (Lond)* 2021; 42: 1042–1047.
30. Garrido MM, Idler EL, Leventhal H, et al. Pathways From Religion to Advance Care Planning: Beliefs About Control Over Length of Life and End-of-Life Values. *The Gerontologist* 2013; 53: 801–816.
31. Occupational Characteristics of Nurses in Israel; Israel, 2014. Availble from: https://www.health.gov.il/publicationsfiles/nd_occup_character.pdf [Last accessed 02/10/2022], https://www.health.gov.il/publicationsfiles/nd_occup_character.pdf.