

Review Article:

The role of spirituality and spiritual care in complementary and alternative medicine: A scoping review

Hoosen M¹, Roman N V² & Mthembu T G³

Abstract

Background: Spirituality has become more prevalent in health professions other than complementary and alternative medicine (CAM). In CAM, spirituality appears to be part of a foundational component of the clinical practice, which is valued by many patients. Spirituality has gained popularity in healthcare education and practice; however, the contribution made by CAM remains minimal evidenced by the paucity of studies on the topic of spirituality in CAM. Therefore, there is need for a scoping review to: 1) to explore the focus and nature of research on spirituality in CAM; 2) to provide recommendations based on the relational aspects between spirituality and CAM. **Methods:** A scoping review was performed of all relevant articles found in Ebscohost (Academic Search Complete), Science Direct, and Scopus published between 2000 and 2019. This scoping review included two hundred and six studies, of these, twenty-two articles focussed on the role of spirituality in CAM. **Results:** These four themes were reported in the results: spirituality as a modality of CAM; patient perceptions of the role of spirituality and CAM; practitioner perceptions of the role of spirituality and CAM; and the role of spirituality and CAM in education and practice. Spirituality was considered an important component and was linked to culture, traditions and/or religious beliefs. The use of spirituality in CAM was especially linked to patients living with chronic disease such as diabetes, cardiac conditions and cancer. Spirituality seemingly facilitated health care and while patients expected spirituality healthcare advice from CAM practitioners most CAM practitioners felt ill equipped to deal with the topic appropriately. **Conclusions:** Overall, this scoping review highlights that the role of spirituality in CAM seem to be of value for both practitioners and clients within the CAM clinical setting. However, only a few practitioners include spiritual healthcare advice without clear guidelines. Consequently, this may compromise the holistic treatment, which so many patients expect within the CAM domain. Therefore, there is a need for the inclusion of spirituality in the CAM curriculum and guidelines for CAM practitioners.

Keywords: spirituality, spiritual care, complementary medicine, alternative medicine, traditional medicine, patient perceptions, practitioner perceptions, CAM practice.

*Bangladesh Journal of Medical Science Vol. 20 No. 04 October'21. Page : 714-724
DOI: <https://doi.org/10.3329/bjms.v20i4.54125>*

Introduction

Spirituality is defined as an aspect of humanity that supports the way individuals seek and express their meaning and purpose in life. It embraces secular and

philosophical, as well as religious and cultural, beliefs and practices¹. It highlights the relationship with the transcendent or sacred and has a strong influence on the person's beliefs, attitudes, emotions, and

1. Dr Mujeeb Hoosen, Coordinator of Unani-Tibb, School of Natural Medicine, Faculty of Community and Health Sciences, The University of the Western Cape, Bellville, South Africa
2. Professor Nicolette Vanessa Roman, SARChI: Human Capabilities, Social Cohesion and the Family, The Centre for Interdisciplinary Studies of Children, Family and Society, Faculty of Community and Health Sciences, The University of the Western Cape, Bellville, South Africa
3. Dr Thuli Godfrey Mthembu, Senior Lecturer, Department of Occupational Therapy, Faculty of Community and Health Sciences, University of the Western Cape, Bellville, South Africa

Correspondence to: Dr Mujeeb Hoosen, School of Natural Medicine, Faculty of Community and Health Sciences, University of the Western Cape, South Africa.

Email: mahoosen@uwc.ac.za / mujeebh786gmail.com

behaviour². Every culture and tradition have some form of spiritual practice, which focuses on a deeper interaction with a higher entity³. It is an important component of quality of life, health and well-being both in the general population and those affected by illnesses⁴. Previous studies have indicated that spirituality and spiritual care are firmly fixed within the health care agenda^{5,6}. This growing interest has led to more professionally diverse discourses on spirituality with almost every healthcare profession contributing to the debate, including medicine^{4,5}. Studies report that healthcare practitioners who provide spiritual care to their patients contribute significantly to improving their patients' physical comfort as well as lower levels of anxiety and increase their hope for the future. Patients who reported a greater awareness of their spirituality also reported that they are healthier⁷. Studies confirm that spirituality and spiritual care practices are closely linked to better health outcomes^{4,5,6,7}. It is reported that many patients associate spirituality within the CAM domain⁸. Yet, little is known from the CAM's perspective about spirituality and spiritual care.

CAM also known as 'natural' or 'non-allopathic' refers to other than allopathic, modern or 'biomedical' medicine⁹. CAM domains may include holistic medical systems (e.g., African traditional medicine and Unani Tibb), mind body medicine (e.g., relaxation therapy), biologically based practices (e.g., herbal medicine), manipulative and body-based practices (e.g., massage and cupping therapy), and energy medicine (e.g., therapeutic touch)¹⁰. Today, CAM has gained popularity amongst medical practitioners, researchers, government agencies and the public⁸. CAM is a primary form of healthcare delivery and it serves to complement existing healthcare systems. It is an essential component of healthcare in most countries, which is often underestimated. For example, CAM systems such as African traditional medicine, Unani-Tibb, traditional Chinese medicine, amongst others are practiced and utilized by millions globally. It is estimated that up to 80% of Africans rely on CAM for their healthcare needs¹¹. Approximately 38% of the general US population use CAM. CAM services and products are increasing in demand. It has been reported that adults spent nearly \$34 billion on CAM-related care and products; \$22 billion was spent on self-care CAM therapies. CAM usage in the USA has continued to increase over the decades¹².

Spirituality and CAM are interconnected in complex

ways and are often discussed in the context of holistic care¹⁰. In several studies, spirituality was the strongest predictor for CAM use amongst patients living with chronic disease. Particularly amongst people living with diabetes, cardiac conditions and cancer^{13,14,15,16}. Spirituality and CAM are two extremely relevant topics to cancer survivors. Research on spirituality and CAM is rapidly increasing in the field of cancer¹⁷.

Spirituality is a foundational component in CAM often discussed in the context of holistic wellness^{5,9,14,15,16}. All CAM modalities recognises the concepts of spirituality, vitality and energy as key components to attaining wholeness for the mind, body and spirit^{5,8,9}. For instance, the Unani system of medicine recognizes the important role of spirituality and spiritual care in healthcare, the human spirit is considered the supreme regulator of man⁹. Spirituality is an important tenant in Ayurveda, traditional Chinese medicine as well as many other forms of CAM too^{5,9}. For this reason, many patients seek therapies related to spirituality within the CAM profession⁸. In CAM practice, patients tend to expect their CAM practitioners to address their spiritual needs during illness^{5,8,10}. Although the importance of spirituality in healthcare education and practice is given priority in many health professions, the progression in CAM remains minimal⁵. In the past CAM training had to absorb and conform to several elements of biomedicine which led to a hybrid form consisting of traditional values within a biomedical model. This contributed to the neglect of the spiritual component in CAM education and practice as CAM institutes moved away from their traditional training to adopt a more biomedical approach^{5,8,9,16}. This may be the reason why there are so few studies on the role of spirituality in CAM today. For instance, Mthembu, et al.,¹⁸ reported that spirituality and spiritual care were mainly examined in healthcare professions such as nursing, psychiatry and social work, and little is known in other health professions. As a result, it has been reported that practitioners seemed to be ill equipped to deal with the topic of spirituality with their patients¹⁸. This may also be the case in the field of CAM, which necessitated for a scoping review to explore the role of spirituality in the field of CAM. This may shed light on whether the holistic approach within CAM theory is applied within clinical setting. This scoping review aims to recognise the gaps, which may exist in the field of spirituality and CAM. Scoping reviews are valuable in mapping the main concepts of a research area to its source and evidence

available in the literature. Scoping reviews are employed particularly in fields, which are complex, or has not been reviewed comprehensively before^{19,20}. The objectives of scoping reviews are broad and more comprehensive than the objectives of a systematic review, which are narrow, and more focused^{19,20}. For this reason, a scoping review has been chosen in this study. The objectives of this scoping review are to: 1) to explore the focus and nature of research on spirituality and CAM; and 2) provide recommendations based on the relational aspects between spirituality and CAM.

Methods

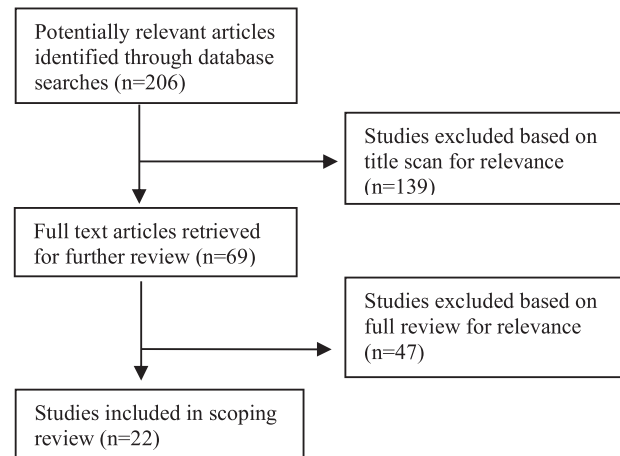
A search of Ebscohost (Academic Search Complete), Science Direct, and Scopus databases was conducted using the terms: (a) spirituality *AND*; (b), complementary medicine (c) traditional medicine (d) alternative medicine from the records in these databases from January of 2000- December 2019. The inclusion criteria for this review required studies to: (a) be relevant to CAM practitioners; (b) scholarly, peer reviewed; and (c) full-text articles (d) in the English language. The initial search produced two hundred and six hits for the previously mentioned search terms. A subsequent process of examining the title, abstract, and main text of each article was done (sixty-nine articles), with exclusion of duplicated or non-eligible documents occurring at each stage. Twenty-seven articles were in areas other than CAM and therefore not included and twenty duplicated articles were removed which narrowed down the final number to twenty-two articles.

The charting of data from these twenty-two articles involved the extraction of information from individual articles. Data were categorised according to prevalent themes and shared in the results. Descriptive characteristics such as authors, year of publication, country where the study was held, study design, study population, sample size, modality of CAM, related CAM therapies, spirituality, spiritual care, clinical practice, patient perceptions, practitioner perceptions and key findings were collected.

A qualitative descriptive approach was used to summarize the results, grouping together themes that were similar. The descriptive summary of the research categorised the amount, focus and nature of research. The objective of this scoping review was to scope the field of CAM and to summarize the main results as reported across these articles in relation to spirituality. Results of the search strategy

and process of selecting spirituality and CAM related research articles can be seen in Figure 1.

Figure 1:



Results of search strategy and process of selecting spirituality and CAM related research articles.

Figure 1 is a flow diagram describing the process of searching and selecting spirituality and CAM related articles to be included in the scoping review.

Results

The study and implementation of spirituality has become more prevalent in health professions other than modalities of CAM. There is relatively little research done on the role of spirituality in CAM, which resulted in a narrow list of studies. In this article twenty-two peer reviewed research studies were examined, which included three review articles, fifteen cross-sectional studies, five of which employed a mixed methods approach, two were multi centric national surveys, one online survey and one randomised clinic trial.

In this scoping review, demographics and the countries where these studies took place are presented first, followed by a review of the literature and listing of the modalities and therapies of CAM commonly found within the eligible studies. There are four themes presented in this scoping review: spirituality as a modality of CAM; patient perceptions of the role of spirituality and CAM; practitioner perceptions of the role of spirituality and CAM; and the role of spirituality and CAM in education and practice.

Demographics

This scoping review reported on studies across eleven countries, on eleven CAM modalities and over forty related CAM therapies in order to explore the role of spirituality in CAM. Studies included in this review

reported on the use of spirituality related CAM therapies within the American, Hispanic, Native Indian, Arabian, Jewish, Chinese, German, and Indian communities. This scoping review provided information on the patient, CAM practitioner and allopathic practitioner views on the role of spirituality in CAM. These studies concurred that traditional, cultural and religious aspects were strongly related to the use of spirituality related CAM therapies and modalities^{12,13,14,5,16,17}. No studies were found on any African country or population even though it was previously reported that millions of people in Africa rely on CAM for their healthcare needs¹¹.

Studies on CAM and spirituality conducted in different countries

Drawing from the reviewed studies, there were twenty-two studies that reported on CAM and spirituality. These countries include the United States of America (7), Australia (3), Canada (2) Puerto Rico (1), Israel (2), Denmark (1), Germany (1), Saudi Arabia (1), Japan (1), China (1) and India (2).

Modalities and Therapies of CAM

Most studies in this scoping review reported on the use of several CAM therapies within a few CAM modalities or as stand-alone therapies related to the use of spirituality as reported by the participants enrolled in various studies. These therapies includes: prescription of vitamins and supplements^{14,15,17}, antioxidants¹², megavitamin therapy¹², herbal supplements^{14,15,17}, herbal extracts and concentrates^{10,15}, herbal medicine^{10,12,14,15}, traditional and folk remedies^{10,12,14,15}, kitchen remedies^{13,14}, dietary/nutritional therapy^{14,17} (including nutritional supplements)^{14,17}, lifestyle-diet modification¹², weight loss program¹², anthroposophic medicine^{10,15} (e.g. injections of Viscum, Mistletoe and Iscador) aromatherapy^{12,23,24}, Bach remedies^{110,12,13}, reflexology^{8,17}, body–mind therapies^{8,12}, biofeedback (manipulation of physiological functions)^{8,17}, hypnosis (manipulation of mental states)^{8,12}, imagery techniques (positive imagination)^{10,12,15}, prayer^{8,12,23,24} (connection to a higher power), meditation/relaxation (self-induced mode of consciousness)^{10,12,15}, and spiritual healing^{10,12,13,14,15,16,17} (channelling healing energy)⁸, body–mind therapies^{12,23,24} (besides prayer²³, meditation⁸, and spiritual healing)⁸, breathing exercises^{10,12,15}, touch and movement therapies^{10,15} (e.g., reflexology, yoga, shiatsu, etc.), Alexander and Feldenkreis techniques^{10,15}, healing and energy (e.g., magnets, Reiki, Bicombs)^{8,10,15}, art therapies¹⁴

(e.g., drawing, music, dance)¹⁴, massage²³, cupping²³, acupuncture^{26,27,29,30}, tai chi¹⁷, Qi gong^{17,26,27,28}, and chiropractic treatment^{12,17}.

Seventeen studies reported on the use of spirituality as a CAM therapy by participants within a few modalities of CAM. These modalities include: Unani medicine (n=2), Naturopathy (n=5), Homeopathy (n=4), Chiropractic (n=5), Sidda (n=2), Ayurveda (3), Aromatherapy (4) Traditional Chinese medicine (12), Traditional Arabian medicine (1), and Traditional Jewish medicine (1).

Spirituality as a modality of CAM

Authors within nineteen of the twenty-two studies included in this scoping review described spirituality within the context of CAM and holistic medicine. Chang et al.,¹³ reviewed eighteen studies from nine countries and reported that spirituality was the most preferred CAM modality in populations living with diabetes¹³. Ben-Arye et al.,¹⁰ reported likewise in an exploratory cross-sectional study on CAM usage and the its relation to spirituality conducted in Israel on 3742 patients living with diabetes¹⁰. Similar findings were also reported in studies on other illness conditions like cancer^{14,15,23,28}.

In a longitudinal qualitative study conducted on patients affected by prostate cancer in Canada, White et al.,²⁵ reports that one third of the sample chose CAM based on the spiritual component. These patients associated spirituality with CAM and well-being²⁵. In four separate cross-sectional studies conducted on patients living with cancer in Canada, Saudi Arabia, Australia and Israel, patients were reported to have chosen CAM as an option for healing based on their belief that spirituality was closely linked to the CAM domain. These patients were also reported to have chosen CAM to satisfy their religious and spiritual needs during their illness^{14,15,23,28}. Furthermore, Robotin²⁷, reported that spirituality was the preferred modality of CAM amongst 70% of patients living with cancer in the USA and Singapore. In both studies patients regarded CAM and spirituality in the context of holistic care²⁷. Jones et al.,³¹ also reported that most participants of a study on CAM usage among prostate cancer survivors regarded spirituality as an important CAM modality in their preferred treatment for cancer. Many participants were sceptical of other forms of CAM like herbal medicine, chiropractic treatment, guided imagery amongst others but all participants valued the role of spirituality as a modality of CAM³¹.

In a qualitative survey conducted in the USA on cardiac patients (sample size: 481 face-to-face interviews and 426 telephone interviews) it was reported that 23.3% of the respondents relied on spiritual healing to assist them to better manage their cardiac symptoms. In this study, spirituality was once again recognised as a modality of CAM¹². In a national online survey conducted in China, it was reported that most of the 880 respondents chose and remained using traditional Chinese medicine treatments due to the strong spiritual components³⁰.

Patient perceptions of the role of spirituality and CAM

Eleven studies reported on patient perceptions in relation to the role of spirituality and CAM.

A national survey conducted on 22 929 American healthcare users investigated the role of spirituality and religion in healthcare reported that 18% of participants utilised spiritual practices as part of their healthcare options. Culture and tradition played a key role in CAM related choices made by many participants. These participants relied on spirituality to cope with health-related stress and they considered spirituality an important component in the healing process³².

In another survey on the association between Ayurveda, health and spirituality in Germany on seventy Ayurveda patients, it was reported that most patients regarded themselves as spiritually inclined. They considered spirituality a crucial component in their lives and they viewed Ayurveda as a form of spirituality and healing. In this study 76% of participants believed that Ayurveda therapists were performing spiritual guide related functions. These patients expected spiritual care from their Ayurveda therapists. A quarter of respondents believed that training in a western medical school had a negative impact on the spiritual characteristics of the Ayurveda therapist²⁴.

The American Cancer Society conducted a longitudinal, population-based study designed to follow survivors of cancer in the US over a 10-year period which explored factors related to their quality of life. This study particularly explored the classification of religious/spiritual practices as CAM and alternative subscale structures of the Functional Assessment of Chronic Illness Therapy-Spiritual Well-being (FACIT-Sp). The prevalence of any CAM use decreased significantly when spirituality was excluded, from 79.3 to 64.8%. This study confirmed

that spiritual wellbeing was significantly associated with CAM use for most patients living with cancer¹⁷. In another longitudinal study on patients living with prostate cancer, White et al.,²⁵ reported that participants sought a holistic approach when dealing with their illness. Some viewed their condition as a spiritual journey and a test of faith. They also reported that they expected their physicians to understand their spiritual needs and expected to establish a partnership with their healthcare providers²⁵. CAM use was associated with the patient's spiritual quest, a higher degree of spiritual quest was associated with higher expectations from the CAM provider consultation. Two hundred and thirty-five of the five hundred and nine respondents reported their expectations of the oncology social workers regarding CAM integration. In another study, it was reported that patients living with cancer expected a spiritual health assessment as part of their consultations¹⁰. Patients chose CAM based on its integration of spirituality into treatment. Spirituality and prayer were the most common chosen therapies among many patients living with cancer. A high level of spiritual faith of patients related to their belief and use of CAM. These patients preferred the integration of CAM into their cancer treatment¹⁴.

In another national survey conducted in the USA on 3032 CAM users, spirituality self-identification was positively related to CAM usage amongst most participants⁸. Several other studies conducted in the USA also reported that CAM users regarded spirituality as an indispensable part of their preferred healthcare program which provided the necessary coping skills to deal with their illness^{13,31,32,33}. Furthermore, studies within other regions like Australia, Canada, Israel, Saudi Arabia, Japan, Germany, India, Puerto Rico and China supported these findings^{10,12,14,15,16,23,24,25,26,27}.

Most studies conducted on populations affected by cancer and diabetes across a few countries reported on the association or relation between spirituality, CAM and holistic healthcare. These participants chose CAM to satisfy their spiritual health needs during their illness. Some described spirituality within CAM as means to wellness; others felt empowered to be able to determine their own path to wellbeing^{10,14,15,26,27}. Participants sought healing in a broader mind, body, spirit context; some found that developing individualized CAM approaches were consistent with their beliefs about the causes of cancer. These patients made significant lifestyle changes to improve their health. Many believed

that spirituality within the CAM domain increased their hope and allowed them to deal with their illness^{13,16,24,28,29}. Some felt comfortable discussing their spiritual health needs with CAM practitioners but not so with allopathic physicians. Some believed that their oncologists were not in favour of CAM at all. Many patients particularly those affected by cancer and cardiac conditions reported that they did not disclose their CAM use with their allopathic physicians. Many perceived conventional treatments to have a negative impact on their quality of life^{10,13,14,15,17,31}.

Practitioner perceptions of the role of spirituality and CAM

A total of six studies reported on the practitioner perceptions of the role of spirituality and CAM. A national survey was conducted in the USA on 1561 practitioners and the relation between their spirituality and CAM usage. This study reported that the spirituality of most practitioners was closely related to their integration of CAM into practice, personal usage and for CAM referral to their patients²⁶. In another survey conducted in Germany on 70 Ayurveda therapists and their views on their profession and its relation to health and spirituality, it was reported that 76% of participants believed Ayurveda to be a form of spirituality and 79% of Ayurveda therapists believed that they should fulfil functions related to spiritual guidance²⁴.

In a cross-sectional survey conducted on 74 allopathic practitioners in Puerto Rico and their views on spirituality and CAM in their practice it was reported that most believed CAM to be effective and they regarded spirituality as an important component of CAM. Physicians who regarded themselves as spiritual were more inclined to use CAM personally and refer CAM to their clients²⁹. A multisite exploratory study conducted in India on the role religion and spirituality in healthcare amongst CAM and allopathic professionals reported that CAM practitioners were more spiritually inclined than the allopathic group whilst both believed that spirituality was important to their patients healing process¹⁶.

In a quantitative survey conducted on 162 CAM practitioners and their views toward spirituality in their lives in relation to clinical practice it was reported that most participants considered spirituality important to their personal lives. However only 87 participants reported that spirituality was an

important component to their clinical practice whilst 47 regarded spirituality as non-important and the remainder were unsure of the role of spirituality in their clinical practice³⁴.

A cross-sectional study was conducted at five CAM and two allopathic tertiary care hospitals in India involving 393 healthcare professionals. This study explored their attitudes towards spiritual healing and its role in alleviating the stigma attached to psychiatric services. The perspectives of CAM and allopathic health professionals on role of spirituality in mental health care were compared. Over 40% of the participants in both groups believed that patients relied on CAM practitioners to assist them with their spiritual health and mental disease management. In this study 87% of CAM practitioners and 73% of allopathic practitioners agreed that spiritual healing was a beneficial component and complementary to psychiatric care¹⁶.

The role of spirituality and CAM in education and practice

The importance of spirituality in healthcare education and practice is currently given importance in many fields however, the progression in CAM remains minimal. CAM education does not adequately prepare practitioners to address spirituality. CAM practitioners may be ill equipped to address the topic of spirituality with their patients. There is a need for spirituality to be included in CAM training and practice⁵. Spirituality is a growing field in medicine, practitioners should be familiar with various CAM therapies in relation to the needs of their patients as well as be sensitive to their cultural preferences⁸.

In a multisite exploratory study conducted in India on the role religion and spirituality in healthcare amongst CAM and allopathic professionals it was reported that both groups agreed that spirituality was a focus area for their patients during illness. Whilst the CAM group felt more comfortable in addressing matters of spirituality they nevertheless felt that they did not have the expertise to deal with this aspect appropriately. Some of the barriers to providing spiritual care that were reported by both groups include 'insufficient knowledge/training' (26.6 % TCAM and 24.9% allopaths), 'insufficient time' (27.6% TCAMs and 31.3% allopaths), 'general discomfort' (34.9% TCAMs and 27.4% allopaths), and a 'concern of offending the patients' (16.2 % TCAMs and 19.4 % allopaths). The CAM group felt more strongly than the allopathic group that spirituality should be

included in the medical curriculum¹⁶. Several studies on populations living with cancer recommended the inclusion of spirituality in medical education and practice^{14,15,23,28}. In a qualitative study on patients living with prostate cancer, Jones et al.,³¹ reported that more than half of the participants believed that spirituality assisted them to deal with their illness. The study further revealed four themes, which emanated from this study namely; the importance of spiritual needs as a CAM modality to health, the value of education in relation to CAM, importance of trust in selected healthcare providers, and how men decide on what to believe about CAM modalities³¹.

In a preliminary study by Margolin et al.,³⁵ on patients affected by HIV and substance abuse it was reported that those who received a spirituality-based intervention alongside their acupuncture treatment received significantly greater clinical gain than the control group. These patients had significantly more drug-free weeks during treatment, and greater improvements in anxiety and depression than the control group. The efficacy of the acupuncture treatment was also significantly improved in the group who were exposed to the spirituality-based program³⁵.

Ben-Arye et al.,¹⁰ conducted an exploratory cross-sectional study on CAM usage and its relation to spirituality on 3742 patients living with diabetes in Israel. The findings confirmed a positive association between spirituality and CAM usage. This study recommended that physicians enquire on the CAM usage from their patients living with diabetes. This study also proposed the integration of a three-layer healthcare model, which includes lifestyle changes, empowerment of patients, and therapeutic relationships woven around spirituality, CAM and conventional treatment¹⁰.

Discussion

The World Health Organisation (WHO) highlights the important role that CAM plays in the healthcare of populations around the world³⁶. CAM systems such as African traditional medicine, Unani-Tibb, traditional Chinese medicine, amongst others are practiced and utilized by millions globally. It is estimated that up to 80% of Africans rely on CAM for their healthcare needs¹¹. CAM is an essential component of healthcare in most countries, which is often underestimated. CAM services and products are increasing in demand³⁷. CAM refers to a patient-centred, wellness-orientated system of medicine

focused on individualized treatment according to lifestyle factors³⁶.

All CAM modalities recognise the concept of spirituality as a key component to attaining wholeness for the mind, body and spirit. CAM is as diverse and abundant as the peoples of the world⁹. Most countries have their own forms of CAM, which are firmly rooted in their culture and history³⁶. Most forms of CAM are tradition-based and result from centuries of observation, empirical practice and intuitive experience⁹. Koenig³⁸ reports that spirituality and healthcare have been related in one way or another in all population groups since the beginning of recorded history³⁸. Every culture and tradition has some form of spiritual practice which focuses on a deeper interaction with a higher entity³. It is an important component of quality of life, health and well-being both in the general population and those affected by illnesses⁴. The association between spirituality and CAM is highly regarded in most forms of CAM¹⁰. Therefore, many patients associate spirituality within the CAM domain⁸. Despite this there seems to be very little information of the role of spirituality in CAM when compared to other healthcare professions.

This might be due to the impact that the western biomedical system had on CAM education and practice in the past, which influenced future research initiatives in CAM²⁴. The western biomedical system viewed disease as a physical or mechanical disorder with little relationship to a person's psychological, social and spiritual experiences²². This was an essentially European based medical system, which dominated medical education in several countries for decades. The early to mid-twentieth century was marked by a dominant bio-physically-oriented approach to medicine, which disregarded the spiritual aspect of healing²⁶. The Anglicization of medical education was established by European science in all medical schools²². The colonial medical model, which was based on reductionism, ignored the role of religion and spirituality in healthcare. This, alongside other factors led to the eradication of CAM in the formal health education sector and public health in most countries²². Holistic practitioners and CAM supporters were critical of western biomedicine's reductionist approach, which was characterised by impersonality²⁶. This began to change towards the end of the twentieth century with the rise in consumer-oriented healthcare services and a growing consumer demand for CAM and the person-centred approach to healthcare¹⁶. CAM

systems regained popularity and were slowly re-introduced back into society through training and practice, however CAM systems were no match to the well-established colonial biomedical system. CAM training had to absorb and conform to several elements of biomedicine, which led to a hybrid form consisting of traditional values within a biomedical model. This contributed to the neglect of the spiritual component in CAM education and practice as CAM institutes moved away from their traditional training to adopt a more biomedical approach^{16,22,24}. Today the contribution to the topic of spirituality in healthcare by CAM remains minimal compared to the other health professions^{5,8,16}. Mthembu et al.,¹⁸ reported that spirituality and spiritual care were mainly examined in healthcare professions such as nursing, psychiatry and social work, and little is known in other health professions¹⁸.

Spirituality was found to be the strongest predictor for CAM use especially amongst patients living with chronic disease. Particularly amongst people living with diabetes, cardiac conditions and cancer^{10,13,14,15,16,40,41}. Spirituality and CAM are two topics that has gained recognition as being extremely relevant to cancer survivors. Research on spirituality in CAM for cancer survivors is increasing rapidly¹⁷.

Most studies conducted on populations affected by cancer and diabetes across a few countries reported on the association between spirituality, CAM and holistic healthcare. The studies confirmed that spirituality was an important component to most people which may be linked to their culture, traditions and/or religious beliefs^{10,13,14,15,16,23,42,43}. Most participants in the reviewed studies sought CAM therapies based on their belief that CAM modalities included spirituality practices, which were valuable to their healing process. Spirituality in CAM was seen as a means of hope, healing and as a coping mechanism. Many viewed conventional healthcare as impersonal and some believed that conventional treatment could be harmful. Most participants expected spirituality care advice and practices from their CAM practitioners^{10,13,14,15,16}. These findings agreed with White et al.,²⁵ who reported that patients living with cancer tended to perceive conventional treatment as ineffective and harmful whilst CAM was perceived as effective with less or no adverse effects²⁵. Furthermore, patients' self-knowledge about CAM contributed to the decision to decline conventional cancer treatment. Decision-making was strongly influenced by the patient's belief in the

whole person healthcare model as opposed to the biomedicine approach²⁵. In addition, authors within nineteen of the twenty-two studies included in this scoping review described spirituality within the context of CAM and holistic medicine. It is clear that most studies reported on the importance of spirituality for the clients of CAM, which further highlights the need for the CAM practitioner competence in the area of spirituality.

CAM practitioners agreed that spirituality was important to the wellbeing of patients. However only those who were spiritually inclined were likely to include spirituality practices into their treatment regimens for their patients but they felt that they did not have the expertise to deal with this aspect appropriate^{24,31,34}. These practitioners relied on their own forms of spirituality to guide their spiritual care advice in practice. CAM practitioners who were not spiritually inclined were less likely to include spirituality practices into their treatment. This may mean that those patients seeking CAM modalities might not have their spiritual healthcare needs met depending on the practitioner's views on spirituality. The inclusion of spirituality in clinical practice should be guided by professional guidelines as opposed to personal tendencies. Some of the barriers to providing spiritual care that were cited includes 'insufficient knowledge/training', 'insufficient time', 'general discomfort', and a 'concern of offending the patients'^{24,31,34,44,45}. These findings agreed with previous reports amongst other healthcare professionals³⁹.

Allopathic practitioners agreed that spirituality was important to the wellbeing of patients. They viewed CAM spiritual therapies as a facilitator to good health and wellbeing. These practitioners supported an integrative approach to medicine, which included the use of several CAM modalities and therapies to satisfy the spiritual needs of their patients¹⁶. Several studies reported that patients felt more comfortable discussing their spiritual health needs with CAM practitioners as opposed to allopathic physicians. Some believed that their allopathic physicians were not in favour of CAM at all. Many patients particularly those affected by cancer and cardiac conditions reported that they did not disclose their CAM use with their allopathic physicians. Many perceived conventional treatments to have a negative impact on their quality of life. These patients expected an integrative healthcare approach from their allopathic physicians^{10,15,17,24,31}. In one study

25% of respondents believed that training in a western medical school had a negative impact on the spiritual characteristics of the Ayurveda therapist²⁴. One study proposed the integration of a three-layer healthcare model, which included lifestyle changes, empowerment of patients, and therapeutic relationships woven around spirituality, CAM and conventional treatment¹⁰. Spirituality and healthcare seem to be a common area of interest for both CAM and allopathic practitioners. This may be a good starting point for the integrative healthcare approach, which seems to be needed by patients especially those affected by diabetes and cancer. It seems that patients tend to hide their inclinations or use of CAM from their allopathic physicians for several reasons as reported previously. This suggests that patients may use more than one system of medicine at a time, which may impact in a good or bad way. For instance, a patient affected by cancer may be on chemotherapy treatment whilst using herbal medicine prescribed by the CAM practitioner, this may cause drug interactions, which could enhance or decrease the efficacy of the allopathic treatment. More research on this is required.

The importance of spirituality in healthcare education and practice is currently given importance in many fields however the progression in CAM remains minimal. Several studies reported on the need for spirituality in CAM education and practice^{5,10,14,15,23,31,35}. Patients associate spirituality within the CAM domain therefore they expect spiritual care advise from CAM practitioners. However, CAM education does not adequately prepare practitioners to address spirituality. CAM practitioners are reported to be ill equipped to address the topic of spirituality with their patients. There is a need for spirituality to be included in CAM training and practice^{5,10,14,15,23}.

Recommendations for practice and education

Based on the finding in this scoping review it seems that spiritual care guidelines are required for the CAM profession so that CAM practitioners may provide the holistic care which is expected from their patients. The inclusion on spirituality and spiritual care into the CAM curriculum is also required to prepare graduates of CAM for the holistic practice according to the philosophy of CAM⁴⁵.

Conclusion

Although spirituality is a foundational component of CAM very little progress has been made in this field when compared to other health professions. Overall, the literature suggests that many people in several countries strongly associate spirituality within the CAM domain especially those affected by chronic conditions. For some, spirituality is recognised as a CAM modality and for others it is seen as a CAM therapy. The findings that emerged from this review indicates that patients value the role of spirituality in their lives and expect spirituality to feature in their healthcare services, which is the main reason why many patients choose CAM. Decision-making was strongly influenced by the patient's belief in the whole person healthcare model as opposed to the biomedicine approach. They expect CAM practitioners to be competent in spirituality and spiritual care however as reported this is not the case. Practitioners felt ill equipped to deal with the topic of spirituality in an appropriate manner and recommended the inclusion of spirituality into CAM education and practice. The information provided in this review highlights the need for further research on the topic of spirituality within CAM for education and practice⁴⁵.

Source of funding

This work is based on the research supported in part by the National Research Foundation (NRF) of South Africa for the grant, Unique Grant No. 122037. Any opinion, findings and conclusion or recommendations expressed in this material are that of the author(s) and the NRF does not accept any liability in this regard.

Conflict of interest

None declared

Ethical clearance

This review forms part of a larger PhD study. Ethics approval for this study has been granted by the Biomedical Research Ethics Committee at the University of the Western Cape in South Africa (Ethics number: BM20/2/7).

Authors' contribution

MH designed the study, gathered data, analysed and wrote the manuscript in partial fulfilment of obtaining a PhD degree. NVR and TGM critically reviewed the manuscript as supervisors. All authors have read and approved the final manuscript.

References:

1. Puchalski, C., Blaatt, B., Kogan, M., Butler, A. Spirituality and Health: The Development of a Field. *Academic Medicine*, 2014; **89** (1): 10-16. <https://doi.org/10.1097/ACM.0000000000000083>
2. Phillips, S. B., Olson, J., Brett-MacLean, P., Oneschuk, D., Sinclair, S., Magnus, R., Weis, J., Abbasi, M., Parmar, J., Puchalski, C. M. Integrating Spirituality as a Key Component of Patient Care. *Religions*, 2015; **6**:476-498. <https://doi.org/10.3390/rel6020476>
3. Jantos, M., Kiat, H. Prayer as medicine: How much have we learned? *The Medical Journal of Australia*, 2007;**186** (10): 51-593. <https://doi.org/10.5694/j.1326-5377.2007.tb01041.x>
4. Camody, J., Reed, G., Kristeller, J., Merriam, P. Mindfulness, spirituality, and health-related symptoms. *Journal of Psychosomatic Research*, 2008;**64**: 393-403. <https://doi.org/10.1016/j.jpsychores.2007.06.015>
5. Grant A. Spirituality, health and the complementary medicine practitioner. *Journal of the Australian Traditional-Medicine Society* 2007; **13** (4): 207-209.
6. McSherry, W., Cash, K., Ross, L. (2004) Meaning of spirituality: implications for nursing practice. *Journal of Clinical Nursing* **13**, 934-941. <https://doi.org/10.1111/j.1365-2702.2004.01006.x>
7. Melhem, G.H.B., Zeilani, R.S., Zaqqout, O.A., I , Aljwad, A.I., Shawagfeh, M.Q., Al- Rahim, M.A. (2016). Nurses' perceptions of spirituality and spiritual care. *Indian Journal of Palliative Care*, 22 (1), 42-49. <https://doi.org/10.4103/0973-1075.173949>
8. Ellison, C.G., Bradshaw, M., Roberts, C. A. Spiritual and Religious identities predict the use of CAM amongst adults in the US. *Preventive Medicine*, 2012;**54**: 9-12. <https://doi.org/10.1016/j.ypmed.2011.08.029>
9. Bhikha, R., Glynn, J.) Review article: The Role of Tibb in Integrative Medicine for Diseases of Lifestyle. *Bangladesh Journal of Medical Science*, 2017;**16** (1), 13-20. <https://doi.org/10.3329/bjms.v16i1.31126>
10. Ben-Arye, E., Schiff, E., Karkabia, K., Keshet, Y., Lev, E. Exploring association of spiritual perspectives with complementary medicine use among patients with Type 2 diabetes in Israel. *Ethnicity & Health*, 2011;**16** (1): 1-10. <https://doi.org/10.1080/13557858.2010.510181>
11. Mahlangeni, N. T., Moodley, R., Jonnalagadda, S. B. (2014) Elemental composition of Cyrtanthus obliquus and Lippia javanica used in South African herbal tonic, Imbiza. *Arabian Journal of Chemistry*, 1-9.
12. Nicdao, E. G., Amy, L. A (2014) Religion and the Use of Complementary and Alternative Medicine (CAM) Among Cardiac Patients. *Journal of Religious Health*, 53, 864-877. <https://doi.org/10.1007/s10943-013-9681-6>
13. Chang, H.Y., Wallis, M., and Tiralongo, E., (2007) Use of complementary and alternative medicine among people living with diabetes: literature review. *Journal of Advanced Nursing*, 58 (4), 307-319. <https://doi.org/10.1111/j.1365-2648.2007.04291.x>
14. Trinkaus, M., Burman, D., Barmala, N., Rodin, G., Jones, J., Lo, C., Zimmermann, C (2011) Spirituality and use of complementary therapies for cure in advanced cancer. *Psycho-Oncology* 20, 746-75. <https://doi.org/10.1002/pon.1773>
15. Ben-Arye, E., Schiff, E., Vintal, H., Agour, O., Preis, L., Steiner, M (2012) Integrating Complementary Medicine and Supportive Care: Patients' Perspectives Toward Complementary Medicine and Spirituality. *The Journal of Alternative and Complementary Medicine*, 18 (9), 824-831. <https://doi.org/10.1089/acm.2011.0327>
16. Ramakrishnan, P., Dias, A., Rane, A., Shukla, S. L., Ansari, B. K. M., Ramaswamy, R. S., Reddy, A. R., Tribulato, A., Agarwal, A. K., Bhat, J., Prasad, N. S., Mushtaq, A., Satya, N., Rao, P. H., Murthy, P., Koenig, H. G (2014) Perspectives of Indian Traditional and Allopathic Professionals on Religion/Spirituality and its Role in Medicine: Basis for Developing an Integrative Medicine Program. *Journal of Religion and Health*, 53, 1161-1175. <https://doi.org/10.1007/s10943-013-9721-2>
17. Crammer, C., Kaw, C., Gansler, T., Stein, K., D (2011) Cancer Survivors' Spiritual Well-Being and Use of Complementary Methods: A Report from the American Cancer Society's Studies of Cancer Survivors. *Journal of Religion and Health*, 50, 92-107. <https://doi.org/10.1007/s10943-010-9327-x>
18. Mthembu, T.G., Wegner, L., Roman, N.V. (2016). Teaching spirituality and spiritual care in health sciences education: A systematic review. *African Journal for Physical Activity and Health Sciences*, 22 (4:1), 1036-1057.
19. Lambert H (2006) Accounting for EBM: Notions of evidence in medicine. *Social Science Medicine*, 62, 2633-2645. <https://doi.org/10.1016/j.socscimed.2005.11.023>
20. Arksey, H., & O'Malley, L. (2005) Scoping studies: Towards a methodological framework. *International Journal of Social Research Methodology: Theory & Practice*, 8 (1), 19-32. <https://doi.org/10.1080/1364557032000119616>
21. Ministry of Ayurveda, Yoga & Naturopathy, Unani, Siddha and Homoeopathy Government of India. (2016). Unani System of medicine, the Science of Health and Healing. India: Dossier.
22. Bhikha R. (2004). African Renaissance in Health Education: Developing an integrative programme of Unani-Tibb training for health care professionals in Southern Africa. Completed in fulfillment of a Doctorate in Philosophy, Faculty of Education, University of the Western Cape, South Africa.
23. Jazieh, A. R., Al Sudairy, R., Abulkhair, O., Alaskar, A., Al Safi, F., Sheblaq, N., Young, S., Issa, M., Tamim, H (2012) Use of Complementary and Alternative Medicine by Patients with Cancer

- in Saudi Arabia. *The Journal of Alternative and Complementary medicine*, 18 (11), 1045-1049. <https://doi.org/10.1089/acm.2011.0266>
24. Kessler, C., Wischnowsky, M., Eisenmann, C., Melzer, J (2013) Ayurveda: Between Religion, Spirituality, and Medicine. *Evidence-Based Complementary and Alternative Medicine*, 1-11. <https://doi.org/10.1155/2013/952432>
 25. White, M. A., Verhoef, M. J., Davison, B. J., Gunn, H., Cooke, K (2008) Seeking Mind, Body and Spirit Healing-Why Some Men with Prostate Cancer Choose CAM (Complementary and Alternative Medicine) over Conventional Cancer Treatments. *Integrative Medicine Insights*, 3, 1-11. <https://doi.org/10.4137/IMI.S377>
 26. Curlin, F. A., Rasinski, K. A., Kaptchuk, T. J., Emanuel, E. J., Miller, F. G., Tilburt, J. C (2009) Religion, Clinicians, and the Integration of Complementary and Alternative Medicines. *The Journal of Alternative and Complementary medicine* 15, 9987-994. <https://doi.org/10.1089/acm.2008.0512>
 27. Robotin, M (2010) Enquiring about cancer patients' use of complementary and alternative medicines: Is our job done? *Asia-Pacific Journal of Clinical Oncology*, 6, 245-247 <https://doi.org/10.1111/j.1743-7563.2010.01361.x>
 28. Gillett, J., Lentile, C., Hiscock, J., Plank, A., Martin, J. M (2011) Complementary and Alternative Medicine Use in Radiotherapy: What Are Patients Using? *The Journal of Alternative and Complementary medicine*, 18 (11), 1014-1020. <https://doi.org/10.1089/acm.2011.0334>
 29. Soto-Espinosa, J., Koss-Chioino, J., D. Doctors Who Integrate Spirituality and CAM in the Clinic: The Puerto Rican Case. *Journal of Religious Health*, 2017;56:149-157. <https://doi.org/10.1007/s10943-016-0198-7>
 30. Mou, Y. Predicting the Use of Traditional Chinese Medicine Health Maintenance Approach from Cultural and Spiritual Perspectives. *Journal of Religion and Health*, 2017;56: 971-985. <https://doi.org/10.1007/s10943-016-0299-3>
 31. Jones, R. A., Taylor, A. G., Bourguignon, C., Steeves, R., Fraser, G., Lippert, M., Theodorescu, M., Mathews, H., Kilbridge, K. L Complementary and Alternative Medicine Modality Use and Beliefs Among African American Prostate Cancer Survivors. *Oncology Nursing Forum*, 2007;34, (2). <https://doi.org/10.1188/07.ONF.359-364>
 32. Gillum, F., Griffith, D., M Prayer and Spiritual Practices for Health Reasons among American Adults: The Role of Race and Ethnicity. *Journal of Religion and Health*, 2010;49:283-295. <https://doi.org/10.1007/s10943-009-9249-7>
 33. Yeh, G.Y. Use of complementary and alternative medicine among persons with diabetes mellitus: results of a national survey. *American Journal of Public Health*, 2002;92 (10), 1648-1652. <https://doi.org/10.2105/AJPH.92.10.1648>
 34. Ahlin, L (2008) The Meaning of "Spirituality:" a discussion with its starting point in an investigation among alternative therapists. *Implicit Religion*, 11, 25-38. <https://doi.org/10.1558/imre.v11i1.25>
 35. Margolin, A., Avants, S. K., Arnold, R (2005) Acupuncture and Spirituality-Focused Group Therapy for the Treatment of HIV-Positive Drug Users: A Preliminary Study. *Journal of Psychoactive Drugs*, 385 (4), 37-45. <https://doi.org/10.1080/02791072.2005.10399811>
 36. Hoosen, M. Temperament - an important principle for health preservation in Tibb an-Nabawi and Unani-Tibb. *Bangladesh Journal of Medical Science*, 2017;16: 04, 487-495. <https://doi.org/10.3329/bjms.v16i4.33600>
 37. WHO traditional medicine strategy: 2014-2023. (2013) [http://www.who.int/medicines/publications/traditional/trm_strategy14_23/en/] accessed: 15.02.20.
 38. Koenig, H. G. Religion, Spirituality, and Health: The Research and Clinical Implications (Review Article). *International Scholarly Research Network*, 2012; 33. <https://doi.org/10.5402/2012/278730>
 39. Mthembu, T.G. (2017) The design and development of guidelines to integrate spirituality and spiritual care into Occupational Therapy education using design-based research. Western Cape: UWC. (PhD. Child and Family Studies) <https://doi.org/10.1080/0164212X.2017.1362367>
 40. Permana, I. How Religiosity and/or Spirituality Might Influence Self-Care in Diabetes Management: A Structured Review. *Bangladesh Journal of Medical Science*, 2018;17 (2), 185-193. <https://doi.org/10.3329/bjms.v17i2.35869>
 41. Kadri, R., Husain, R., Omar Syed, H. S. Impact of Spiritual Meditation on Drug Addiction Recovery and Wellbeing: A Systematic Review. *International Journal of Human and Health Sciences*, 2020;4 (4), 237-250. <https://doi.org/10.31344/ijhhs.v4i4.208>
 42. Ahmad, W. Q. Spiritual Care at The End Of Life: Western Views and Islamic Perspectives. *International Journal of Human and Health Sciences*, 2018;2 (2), 65-70. <https://doi.org/10.31344/ijhhs.v2i2.28>
 43. Mohamed, M. N., Marican, S. Treatment and Rehabilitation of Substance Use Disorder: Significance of Islamic Input in Malaysia. *International Journal of Human and Health Sciences*, 2018;2 (4), 209-216. <https://doi.org/10.31344/ijhhs.v2i4.57>
 44. Roman, N., Mthembu, T., Hoosen, M. Spiritual care - 'A deeper immunity' - A response to Covid-19 pandemic. *African Journal of Primary Health Care & Family Medicine*, 2020;12: (1), 1-3. <https://doi.org/10.4102/phcfm.v12i1.2456>
 45. Hoosen, M., Roman, N., Mthembu, T. The Development of Guidelines for the Inclusion of Spirituality and Spiritual Care in Unani Tibb Practice in South Africa: A Study Protocol. *Journal of Religion and Health*, 2020; <https://doi.org/10.1007/s10943-020-01105-5>