



## Revista Brasileira de Hematologia e Hemoterapia Brazilian Journal of Hematology and Hemotherapy

[www.rbhh.org](http://www.rbhh.org)



### Scientific Comment

# Spirituality, religiousness and health: implications for the field of hematology



Giancarlo Lucchetti\*

Universidade Federal de Juiz de Fora (UFJF), Juiz de Fora, MG, Brazil

Spirituality is understood to be a “personal search to understand final questions about life, its meaning, its relationship to sacredness or transcendence that may or may not lead to the development of religious practices or formation of religious communities”. In contrast, religiousness is the “extension to which an individual believes, follows, and practices a religion”.<sup>1</sup>

In the last few decades, these concepts are gaining more attention of scientists throughout the world. Studies have been showing that spiritual and religious beliefs could have an important impact on both physical and mental health.<sup>1</sup> In addition, spiritual needs are common among patients, religious beliefs influence medical decision making and many patients would like their doctors to address these issues.<sup>1,2</sup> However, few Brazilian Medical Schools have courses dealing with “spirituality and health”<sup>3</sup> and few physicians and medical students are prepared to address these issues.<sup>4</sup>

In order to deal with suffering, patients generally use strategies to manage their condition and its impact, also known as coping. A frequent strategy employed by patients is the use of religious beliefs and behavior to alleviate the negative emotional consequences of stressful life circumstances.<sup>5</sup>

In the field of hematology, spirituality and religiousness have been associated with several positive outcomes: better quality of life in hematopoietic stem cell transplant patients,<sup>6</sup> in patients with multiple myeloma<sup>7</sup> and in patients with myelodysplastic syndromes<sup>8</sup>; slower passage of subjective time (which could be a sign of mental suffering) in patients with hematological malignancies<sup>9</sup>; lower

post-traumatic stress symptoms in acute leukemia patients<sup>10</sup> and fewer hospital admissions among adults with sickle cell disease.<sup>11</sup>

On the other hand, religion can also be related to many clinical and ethical issues such as, delayed prenatal diagnosis of hemophilia,<sup>12</sup> changes in hematologic parameters during religious obligation (i.e. Ramadan),<sup>13</sup> use of spiritual healing by patients with hematological diseases<sup>14</sup> and refusal of blood by Jehovah's Witnesses.<sup>15</sup>

Within this context, this issue of the Revista Brasileira de Hematologia e Hemoterapia presents an interesting article entitled “Association between religiousness and blood donation among Brazilian postgraduate students of health-related areas” carried out by Martinez et al.<sup>16</sup> This article brings new and original evidence to this field of research.

The authors examined the association between religiousness and blood donation among 226 postgraduate students. They found organizational religiousness (religious attendance) was associated with attitudes toward blood donation (even after adjusting for age and gender) and that regular blood donors had a higher intrinsic religiousness and were more likely to donate blood again. Particularly in Brazil, where blood donation is not remunerated, finding strategies to encourage the population to donate blood voluntarily and regularly are needed.

Interestingly, the same group has recently published an article<sup>17</sup> investigating the association between spirituality and adherence or intention to donate blood in 281 postgraduate students. They found no relationship between

DOI of original article: <http://dx.doi.org/10.1016/j.bjhh.2014.03.012>.

\* Correspondence to: Avenida Eugênio do Nascimento s/n – Dom Bosco, Faculdade de Medicina da Universidade Federal de Juiz de Fora (UFJF), 36038-330 Juiz de Fora, MG, Brazil.

E-mail address: [g.lucchetti@yahoo.com.br](mailto:g.lucchetti@yahoo.com.br)

<http://dx.doi.org/10.1016/j.bjhh.2014.03.016>

1516-8484/© 2014 Associação Brasileira de Hematologia, Hemoterapia e Terapia Celular. Published by Elsevier Editora Ltda. All rights reserved.

spiritual well-being and blood donation, which underscores the differences between religiousness and spirituality.

Another study that assessed this issue was published by Gillum and Masters<sup>18</sup>. They carried out a national survey of 7611 women and 4282 men aged 18–44 years. In women, they found positive associations of childhood religious affiliation, current affiliation and attendance with blood donation in the bivariate analysis, but not after adjusting for sociodemographic variables. In men, they found no remarkable differences.

Although there are some limitations in the study conducted by Martinez et al.<sup>16</sup> (i.e. convenient sample and predominantly highly educated young women) and these are preliminary results, the authors raise an important and usually undervalued issue for discussion: the role of spiritual and religious beliefs in medicine and hematology. Since hematologists deal with ethical dilemmas, end-of-life issues, delivery of bad news and treatment of severely ill patients, they should be aware and recognize patients' spiritual needs and conflicts, in order to achieve a more integrated, person-centered care.

### Conflicts of interest

The author declares no conflicts of interest.

### REFERENCES

1. Koenig HG. Religion, spirituality, and health: the research and clinical implications. *ISRN Psychiatry*. 2012;2012:278730.
2. Lucchetti G, Lucchetti AL, Puchalski CM. Spirituality in medical education: global reality? *J Relig Health*. 2012;51:3–19.
3. Lucchetti G, Lucchetti AL, Espinha DC, de Oliveira LR, Leite JR, Koenig HG. Spirituality and health in the curricula of medical schools in Brazil. *BMC Med Educ*. 2012;12:78.
4. Lucchetti G, de Oliveira LR, Koenig HG, Leite JR, Lucchetti AL. Medical students, spirituality and religiosity-results from the multicenter study SBAME. *BMC Med Educ*. 2013;13:162.
5. Peres MF, Lucchetti G. Coping strategies in chronic pain. *Curr Pain Headache Rep*. 2010;14:331–8.
6. Sirilla J, Overcash J. Quality of life (QOL), supportive care, and spirituality in hematopoietic stem cell transplant (HSCT) patients. *Support Care Cancer*. 2013;21:1137–44.
7. Durner J, Reinecker H, Csef H. Individual quality of life in patients with multiple myeloma. *Springerplus*. 2013;2:397.
8. Thomas ML. The impact of myelodysplastic syndromes on quality of life: lessons learned from 70 voices. *J Support Oncol*. 2012;10:37–44.
9. Wittmann M, Vollmer T, Schweiger C, Hiddemann W. The relation between the experience of time and psychological distress in patients with hematological malignancies. *Palliat Support Care*. 2006;4:357–63.
10. Rodin G, Yuen D, Mischitelle A, Minden MD, Brandwein J, Schimmer A, et al. Traumatic stress in acute leukemia. *Psychooncology*. 2013;22:299–307.
11. Bediako SM, Lattimer L, Haywood Jr C, Ratanawongsa N, Lanzkron S, Beach MC. Religious coping and hospital admissions among adults with sickle cell disease. *J Behav Med*. 2011;34:120–7.
12. Balak DM, Gouw SC, Plug I, Mauser-Bunschoten EP, Vriends AH, Van Diemen-Homan JE, et al. Prenatal diagnosis for haemophilia: a nationwide survey among female carriers in the Netherlands. *Haemophilia*. 2012;18:584–92.
13. Attarzadeh Hosseini SR, Hejazi K. The effects of Ramadan fasting and physical activity on blood hematological–biochemical parameters. *Iran J Basic Med Sci*. 2013;16:845–9.
14. Jaime-Perez JC, Chapa-Rodriguez A, Rodriguez-Martinez M, Colunga-Pedraza PR, Marfil-Rivera LJ, Gomez-Almaguer D. Use of complementary and alternative medicine by patients with hematological diseases experience at a university hospital in northeast Mexico. *Rev Bras Hematol Hemoter*. 2012;34:103–8.
15. Knuti KA, Amrein PC, Chabner BA, Lynch Jr TJ, Penson RT. Faith, identity, and leukemia: when blood products are not an option. *Oncologist*. 2002;7:371–80.
16. Martinez EZ, Almeida RGdS, Braz ACG, Carvalho ACDd. Association between religiousness and blood donation among Brazilian postgraduate students of health-related areas. *Rev Bras Hematol Hemoter*. 2014;36:184–90.
17. Almeida RG, Martinez EZ, Mazzo A, Trevizan MA, Mendes IA. Spirituality and post-graduate students' attitudes towards blood donation. *Nurs Ethics*. 2013;20:392–400.
18. Gillum RF, Masters KS. Religiousness and blood donation: findings from a national survey. *J Health Psychol*. 2010;15:163–72.