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A social representation of organ donation. Factors influencing donation availability

**Diana Todeanca^{1*}, Andrei Holman¹,
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Abstract: One can notice an increase in number of researches around the capacity to measure availability and intention to donate. Our study intends to create an instrument addressing the organizing principles of the social representation of organ donation and their influence on people’s willingness to donate (one's own organs or the ones of a family member) along with other psycho-moral variables (moral foundations, cognitive strategies of moral disengagement, empathy). For the construction of the proposed tool, we conducted a set of 20 preliminary interviews with subjects from the general population who expressed their opinion on organ donation and other associated elements / ideas that could be factors of influence in the decision of becoming an organ donor after death. In the pilot study, 20 participants from the general population were interviewed, 14 women and 6 men, aged between 23 and 77, from urban and rural locations around Iasi and Bacau. Thereafter, within the main study, a sample of 141 students in psychology participated, aged between 19 to 38, 122 women and 19 men, students at the Faculty of Psychology and Education Sciences from Iasi, Romania took part in the study. The results are surprising if we consider the utility and danger factors, the willingness to donate the organs of a family member, or the absence of a significant influence of the factors extracted from the Interpersonal Reactivity Index, namely Emphatic Concern and Personal Distress. More research is needed to discover a possible explanation and future studies should address these issues.

Keywords: organ donation, attitudes, social representation, instrument developing.

Introduction

In order to facilitate the decision to donate organs, attitudes towards organ donation are considered a key factor (Kaiser et al., 2014; Wakefield, Watts, Homewood, Meiser, & Siminoff, 2010). However, several aspects influence the relationship between attitudes and actual organ donation, which has led to an increase in number of researches around the capacity to measure availability and intention to donate.

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Attitudes towards organ donation are usually measured using subjective instruments. More specifically, in many cases, the attitude towards organ donation is measured along a single positive or negative dimension which limits the measurement to a pro or against response - for example, very negative or very positive (Gardner, 1993, in Schweiger et al., 2004). Attitudes towards the availability of organ donation are often measured on bipolar scales, generally pursuing a single idea (“For me, registering a desire to become a post-mortem donor would be one worthless - very valuable”, Hyde & White, 2013). The beliefs associated with how organ donation is understood require, undoubtedly, multidimensional scales to evaluate the various ideas that could be associated with this issue e.g.: “Doctors could declare death brain too soon” (Irving et al., 2011; Parisi & Katz, 1986; Shepherd, O’Carroll, & Ferguson, 2014). The difference lies in the desired level of explanation - either identifying the beliefs underlying the intention to donate or the intention in itself. However, in many cases, a participant can express both positive and negative opinions regarding organ donation.

Organ Donation

The organ donation is a complex process involving psychological, social, and ethical aspects, and also a social maturity along with public opinion on organ donation, factors that contribute to a sustainable and stable social system for organ donation (Roh, 2018). Unlike other health problems, medical procedures or treatments, post-mortem organ donation offers absolutely no benefit to the donor. Considering this, individuals are often reluctant or fearful to such decision and in a position that compels them to contemplate their own mortality (Morgan, 2004; Morgan & Miller, 2002a). The decision to donate is not a simple one and it interferes with psychological and ethical issues, such as the safety of the healthy individual and the removal of an organ, the motivation of the donor, the feeling of moral obligation instead of altruism, the donor financial rewards etc. (Roh, 2018).

Contributing factors for the willingness to donate organs

Horton and Horton (1991) have built a predictive willingness to donate (WTD) model, suggesting that WTD's most powerful predictors are knowledge about donation and attitudes about this act, personal values (including altruism) playing a much weaker (even if statistically significant) role. Radecki and Jaccard (1999) and Horton and Horton (1991) provide data confirming that donation information predicts the availability to sign an organ donor agreement. Similarly, Kopfman's and & Smith model (1996) indicates that the desire to donate is influenced by the attitude towards donation, knowledge, fears about transplantation, subjective norms, and the level of altruism (Morgan & Miller, 2002b).

Moreover, Boulware et al. (2002) demonstrate that a number of different factors (demographic, socioeconomic, attitudinal and clinical) are associated with the desire to donate post-mortem organs, but also to become a lifetime donor. However, the importance of each factor in explaining the variation in the availability to donate differs depending on the type of donation. The authors show that ethnicity and socio-economic factors have been strongly correlated with (and explained the highest variance in) the desire to become a post-mortem donor, but these factors have not been correlated with (and have not explained an increased percentage of variation in) the desire to become a lifetime donor. The perceived importance of spirituality and religion was also inversely associated with the desire to become a post-mortem donor. Religious reasons are often cited as barriers to willingness to donate, even though studies show that most religions support post-mortem donation (Park, 1998; Gallagher, 1996).

More recent studies in Europe (Mossialos, Costa-Font, & Rudisill, 2008) show that WTD is also associated with institutional procedures and knowledge of these procedures. In some cases, however, simply contemplating one's own death can adversely influence the decision and refusing to think or consider this unfortunate alternative. In addition, people are more willing to donate their own organs than those of a family member, and they are generally taking their own decisions and transferring them to their loved ones.

Social Representations and Organ Donation

Since Social Representations are “collective elaborations of a social object by the community for the purpose of behaving and communicating” (Moscovici, 1963, p. 251), post-mortem organ donation, as a body-centered decision, is appropriate for a Social Representations theory analysis, for two main reasons. First, organ donation represents a topic which has led to various ethical controversies, being included in many social debates with individual relevance. This multitude of positions on the topic makes the Social Representations approach an appropriate paradigm, as it can explore and offer an organized image of these multiple discourses, of their symbolic content, dimensions and social underpinnings. Secondly, since organ donation and transplantation represents a medical branch, hence a scientific endeavor, the investigation of its Social Representation can reveal the manners in which it is familiarized by the public, its anchoring and objectifications in the common sense.

The epistemological advantage of the theory of Social Representations was first illustrated by Moscovici, in his analysis of the shared meanings of psychoanalytic concepts in French society (Moscovici, 1961). As Moscovici (1961) states, these forms of social knowledge assist the individual in making the unknown or unfamiliar – especially in the case of scientific objects, but not only – familiar. Once constructed, the Social Representation of the object

mediates individual's relationship with it; this idea is of particular relevance in what regards organ donation, since all of the participants in our research have never undergone such procedures themselves; thus, all their contact and experience with this issue is made through their Social Representation of organ donation.

But this cognitive level of Social Representations is also joined by the behavioral one, since the individual's actions on the object, as well as his positions towards it, as socially expressed, are guided by his social representation. Even more, this approach affirms the synthesis of the two – subject and object – in the frame of the Social Representation: “subject and object are not regarded as functionally separate. An object is located in a context of activity since it is what it is because it is in part regarded by the person or the group as an extension of their behavior” (Moscovici, 1961, p. xi).

The Present Study

Our research aims to integrate the theory of social representations into the predictive model of the willingness to donate by accommodating the possible coexistence of contradictory representations about organ donation and possibly explaining the difference between the declarative positive attitudes of the donation act along with the frequent rejection met in the medical practice. We also seek to identify the role of some elements of morality (moral foundations, cognitive strategies of moral disengagement) in the donation decision, but also the influence of other psychological variables such as empathy on the willingness to become a donor or to accept the donation of the organs of a family member. In addition, we identified the significant predictors of willingness to donate. More specifically, the present study aims to create an instrument addressing the organizing principles of the social representation of organ donation and their influence on people's willingness to donate (one's own organs or the ones of a family member) along with other psycho-moral variables (moral foundations, cognitive strategies of moral disengagement, empathy).

Moral foundations – The morality of organ donation was frequently analyzed with regard to the fairness of distribution of the organs, the inter-cultural or inter-racial transplants or the process of prioritizing some receivers and not others. However fewer studies (e.g., de Groot et al., 2012) have addressed the problem of the morality of the decision / willingness to become a donor or to donate the organs of a close relative after brain death.

We included Haidt's Moral Foundation Inventory to explore whether morality stands behind the decision of being willing to donate or not. Cognitive strategies of Moral Disengagement – In the same context of the morality of the decision to donate or not, we presumed that a set of cognitive influencers exists. Since there is a constant major gap between the number of people who believe donation is a good thing that should be done and the number of people who

actually donate or become donors, we believe that, behind the refusal to donate, there are cognitive strategies that make the unwillingness to donate seem “normal”.

We used Caprara’s Civic Moral Disengagement scale (Caprara, Fida, Vecchione, Tramontano, & Barbaranelli, 2009) to identify a series of cognitive strategies that people use to disengage from civic responsibility and explored whether these strategies are linked to the unwillingness to donate after brain death.

Empathy and Personal Distress – The idea of “gift of life” associated with organ donation brings along the concept of giving and therefore the personal empathic characteristics of those who donate, the capacity of feeling what others are feeling. Empathy was also found to be linked with organ donation in previous studies (Rodrigue et al., 2004; Wilczek-Rużyczka, Milaniak, Przybyłowski, Wierzbicki, & Sadowski, 2014), therefore we included two subscales of the Interpersonal Reactivity Index (Davis, 1983) that concern empathy and also personal distress, that represents the “self-oriented” feelings of personal anxiety and unease in tense interpersonal situations. Thus, we set two main objectives: 1. Building a tool for identifying the organizational principles of the social representation of organ donation. 2. Verifying the influence of the principles of SR and other moral factors on willingness to donate in two forms (donating one's own organs and donating the organs of a relative).

We hypothesized that some elements of morality (moral foundations, cognitive strategies of moral disengagement) along with other psychological variables (e.g., empathy) might predict the willingness to donate (one's own organs or the ones of a family member) or to accept the donation of the organs of a family member.

Method

Participants

In the pilot study, 20 participants from the general population were interviewed, 14 women and 6 men, aged between 23 and 77, from urban and rural locations around Iasi and Bacau. Thereafter, within the main study, a sample of 141 students in psychology participated, aged between 19 to 38, 122 women and 19 men, students at the Faculty of Psychology and Education Sciences from Iasi, Romania took part in the study.

Instruments

Semi-structured interview guide (used for the pilot study) was comprised of seven questions derived from a recent meta-synthesis of qualitative studies - Newton, 2011).

Moral Foundations Questionnaire (Graham, Haidt & Nosek, 2008) with 5 subscales (Care / harm, Fairness / cheating, Loyalty / betrayal, Authority / Subversion, Purity / degradation) that intends to explore the origins of and variation in human moral reasoning on the basis of innate, modular foundations (Alpha Cronbach reliability coefficient .861). Various studies have offered moral foundations theory as an explanation of differences among political progressives (liberals in the American sense), conservatives, and libertarians, and have suggested that it can explain variation in opinion on politically charged issues such as same sex marriage and abortion. In this context, willingness to donate might also be influenced by the personal moral foundations.

Civic Moral Disengagement Scale (Caprara et al., 2009) Moral disengagement has been introduced by Bandura to address psychosocial mechanisms by which individuals mitigate the moral consequences of harmful behaviors (Alpha Cronbach reliability coefficient .843). Proper measures to assess moral disengagement mechanisms for aggression and violence have been made available since long (Bandura, Barbaranelli, Caprara, & Pastorelli, 1996). The same mechanism may serve self-exonerative functions when violating civic duties and obligations, a specific measure has been developed to assess civic moral disengagement. In this context, the refusal of organ donation might be perceived as a moral duty that is being avoided, though we explored these cognitive strategies in relation with WTD. The instrument is comprised of 8 subscales, as follows: Moral Justification, Euphemistic Labeling, Advantageous Comparison, Displacement of Responsibility, Diffusion of Responsibility, Distortion of the Consequences, Attribution of Blame, and Dehumanization.

Interpersonal Reactivity Index (Davis, 1983) we used only 2 subscales (Alpha Cronbach reliability coefficient .824): Empathic Concern that assesses “other-oriented” feelings of sympathy and concerns for unfortunate others, and Personal Distress that measures “self-oriented” feelings of personal anxiety and unease in tense interpersonal settings.

Willingness to donate (WTD). The dependent variable in our study was assessed through a 6-points Likert scale (ranging from *definitely no* to *definitely yes*) for two questions, addressing different situations of organ donation – donating one’s own organs, or donating the organs of a close family member in the unfortunate case of brain death.

If you were diagnosed with brain death and your life could no longer be saved, would you donate your organs?

If a close family member was diagnosed with brain death and their life could no longer be saved, would you donate their organs?

Procedure

For the construction of the proposed tool, we conducted a set of 20 preliminary interviews with subjects from the general population who expressed

their opinion on organ donation and other associated elements / ideas that could be factors of influence in the decision of becoming an organ donor after death. The structure of the interview guide reaches the most important topics in the field of organ donation as identified in previous qualitative studies (Newton, 2011). Thus, in their speech, the participants reached different areas, depending on the personal importance, which were used in the later stages.

After transcribing the interviews, we conducted an analysis of the information retrieved and extracted a variety of themes that would further be turned into items in the final questionnaire, along with other relevant ideas from the literature (Moloney & Walker, 2002, Morgan, 2004; Morgan & Miller, 2002c; Newton, 2011). Regardless of the frequency with which they were mentioned in the interviews, ideas have been turned into items, in order to later test the grouping of factors and relevance for the availability to donate.

Data analysis

Exploratory Factorial analysis

The initial questionnaire for social representation of organ donation contained 37 items that were applied alongside with the other above-mentioned scales on a group of 141 subjects from the faculty of Psychology. Following exploratory factorial analysis, the number of items in the questionnaire was reduced to 20, grouped into 6 relevant factors: Utility / Utilitarianism, Dangers, Dangers / Risks, Family, Religion and Medical System.

Subsequently, the six factors of social representation of organ donation were introduced into a linear regression analysis to identify those principles that significantly influence willingness to donate in its two forms (donation of own organs and those of a relative) and other possible moral variables that complement the predictive model of WTD.

Predictive analysis

In the case of predictive analysis, we started from the idea that social representation is the main theoretical pinpoint and provides a broader understanding of the underlying reasons for willingness to donate. To complement the model, we also investigated the role of psycho-moral factors in explaining the concept of willingness to donate with its two forms - one's own organs or those of a relative.

Results

In conducting the Exploratory Factor Analysis, we removed 17 items that had less than .30 communities that had loads of two or more factors, or whose content was inconsistent with the meaning of others. We have thus obtained a total of 20 items, grouped in 6 factors (see Table 1): Utility (4 items, e.g., “The

human body is just a machine, a device, so donating organs after death only has advantages”), Dangers (5 items, e.g., “Becoming an organ donor is risky because if they know you are a donor, doctors will not do their best to save your life”), Family (2 items, “Donating organs of a deceased relative is a good deed by which the family alleviates part of the suffering”), Religion (3 items, “Donating organs violates the divine will”). Medical System (3 items, “It's risky to become an organ donor, taking into account the problems in the Romanian medical system”), Dehumanization (3 items, “Organ donation dehumanizes the body”).

Table 1. Factorial model for the Organizing Principles of SR of organ donation

Items	1	2	3	4	5	6
Item 34. Rejecting organ donation after death is a waste.						
Item 33. The human body is just a machine / equipment, organ donation after death has only advantages.						
Item 25. In the event of an accident, I believe that all organs of those who lose their lives should be taken and donated to those in need.						
Item 3. To register as an organ donor is an altruistic gesture.						
Item 35. Becoming an organ donor is risky, because if one knows you're a donor, doctors will not do their best to save your life.						
Item 36. Agreeing with organ donation is risky because brain death can be misdiagnosed.						
Item 37. Doctors unnecessarily force the limits of nature through organ transplantation.						
Item 24. Organ donation is dangerous because donated organs can be sold on the black market.						
Item 18. Registering as an organ donor is risky, because you can become the target of organ trafficking.						
Item 19. Donating organs to a deceased close relative is a good deed by which the family alleviates part of their suffering.						

Social representation of organ donation

Items	1	2	3	4	5	6
Item 17. Donating organs to a deceased relative is a relief for the family, because in this form the deceased continues to exist.			.583			
Item 32. We are the masters of our own body, so organ donation is the right choice.				.656		
Item 29. I think organ donation is right from a religious / spiritual point of view.				.587		
Item 8. Organ donation violates divine will.				-.560		
Item 22. It is risky to become an organ donor, given the problems in the Romanian medical system.					-.587	
Item 21. Becoming an organ donor during your life (by donating a kidney or a part of the liver) is putting your life at risk.					-.530	
Item 11. Organ donation after death is a mutilation of the body of the deceased.					-.493	
Item 10. Donating organs after death can make it difficult to carry out burial traditions.						.649
Item 31. Organ donation dehumanizes the human body.						.431
Item 9. Organ donation is an act that brings happiness to others.						.412

Correlational analysis

The correlation analysis revealed strong and medium significant correlations between both dependent variables and the subfactors of the social representations questionnaire created. All correlation coefficients are presented in Table 2 below. Also, weak significant correlations were identified between WTD_self and two subfactors of the moral foundations questionnaire, but no significant correlations were found between WTD and the interpersonal reactivity scores (Empathic Concern and Personal Distress) (Table 3).

Table 2. Correlations coefficients between WTD and Social Representations of Organ Donation Questionnaire

	1	2	3	4	5	6	7	
Utility	1							
Dangers	.220**	1						
Family	.138	.011	1					
Religion	.459**	.336**	.185*	1				
Med_Syst	-.142	.161	-.016	-.061	1			
Dehum	.450**	.341**	.229**	.408**	-.078	1		
WTD Self	.531**	.306**	.232**	.484**	.151	.337**	1	
WTD Other	.248**	-.166*	.213*	.123	.014	.136	.316**	1

Table 3. Correlations WTD and Moral Foundations / Interpersonal Reactivity

	1	2	3	4	5	6	7	8
Harm / Care	1							
Fairness /Reciprocity	.553**	1						
In-group / Loyalty	.364**	.341**	1					
Authority / Respect	.313**	.405**	.572**	1				
Purity / Sanctity	.277**	.156	.506**	.579**	1			
Empathy Concern	.313**	.106	.128	.097	.243**	1		
Personal Distress	.235**	.130	.208*	.159	.339**	.424**	1	
WTD other	-.017	.063	-.081	-.010	-.071	.013	.082	1
WTD self	.213*	.201*	-.033	-.061	-.126	.034	-.092	.316**

Moreover, weak negative significant correlations were identified between WTD_self and two of the subfactors of the social disengagement scale. All correlations reported below in Table 4.

Social representation of organ donation

Table 4. Correlations: WTD and Social Disengagement Questionnaire

	1	2	3	4	5	6	7	8
Moral Justification	1							
Euphemistic language	.406**	1						
Advantageous comparison	.542**	.476**	1					
Displacement of responsibility	.349**	.046	.380**	1				
Diffusion of responsibility	.402**	.326**	.458**	.486**	1			
Distorting consequences	.403**	.329**	.498**	.382**	.471**	1		
Attribution of blame	.375**	.279**	.333**	.394**	.398**	.343**	1	
Dehumanization	.388**	.306**	.398**	.306**	.335**	.294**	.360**	1
WTD Other	-.002	.163	.029	-.124	-.093	.095	.057	-.107
WTD Self	-.097	.082	.022	-.073	-.214*	-.258**	-.091	-.116

Predictive analysis

The analysis was performed separately for the two forms of the dependent variable (WTD of one's own organs and WTD for the organs of a family member). For each step of the hierarchical regression, we included predictors as follows: first, the factors derived from the social representations tool previously built; secondly, the moral foundations; third, the interpersonal reactivity scores and forth, the social disengagement factors. The final model for each criterion was comprised of the significant predictors. The Adjusted R Square value represents the proportion of the criterion explained by the predictors, and the F and Sig<0.05 values imply that the proportion explained is significant.

The results showed different patterns depending on the chosen criterion. In the case of WTD for one's own organs, significant predictors include: Utility, Family, Religion and the Medical System, the moral foundation Care / Harm, and cognitive mechanisms as Distorting Consequences and Advantageous Comparisons, which explain 45,3% (Adjusted R Square = 0.453, F = 16.282, $p < 0.01$) of the criterion WTD of one's own organs. Factors like Dangers, Dehumanization or Empathetic Concerns, have been insignificant (Table 5).

Table 5. Predictive model for WTD of one's own organs

Model	F	p	Adjusted R Square	Change Statistics		Coefficients	
				R Square Change	p	Beta	Sig.
1	23.48	.000	.411	.429	.000		
Utility						.412	.000
Family						.171	.016
Religion						.278	.001
Medical System						.214	.002
2	20.12	.000	.426	.019	.041		
Utility						.393	.000
Family						.173	.013
Religion						.270	.001
Medical System						.210	.003
(Harm / Care)						.139	.041
3	16.28	.000	.453	.035	.018		
Utility						.396	.000
Family						.161	.019
Religion						.246	.002
Medical System						.215	.002
Harm / Care						.126	.067
Advantageous comparisons						.191	.013
Distorting consequences						-.189	.018

In the case of WTD for the organs of a family member, significant predictors were Utility, Dangers and Family, but they explain a lower part of the

criterion WTD of the organs of a family member, only 5.4% (Adjusted R Square = 0.054, $F = 8.109$, $p < 0.01$), while cognitive mechanisms and moral fundamentals were insignificant (Table 6).

Table 6. Predictive model for WTD the organs of a relative

Model	F	p	R Square	Adjusted R Square	Change Statistics		Coefficients	
					R Square Change	p	Beta	p
1	8.109	.000	.061	.054	.061	.003		
Utility							.274	.001
Dangers							-.241	.004
Family							.198	.015

Discussions

The present study aimed to create an instrument addressing the organizing principles of the social representation of organ donation and their influence on people’s willingness to donate (one's own organs or the ones of a family member) along with other psycho-moral variables (moral foundations, cognitive strategies of moral disengagement, empathy). We intended to identify the role of some elements of morality (moral foundations, cognitive strategies of moral disengagement) in the donation decision, but also the influence of other psychological variables such as empathy on the willingness to become a donor or to accept the donation of the organs of a family member. In addition, we tried to identify the significant predictors of willingness to donate.

The results of the present study somewhat contradict previous findings (Moloney & Walker, 2000, 2002). In both prediction models, for the two forms of the criterion variable, the Utility factor positively significantly influenced the willingness to donate. This suggests that people who see the body as a “machine” that people use over the course of their lives are more willing to donate their own organs, but also those of a close relative. These results contradict the studies of Moloney and Walker (2000, 2002) that the prospect that organ donation is regarded as “removal and replacement of body parts” brings with it a series of feelings of repulsion and disgust and lead rather to the refusal to donate.

The factor Utility (Utilitarianism) is inspired by the bibliography on morality and is one of the poles defined by researchers when it comes to different types of moral decisions. The most frequently used examples of recent studies are based on Kohlberg's (1969) moral dilemmas and try to delineate the choices to two opposing poles - utilitarianism and deontological choice. More specifically, the participants are presented with a scenario of an imminent danger (e.g., the tram that has ran out of control) that is likely to lead to the wounding or killing of some people. The respondent may choose to act (or in some cases, to do nothing) to stop this danger, but at the cost of killing or injuring another person. The optimal decision from an arithmetic point of view is the one-person slaughter to save a larger number of people, and the action in this sense is described as a utilitarian approach. At the other pole, there is the deontological decision in which the protagonist chooses not to take responsibility for injuring or killing another person, even if that would mean hurting a larger number of people. In another version, the option of saving the four people from being killed by the tram involves the manslaughter of a fifth character by pushing them off a bridge, stopping the tram and saving the other people.

In our built tool, the items grouped in the subscale named Utility are similar in meaning, and suggest the idea that after death, the human body no longer means something sacred, but rather a machine that has been used throughout life.

Other studies on disgust consider, in agreement with Moloney and Walker, that behind the refusal to donate there are strong emotions of disgust and repulsion to the idea of organ transplantation from a body deceased to another living organism. The items of disgust did not appear to be significant and were not part of any factor. Moreover, the Utility factor, whose composition was the closest to the idea of disgust regarding organ transplantation, was a positive predictor of the willingness to donate.

These differences could be explained by the presence of the Harm / Care moral foundation in the predictive model. This foundation indicates the presence of feelings of care and protection towards others and could induce a detachment from the idea of sacredness of the body by simply outlining the moral duty to show care for others.

Also, the absence of the Dangers factor in the predictive model of the WTD of one's own organs is surprising and also the presence of the Religion factor with a positive coefficient. Specifically, these results could indicate that people who refuse to accept organ donation do not make this decision from the point of view of possible dangers (misdiagnosed brain death, the possibility of organ trafficking, etc.) or rigid religious beliefs, as some previous studies suggest. An explanation could be the presence of the factor Distorting Consequences as a significant factor. This is a cognitive mechanism that diminishes the commitment and reduces the negative effects of an action in

order to justify wrong choices or beliefs. In particular, people who are against organ donation do not make this decision by evaluating possible dangers, but by mitigating the consequences of inaction, or refusal to donate. Thus, constructing arguments that make the consequences of the refusal to donate insignificant, the decision becomes more acceptable to the individual, and so, the moral duty loses its worth.

In the case of willingness to donate the organs of a family member, the results were once again surprising with regards to the differences from the predictive model of one's own organs. If in the first model (WTD of one's own organs) some predictors showed to be significant in the area of morality and cognitive mechanisms, they did not have a significant influence in the second model (WTD of the organs of a close relative). In case of the willingness to donate the organs of a family member, however, the Dangers factor was significant, which suggests that when it comes to people's loved ones, the possible dangers are brought into discussion. People think that a wrong diagnosis of brain death could be put in the case of their loved ones, probably in the hope that there may still be a chance of them getting better.

Another interesting result is the absence of a significant influence of the factors extracted from the Interpersonal Reactivity Index, namely Empathic Concern and Personal Distress. Although we may see empathy as a cause of sensitivity to the thought that there are people in need of a transplant, the present results indicate the absence of such influence in the decision to donate. It is possible for individuals to position themselves mentally too far away from the possibility of such a situation, and empathic experiences are thus too difficult to access.

There are several limitations of our study. The sample used for this study is a small homogenous one (psychology students). Also, no data were gathered to permit an investigation into the reasons for this seeming attitude contradiction. Moreover, we measured intentions to become an organ donor, rather than actual behaviors. Finally, the qualitative research is not considered that robust as opposed to quantitative methodologies.

Future studies should address these issues. More research is needed to discover a possible explanation for the coexistence of contradictory attitudes about organ donation by identifying the elements of social representation of organ donation, and last but not least, we will consider identifying the role of elements of morality (e.g., physical and moral disgust) in the organ donation decision. The practical aims derived from these results, include modifying the organ donation approach and creating new ways of encouraging the general public to make that decision. The results of this research may, why not, become a starting point for implementing an opt-out system in Romania, as in other European countries.

In conclusion, the importance of this study is a major one, both theoretically and practically. Following the ongoing research, we will come to a better understanding of the cognitive and / or affective mechanisms underlying organ donation. These elements can have an important influence on manifest behavior (signing an official decision to become a donor after death) and could also have an impact on the development of advertising campaigns to effectively encourage this behavior, or maybe even improving the approach strategies in the cases of grieving families that are faced with the decision of donating the organs of their loved ones.

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