

MORAL COMPETENCE AND SOCIO-MORAL REFLECTION

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Abstract. *Given that the improvement of the moral development assessment is very much in need, the present research analyzes, comparatively, from a theoretical and empirical point of view two instruments that were elaborated in order to evaluate aspects of the moral judgment. The first one, Moral Judgment Test (MJT), elaborated by Lind in 1978 (Lind, 2000), focuses on the moral competence of the moral judgment, but assesses also the moral orientation aspect of the moral judgment in the context of two moral dilemmas. The second one, The Sociomoral Reflection Measure – Short Form Objective (SRM-SFO), elaborated by Brugman, Basinger, and Gibbs (2007), evaluates only the moral orientation aspect of the moral judgment as a socio-moral reflection on the importance of some important moral values in various typical social contexts. Such a comparison between the assessment instruments for moral judgment, rarely encountered in the psychological literature, is meant to contribute to a better understanding of the data obtained with these instruments and of their psychometric qualities, given that the first one is internationally rather frequently used for research purposes, and the second one is a more recent and pragmatically attractive version of an older instrument widely used (Sociomoral Reflection Measure – Short Form: SRM-SF, elaborated by Gibbs, Basinger & Fuller, 1992): SRM – SFO. Both instruments were administered to a sample of 77 first year students at the University of Fine Arts and Design from Cluj (with a mean age of 22). The obtained data indicated the existence of some of the anticipated positive and negative correlations between the (main) scores of the two instruments – correlations anticipated by taking into account their theoretical underpinning –, and, thus, they contribute in supporting their convergent validity.*

Keywords: *moral competence, socio-moral reflection, moral development.*

Currently, the assessment of the various aspects of the moral development, although it may be considered to be highly significant, has at its disposal very few methods and instruments. This situation may be partially explained by taking into account the difficulty of such an undertaking. However, it is to be noted also the researchers' reduced interest for an investigation of the relationships between the results obtained at least with the existing methods and instruments in order to

identify their significance and the way in which those methods and instruments could be improved. Even though the aspect of the moral judgment development has attracted in a greater degree the researchers' attention, in this case, too, the situation is, to a large extent, the same with the above mentioned general one. Those few assessment instruments for the level of moral judgment that are currently in a wider use: Defining Issues Test2: DIT2 (Rest, Narvaez, Thoma & Bebeau, 1999), Moral Judgment Test: MJT, renamed in 2014 as Moral Competence Tests: MCT (Lind, 1978, apud Lind, 2000), and The Sociomoral Reflection Measure: SRM (Gibbs, Basinger & Fuller, 1992), with its several versions, have all as a starting point the Kohlbergian theory on the moral judgment development and the Kohlbergian method of assessment of the quality of the moral arguments/motivations provided in order to justify a moral decision. Their changed elements in comparison with the classical Kohlbergian method are rather superficial ones, having in a greater extent a pragmatic rationale: the Kohlbergian interview was replaced with questionnaires, the Kohlbergian task of generating moral arguments was replaced with the rating on Likert scales of the support given for predefined moral arguments, the computation of an average level of the moral arguments generated by an investigated subject in the Kohlbergian interview was replaced with other quantitative indices (i.e., the relative support given by an investigated subject for the moral arguments considered to represent a higher level of moral judgment, or the consistency in supporting moral arguments assumed to represent the same level of moral judgment), or, in a few cases (see below), the Kohlbergian moral dilemmas as a context for generating/rating moral arguments/motivations were replaced with the justification of the importance of several moral values. In building such methods and instruments for assessing the moral judgment level, the classical Kohlbergian theory has been completed with relatively few new ideas, as, their theoretical base, in its essence, is not significantly changed, in my opinion. But scarcely any studies have been conducted in which the results obtained with the above mentioned instruments to be analyzed comparatively (I have encountered only two so far: one of Ishida, from 2006, and one of Rest, Thoma & Edwards, from 1997, both comparing DIT2, and, respectively, DIT1, an earlier version of DIT2 – see Rest et al., in 1999 –, with MJT) and in which their reciprocal convergent validity to be investigated. But such an undertaking would be a useful one, as it was also noted above, in order to understand better the meaning of the results obtained with them, their relationship with their theoretical underpinning, and in order to find out supplementary data in what respects their psychometric qualities.

The present research is a step in that direction, as its purpose was to compare the results obtained with two of the above-mentioned instruments: MJT and the SRM-SFO version of the SRM based method for assessing moral judgment. Only those two instruments were chosen for now, because the administration and scoring of DIT2 is more expensive, because, as it was mentioned above, there are already comparisons of DIT with MJT, but, to my knowledge, there is no one to compare

MJT with the sociomoral reflection method, in any of its versions, because SRM-SFO is more similar with DIT than with MJT, and because both MJT and SRM-SFO bring, in my opinion, more changes to the classical Kohlbergian method in comparison with DIT, which makes their comparison more interesting. The purpose of the research was also to investigate the relationships between the particular theoretical and methodological developments of the two instruments for assessing moral judgment.

The first chosen instrument, The Moral Judgment Test (elaborated by Lind in 1978, apud Lind, 2000), has been and is currently in use on a relatively wide scale in Europe, but also outside of it (Lind, 2000), and it is focused on the assessment of a particular aspect of the moral judgment, what Lind (2000) calls “moral competence”. It is its most central underpinning concept, which, as Lind (2000) states, is to be found in Kohlberg’s writings only in a covered, implicit, formulation. Lind’s (2000) contribution was, as he said, to make it explicit and to elaborate it in his dual aspect theory of morality regarding the relationship between the cognitive and the affective aspects in the moral judgment development. Although he starts out with the idea that the two aspects of the moral judgment, the cognitive and the affective one, are inseparable, as two facets of the same reality, the moral competence index (named C index) of the MJT assesses mainly its cognitive aspect, seen to be an ability that can be improved based on personal experience, predominantly the one regarding the discussion and reflection in what respects various moral dilemmas. Such an ability, the so called moral competence, in Lind’s (2000) view, regards the capacity of a person to rationally control through a principled reasoning her/his tendencies to morally judge in an egocentric manner because of affective influences. The moral competence aspect of the moral judgment is considered by Lind (2000) to be uniquely assessed by MJT, the author affirming that no other instrument is able to measure it, although Rest et al. (1997), in their comparison of DIT with MJT, tried to compute, inadequately, a score for moral competence based on the answers for DIT. That is why Lind (2000) notes that “that it would be pointless to validate the MJT by correlating it with other tests” (p. 8) and that “if the correlation with another test was low, we would think that this other test rather than the MJT is not valid” (p. 8). Lind (2000) states that the affective aspect of the moral judgment is reflected especially in what he calls moral orientation, assessed through the level of preference for the moral arguments considered to be typical for a certain stage of the moral judgment development. It is this aspect that is mainly assessed by the rest of the moral judgment instruments. So, MJT is viewed by Lind (2000) to be more than a questionnaire that assesses moral orientation, mainly an affective aspect of the moral judgment reflecting the preference for a certain level of moral judgment, as other instruments do. It is considered by him (Lind, 2000) to be, in the same time, also a cognitive and behavioral task (see also Faiciuc, 2014). So, MJT tries to surpass, through the idea of moral competence and its conception as a cognitive and behavioral task, the issues that occur in the assessment of the moral judgment in other instruments, especially the one of the answer in the direction of the social

desirability when only the moral orientation is taken in view through the preference for the predefined moral arguments supplied by a questionnaire.

The moral cognitive and behavioral task of the MJT consists in confronting the assessed people with counterarguments to the arguments that are favoring the solution supported by them for each of the two given moral dilemmas. Those counterarguments are formulated with the intention to correspond to the same levels of the moral judgment development as the arguments supported by the investigated subjects. As it is stated by Lind (2000), the level of preference for the arguments that support the chosen solution for each of the two given moral dilemmas indicates the preferred level of moral orientation in order to find a solution to a moral dilemma. But the level of preference for the counterarguments to the chosen solution for each of those moral dilemmas indicates the ability the use a certain preferred level of moral judgment in a consistent and coherent manner when judging others' opinions, arguments, and behaviors.

The moral orientation aspect in MJT is assessed considering the preference for the pro- and counter- moral arguments given for the predefined solutions of the two moral dilemmas, arguments that are ordered in six levels, overlapping in generally with the six stages of moral arguments envisioned in the Kohlbergian theory.

Although the moral competence and moral orientation aspects of the moral judgment are assessed separately with MJT and they are theoretically treated as relatively distinct aspects of it, they still have a certain relationship, stated and predicted by Lind (2000). It is to be expected, he says, based on an assumed cognitive-affective parallelism, that a moral orientation characterized by a preference for moral arguments of a higher level type to be positively associated with a higher level of moral competence. He considers that prediction to be also a criterion in judging the validity of the MJT when applied to a certain sample. Extrapolating this prediction, a higher level of moral competence should be positively correlated with the scores computed for other moral judgment instruments, as they measure also aspects similar with the moral orientation one. This prediction has not been tested so far for the SRM-SFO. Its testing will be one of the purposes of the current research. It is to be noted that this prediction is not so obvious, and it may have its pitfalls. One reason for that is the fact that the moral competence index is computed as a measure of the consistency in the preference for moral arguments of a certain level (any level!) no matter if those arguments are in the favor or against the solution chosen by an individual for a moral dilemma. So, mathematically, one may have a high score for moral competence if she/he chooses consistently moral arguments of the lowest level both pro and against the moral solutions she/he chooses for the given moral dilemmas. But Lind (2000) stated his prediction based on the theoretical reason that one who would prefer moral arguments of a lower level for the solution chosen by her/him for the given moral dilemmas would most likely not be able to prefer moral arguments of the same type that would be against that solution. So, it is considered to be unlikely

that one to have both a higher moral competence and a moral orientation characterized by a consistent preference for moral arguments of a lower level.

The second instrument used in the present research is the Sociomoral Reflection Measure – Short Form Objective, elaborated by Brugman, Basinger and Gibbs (2007). It is a relatively recent instrument that is an objective version of an older instrument, more widely used: Sociomoral Reflection Measure – Short Form, SRM-SF, elaborated by Gibbs et al. (1992). Whereas the latter one, SRM-SF, is an instrument in which the level of moral judgment is assessed based on the free written answers given by the investigated subjects to several questions, SRM-SFO offers predefined answers to similar questions, which are to be rated by the investigated subjects. That is why SRM-SFO is considered to be an objective version of the SRM-SF. Unlike other instruments that assess moral judgment, both above-mentioned instruments do not use moral dilemmas and the rating of the arguments for the supported solutions to those dilemmas, but they require instead the production (for SRM-SF) or the assessment (for SRM-SFO) of arguments for why some moral values, in the context of various social situations, may be considered important or unimportant by the investigated subjects. Because they require a reflection on the moral values in the context of social situations, they are named as measures of socio-moral reflection. In comparison with the SRM-SF, SRM-SFO is more attractive from a pragmatic point of view, as it is more easily administered to more various categories of subjects (e.g., with lower ages and educational levels), and more easily scored. Both versions have the same Kohlbergian traditional conceptual basis, and imply the computation of an average level of the generated or evaluated moral arguments. But the overlap with the Kohlbergian theory is not a complete one, as it is supplemented with some new theoretical and methodological contributions. On the one hand, from a theoretical point of view, the stages for the moral judgment development somewhat differ from the stages of the traditional Kohlbergian theory. If, at Kohlberg, there are three main stages (preconventional, conventional, and postconventional), each with two substages, Gibbs et al. (1992) concentrated them only in two main stages (one immature, one mature), with two substages, and, for the SRM-SF, with three additional transitional substages between the four main substages. The transformation is mainly the result of the merging of the last three Kohlbergian substages in only one stage in the Gibbs et al.'s (1992) version. The moral arguments of the *first level* at SRM-SFO, an immature one, are characterized by their unilateral focus on the personal concrete, physical interest in what respects the consequences of a moral decision and when arguing the importance or the lack of importance of a moral value. The *second level* of moral arguments, still an immature one, is one in which the importance of a moral value is regarded from an instrumental perspective, in the context of a reciprocal bargain. The *third level* of moral arguments, the first mature one, is characterized by a reflection on the moral values from a prosocial and empathic perspective. It is to be noted that this level, too, only partially overlaps with the third level in the Kohlbergian model, because the conformity to the norms of a social groups is a less prominent aspect in the SRM-SFO case and it is included partially in the next level.

Finally, the *fourth level* of moral arguments, the fully mature one, is characterized by a reflection in the terms of social norms and the reasons for which they are necessary for a particular social system, at first, or for any social system in general, ultimately. On the other hand, from a methodological point of view, as it was mentioned also above, the measurement of the level of moral judgment is not based on finding arguments for solutions at moral dilemmas, but on finding arguments in order to support the importance or lack of importance of several moral values.

Given the above mentioned aspects, concretely, in the present research, the purpose was to investigate:

1) The link between the moral competence index of MJT, computed both globally and separately for the two moral dilemmas and the SRM score for the preferred level of moral judgment at the SRM-SFO (moral orientation measured with SRM-SFO). If the two instruments both have convergent validity, it is to be expected a positive correlation between those indices.

2) The link between the moral competence index of MJT and the preference for each of the four levels of moral arguments of SRM-SFO (moral orientation measured with SRM-SFO). It is to be expected a negative correlation with the first two levels, the immature ones (especially for the first level and, eventually, for the second one) and a positive one (for the level 4 and, less likely, for the level 3).

3) The link between the preferences for the six levels of moral arguments at MJT (moral orientation measured with MJT) and the preferences for the four levels of moral arguments of SRM-SFO (moral orientation measured with SRM-SFO). It is to be expected a positive correlation between the preferences for the inferior levels of the moral arguments of the two instruments, and, respectively, between the preferences for the superior levels of moral arguments of the two instruments, and a negative correlation between the preferences for the inferior levels of the moral argumentation of one of the instruments and the ones for the superior levels of the other instrument.

4) The link between the SRM score (called SMRS) of SRM-SFO (moral orientation measured with SRM-SFO) and the preference for each of the six levels of moral arguments of MJT (moral orientation measured with MJT). It is to be expected that the pattern of the correlations to be similar with the one expected for their correlations with the moral competence index, i.e. a negative correlation with the inferior levels, and a positive one with the superior ones.

METHOD

The research was a correlational one.

Participants: A number of 78 first year students at the University of Fine Arts and Design from Cluj-Napoca, with an average age of 20 years (34 females, 16 males, 28 who did not indicate their sex). As not all participants completed

validly all the items of the two instruments, a different number of participants was taken into account for each of the computed correlations, indicated in each particular case. Participants received credit points for completing the instruments.

Instruments: The first instrument was MJT, elaborated by Lind in 1978, in its Romanian version (Lupu, 2009). It is an instrument for which there are numerous studies in what respects its validity (see Lind, 2000). It was renamed in 2014 by Lind as Moral Competence Test in order to reflect better its purpose and to avoid possible confusions. The test includes two moral dilemmas (The workers' dilemma and the mercy-killing dilemma) for which a solution is given by the author of the test. The respondents should rate (on a Likert scale with 7 points from "I strongly disagree" to "I strongly agree") in what degree they agree or disagree with the given solution. Then, they have to rate to what degree they agree or disagree (on a Likert scale with 9 points from "I completely reject" to "I completely accept") with six arguments in the favor of the given solution of a dilemma and with six counterarguments for that solution. Each of the six arguments or counterarguments corresponds to one of the six levels of moral judgment development, as they were conceived by Lind, taking into consideration the Kohlbergian theory. A participant would have a higher score for the moral competence if she/he agrees or disagrees in a consistent way with the same types of moral arguments, no matter if they are pro or contra the solution preferred by her/him in solving the two dilemmas, taken into consideration only their moral quality. Lind (2000) states that C score of the moral competence (or C index) indicates the degree to which a respondent let that her/his moral judgment to be determined by moral principles and considerations and not by "psychological forces", like the human tendency to select and accept only arguments that support a personal opinion or a personal decision. The C-index ranges from zero (lowest score) to one hundred (highest score). A separate moral competence index was computed for the mercy-killing dilemma (named also the doctor's dilemma): Cd, and for the workers' dilemma: Cw. Besides the C index for the moral competence, there are computed also scores for the preference for each of the six levels of moral arguments. They indicate what was called by Lind the moral orientation aspect of the moral judgment, the affective one, depending on the levels of moral arguments that are the most or the least preferred ones. Given that MJT is rather a cognitive ideographic experimental task through which it is evaluated a competence that is changeable, especially through experience, Lind (2000) does not recommend the computation of a coefficient of internal consistency or the assessment of the fidelity of this instrument.

As noted above, SRM-SFO is the second instrument used in this research. It was translated by me for this research, when it was used for the first time. Each of the ten items of the SRM-SFO has three requirements. The first one is the assessment of the personal importance attributed by a respondent (on a Likert scale with three points) to the observance of a certain moral value in the context of a

social situation with which it is linked. The second requirement is to appreciate the degree to which four given arguments through which the importance of that moral value may be supported, corresponding to the above mentioned four levels of moral arguments, each having attributed a different score (from 1 to 4, depending on the corresponding level of moral judgment) is close or not to the argument that that respondent would prefer to use in order to support the importance of that moral value. In this case, there is no forced choice, as a respondent may choose all the four arguments to be close to the one they would use. For the third requirement, implying a forced choice, the respondent has to choose one of the previous four arguments that is the closest to the way they would support the importance of that moral value. The entire SRM-SFO can be found in “Sociomoral Reflection Measure – Short Form Objective” (n.d.). The domains of the moral values that were taken into consideration in SRM-SFO regard the contract and truth (4 items), affiliation (1 item), saving life (2 items), law and property, and legal justice (3 items). For the SRM-SFO there was calculated a global score for the average level of the close and closest moral arguments for all the ten items: SRMS score, which ranges from 1 to 4, that is from the lowest to the highest level of the moral arguments of the SRM-SFO. There were computed also scores for the average preference for the four levels of moral arguments of the SRM-SFO in two versions: for the arguments for which a “close” rating is required, without a forced choice, and for the moral arguments resulted when a “closest” selection is required. Data regarding the psychometric qualities of the SRM-SFO are found in the study made by Brugman et al. (2007).

Procedure: The two paper-and-pencil instruments were administered collectively, in the same session both, in the same order for all the participants.

RESULTS

The descriptive values for the main variables used in the present research are presented in the Table 1.

Table 1

The descriptive values for the main variables used in the present research

Variable	N	mean	median	σ	skewness	kurtosis
SRMS	60	2.83	2.85	0.30	-.66	1.99
C index	72	17.48	14.89	11.83	.71	-.21
Cw	74	39.70	36.38	22.56	.33	-.59
Cd	74	31.07	29.05	22.12	.45	-.54

Given the fact that almost all the variables involved in computations had a distribution significantly departed from the normal distribution and given the

predictions made above, the nonparametric Spearman rank correlation coefficient was used, unilaterally. The chosen threshold for the statistic significance was that of $p = .05$.

The data regarding the internal consistency of SRM-SFO are similar with the ones reported by the authors of this instrument.

The internal consistency for the SRM-SFO in what respects the preference for the moral arguments of the first level was of $\alpha = 0.75$ ($N = 69$), of the second level: $\alpha = 0.77$ ($N = 69$), of the third level: $\alpha = 0.68$ ($N = 69$), and of the fourth level: $\alpha = 0.67$ ($N = 69$). The correlation between the SRMS and the preference for the four levels of moral arguments in the close version at SRM-SFO was for the level 1: $\rho = -0.370$, $p = .002$, $N = 60$; for the level 2: $\rho = -0.428$, $p = .000$, $N = 60$; for the level 3: $\rho = -0.347$, $p = .003$, $N = 60$; for the level 4: $\rho = 0.267$, $p = .020$, $N = 60$. The correlation between the SRMS and the preference for the four levels of the moral arguments in the closest version at SRM-SFO was for the level 1: $\rho = -0.658$, $p = .000$, $N = 58$; for the level 2: $\rho = -0.598$, $p = .000$, $N = 58$; for the level 3: $\rho = -0.151$, $p = .129$, $N = 58$; for the level 4: $\rho = 0.865$, $p = .000$, $N = 58$. The preference for the four levels of the moral arguments, for the both versions (close and closest) followed a monotonically increasing pattern, the least preferred being the moral arguments of level 1 and the most preferred those of level 4.

The data regarding MJT in what respects the criteria indicated by Lind for its validity are also similar with the one obtained by Lind (2000), with several exceptions. The correlation between the C index and the preference for the six levels of moral arguments was a statistically significant negative one for the preference for the level 1 arguments: $\rho = -0.428$, $p = .000$, $N = 72$, and for the level 2 arguments: $\rho = -0.429$, $p = .000$, $N = 72$, tended to be a negative one for the preference for the level 3 moral arguments: $\rho = -0.187$, $p = .058$, $N = 72$, close to zero for the preference for the level 4 moral arguments, and a statistically significant positive one for the preference for the level 5 moral arguments: $\rho = 0.270$, $p = .011$, $N = 72$, and again close to zero for the preference for the level 6 moral arguments.

Of the six levels of moral arguments of MJT the least preferred ones were those of level 2 (mean $m = -1.5$), not of the level 1 (mean $m = -.68$), and the most preferred ones were those of the level 5 (mean $m = 3.74$), and not of the level 6 (mean $m = 3.08$), and those of the level 3 (mean $m = .86$) and 4 (mean $m = 2.84$) had an intermediary level of preference. The quasi-simplex structure of the preference for the six levels of moral arguments in the inter-correlations matrix (neighboring stages should correlate higher than more distant stages) was not entirely followed by data. After the principal component factor analysis with varimax-rotation, the resulted first two factors (the second one having an eigenvalue lower than 1, but very close to it) had factor loadings for the preference scores for the six levels of moral arguments that were not perfectly orderly located

on a simplex curve between the two factors: there were order reversals for the level 1 and 2, and for the level 5 and 6 respectively.

In what respects the investigated correlations between the scores of the two instruments the data were as follows.

1) The Spearman rank correlation between global C index of the MJT and SRMS was $\rho = .393$, $p = .001$ ($N = 56$), for the workers' dilemma, the correlation between the Cw and SRMS was $\rho = .328$, $p = .006$ ($N = 59$), and between Cd and SRMS had no statistic significance.

2) The correlations between C index, Cd, and Cw, respectively, and the preferences for the moral arguments of the four levels at SRM-SFO (close and closest versions) are to be found in Table 2.

Table 2

The correlations C index, Cd, and Cw, respectively, and the preferences for the moral arguments of the four levels at SRM-SFO (close and closest versions)

Preference for moral arguments at SRM-SFO of		C index	Cd	Cw
Level 1 (close)	ρ	-.355	-.296	-.098
	p, N	.002, 65	.008, 65	.213, 68
Level 2 (close)	ρ	-.331	-.199	-.099
	p, N	.004, 65	.056, 65	.211, 68
Level 3 (close)	ρ	-.231	-.202	.110
	p, N	.032, 65	.053, 65	.186, 68
Level 4 (close)	ρ	-.171	-.223	.105
	p, N	.087, 65	.037, 65	.197, 68
Level 1 (closest)	ρ	-.198	.032	-.337
	p, N	.072, 56	.408, 57	.005, 58
Level 2 (closest)	ρ	-.204	.011	-.140
	p, N	.066, 56	.469, 57	.147, 58
Level 3 (closest)	ρ	.000	-.061	.162
	p, N	.499, 56	.326, 57	.112, 58
Level 4 (closest)	ρ	.242	-.018	.153
	p, N	.036, 56	.447, 57	.127, 58

3) The Spearman rank correlations between the preferences for the six levels of moral arguments of MJT globally and the preferences for the four levels of moral arguments at SRM-SFO (close and closest versions) are presented in the Table 3 and 4.

4) The correlation between the SRMS and the preference for the moral arguments at MJT was for the level 1 arguments: $\rho = -.455$, $p = .000$, $N = 56$; the level 2 arguments: $\rho = -.550$, $p = .000$, $N = 57$; the level 3 arguments: $\rho = -.158$, $p = .120$, $N = 57$; the level 4 arguments: $\rho = -.158$, $p = .120$, $N = 57$; the level 5 arguments: $\rho = .075$, $p = .292$, $N = 56$; the level 6 arguments: $\rho = -.033$, $p = .405$, $N = 57$.

Tabel 3

The correlations between the preferences for the six levels of moral arguments at MJT and those for the four levels of moral arguments at SRM-SFO (close version)

Preference for moral arguments		Level 1 of SRM-SFO	Level 2 of SRM-SFO	Level 3 of SRM-SFO	Level 4 of SRM-SFO
Level 1 at MJT	ρ	.380	.414	.341	.102
	p, N	.001, 65	.000, 65	.003, 65	.208, 65
Level 2 at MJT	ρ	.415	.466	.296	.149
	p, N	.000, 66	.000, 66	.008, 66	.116, 66
Level 3 at MJT	ρ	.502	.453	.383	.242
	p, N	.000, 66	.000, 66	.001, 66	.025, 66
Level 4 at MJT	ρ	.351	.394	.260	.108
	p, N	.002, 66	.001, 66	.018, 66	.194, 66
Level 5 at MJT	ρ	.066	.091	.054	.211
	p, N	.301, 65	.237, 65	.335, 65	.046, 65
Level 6 at MJT	ρ	.338	.263	.357	.299
	p, N	.003, 66	.016, 66	.002, 66	.007, 66

Tabel 4

The correlations between the preferences for the six levels of moral arguments at MJT and those for the four levels of moral arguments at SRM-SFO (closest version)

Preference for moral arguments		Level 1 of SRM-SFO	Level 2 of SRM-SFO	Level 3 of SRM-SFO	Level 4 of SRM-SFO
Level 1 at MJT	ρ	.248	.195	.209	-.382
	p, N	.033, 56	.075, 56	.061, 56	.002, 56
Level 2 at MJT	ρ	.177	.418	.106	-.461
	p, N	.092, 58	.001, 58	.214, 58	.000, 58
Level 3 at MJT	ρ	-.109	.165	.312	-.221
	p, N	.207, 58	.108, 58	.009, 58	.048, 58
Level 4 at MJT	ρ	-.037	.187	-.002	-.142
	p, N	.393, 58	.080, 58	.494, 58	.144, 58
Level 5 at MJT	ρ	-.109	-.088	.226	-.006
	p, N	.209, 57	.257, 57	.046, 57	.483, 57
Level 6 at MJT	ρ	-.126	-.009	.320	-.155
	p, N	.174, 58	.472, 58	.007, 58	.123, 58

DISCUSSION AND CONCLUSIONS

Data in what respects the psychometric qualities of the two instruments were relatively similar with the ones cited by their authors with several exceptions. For the SRM-SFO the internal consistencies had, in general, acceptable values. The correlations between the SRMS and the preferences for the four levels of moral arguments in the both versions (close and closest) and the ordering of those preferences were the ones required by the theoretical underpinning of the SRM-SFO. For the

MJT, the preference for the six levels of moral arguments is almost monotonically increasing, as the required one, and the occurred reversals are to be encountered also in other studies using MJT (Lind, 2000). The correlations between the C index and the preferences for the six levels of moral arguments were in general the expected ones, with the exception that the expected positive correlation between the C index and the preference for the moral arguments of level 6 did not occur. This exception may indicate a problem with the way the moral arguments of level 6 were understood by the participants of this sample. Also, the quasi-simplex structure of the intercorrelations matrix for the preferences for the six levels of moral arguments was only close to the expected one.

1) A positive correlation occurred, as anticipated, between the C index of MJT and the SRMS of the SRM-SFO. Therefore, although the two instruments use different methods for assessing the level of moral judgment, the fact that they are positively associated might mean that they validly measure the same phenomenon. Also, this result supports the expected link between the moral competence and moral orientation aspects of the moral judgment. The lack of a significant correlation between the SRMS and Cd, might be explainable through the segmentation phenomenon (Lind, 2014), which occurs when the content of a moral dilemma may influence the level of demonstrated moral competence because of a high level of support from a particular socio-cultural environment for a particular solution for that dilemma and the moral values involved by that content, leading to a powerful social pressure in their favor. It may be one thing to surpass the biases of a personal opinion, and another thing, presumably a harder one, to surpass the biases of an opinion prevalent in one's social environment. In the direction of this hypothesis is the fact that Cd index, on this sample, was significantly lower (the test Wilcoxon was $z = -2.36$, $p = .018$) than the Cm index, possibly because of a unfavorable opinion in the Romanian society or in this sample for the euthanasia solution.

2) The negative correlations between the C index, and Cd, respectively, and the preferences for the two inferior, immature, levels of moral arguments for SRM-SFO (close version) were statistically significant, as anticipated. Instead, the anticipated positive correlations between those indices and the preferences for the two superior, mature, levels of moral arguments for SRM-SFO were not obtained, the tendency being even one toward a negative association between them, which is even statistically significant in the Cd case. The negative correlations between the preferences for the two inferior, immature, levels of moral arguments for SRM-SFO (closest version) and C index, and Cd, respectively, were only close to the significance threshold, but the expected negative correlation between the Cw and the preference for the level 1 moral arguments of the SRM-SFO was statistically significant. Only in the closest version, the preference for the moral arguments of level 4 at SRM-SFO had a significantly positive correlation with C index, as it was expected. So, the general pattern of correlations was closer to the expected one especially for the correlation between the C index and the closest version of the preference for the four levels of

moral arguments of the SRM-SFO, maybe because the closest version, which implies a forced choice, and C score are global indices, with a more synthetic value, being less content dependent. So, in this case, the link between the moral competence and the moral orientation as measured by the separate preferences for the four levels of moral arguments at SRM-SFO was supported by data in a lesser degree.

3) The correlations between the preferences for the four levels of moral argumentation of the SRM-SFO (the close version) and the preference for the six levels of moral argumentation of the MJT are in a large degree not the expected ones, as some answer tendencies (toward a positive rating of the predefined arguments, irrespective of their level and type of instrument), which may be more manifest in the case when the choice is not a forced one, might have masked them. That this may be case is supported by data in which the four levels of moral argumentation of the SRM-SFO (the close version) were correlated with the ipsitized version of the preference score (the one obtained by subtracting from the absolute preference score the mean score of the absolute preference for all the moral arguments of MJT, indicating thus a relative preference for a moral argument) for the six levels of moral arguments of MJT. In this version, the number of significant positive correlations is decreased and there occur some of the expected significant negative correlations. But in the closest version, those correlations were closer to the expected pattern. They support the expected content correspondence between the first three levels of moral arguments of the two instruments, but indicate a problem in what respects the expected content correspondence between the level 4, 5, and 6 of the MJT moral arguments and the level 4 SRM-SFO moral arguments, as the preferences for them correlated significantly positively not with the preference for the level 4 SRM-SFO moral arguments, but with the one for the level 3 SRM-SFO moral arguments (in the case of the level 5 and 6 of MJT moral arguments), and, as a tendency, even with the one for the immature level 2 of the SRM-SFO moral arguments in the case of the level 4 of MJT moral arguments. In the same time, the preference for the level 4 SRM-SFO moral arguments had the expected significant negative correlations with the preferences for the first three levels of the MJT, indicating that the problem may not be with the level 4 SRM-SFO moral arguments but with the level 4, 5, and 6 of MJT ones. This picture is somewhat improved by using in this case, too, an ipsitized version of the preference scores for the six levels of moral arguments of MJT: the relative preference for the level 4 moral arguments of MJT this time has no significant correlation with the preference for the level 2 moral arguments of SRM-SFO (it is close to zero), but it has a significant negative correlation with the preference for the level 3 moral arguments of SRM-SFO ($\rho = -.328$, $p = .007$, $N = 56$), and the relative preference for the level 5 moral arguments of MJT has an expected significant correlation this time with the preference for the level 4, not level 3, moral arguments of SRM-SFO ($\rho = .333$, $p = .006$, $N = 56$), and even the expected

significant negative correlation with the preference for the level 2 moral arguments of SRM-SFO ($\rho = -.293$, $p = .014$, $N = 56$). The relative preference for the level 6 moral arguments of MJT only tends in this case to correlate positively with the preference for the level 3 moral arguments of SRM-SFO, and tends to correlated negatively (very close to a significance threshold of $p = 0.1$), as expected, with the preference for the level 1 and 2 of moral arguments of SRM-SFO, so that its situation is only a little improved in this case.

It may be said, in conclusion, that between the moral orientation aspects of the two instruments, as reflected in the separate preferences for their levels of moral arguments, the data supported only partially the expected correspondences.

4) As in the case of the C index of MJT, also the expected correlation between the SRMS of SRM-SFO and the preference for the six levels of moral argumentation of the MJT was the expected negative one for the inferior levels, but not the expected positive one for the superior levels. But this situation is improved by using ipsitized preference scores for the six levels of moral arguments of MJT, case in which the expected significant positive correlation between SRMS and the relative preference for the level 5 and 6 moral arguments of MJT occur ($\rho = .447$, $p = .000$, $N = 56$, and, respectively, $\rho = .240$, $p = .0037$, $N = 56$), too, not only the significant negative ones with the preference for the first two levels of the MJT.

This result may be interpreted in the light of the above mentioned ones that indicate that meaning of the moral arguments of higher levels at MJT for this sample may be a problematic one, which does not correspond with the one expected based on their theoretical underpinning, as the preference for them does not correlate positively with C index (with the exception of the level 5 moral arguments), with SRMS, and with the preference for the level 4 moral arguments of the SRM-SFO. Therefore, in this context, the rejection of the inferior levels of the moral arguments might be a better index for the moral judgment level than the preference for the higher levels of the moral arguments, which may be influenced in a greater measure by the social desirability phenomenon or some distorting answer tendencies.

The global picture of the investigated correlations shows that between the scores that evaluate the different aspects of the moral judgment with the two instruments there is a link, the anticipated positive and negative correlations being supported by data especially for the main indices (SRMS and C index), those having a synthetic value for the both instruments. These data support the concurrent validity of the two tests.

The interpretation of the data obtained in the present research should take into account its main limits: the small volume of the used sample, its homogeneity in what respects the participants' education domain, which may have a particular influence over their moral judgment.

It would be useful that, in the future, the comparative study of the instruments in use for the moral judgment assessment to be extended and also to

correlate their results with moral behavior tasks in order to find out when their separate application or in combination would bring improvements to the assessment process of the level of moral development and which quantitative indices would have the highest predictive value in what respects the future moral judgment and behavior.

REFERENCES

- Brugman, D., Basinger, K. S., & Gibbs, J. C. (2007, August 11–14). *Measuring Adolescents' Moral Judgment: An Evaluation of the Sociomoral Reflection Measure – Short Form Objective (SRM-SFO)*. Paper presented at the “Cross-cultural research on moral reasoning”, International Council of Psychologists, San Diego, USA. Retrieved from https://www.academia.edu/4594794/Measuring_Adolescents_Moral_Judgment_An_Evaluation_of_the_Sociomoral_Reflection_Measure_-_Short_Form_Objective_SRM-SFO
- Faiciuc, L. (2014). Moral competence as measured with MJT and moral education through reading tales and stories. *Anuarul Institutului de Istorie George Barițiu din Cluj-Napoca. Seria Humanistica*, *XII*, 121–136
- Gibbs, J. C., Basinger, K.S., & Fuller D. (1992). *Moral maturity: measuring the development of sociomoral reflection*. Hillsdale:Lawrence Erlbaum.
- Ishida, C. (2006). How do Scores of DIT and MJT Differ? A Critical Assessment of the Use of Alternative Moral Development Scales in Studies of Business Ethics. *Journal of Business Ethics*, *67*, 63–74.
- Lind, G. (2000). *Review and appraisal of the moral judgment test (MJT)*. Retrieved from http://www.unikonstanz.de/ag-moral/pdf/Lind-2000_MJT-Review-and-Appraisal.pdf
- Lind, G. (2014, March 25). *Moral Competence Test (MCT)*. Retrieved from <http://www.uni-konstanz.de/ag-moral/mut/mjt-engl.htm>
- Lupu, L. (2009). *Moral, lernumwelt und religiosität: Die entwicklung moralischer urteilsfähigkeit bei studierenden in Rumänien in abhängigkeit von verantwortungsübernahme und religiosität* (PhD thesis). University of Konstanz, Germany. Retrieved from <http://kops.ub.unikonstanz.de/handle/urn:nbn:de:bsz:352-opus-95865>
- Rest, J. R., Narvaez, D., Thoma S. J., & Bebeau, M. J. (1999). DIT2: Devising and testing a revised instrument of moral judgment. *Journal of Educational Psychology*, *91*(4), 644–659.
- Rest, J., Thoma, S., & Edwards, L. (1997). Designing and validating a measure of moral judgment: Stage preference and stage consistency approaches. *Journal of Educational Psychology*, *89*(1), 5–28.
- Sociomoral Reflection Measure – Short Form Objective. (n.d.). Retrieved from https://www.academia.edu/3757930/Sociomoral_Reflection_Measure_-_Short_Form_Objective.