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Review of the doctoral dissertation by Mirlinda Kuci

**IMPACT OF THE ENDOWMENT EFFECT ON AN INDIVIDUAL'S CHOICE  
UNDER UNCERTAINTY**

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Scientific value of the dissertation

Research originality

Choices made by economic entities are a very interesting issue that takes up a lot of space in the research work of scientists. The theories reflecting the principles and motives behind decision making (in various conditions) are being developed. There are also new approaches to existing problems or events noticed by scientists. Such a concept is the endowment effect, which means a tendency to value things that we as humans have differently than if we do not own it. This concept was introduced into economics by R. Thaler (the Noblist) - as the doctoral student writes.

This topic is closely related to such notions as rational choice, risk related to choice, uncertainty of decision making, consumer utility. In this regard, it shows the motives and effects of people's actions in transactional (commercial) processes and the basic principles that guide them. Its reflection can be found in almost every element of human action - each of us usually has something that can be traded, to which we are attached. This means that the valuation of this good (thing) may be different - overstated in relation to real market prices.

The analysis of the aforementioned decision-making elements and their determinants is very interesting. About this the doctoral thesis is prepared.

The work of Mirlinda Kucia presented for evaluation is placed in these realities. On the one hand, it points to the endowment effect in the context of behavioral economics, i.e. the search for the basis of our decisions, and on the other hand, the Author places it in the theory of economics by analyzing the theory of the consumer, rationality, utility, as well as uncertainty and risk. The research is based on an economic experiment, which is intended to allow the verification of the research hypotheses.

The work is written in an interesting and original way. Several facts prove its originality. **Firstly**, the subject of the work covers a relatively new concept in economics, which is the endowment effect. Applies it to the areas well established in theory, such as the theory of the consumer, the concept of risk and uncertainty. These concepts interpenetrate each other and together they create interesting and worth analyzing issues related to the decisions of economic entities. **Secondly**, the subject of research is related to experimental methods in economics. It is no longer a novelty today, as the Author herself writes, but conducting experimental research is not a very often used method to solve the economic problems posed. It is worth mentioning that the Author does not focus only on experimental methods but uses statistical tools to analyze and confirm the obtained research results. Therefore, it should be stated that the research is carried out in a mature manner, using different research methods. **Thirdly**, experimental research is usually conducted on the basis of relatively small groups of respondents participating in the research. In this case, the Author reached for a large group of respondents and she has done it internationally. Three nations Swiss, Poles and Albanians were took part in the project.

The scientific value of chapters

The work presented for evaluation consists of four chapters, an introduction, a presentation of goals, research problems and methodology, and finally conclusion. Various compilations such as biography, list of tables and figures were also indicated. The appendix shows the scans of the experimental research that are carried out.

The dissertation is structured in a logical way, because theoretical aspects are discussed first - the first 3 chapters, concerning the current basis of knowledge related to the concept of the endowment effect, the orthodox theory of the consumer, the choice under risk

and uncertainty conditions. The last chapter 4 indicates the methodological and empirical part related to experimental research and the analysis of the obtained research results.

**The first chapter** is devoted to a broad consideration of the subject matter of the endowment effect. First of all, this concept is located in behavioral economics as the fundamental part of economic theory. Then, the scientific achievements related to it are shown. The described determinants of the endowment effect are also an important part, with a broad indication of uncertainty, cultural, socio-demographic factors and risks as the most important. This chapter also indicates the research hypotheses adopted by the doctoral student (5 hypotheses).

In **the second chapter**, the Author has focused on describing the theory of the consumer in the context of the choices made. The elements related to consumer preferences are presented here, then they are reference to indifference curves to indicate, at the end of the chapter, the Edwards Box model as the basis for the analysis also in the context of the endowment effect. It is important that the Author was very skilled at placing the concept of the endowment effect in a very classical theory of economics.

**The third chapter** is dedicated to an overview of issues related to making choices under risk conditions. It is important for the work as a whole because it divides the main part of research into choices under certainty and uncertainty conditions. This part is therefore the basis of the adopted methodology. In this chapter a lot of space is also devoted to the theory of perspectives which is related to the classical assumptions of rationality. It is summed up by the presentation of reference-dependence theory as a possible analysis of human decision making.

**The fourth part** of the work consists of the methodological and empirical considerations of the Author. This chapter is the longest of all the work (it takes up almost half of the entire content). First, the Author presented an introduction to the experiment in economics and the dissertation methodology built on this basis. Then, statistical data on the group of respondents participating in the experiment were presented, broken down into three analyzed countries. The next part of the chapter is the presentation of the results of the research - a conducted scientific experiment divided into the basic determinants established within the methodology. The summary is the subchapter presenting the three participating countries in the context of the value assessment paradigm. The chapter ends with an

experimentally assessed risk aversion. This part was primarily to verify the research hypotheses set in the dissertation.

The work is **summed up** with an concluding part in which the most important research results were presented and their interpretation was discussed. The Author also points out that most of the hypotheses have been positively verified, except for the fourth hypothesis, according to which socio-demographic factors were also supposed to influence the endowment effect. According to the Author opinion, the main goal of the work was achieved despite the fact that she did not manage to positively verification all assumptions.

The assessment of the chapters presented above is positive. All parts are well and logically constructed, give the close approach to the research and its description. On the one hand, it presents the theoretical basis, and on the other, it bases experimental research on it. This is the correct form of presenting a scientific achievement. From a technical point of view, it was possible to place the hypotheses and their analysis a bit more precisely in the relevant parts of the work (which will be discussed later in the review).

#### The formal assessment of the research

The quality in a research work can be assessed through several components, which include, among others: the ability to introduce into the research topic, clarity of the construction of research goals and hypotheses, proper selection of research methods, presentation and interpretation of the obtained results against the background of previous research in a given subject. Referring to the presented doctoral dissertation, ***I state that all the above-mentioned elements of the substantive evaluation receive my high positive assessment.*** Below I present my comments on the construction of the part of the dissertation devoted to the objectives and hypotheses.

First of all, I would like to note that the Author has indicated 6 research questions in her work. Then, using these constructed problems, she has created 5 hypotheses. In my opinion, this is the right approach.

The dissertation has presented 6 research goals. They are as follows:

1. What is the size of the endowment effect in this experimental design according to the exchange paradigm and the valuation paradigm?
2. How does the size of the endowment effect differ between the uncertainty and the certainty condition?

3. How does culture affect the size of the endowment effect?
4. What is the relationship between the type of endowment and the endowment effect?
5. How does age, gender and educational background affect the size of the endowment effect?
6. What is the relationship between risk aversion and the endowment effect?

I have the following comments regarding these objectives. Referring to the assessment of the beginning of the research process, which is to ask questions and build hypotheses, I would like to point out that the dissertation could have one main research question relating to the concept and the existence of the endowment effect. Then to auxiliary questions should be state pointing to specific determinants. The research covered whether there is any endowment effect, what is its size and what determinants affect it. This implies the possibility of setting the main and auxiliary goals. The main goal would then be the first goal, the others could be considered auxiliary.

The Author presented 5 research hypotheses in the work. They are as follows:

H1: There is a significant association between the type of the endowment and the endowment effect.

H2: There is a significant association between uncertainty and the endowment effect.

H3: There is a significant association between culture and the endowment effect.

H4: There is a significant association between socio-demographics and the endowment effect.

H5: There is a significant association between risk aversion and the endowment effect.

The presented detailed research hypotheses are properly constructed and allow to get know with what the research will be about. They are clearly and logically presented. My observation that can be made in relation to the hypotheses is similar as in relation to the goals. The first hypothesis should be treated as the main hypothesis, while the rest may be auxiliary. At the same time, the endowment effect hypothesis versus the valuation paradigm are missing. As a result, the goals and hypotheses do not fully coincide with each other. It is definitely worth including this paradigm in the main hypothesis, because it is the basis of the whole research.

It would also be worth putting the research hypotheses quite clearly in different dissertation parts: at the very beginning, right after the goals, and at the end of the summary part. Indicating hypotheses in the summary would make it easier to understand whether they were verified and how.

## Editorial correctness of the dissertation

The formal assessment of the editorial correctness of the presented doctoral dissertation is very high. One can see that the work is refined in terms of graphics, technical and text. This facilitates both its reading and the assimilation of the presented knowledge. Charts and tables are colored with appropriate markings indicating their most important elements. Pages are properly numbered. The numbering of tables and charts is correct. The dissertation adopts the convention of indicating references according to the APA schema, which is the correct method.

The work is basically free of any typographical or grammatical errors, and the few exceptions do not change the overall very good assessment.

The layout of the work presented by the doctoral student is divided into four chapters. In my opinion, the fourth chapter could be divided into two separate ones. A methodological chapter can be distinguished from it, in which, first of all, the conducted experiment would be described. This is currently done in the beginning of Chapter Four. Such a change would have a positive impact on the logic of the construction of the entire work.

## Critical remarks

Each scientific dissertation should be subject to evaluation, which includes a critical analysis of the presented research material. It is no different in the case of Mirlinda Kuci's dissertation. Below I present comments of a scientific nature and regarding the research methodology.

### Scientific comments

The presented work is an interesting study of the endowment effect that exists in almost every decision-making. It is worth noting here that the author has presented in detail the current scientific achievements, mainly worldwide, concerning research in the field of behavioral economics, with particular emphasis on the endowment effect. Theoretical considerations also apply to theories supporting this concept and convergent with the research issues undertaken, such as the theory of consumer choice and choice under risk conditions. The research itself - an economic experiment - was carried out properly, using all the recommendations related to conducting research in this way. Moreover, as I have already mentioned, the author also used statistical methods to determine the significance of the

obtained results. An interesting part of the work and the evaluation of the research results is the analysis of three different nations which, as it turns out, behave differently. In many cases, the responses obtained indicate that different nations have different behaviors.

Another remark worth mentioning for this dissertation is that the doctoral student should present the conclusions to the results obtained in a more clearly manner, especially pointing to the most important ones. It is probably a consequence of the large amount of research material collected and many possibilities of analysis in various scenarios. My comment relates mainly to the concluding section (Conclusions) in which the most important results obtained in the conducted experiment are presented, but they are described rather briefly. It would be worth extending the section here pointing to possible further research. There is also no indication of the practical application of both the theory related to the endowment effect and the research results obtained by the Author.

#### Research methodology

The research methodology for the dissertation is described in three places throughout the whole work. First, it is an introductory part that describes the goals, research questions, and methods. Then it is the first chapter in where the concept of the endowment effect is described and research hypotheses for individual determinants are indicated. The last part where one can find a description of the methodology is the fourth chapter which presents both the concept of experiment in economics and the description of the experiment itself. Such an approach to the presentation of the research methodology is somewhat difficult in assessing the work. The hypotheses were presented only in the first chapter. There is no indication of them both in the methodological part at the beginning of the work immediately after the presentation of the goals, as well as in the part related to the description of the methodology of experiments in the fourth chapter. Such a multiple presentation of hypotheses would facilitate the understanding of the research convention and the answer whether the hypothesis have really been verified. There is also no indication of the same hypotheses in the concluding part. The reader must either guess what the hypotheses were or look for them in the first chapter. This is undoubtedly a handicap.

The description of the conducted experiment is properly prepared. The methodology of selecting the research respondents is described in detail: what they were informed about and what they will do in each experiment. The process of the experiments itself was also shown. It is also very good to attach scans (screenshots) of the tests carried out in the

appendix. This allows not only to find out how the research was conducted from the point of view of methodological preparation, but also to analyze the practical conduct of the experiment.

Anyway, the methodological part should include a detailed description of the method of selecting a group of respondents, in this case people who were participated in the experiment. As the Author points out, the members of response group were people living in 3 countries and were in different ages. Unfortunately, the Author did not indicate how the people who finally ended up in the group of respondents were selected. We already know the research was conducted online, but it was not shown how these people were selected and reached. Therefore, it is difficult to know if it was a completely random selection, providing the conditions for a properly conducted economic experiment.

As it was mentioned before, the goals and hypotheses could be constructed differently, i.e. the main goal and the main hypothesis should be distinguished and the goals of the auxiliary hypothesis should be added to them. Nevertheless, in the form as they are presented, they fully explain the research problem undertaken and define the framework for conducting the research.

### Questions to the Author

1. The basic premise of utility theory is that consumers rationally make decisions to obtain the highest level of satisfaction. According to the assumptions of the Homo Oeconomicus theory, the human goal is, above all, to maximize the financial value of the decisions made. Could such an approach to the purposefulness of the decisions made (i.e. the decision's evaluation in the financial value), in the opinion of the Author, affect the existence and value of the endowment effect?
2. Emotions accompany a person in making every decision. They are very often an important determinant of the final effect of the decision-making process. For example, a bad mood can lead to a negative attitude to decisions. Do emotions also play a role in measuring the endowment effect? What is emotions role and what is its meaning?
3. Economic research, apart from its theoretical dimension, very often has an application character. Can the Author indicate practical applications for the endowment effect for both: consumers and other market entities?



## Final assessment

I, the undersigned, certify that the reviewed doctoral dissertation of Mirlinda Kuci meets the conditions specified in Art. 13.1 of the Act dated March 14, 2003 on academic degrees and academic title as well as degrees and title in the field of art (Journal of Laws No. 65, item 595, as amended) and I am applying for admission of Ms Mirlinda Kuci to further stages doctoral dissertation.

At the same time, I request that the doctoral dissertation be distinguished with an appropriate award due to the high substantive value of the work and the detailed nature of the study, especially regarding the analysis of a large amount of collected research material from an international perspective.

27 August 2020  
date of the review



signature of the reviewer

