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THE REASONS OF AVERSION TO
ORGAN TRADE LEGALIZATION

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Prohlašuji na svou čest, že jsem bakalářskou práci vypracovala samostatně a s použitím uvedené literatury.

I, hereby, solemnly swear that I wrote this bachelor thesis on my own, using the literature listed below.

Soňa Pavelková
Prague, January 10, 2011

I would like to thank doc. Ing. Daniel Šťatný, Ph.D. for his priceless comments and the supervision of my this thesis.

Also, I would like to thank Petr Koblovský, Ph.D. for his insights into Star Trek.

Additionally, I would also like to express my gratitude to my parents for their moral and other support.

Abstract

This paper is aiming at finding out, whether the reasons of aversion to organ trade legalization are more a moral issue or the aversion is caused by people being uninformed or misinformed. Accordingly, a survey aimed at four target groups (medical professionals, students, patients and donors) was done in the Czech Republic. The results showed that the aversion is mostly caused by lack of information about the possibility of organ trade legalization, however moral issue seemed not to be a major problem for the legalization.

Keywords:

Organ market legalization, transplantation, financial compensation, aversion

JEL classification:

A13, I19

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Dr. Sheldon Cooper MSc, PhD., Theoretical physicist: *You know, in difficult times like this, I often turn to a force stronger than myself.*

Amy: *Religion?*

Dr. Cooper: *Star Trek.*

Introduction

The topic of market with human organs can be characterized as being widely diverse with respect to opinions prevailing in the population. Most of the opinions are very negative (Friedman, Friedman 2006), however, it is not clear why it is so. The general negative view is also the reason, why this paper avoids the word “trade” or “market”, as these words were found to be confusing for most of the population in the short research that was conducted before the survey. Instead, a term financial compensation for donors (hereinafter only “FCD”) was used to create an idea of the main concept of the market. One of the explanations for the negative attitudes is that the general public lacks information (or has incorrect information) on how the FCD might work. Another basis for such attitude might stem from “moral” grounds. Identifying reasons that cause such negative attitudes (in extreme form even aversion) could serve as a lead that can help economists (and other academics) bring this topic closer to the wide public. Thereby the topic can become less controversial and possible inefficiencies and biases prevailing in the population can be eliminated.

This topic is also of a great importance, as there is a persisting, general and - more importantly - extreme shortage of human organs available for transplantations (Gaston, 2006). In 2005, less than 15% of the 70 000 Americans seeking transplants actually received them. The prediction is that by 2010, there will be over 100 000 people in the USA waiting for transplantations along with many suitable candidates not being listed on the transplant candidates lists because they gave up. Although the number of deceased kidney donors (kidney being one of the most often organ transplanted) has recently increased, the situation has not improved as the quality of the available organs is low because of higher average age of these donors. Moreover, even if all potential deceased donors in the USA became factual donors, the statistical data predict a continuing deficit in the number of donors.

A wide diversity of papers trying to explain this shortage and to offer a solution has already been written (Perry, 1980; Dukeminier, 1970; Denise, 1985). One of the proposed solutions is an introduction of some kind of “market”, where financial incentive would be offered as a motivation for donation (Block, et al.). This paper analyses reasons causing

the general aversion to that idea. In the first part, I summarize the most common reasons of aversion to FCD as published in papers on this topic or which I learned while conducting interviews¹. The second part will be devoted to the results of my own survey in Czech population. The third part summarizes and concludes the survey.

1 Review of the relevant literature

1.1 Ethical and social problems of FCD

Ethical and social issues are one of the most frequently mentioned reasons the general public raise against the legalization of the market with organs (Childress 2006). One of the typical problems being mentioned is generally known as “the problem of altruism”. Another issue is a general people’s concerns - a fear of death and a fear of procedures with their body after death etc. The diversity of cultures and religions and motivation for donation can also be named as an ethical and social issue related to the reasons of the mentioned aversion.

Altruism

Many authors (Epstein 2008; Prottas 1983) explained why the problem of altruism should not mean a significant obstruction in legalizing of the market with organs. They argued that the introduction of the FCD shall not eradicate the main attribute of altruism – being the quality of unselfish concern for the welfare of the others² – and cause a decrease in willingness to donate in the group of altruistic donors. Moreover, using a neoclassical model, Richard A. Epstein (2008) explained, why financial incentives should not crowd out altruistic donors.

Regardless, the opinion to the contrary prevails in the general population, and it also predominates in professional circles (Dejong, 1995) - that was also revealed in the interviews with the medical practitioners I conducted. Also a research done on this topic

1 Interview with: MUDr. Václav Chmelík (The Chief of Infection at the České Budějovice Hospital and a Member of National Pandemic Commission), and MUDr. Petr Pták (general surgeon). Their answers to particular questions are presented in this paper. MUDr. Chmelík has a personal experience with this topic, as infection department often in cases of organ destruction by various infections has to cooperate with transplantation department.

2 WordNet Search [online]. 2010 [cit. 2010-11-14]. WordNet home page.

(Pessemier, Bemmaor, Hanssens, 1977) showed an overall decrease in the supply of human body parts when financial incentive was set, which the authors attributed to altruism. Although there seemed to be a clear evidence that the financial incentives with respect to organ donations cause a general decrease in the willingness to supply human body parts, a significant part of potential donors was also positively influenced by these incentives (in particular case of kidneys). That is why the unresolved problem of altruism still needs to be count as one of the main weapons of opponents of FCD.

Fear of death

As discussed by Professor James Childress³ and confirmed in further research (Sanner, 1994), many people who refuse to become donors mostly fear being declared dead too soon, or hesitate to let their body be cut up after their death. Also the fear of exposure of remains in unpleasant way without their permission is one of the reasons why some people fell frightened of the legalization of FCD.

Cultures and religion

Notably, different cultures, religions and social classes have significantly strong and usually opposite opinions on the topic of the organ donations (Chmelík, see note 1). For example, followers of Catholic Church consider selling of human body parts to be against God's law (Friedmann, 1970) and Jehova's witnesses reject even blood transfusion not to act against God's will. Moreover, the opinions on the legalization of FCD will likely differ between homeless people and the entrepreneurs. The opponents might argue that there might be a problem to distinguish whose interests or opinions are more important with respect to the availability of organs to different social classes and with respect to religions.

Motivation

Motivation of individuals, who might be due to their economic situation forced to sell their organs is also one of often mentioned concerns. Accepting the principle that one can sell something irreplaceable and really important for one's life, could serve as an

3 James Childress, Professor of ethics at the University of Virginia and Chairman of the Institute of Medicine Committee that produced the 2006 report "Organ Donation: Opportunities for Action", referred to KNOX, Richard. NPR [online]. May 21, 2008 [cit. 2010-11-14]. Should We Legalize the Market for Human Organs?. Retrieved from WWW: <<http://www.npr.org/templates/story/story.php?storyId=90632108>>.

instruction: I have already lost everything, but I still have a kidney to sell⁴. This might be according to the doctors' opinions legally acceptable, but morally very disputable and desperate solution, which otherwise would not be made under different circumstances (Chmelík, see note 1). Opponents of FCD are concerned that legalization can lead to the misrepresentation of medical information, especially in case when a donor is in need of money (Mayes, 2003). Inability to take back one's decision after realizing the loss can be crucial in this case (Goyal, 2002).

1.2 Legislative problems

Corruption

Many people are afraid of negative consequences of corruption in the process of the formation of the legislative framework, as well as corruption resulting from the imperfections introduced by such framework. This double layer corruption environment is viewed to be extremely destructive.

Globalization and “organ travelling”

The next negative attitude towards the market with organs is derived from the general critique of globalization (Delmonico 2008).⁵ The opponents are concerned that people from third world countries would not be selling the organs from their own will. Although this is similar to the problem discussed above, in this case, the opponents stress the aspect of the exploitation of third world countries and emphasise the need to introduce/adopt a global understanding, global cooperation and coordination. According to them, this is not easy to manage for many reasons, such as likely significant deployment and organisational costs.

4 Motivation is actually also believed to be one of the main indicators of organ quality, as it serves as screening of perspective of a potential donor, because the principle of voluntariness as itself shows the accurate motivation of a particular person. (Chmelík, Pták, see note 1) When a price is set, the process of decision making could be distorted and the market can be supplied with low quality organs (Akerlof, 1970).

5 For example, let's say that if a 72 years-old is waiting for a transplantation, there is no reason to wait in the environment, where the waiting list doesn't provide such person a reasonable waiting time. In case of a wholly functional market with organs, such person would likely travel to another country, very likely to third world countries and buy the necessary organ there much faster and much cheaper.

1.3 Medical problems

Organ quality and the social status of a donor

The most discussed medical reason is the quality of the donated organs.⁶ There seems to be a significant variability in quality of organs depending on the social class of a donor. People who would be attracted by financial incentives would likely be from poor (lower) social class, which is generally known for lower hygiene and health conditions (Menor 2002). Moreover, tracking the origin of donated organs might be also of an issue. The medical professionals mention the legalization of blood market as a demonstrative example when the introduction of market and financial incentives by attracting people in poor social conditions caused more harm than good.⁷

Donor suitability

According to medical professionals, the FCD also generates a crucial problem with donor suitability. From the medical point of view, even if there are more donors as a consequence of the FCD, it does not necessarily mean that more transplantation surgeries will take place. Age, weight, blood type, medical history, allergies etc. are examples of aspects that are vital for the successful surgeries. Therefore, even if the number of subjects willing to donate their organs increases, it does not necessarily mean that there will be more

6 Mentioned by both doctors, Václav Chmelík and Petr Pták, the arguments in this part are based on interviews with these two doctors. Also see note 4.

7 In the 80s, when trade with blood was legalized (for example in Switzerland), trade with African blood was established. Obviously, the blood was tested for all known diseases. But at that time, in the 80s, a lot of dangerous and nontreatable diseases were unknown. For example HIV virus or Hepatitis C. (It is necessary to emphasize, that there were no practical chance to determine, if the blood is contaminated or not. The important role is played by time factor, because incubation period of those diseases is quite long and symptoms do not have to occur, for example in case of Hepatitis C. Only distinct effects of this disease are vivid. There was no misconduct in testing the blood or treatment; it was just impossible to protect population from those diseases in that time). By that time, many people got ill and suffered from these diseases, which were absolutely unknown and not spread in Europe. Nowadays, according to the doctors, there are still plenty of diseases undiscovered, which in case of free organ trade could be spread as well as HIV virus or Hepatitis C. Some diseases might not occur or hurt Asian population, but they could hurt the Africans - and vice versa.

successful transplantations (Joralemon, 1995).⁸

2 Base Survey

The most relevant found study for this paper was carried out in 1994 in Uppsala, Sweden (Sanner, 1994). The purpose was to find out the factors influencing the attitudes to organ donation and to other selected procedures related to dead tissues. The survey involved 400 inhabitants of Uppsala, while 38 persons were chosen for a follow-up in-depth interview, as their opinions on this issue seemed to differ significantly from each other, however represented dominant views common to identifiable groups of respondents. The opinions of these 38 respondents were then divided in 20 motive categories, out of which 17 motives were identified as negative to organ donation whereas 3 as positive. The research further set 6 different motive complexes: 1) illusion of lingering life; 2) protection of the value of the individual; 3) distrust, anxiety and alienation; 4) respecting the limits set by Nature or God; 5) altruism; 6) rationality.

The research identified several potential motives why people refuse organ donation. These motives are also in accordance with motives mentioned above in the first part of the paper, which implies occurrence of similar motives of aversion also in the research done in this paper, which will be analysed in the next part.

3 Czech survey

3.1 Description

Respondents (n=230) were asked to provide information on their attitude to legalization of the FCD. There were four target groups: (i) medical staff, (ii) patients before and after the transplantation, (iii) donors, (iv) control group selected from university students (primarily not involving the subjects from the other groups) while a high variation in opinion

⁸ Nevertheless this issue can be partly overcome because there is already a number of drugs, which lower the probability of organ rejection. Such drugs must be taken on regular basis, hence causing significant discomfort to the recipient of the organ. Moreover, even if the recipient obeys all restrictions, it does not mean that their organism would not eventually respond negatively to the transplanted organ.

was expected between these groups because of the significant difference in professional background of the group members. There were two tested statements. The first statement is that repulsiveness to FCD is caused by incorrect information about the whole idea of legalization of FCD.

The second statement is that people are against FCD per se, especially because of moral repulsiveness and cultural background. The main purpose of the survey was to find out which statement is more likely to prevail.

Respondents were informed that this bachelor thesis does not back up any opinion on this topic and that it is anonymous. There were fourteen questions.

- 1) Have you ever heard about the idea of legalization of financial compensation for the donors of human organs?
- 2) What do you think the purpose of this legalization is?
- 3) Have you heard about the way the system could possibly work?
- 4) Would you be interested in learning more about how it could work?
- 5) Suppose your health condition demands transplantation of a kidney. How much would you possibly be willing to give up in order to secure a surrogate kidney?
- 6) Suppose your health condition allows you to donate a kidney and help someone or even save his/her life. What would be the appropriate financial compensation for your donation of the kidney?
- 7) Do you think financial compensation for donors is immoral?
- 8) Do you think financial compensation for blood (sperm) donation is immoral?
- 9) Do you think financial compensation for drug manufacturers is immoral?
- 10) Do you think financial compensation for the help doctors provide is immoral?
- 11) Despite the moral aspects, do you think there are any other problems of this legalization?
- 12) Do you think that legalization of financial compensation for donors could help solve the problem with the lack of organs?
- 13) Can you think of any other benefits of this legalization?
- 14) If there was a referendum about this legalization, what would your vote be?

The first four questions should indicate the interest about the FCD and the general knowledge among the tested population about this issue. The next two questions (questions 5 and 6) should indicate how, or how much people evaluate their organs, specifically a kidney. It is supposed to be a bit confusing for some of the respondents to answer and we expected there might be some questionnaires not filled in on these two questions. That is why the questions were asked not to force the respondent to set an exact price as for some of them the price might be unimaginable. The aim was to find out if the evaluation is for the respondents at least possible. Questions 7 to 10 focus on the moral aspects of FCD. In order to detect consistence in subjective morality judgments, respondents were presented with analogies, which are currently perfectly legal (blood, semen, drugs). Questions 11 to 14 examined factual basis of aversion.

Respondents set

As mentioned, the questionnaire was filled in by 230 respondents. As can be seen from Table 1 below, number of men (n=111) and women (n=119) was almost equal. But there was an age category “under 26” which is significantly overrepresented. Total number of people below 26 years of age is 73.48% in the sample, which was caused by the fact that most of the questionnaires were filled in by students, as they were one of the target groups and also the most achievable.

Table 1: Structure of men and women according to age category

Gender,age	
MEN (n=111)	48,26%
<= 26 ys	39,13%
27-49 ys	6,09%
>= 50 ys	3,04%
WOMEN (n=119)	51,74%
<= 26 ys	34,35%
27-49 ys	12,61%
>= 50 ys	4,78%
Total (n=230)	100,00%

Table 2 shows the representation of men and women according to their job. As said before, there is an overrepresented group of students, which reached 70% of the total sample; students of VŠE form 66.09% of the total number of respondents. Medical doctors and nurses are the second most frequent respondents. The group “Others” includes in this case general population, patients and donors. Unfortunately, it was quite difficult to reach

the group of patients and donors, because doctors are not allowed to provide information about their patients. Therefore, the only way to gain at least some questionnaires was to ask the doctors a favour to ask their patients to fill the questionnaires up. Therefore, we obtained just five usable questionnaires from patients, however one patient was identified (indicated himself as a recipient) also in the group of VŠE students. According to this fact, their answers were united with the group of general population and the one student was included in the group of VŠE students. Factual donors were not – unfortunately - reached at all, nonetheless 9 of the respondents from the group of VŠE students answered that they are listed as donors (mostly blood donors) - they are also included in the group of VŠE students.

Table 2: Structure of men and women according to education and occupation

	Occupation					
Gender	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
MEN	15,32%	0,00%	75,68%	4,50%	4,50%	100,00%
WOMEN	10,08%	21,85%	57,14%	3,36%	7,56%	100,00%
Total (n=230)	12,61%	11,30%	66,09%	3,91%	6,09%	100,00%

Table 3 refers of the respondents' structure according to their religion. There were 20.43% Christians.

Table 3: Structure of respondents according to gender and religion

	Religion			
Gender	Christianity (n=47)	no religion (n=179)	others (n=4)	Total (n=230)
MEN	21,62%	76,58%	1,80%	100,00%
WOMEN	19,33%	78,99%	1,68%	100,00%
Total(n=230)	20,43%	77,83%	1,74%	100,00%

3.2 Results of the survey

3.2.1. Knowledge & ignorance

The first part is devoted to questions 1 to 4. As can be seen from Table 4, most of doctors and nurses have never heard about the idea of legalization of FCD. On the other hand, students seem to be more informed, because the number of positive and negative answers to this question was quite balanced (positive answer amounted 50.66%), not just in the

group of VŠE students, also in the group of students of other universities.⁹ The reason why students are more informed may be that the problem of FCD is more discussed in academic circles or they might be just generally more interested in this topic, also because 66.09% of the total number of respondents were VŠE students and the topic of markets is familiar to them.

Table 4: The results of the first question according to occupation

Q: Have you ever heard about the idea of legalization of financial compensation for the donors of human organs?						
	Occupation					
Response	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
NO	82,76%	76,92%	50,66%	22,22%	64,29%	57,39%
YES	17,24%	23,08%	49,34%	77,78%	35,71%	42,61%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

In Table 5 we can see the results of the second question. As the results show, most people are persuaded that the purpose of the legalization of FCD is to increase the quantity of available organs or the motivation for donation. These answers of respondents were not surprising, as these two are general consequences of financial incentives. All other responses are quite similar in frequency (less than 5%).

Table 5: The results of the second question according to occupation

Q: What do you think is the purpose of this legalization?						
	Occupation					
Purpose of the legalization	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
quantity expenditure	41,38%	46,15%	42,76%	22,22%	71,43%	43,91%
motivation	13,79%	7,69%	42,11%	11,11%	14,29%	31,74%
elimination of black market	3,45%	0,00%	3,95%	22,22%	7,14%	4,35%
express an honour for donors	3,45%	3,85%	3,95%	0,00%	0,00%	3,48%
nonsense	6,90%	3,85%	0,66%	22,22%	0,00%	2,61%
gain	0,00%	7,69%	1,32%	11,11%	0,00%	2,17%
higher effectivity of current system	0,00%	0,00%	1,97%	11,11%	0,00%	1,74%
insurance savings	0,00%	3,85%	0,00%	0,00%	0,00%	0,43%
strategic pressure on poor	0,00%	0,00%	0,66%	0,00%	0,00%	0,43%
no response	13,79%	0,00%	2,63%	0,00%	7,14%	3,91%
undecided	17,24%	26,92%	0,00%	0,00%	0,00%	5,22%
Total(n=230)	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

⁹ The general results then might be influenced by the overrepresented group of students.

Table 6 shows the answers to the third question. As can be seen, almost no one has ever heard about the design of FCD, more than 90% of respondents have not got in touch with information about possible system. Even in medical circle, where at least some information could reasonably be expected, the knowledge is really poor. The results slightly differ only among students. As in the first question, this could be caused by higher access to the whole topic.

Table 6: The results of the third question according to occupation

Q: Have you heard about the way the system could possibly work?						
	Occupation					
Response	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
NO	96,55%	96,15%	91,45%	77,78%	92,86%	92,17%
YES	3,45%	3,85%	8,55%	22,22%	7,14%	7,83%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

We can say from the results in Table 7, which reflects the results of the fourth question, that respondents are divided in halves, but still there are slightly more people interested in getting more information.

Table 7: The results of the fourth question according to occupation

Q: Would you be interested in learning more about how it could work?						
	Occupation					
Response	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
NO	58,62%	42,31%	42,11%	33,33%	28,57%	43,04%
no response	0,00%	0,00%	0,66%	0,00%	0,00%	0,43%
YES	41,38%	57,69%	57,24%	66,67%	71,43%	56,52%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

To conclude this part, it can be said that people are mostly not appropriately informed about how the system might work, but there is a nontrivial interest in knowing more about the topic.

3.2.2. Evaluation of a kidney

The second part will be devoted to questions 5 and 6, which were aimed at the individu-

als' ability to evaluate their kidney. The purpose was to find out, whether the respondents are capable of thinking about any price at all or whether it is simply repulsive for them to set a price for a human organ. The answers to the question 5 are presented in Table 8. Almost 50% of all respondents are willing to give all they have to gain a kidney which cannot be interpreted as setting a price, as it is too abstract. But there is a clear difference between answers of VŠE students and those of medical staff, where 10.34% doctors and 11.54% of nurses would not give any reward to the donor, whereas only 1.97% of VŠE students would be equally unwilling to pay any remuneration. The difference in answers between these two groups of respondents is relatively strong also in other answers. Almost all VŠE students answered the question, whereas 10.34% of doctors and 11.54% of nurses gave no response and even more were undecided about the possible reward. These differences might be caused by the fact that VŠE students - as future economists - are more materialistic and they are used to evaluate variable things on everyday basis, unlike the rest of the population (Houdek, 2010; List, 2001). It is relevant to mention the answers of the patients, who are included in the category "others". As they answered, two of them even tried to buy a kidney, but unsuccessfully. The problem according to them was that the potential donors could not set the price for their kidney. Also a problem of finding a suitable donor was mentioned by one of them.

Table 8: The results of the fifth question according to occupation

Q: Suppose your health condition demands transplantation of a kidney. How much would you possibly be willing to give up in order to secure the surrogate kidney?						
	Occupation					
Amount of compensation	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
all they have	24,14%	30,77%	53,95%	66,67%	64,29%	48,70%
some compensation	10,34%	7,69%	19,08%	0,00%	14,29%	15,65%
large compensation	10,34%	3,85%	8,55%	11,11%	0,00%	7,83%
depends on circumstances	10,34%	0,00%	4,61%	0,00%	0,00%	4,35%
no reward	10,34%	11,54%	1,97%	11,11%	0,00%	4,35%
other response	0,00%	3,85%	2,63%	0,00%	0,00%	2,17%
no response	10,34%	11,54%	2,63%	0,00%	7,14%	4,78%
undecided	24,14%	30,77%	6,58%	11,11%	14,29%	12,17%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

Table 9 shows the answers to the question 6. The results were not as significant as in question 5. The two most frequent answers show, that the respondents are mostly willing

to donate just to relatives for free or they do not require a reward. An often mentioned reason why they do not want a reward was that if they decide to donate, it will be due to motivation other than money. Compared to previous question, the amount of compensation required is generally lower than the amount of compensation, which respondents are willing to give up for kidney.¹⁰

Table 9: The results of the sixth question according to occupation

Q: Suppose your health condition allows you to donate a kidney and help someone or even save his/her life. What would be the appropriate financial compensation for your donation of a kidney?						
	Occupation					
Amount of compensation	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	other (n=14)	Total (n=230)
only for relatives for free	17,24%	23,08%	20,39%	11,11%	28,57%	20,43%
some compensation	3,45%	3,85%	25,66%	22,22%	0,00%	18,70%
no reward	27,59%	42,31%	11,18%	0,00%	21,43%	16,96%
large compensation	17,24%	0,00%	13,81%	33,33%	7,14%	13,05%
no donation	0,00%	0,00%	10,53%	11,11%	35,71%	9,57%
depends on circumstances	3,45%	7,69%	4,61%	22,22%	0,00%	5,22%
no response	6,90%	3,85%	3,29%	0,00%	0,00%	3,48%
undecided	24,14%	19,23%	10,53%	0,00%	7,14%	12,61%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

To conclude, most of the respondents are basically not willing to sell their kidney and on the other hand they are prepared to give up everything they have to buy it. It can be said, according to the results, that the price is significantly higher than the average salary implying that for most people in need the organs would be unachievable even on free market.

3.2.3. Moral issues

In this chapter I will discuss questions 7 to 10. Respondents were asked about the morality of payment for various health-related services ranging from organs health care to services of the doctor. Table 10 shows the answers to question 7. As can be seen, 96% of group of VŠE students do not find financial reward for donors immoral. Similarly, considerable majority of students of other universities (78%) find the introduction of financial incentives for the donors not immoral. On the other hand, medical stuff - especially

¹⁰ This corresponds with the prevalence of “endowment effect” in the general public. For details see Kahneman, D., J. L. Knetsch, et al. (1990).

nurses - find the payment for the donors not particularly moral. Only 50% of nurses and 69% of doctors do not find it immoral, which is significantly different result compare to the group of students.

Table 10: The results of the seventh question according to occupation

Q: Do you think financial compensation for donors for their help is immoral?						
	Occupation					
Response	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
NO	68,97%	50,00%	71,43%	77,78%	96,05%	85,22%
no response	0,00%	0,00%	0,00%	0,00%	0,66%	0,43%
YES	31,03%	50,00%	28,57%	22,22%	3,29%	14,35%
Total	100%	100%	100%	100%	100%	100%

With respect to the gender differences in answers to the same question, it can be observed that more women than man find financial compensation for donors immoral. The possible reason behind this difference might be based on higher empathy in women in general (Croson, Gneezy, 2009), which might cause higher repulsiveness of the very idea of inducing social cooperation by financial incentives.

Table 11: The results of the seventh question according to gender

Q: Do you think financial compensation for donors for their help is immoral?			
	Gender		
Response	MEN (n=111)	WOMEN (n=119)	Total (n=230)
NO	90,99%	79,83%	85,22%
no response	0,90%	0,00%	0,43%
YES	8,11%	20,17%	14,35%
Total	100%	100%	100%

The answers to the eighth question on morality of other kind of donations (sperm and blood) are summarized in tables 12 and 13. Results in the group of VŠE students are almost equal as in previous question - 95% of students found no moral issue therewith. But there is a change in answers in the group of medical stuff. They mostly find paid-for-donorship of blood and sperm moral, although it is less invasive than organ donation and, therefore, less dangerous. One of the explanations is that paying for blood and sperm donation is common for quite a long time, but the reward for organ donors is currently illegal.

Table 12: The results of the eighth question according to occupation

Q: Do you think financial compensation for blood (semen) donation is immoral?						
	Occupation					
Response	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
NO	86,21%	65,38%	95,39%	88,89%	71,43%	89,13%
YES	13,79%	34,62%	4,61%	11,11%	28,57%	10,87%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

The results of the eighth question according to gender are quite similar to results from question 7 i.e. men seem to tolerate the idea of financial compensation for blood (sperm) donation more than women do.

Table 13: The results of the eighth question according to gender

Q: Do you think financial compensation for blood (semen) donation is immoral?			
	Gender		
Response	MEN (n=111)	WOMEN (n=119)	Total (n=230)
NO	95,50%	83,19%	89,13%
YES	4,50%	16,81%	10,87%
Total	100,00%	100,00%	100,00%

In the ninth question, there is reduction in number of VŠE students, who find it moral to pay for drugs. This result was found to be surprising especially in the context of their previous answers and their field of study.

Table 14: The results of the ninth question according to occupations

Q: Do you think the financial compensation for a drug manufacturer for his help is immoral?						
	Occupation					
Response	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
NO	72,41%	53,85%	88,82%	77,78%	64,29%	80,87%
no response	3,45%	3,85%	0,00%	0,00%	0,00%	0,87%
YES	24,14%	42,31%	11,18%	22,22%	35,71%	18,26%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

Also, as the results of the ninth question considering gender show, there is a decrease in tolerance for the payment to the drug manufacturers especially among men (in comparison to the previous answers).

Table 15: The results of the ninth question according to gender

Q: Do you think the financial compensation for a drug manufacturer for his help is immoral?			
	Gender		
Response	MEN (n=111)	WOMEN (n=119)	Total (n=230)
NO	83,78%	78,15%	80,87%
no response	0,90%	0,84%	0,87%
YES	15,32%	21,01%	18,26%
Total	100,00%	100,00%	100,00%

Last two tables in this part report results of the answers to question 10 on morality of payments for medical care. There is a massive increase in negative answers (not finding the payments immoral) among doctors, but there is no such an increase of negative answer among nurses. It might be caused by nurses being jealous on higher salaries of doctors. Answers of VŠE and other students were categorical - almost all respondents did not find compensating doctors for health care in general immoral. Surprisingly, however, the answers were more positive in case of FCD than in case of paying for the services of the doctor.

Table 16: The results of the tenth question according to occupation

Q: Do you think financial compensation for the doctors for their help is immoral?						
	Occupation					
Response	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
NO	93,10%	69,23%	92,76%	100,00%	71,43%	89,13%
no response	3,45%	3,85%	0,00%	0,00%	0,00%	0,87%
YES	3,45%	26,92%	7,24%	0,00%	28,57%	10,00%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

The results of the tenth question according to gender are quite similar to results of the first two questions in this part. Conculringly with the previous answers, it seems that women find paying for the medical services much more immoral in comparison to men. But the percentage of women not finding it immoral to pay in this case is the highest in set of these four questions.

Table 17: The results of the tenth question according to gender

Q:Do you think financial compensation for the doctors for their help is immoral?			
	Gender		
Response	MEN (n=111)	WOMEN (n=119)	Total (n=230)
NO	93,69%	84,87%	89,13%
no response	0,90%	0,84%	0,87%
YES	5,41%	14,29%	10,00%
Total	100,00%	100,00%	100,00%

It is notable, that drug manufacturing was seemed as the most immoral way¹¹ of earning money in the health care system, although the research and development branch in drug manufacture constitutes high costs. Also generally lower acceptance of the willingness to pay for health care among women is noticeable. As already noted above, the reason might stem from a generally higher degree of empathy in women as compared to men. It can be concluded that the repulsiveness to pay for organs in comparison with paying for other services is not dramatically higher (much more similar than one would expect).

3.2.4. Problems of legalization

The last part, which investigate the last four questions, should show which issues of the legalization of the FCD are the most frequent among respondents. Table 18 shows the results of question 11. In total, the most frequent answer was that there is no other problem than the moral aspects, but it is likely that some respondents just did not want to think about the answer - this answer being the easiest. Next three most frequent answers (legislation, lack of money in the system and danger of misuse) are in general somehow connected with the problem of legislation. The category “danger of misuse” also includes the problem of corruption,¹² which was the most frequent answer in this category. There is no such a strong difference in answers between doctors, nurses and students, who were quite different in opinions in previous parts.

11 Notably, people find the payments more immoral when they can not potentially become recipients of the payments themselves and vice versa - i.e. the lowest rates of moral disapproval were towards donating bloods, sperm and organs, however the highest disapproval appeared in cases where the people have to pay for the service on regular basis (for drugs) without being able to exclude such payments or become potential beneficent.

12 The group of answers categorized as „danger of misuse“ consist of more answers which can be included in this category. Corruption was the most frequent answer out of this group.

Table 18: The results of the eleventh question according to occupation

Q: Despite the moral aspects, do you think there are any other problems of this legalization?						
	Occupation					
Possible problems	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
no other problems	27,59%	38,46%	28,29%	33,33%	28,57%	29,57%
lack of money in the system	17,24%	3,85%	17,11%	11,11%	14,29%	15,22%
danger of misuse	13,79%	15,38%	7,89%	22,22%	28,57%	11,30%
legislation	13,79%	3,85%	11,84%	22,22%	7,14%	11,30%
danger of "unhealthy" donors	3,45%	3,85%	13,16%	0,00%	7,14%	10,00%
danger of black market	3,45%	11,54%	9,21%	0,00%	0,00%	7,83%
ethics	3,45%	0,00%	3,95%	0,00%	0,00%	3,04%
no response	17,24%	23,08%	8,55%	11,11%	14,29%	11,74%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

Next table (Table 19) reflect the results of the question 12 according to occupation. As it is evident from the table, respondents find it quite possible, that financial compensation could help solve problem with the lack of organs, for the percentage of positive answers is distinctively higher. Nevertheless, a notable difference between doctors and students can be observed. While 90.79% of VŠE students find it quite possible that financial compensation will help, only 62.07% of doctors and 61.54% of nurses are of the same opinion. Why the answers are so different in these groups on this question is not really evident from the survey.

Table 19: The results of twelfth question according to occupation

Q: Do you think that legalization of financial compensation for donors could help to solve the problem with the lack of organs?						
	Occupation					
Response	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
NO	31,03%	38,46%	7,89%	22,22%	21,43%	15,65%
no response	6,90%	0,00%	1,32%	0,00%	0,00%	1,74%
YES	62,07%	61,54%	90,79%	77,78%	78,57%	82,61%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

Table 20 reflects results of the thirteenth question according to occupation. Most of the respondents did not answer the question or they could not think of any other positive

effects. Again, it can be caused by respondents being lazy to answer this question. Next most frequent answers were elimination of the black market¹³, which was mentioned especially by VŠE students, more donors (which is basically reduction in human organ deficit) and more saved lives.

Table 20: The results of the thirteenth question according to occupation

Q: Can you think of any other benefits of this legalization?						
	Occupation					
Other positives of the legalization	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	other (n=14)	Total (n=230)
none	44,83%	46,15%	15,79%	33,33%	21,43%	23,91%
more donors	3,45%	15,38%	9,87%	11,11%	0,00%	9,13%
elimination of black market	0,00%	0,00%	11,84%	11,11%	7,14%	8,70%
more saved lives	0,00%	7,69%	5,92%	11,11%	28,57%	6,96%
solution of poor financial situation of donor	0,00%	0,00%	5,92%	11,11%	0,00%	4,35%
compensation for complication	0,00%	0,00%	4,61%	0,00%	0,00%	3,04%
market advantages	0,00%	0,00%	4,61%	0,00%	0,00%	3,04%
more money for research	0,00%	0,00%	3,29%	0,00%	0,00%	2,17%
more informations	0,00%	0,00%	1,97%	0,00%	7,14%	1,74%
new jobs	0,00%	0,00%	0,66%	0,00%	0,00%	0,43%
transparent market	3,45%	0,00%	0,00%	0,00%	0,00%	0,43%
no response	48,28%	30,77%	35,53%	22,22%	35,71%	36,09%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

Last question inquires if the respondents would vote for or against legalization in case of a referendum on this issue. Table 21 shows the results according to occupation. While there is almost a equal split in the answers among doctors, there is strong majority of positive answers in the group of VŠE students. Influence of studying economics, which currently brings free market as the best solution of any shortage (particularly at the faculty of Economics and Public Administration where the most respondents were recruited from), might be the reason of this difference.

¹³ Surprisingly, black market was also mentioned as a disadvantage of the legalization especially by medical stuff, while no one from this group mentioned it as advantage. (See Table 19)

Table 21: The results of the fourteenth question according to occupation

Q: If there was a referendum about this legalization, what would your vote be?						
	Occupation					
Response	doctor (n=29)	nurse (n=26)	VŠE (n=152)	other universities (n=9)	others (n=14)	Total (n=230)
AGAINST	48,28%	65,38%	9,21%	33,33%	42,86%	23,48%
FOR	51,72%	34,62%	90,79%	66,67%	57,14%	76,52%
Total	100,00%	100,00%	100,00%	100,00%	100,00%	100,00%

Table 22 shows the results of the same question according to age. Again, an equal split can be found in the groups of 27-49 year olds and 50 or more year olds. There is an obvious difference of less-than-26-year-olds and the other groups. One of the reasons might be found in the ability of young people to be more open to new topics than older respondents.

Table 22: The results of the fourteenth question according to age

Q: If there was a referendum about this legalization, what would your vote be?				
	Age			
Response	<= 26 ys (n=169)	27-49 ys (n=43)	>= 50 ys (n=18)	Total (n=230)
AGAINST	13,02%	51,16%	55,56%	23,48%
FOR	86,98%	48,84%	44,44%	76,52%
Total	100,00%	100,00%	100,00%	100,00%

Last Table 23 shows the results according to gender of the respondents. More men than women are for the idea, while men take higher risks, unlike women which are considered to be more conservative (Byrnes, Miller, Schaffer 1999). Empathy might also play the role as well.

Table 23: The results of the fourteenth question according to sex

Q: If there was a referendum about this legalization, what would your vote be?			
	Gender		
Response	MEN (n=111)	WOMEN (n=119)	Total (n=230)
AGAINST	17,12%	29,41%	23,48%
FOR	82,88%	70,59%	76,52%
Total	100,00%	100,00%	100,00%

To conclude, there is not such a strong diversity of opinions between groups of VŠE

students and medical staff as it was usual in previous parts. There was also no evidence of general repulsiveness to the topic and in the end more respondents vote for legalization than against. The results might have been influenced by overrepresented group of students, but even if the groups are studied separately, positive answers are more frequent than negative answers. Moreover, the opinion that the financial incentives would help solve the problem with lack of organs was predominant.

Conclusion

The ambitions were to find out, what are the roots of the aversion to FCD. As the survey aimed at four target groups (medical professionals, students, patients and donors) shows, most of the respondents found the problems of FCD mostly in legislation, especially the problem “how the market will be managed” was highlighted. Accordingly, it seems, that the moral issues are not the main cause of the aversion and, therefore, it can be said, that the aversion is more likely caused by lack of information about the general idea of FCD. Notably, the tested groups should have had more information about the introductions and impact of FCD than the rest of the population (as most of the respondents were highly educated, moreover, in the fields of medicine and economics), nevertheless, their knowledge was considerably poor. Despite the lack of knowledge, most of the respondents were quite positive to the idea of FCD.

The research also shows another interesting fact. A high diversity of opinions among respondents from the medical practice and students, who were mostly represented by VŠE students, was revealed - it might be an inspiration for future researches to find more about the exact reasons of this opinion heterogeneity.

Unfortunately two target groups (patients and donors) were not appropriately present in the sample, as it was difficult to reach these groups and it can also be an inspiration for other research, as their opinions on this topic might be valuable to know.

As the reason of aversion to legalization of financial compensation for donors seems to be caused especially by respondents being uninformed, it might be considered to provide the relevant information to the public, or at least professionals. Also, it seems that economic enlightenment in general make cause higher understanding of the benefits of the markets.

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