GENDER EQUALITY IN DEFINING, SELECTING AND APPROACHING THE AUDIENCE OF THE MILITARY HIGHER EDUCATION INSTITUTIONS

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Abstract: The conceptual definition of the gender equality, regarded as a reference for sustainable development, describes it as a contemporary phenomenon with implications in all the areas of social life. The military education system is a part of the national education system and it has always been a distinctive segment, differently approached. The military environment – rigid, inflexible and oriented exclusively to men since ancient times, has however created, in the past few years, opportunities for the professional development of women, which have proven capacities of adaptability related to all the specific fields.

The paper considers primarily the evolution of gender equality in secondary education, at national level and within the segment of military education, regarded as selection basis for the higher education.

Although an overall decrease in the total number of students has registered in the last five years, the weight of the female segment recorded an increasing dynamics, superior to that of the male segment in the field of higher education, similar to the European dynamics.

Although most of them choose education areas such as transport, engineering, information technology, physical training, administration, medicine, female military students also consider rather or exclusively male specialties such as tanks, aviation, navy.

Based on the principle of ensuring gender equality between men and women, the military higher education institutions provide career opportunities for female graduates, which may advance through entire military hierarchy.

Keywords: marketing, audience, gender equality, military, higher education

Introduction

Gender equality is a controversial concept of modern society, with implications in all areas of social life, with the aim of eliminating patriarchal domination (Rădoi, 2010).

Education best illustrates gender roles in a society at a given time, and the various strategies and social and political approaches regarding their transformation, of changing opportunities and people's lives, not only from a gender perspective but from a class, ethnical and racial perspective, being necessarily correlated to economical, social, political factors, establishing a foreground on which are deployed not only conservative forces, but also social change forces (Văcărescu 2013).

During the development of human society there have been identified different approaches to education regarding the gender of the participants. Thus, we speak of the girls' education, boys' education and common education for both sexes.

Access to education, content of education, forms of organization and education programs have met various trends over time depending on gender (Balica et al, 2004).

In the past, access to education was provided, primarily, for children of noble children, but also for those from poor backgrounds. Educational offer, structure, length of study and the

subjects were different intheschools for girls from those for boys, especially in secondary education. There were common study disciplines, namely: native language, arithmetic, history, geography, ethics, religion etc., boys' education including technology, politics, mathematics, while girls' education emphasized disciplines such as literature, foreign languages, and practical activities like tailoring, painting, music and dance.

In education in Romania, the Education Law of 2011 reiterates the right to education without any sort of discrimination, including the gender equality criteria.

Military education system has always been a distinct segment with different approaches, the military area is rigid and inflexible to change, dedicated exclusively to men, however, still it created a niche for women's participation in this area, which attest to the past years adaptability in all specialties targets but also results, sometimes at a higher level.

Literature review

Education should be seen as an important tool for ensuring the equality of women and men. Gender equality refers to equally valorization of the aspirations, needs and behaviors of men and women (Ionaş, 2013).

The demand for the educational products and services offered by educational institutions is the total volume of educational product/services for wich a given group of customers makes an option, potential consumers of these services, in a specified geographical space, during a specified time interval, in a marketing environment and in terms of a marketing program being developed by these institutions (Kotler, 2005, p.187).

Given the marketing vision of some authors (Grigoruț et al., 2011, p.39), it can be said that the educational services market encompasses a whole educational components that ensures the satisfaction of consumer needs, interests, desires, individually or collectively search apart from supply and demand, educational market assuming the existence of at least two basic elements, namely price and competition, plus the relevant regulations, traditions and prejudices.

Women's access to education was one of the first goals of the feminist movement. The men were privileged in education, and women in a lesser or greater extent, depending on the area and time, excluded from education and training efforts. Before the introduction of mass public education, most men and most women lacked access to education, which was reserved for elite groups, but even among those groups who had access to education, men predominated (Văcărescu, 2013).

The factors that increased the number of women among military personnel are multiple. First, restrictions on women's access to the positions in combat units were removed gradually, and today, women can easily access all work stations, mostly those working in logistics and support units (El Korchi, 2013).

The increase of the military women percentage represents a complex process which characterizes the evolution of the world's democratic states' national armies since 1990; to succeed in a military career, women must, necessarily, completely integrate in the military institution. A simple adaptation of women to the military environment is not enough for acceding to superior positions in the army (Duţu, 2007).

Methodological notes

In order to achieve the gender research in defining, selecting and approaching the audience of the military higher education institutions there has been used the data on the share of women from the total number of students in these institutions, the development of Romania's female population segment in the total of population included in high schools, in higher education institutions, as well as data on indicators of economic, technological and cultural development. The pieces of information were collected for a period of five years from the database of the Tempo National Institute of Statistics, from the websites of military education institutions, and for their analysis there have been computed the coefficients of correlation and determination in order to establish the intensity and direction of the relationship between variables.

This research approach aims, through the use of secondary data, to provide relevant results for the following objectives:

- Identifying links between the share of female students in military higher education system and the demographic, economic, technological, cultural, political variables;

- Evaluating the relationships between these variables.

Main findings of the research

It was not until the late nineteenth century that the women were granted the chance to get educated, meeting the requirements of the Romanian society at that time, establishing the primary schools in urban and rural areas and secondary schools on two levels (Sandu, 2006). Around this time, girls had the opportunity to study in higher education, the statistics mentioned the first women licensed at various universities in Europe. By 1900, the number of women who attended university has grown steadily at the University of Bucharest, during 1901-1905 female students represented 7.4%, during 1906-1910 the percentage rose to 9.6% during 1911-1915 they represented 15% from the total number of students (Văcărescu, 2013).

The education laws after 1918, promoted common education at all levels of study, negating gender differences in terms of structures and training contents. Free and compulsory, equal access to education and homogenization study programs between residence and gender has emerged into the organizing principles of the national education system.

Since 1944, normative documents on education primarily promoted equal access to education, focusing on positive policies for underprivileged groups.

In Romania's XXI century, as shown in the reports about the state of the national education system for the years 2006 and 2013, drawn up by the Ministry of Education and Research, the gross enrollment rate in all levels of education has progressed continuously during 2000-2009, both girls and boys, increasing from 68.9% to 86.5%. In the following period, until 2013, evolution is downward for gender's both segments.

Period	2000	2001	2002	2005	2006	2007	2008	2009	2010	2011	2012	2013
Total	68.9	70.6	72.9	74.43	76.66	81.1	85.9	86.5	84.1	80.4	79.6	79.4
Male	67.7	69.2	71.32	72.61	74.58	78.5	83.2	84	82	79	78.3	78
Female	70.2	72.1	74.55	76.34	78.85	83.8	88.7	89.1	86.4	82	80.9	81

 Table 1. The rate of enrollment in education in Romania, at all levels of education, between 2000 - 2013

Source: National Institute of Statistics

According to the table, the upward trend is concerning the female population, differences by gender, favor maintaining the female population, throughout the reference period.

Worldwide, considering the size of the armies, women are best represented in the US Army and Canada, where they hold a 14% and 11.4% respectively. In 2001, 8.6% of the number of deployed US soldiers represented women and 11,200 women participated in NATO peacekeeping missions in different conflict zones. In Europe, in 2010, the highest share of women in the military area is registered in France, 15.15%, following UK with 9.7% and Germany 9.1% (Eulriet, 2012, p.111). In 2012, the highest number is in Hungary, with a share of 20% of women in the military, Slovenia 15.4%, and Romania recorded only 4.6% (Obradovic, 2012, p.53)

In Romania, the presence of women in the military area has been registered since 1973 when the first class of women officers graduated. They had a training period of only sixth months. In the period 1983-1989, military educational institutions and girls are admitted to pursue degree programs lasting three years for officers, warrant officer's two years respectively, in specialties such logistics, finance and accounting. Proving that they can perform activities in the fields where men predominated, in 1989 the first class of military women pilots graduated. After 1989, following a period of male domination in the area and since 2001, at the selection for admission to military educational institutionsfemale candidates are allowed. The number of candidates and the number of those admitted is increasing, both in number and percentage.

By their educational offer, military institutions of higher education meet the needs and desires of the consumers of educational services, young people aged up to 24 years, both girls and boys promoting the image of military higher education locally, nationally and internationally, through mass-media (TV, radio, written press) and online environment. For 2015-2016 academic year, the education offer of the military system of higher education at bachelor level, comprising 1436 seats, of which 59 places for girls. The number is not final because the Military Medical Institute, other beneficiaries of the defense, public order and national security system and also education with tuition fees do not have separate places for candidates. At the admission exam candidates of both sexes can participate without discrimination, their tie being made just in descending order of their school results.

Admission of students in military higher education institutions is done transparently, giving equal opportunities to all candidates, having regard, exclusively, the competences of the candidates and without any discriminatory criteria, the only restrictions being those additional imposed as selection conditions, namely: a good health, a good physical condition and mental ability specific to the military system.

Military academies prepare young officers and specialists, boys and girls, to work directly in the structures of the Ministry of National Defense or other institutions, users of such human resources (Paile, 2010, p.13).

To analyze the determinant factors of gender equality in the military education system were calculated correlation coefficients, setting the size of the modification of the first variable, the share of girls in total military students, due to changes other.

Table 2. Relations between the share of girls in the total number of students of the military higher education institutions and demographic, economic, technological, cultural, political factors

Variable	2009	2010	2011	2012	2013	Correlation coefficient r	Coefficient of determination r ²
The share of girls in total number of students from military higher education institutions (dependent variable)	18.1	21.1	18.4	16.6	13.3		
Romania's population	20,440,290	20,294,683	20,199,059	20,095,996	20,020,074	0.71	0.50
Romania's population (women)	10,488,417	10,414,274	10,366,110	10,318,889	10,258,594	0.74	0.54
The share of women in the total population	51.31	51.32	51.32	51.35	51.24	0.65	0.42
The share of urban population in the total population	53.87	53.92	53.97	54.01	53.90	0.03	0.001
Romania's population aged 15-19	1,152,868	1,128,738	1,111,526	1,102,118	1,091,355	0.65	0.43
The share of girls in total population aged 15-19	48.70	48.66	48.67	48.78	48.79	-0.89	0.79
High school population	837,728	866,543	888,768	831,810	776,616	0.85	0.73
The share of girls from total high school population	50.07	49.06	48.67	49.00	49.61	-0.32	0.10
Higher education population	775,319	673,001	539,852	464,592	433,234	0.69	0.47
The share of girls from total higher education population	55.28	54.4	53.14	52.77	52.93	0.64	0.41
Number of graduates of military colleges	318	280	273	272	342	-0.66	0.44
Total admissions places military higher education institutions	694	542	496	264	319	0.62	0.39
GDP	524,388.70	510,522.80	533,881.10	565,097.20	596,681.50	-0.96	0.93
GDP per capita	25,065.60	26,368.70	28,047.80	29,744.60	31,901.80	-0.83	0.68
Average income	2,315.99	2,304.28	2,417.26	2,475.04	2,559.05	-0.91	0.82

Relations between the share of girls in the total number of students of the military higher education institutions and demographic, economic, technological, cultural, political factors

Variable	2009	2010	2011	2012	2013	Correlation coefficient r	Coefficient of determination r ²
The share of expenditures for education	5.76	4.20	3.97	3.82	3.51	0.39	0.16
The share of expenditures for defence	4.56	3.83	4.05	3.98	4.51	-0.63	0.39
Number of discrimination cases	528	478	465	548	858	-0.89	0.79
Mobile traffic minutes (mil.)	5132	5431	5540	5849	6492	-0.83	0.69
Internet access traffic minutes (mil.)	42	14	4	2	1	0.37	0.14

Source: National Institute of Statistics, Ministry of National Defence

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and Romania's population has generated a correlation coefficient of 0.71; its corresponding coefficient of determination has the value of 0.50. These results show the existence of a direct link between the two variables. Given the coefficient of determination, the evolution of Romania's population tends to influence by 50% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and Romania's female population has generated a correlation coefficient of 0.74; its corresponding coefficient of determination has the value of 0.54. These results show the existence of a direct link between the two variables. Given the coefficient of determination, the evolution of Romania's female population tends to influence by 54% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the share of females from Romania's population has generated a correlation coefficient of 0.65; its corresponding coefficient of determination has the value of 0.42. These results show the existence of a direct link between the two variables. Given the coefficient of determination, the evolution of the female population share from Romania's population tends to influence by 42% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the share of urban population from Romania's population has generated a correlation coefficient of 0.03; its corresponding coefficient of determination has the value of 0.001. These results show the existence of a

direct link between the two variables. Given the coefficient of determination, the evolution of the urban population share has no influence over the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and Romania's population aged 15 - 19 has generated a correlation coefficient of 0.65; its corresponding coefficient of determination has the value of 0.43. These results show the existence of a direct link of medium intensity between the two variables. Given the coefficient of determination, the evolution of Romania's population aged 15 - 19 tends to influence by 43% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the share of girls from Romania's population aged 15 - 19 has generated a correlation coefficient of -0.89; its corresponding coefficient of determination has the value of 0.79. These results show the existence of a direct link between the two variables. Given the coefficient of determination, the evolution of the girls' share from Romania's population aged 15 - 19 tends to influence by 79% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and Romania's high school population has generated a correlation coefficient of 0.85; its corresponding coefficient of determination has the value of 0.73. These results show the existence of a direct link between the two variables. Given the coefficient of determination, the evolution of Romania's high school population tends to influence by 73% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the share of girls from Romania's high school population has generated a correlation coefficient of -0.32; its corresponding coefficient of determination has the value of 0.10. These results show the existence of a reverse, low intensity link between the two variables. Given the coefficient of determination, the evolution of the share of girls from Romania's high school population tends to influence by 10% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and Romania's higher education population has generated a correlation coefficient of 0.69; its corresponding coefficient of determination has the value of 0.47. These results show the existence of a direct link between the two variables. Given the coefficient of determination, the evolution of Romania's higher education population tends to influence by 47% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the share of girls from Romania's higher education population has generated a correlation coefficient of 0.64; its corresponding coefficient of determination has the value of 0.41. These results show the existence of a direct

link between the two variables. Given the coefficient of determination, the evolution of the share of girls from Romania's higher education population tends to influence by 41% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the number of graduates from military colleges has generated a correlation coefficient of -0.66; its corresponding coefficient of determination has the value of 0.44. These results show the existence of a reverse, medium intensity link between the two variables. Given the coefficient of determination, the evolution of the number of graduates from military colleges tends to influence by 44% the share of female students in the entire number of students from military higher education institutions. The result of measuring the association between the two variables leads to the following conclusion: in conditions of an increasing number of military colleges graduates, the number of female students in higher military education institutions would decrease.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and number of admission places in these institutions has generated a correlation coefficient of 0.62; its corresponding coefficient of determination has the value of 0.39. These results show the existence of a direct, medium intensity link between the two variables. Given the coefficient of determination, the evolution of educational offer tends to influence by 39% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and GDP has generated a correlation coefficient of -0.96; its corresponding coefficient of determination has the value of 0.93. These results show the existence of a reverse, very intense link between the two variables. Given the coefficient of determination, the evolution of GDP tends to influence by 93% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and GDP per capita has generated a correlation coefficient of -0.83; its corresponding coefficient of determination has the value of 0.68. These results show the existence of a reverse, very intense link between the two variables. Given the coefficient of determination, the evolution of GDP per capita tends to influence by 68% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the average income has generated a correlation coefficient of -0.91; its corresponding coefficient of determination has the value of 0.82. These results show the existence of a reverse, very intense link between the two variables. Given the coefficient of determination, the evolution of the average income tends to influence by 82% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the share of expenditure on education has generated a correlation coefficient of 0.39; its corresponding coefficient of determination has the value of 0.16. These results show the existence of a direct, low intensity link between the two variables. Given the coefficient of determination, the evolution of the expenditure on education tends to influence by 16% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the expenditure on defence has generated a correlation coefficient of -0.63; its corresponding coefficient of determination has the value of 0.39. These results show the existence of a reverse medium intensity link between the two variables. Given the coefficient of determination, the evolution of the expenditure on defence tends to influence by 39% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and the number of discrimination cases has generated a correlation coefficient of -0.89; its corresponding coefficient of determination has the value of 0.79. These results show the existence of a reverse, very intense link between the two variables. Given the coefficient of determination, the number of discrimination cases tends to influence by 79% the share of female students in the entire number of students from military higher education institutions.

The correlation between the share of girls from the entire number of students from the military higher education institutions and mobile traffic recorded was established by calculating a correlation coefficient of -0.83; its corresponding coefficient of determination has the value of 0.69. These results show the existence of a reverse, very intense link between the two variables. Given the coefficient of determination, the evolution of mobile traffic recorded tends to influence by 69% the share of female students in the entire number of students from military higher education institutions.

The evaluation of the association between the share of girls in the entire number of students from the military higher education institutions and internet traffic recorded at national level has generated a correlation coefficient of 0.37; its corresponding coefficient of determination has the value of 0.14. These results show the existence of a direct, low intensity link between the two variables. Given the coefficient of determination, the evolution of internet traffic recorded at national level tends to influence by 14% the share of female students in the entire number of students from military higher education institutions.

Conclusions

The analysis of associations between the determining factors of gender equality in the military education system shows that the evolution of the female segment in Romania's population, the share of girls in high school, the evolution of GDP, of household incomes, the evolution of discrimination cases and technological development, have a significant influence over the share of girls in the military higher education institutions.

The outcome of the evaluation of the association between the dependent variable and GDP leads to the conclusion that an increase in GDP per capita is expected to determine the development of all sectors of the economy and society as a whole, including education, reflected in the increase in places offered by higher education institutions and a more consistent presence of women in the total number of students.

Although the results of the analysis confirm that the women segment is a niche one in the higher military education system, gender equality is ensured by the absence of restrictions in the professional activity, in promoting fair and balanced participation of women and men in the selection for management and execution positions by respecting the criteria of competence.

Although predominantly female military students opt for training domains such as transport, engineering, information, physical training, administration, medicine, some choose to enroll for predominantly or even exclusively male specialties such as: tanks, aviation, navy. It is known that the military higher education institutions provide female graduates, a lot of career opportunities, allowing them to advance through the entire military hierarchy.

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REFERENCES:

 Duţu, P., 2007, Perspective în evoluția armatelor naționale, Editura Universității Naționale de Apărare "Carol I" Bucureşti, <u>http://cssas.unap.ro/ro/pdf_studii/perspective_in_evolutia_an.pdf</u> accessed March 03, 2015.
 El Korchi, S., 2013, Quelle place pour les femmes dans la défense nationale ? <u>http://www.womenology.fr/culture-feminine/quelle-place-pour-les-femmes-dans-la-defense-nationale</u>/ accessed March 14, 2015.

3. Eulriet, I., 2012, Women and the military in Europe: Comparing public cultures, Palgrave Macmillan Publishers Limited,

https://books.google.ro/books?id=27WGz4m55FcC&printsec=frontcover&dq=Eulriet&hl=ro &sa=X&ei=St9NVbWiOKX6ywO054HYCg&redir_esc=y#v=onepage&q=Eulriet&f=false, accessed May 08, 2015.

4. Grigoruț, C., Ploae, V., Zăgan, R., Zaharia, R., Micu, A., 2011, Marketing universitar (Ediție online, 2011); <u>http://uefiscdi.gov.ro/Upload/60d56441-0ff7-4bf1-9a6b-aebecb2f1646.pdf</u> accessed April 12, 2015.

5. Ionaș, M., 2013, Politici educaționale de integrare europeană. Dimensiunea de gen în educație, <u>http://www.asociatia-profesorilor.ro/politici-educationale-de-integrare-europeana-dimensiunea-de-gen-in-educatie.html</u>, accessed May 07, 2015.

6. Kotler, Ph., 2005, Managementul marketingului, Editura Teora, București.

7. Obradovic, L., 2012, Gender integration in NATO military forces: Cross-national analysis, Ashgate Publishing Limited, <u>https://books.google.ro/books?id=93-</u> rBAAAQBAJ&printsec=frontcover&dq=Obradovic&hl=ro&sa=X&ei=B- <u>INVdj4LIHMygPXnIHgBw&redir_esc=y#v=onepage&q=Obradovic&f=false</u> accessed May 07, 2015.

8. Paile, S., 2010, The European Military Higher Education Stocktaking Report, <u>http://www.miles.ac.at/download/IntOffice/pdf/2010_05_PaileStocktakingReport.pdf</u>, accessed April 04, 2015.

9. Rădoi, C., 2010, Egalitate de gen în instituțiile militare din România, Revista Sfera Politicii nr.154, <u>http://www.sferapoliticii.ro/sfera/154/art12-Radoi.php</u>, accessed April 10, 2015.

10. Sandu, O., 2006, Educația feminină în societatea româneasca a secolului XIX, http://www.miculparis.ro/newsletter/issues/2006-septembrie/educatia_feminina.html,

accessed May 07, 2015.

11. Văcărescu, T., E., 2013, Contexte de gen. Educația femeilor din România între anii 1880 și 1930, articol publicat în Revista Sfera Politicii nr.175

http://www.sferapoliticii.ro/sfera/175/art02-Vacarescu.php accessed April 02, 2015.

12. Raport asupra stării sistemului național de învățământ, <u>http://www.edu.ro/index.php/articles/10913</u> accessed May 05, 2015.

13. ***, 2009, Proiecția principalilor indicatori macroeconomici până în anul 2020, <u>http://www.cnp.ro/user/repository/prognoza pe_termen_lung_2020_primavara.pdf</u>, accessed May 07, 2015.

14.Raportul de activitate al Consiliului Național pentru Combaterea Discriminării pe anul 2013, <u>http://www.cncd.org.ro/noutati/Evenimente/Raportul-de-activitate-al-CNCD-pe-anul-2013-204/</u> accessed May 05, 2015.

15. ***, 20 evoluții importante, 2013,

http://gov.ro/fisiere/stiri fisiere/GUV evolutii importante in economie.pdf accessed May 07, 2015.

16. <u>http://dmru.mapn.ro/index.php?pag=recrutare</u> accessed May 08, 2015.

17. <u>http://dmru.mapn.ro/index.php?pag=invatamant</u> accessed May 08, 2015.