Study case on navy cadets’ crew profile in regard of diversity management onboard training ships

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STUDY CASE ON NAVY CADETS’ CREW PROFILE IN REGARD OF DIVERSITY MANAGEMENT ONBOARD TRAINING SHIPS

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Abstract: The diversity management and the gender issue specifically, have become important variables of the crew management performance onboard the ship, including in Navy structures. The present study is focused on determining the influence of gender issue against the crew climate and performance onboard Navy ship, applied on cadetship programmes. The authors have developed a specific questionnaire within MENTORESS program (financed by Erasmus+, KA2 action), in joint with the project partners from Piri Reis University, Polish Naval Academy and Bulgarian Naval Academy. Consequently, the questionnaire has been applied on Mircea cel Batran Naval Academy’s cadets (3rd and 4th year of study), alongside the training voyages onboard Navy ships. The results were collected and processed accordingly, several conclusions being drawn in regard of cadets’ perceptions related to gender issue. The major scope was to seek particular reflections on gender issue, in order to determine curriculum gaps and further improvement in education programs for military students in regard of diversity management and leadership adjustment.

1. The research importance and relevance

The diversity management and the gender issue specifically, have become ones of the most important variables of the crew management performance onboard the ship, including in regard of the Navy organizational structures, the organizational climate being an imperative condition for mission fulfillment under effectiveness and efficiency. Mainly, the success of the carried Navy military mission become significantly focused on the crew management, all of other psychosocial variables being considered subordinated, including here the inventory of individual factors (i.e. the inter-individual differences on gender) and situational factors (i.e. onboard working conditions, environmental risk, cultural diversity) that would affect behavioural adjustment and its effectiveness. In this context, the organizational climate is conceived like the sum of individual perceptions, as important part of the organizational culture, the cadets’ attitude being expressive and the most relevant in counting the group values extension throughout the time.
2. Study case hypothesis
The investigated dimensions are dependent on the context and culture of the military organization in the naval field and were expressed by polarized, dichotomous tendencies, describing typologies specific to the characteristics of the analysed collectively from which they were extracted.

The psycho-social processes are consistently relevant in the respective adjustment and organizational integration and further determine in the Navy crew management context the next dynamic processes:
→ the effective adaptation of the crew members to the specific conditions of the strategic and operational onboard missions within multicultural, multinational, interdisciplinary and diversity embedded environment;
→ the effective leadership onboard, consistent with the requirements of the stated objectives of the seagoing missions.

In this context, the socio-professional climate analysis survey applied by the authors, has been conceived as a tool for organizational diagnosis focused on collective perceptions and spotting the contextual manifestations of the “personality” of an organization. The survey sought to capture the dynamics of interpersonal perceptions of gender differences in the form of suggestions, future anticipations, possible solutions or development opportunities. The organizational climate analysis procedures intensively focused on gender diversity management in the specific working conditions of Navy structures are concerning the general work attitude, the questions pursuing to express personal attitudes towards work aspects in terms of preferences, habits and in the context of a gender-based mixed working group.

3. Research methodology
3.1. Questionnaire structure
The applied questionnaire has been built on the theoretical ground defined by the following variables:
• socio-affective dimension;
• cognitive- axiological (normative) dimension;
• instrumental - executive dimension;
• diversity management on gender issue dimension.

By collecting a large number of similar responses around these variables, as used to express and to assess the socio-professional climate analysis, the conclusions gain value for objectivity and their identification creates favourable premises for control and improvement by the commanding structures of the military organization.

3.1.1. The social-affective dimension
On theoretical level, this vector coagulates variables on sympathetic relationships generated by gender differences, affective leader acceptance, affective adherence of group members, the defined items being reflected in table no. 1.

<table>
<thead>
<tr>
<th>Question</th>
<th>No.</th>
<th>Validated answers</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Social-affective dimension</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female Navy personnel’s relations with the supervisors/senior staff are efficient and effective.</td>
<td>1</td>
<td>Agree</td>
</tr>
<tr>
<td>Female Navy personnel’s relations with the peer staff onboard are efficient and effective.</td>
<td>2</td>
<td></td>
</tr>
</tbody>
</table>
Female Navy personnel’s relations with the junior staff/subordinates are efficient and effective. 3
The crew members on board Navy ships are friendly and they help female crew doing difficult jobs. 4
If the Navy female crew members behave like a man they will be accepted easily. 5
The female crew members feel lonely and helpless onboard the ship. 6
Communication among the Navy crew members is effective. 7

3.1.2. The cognitive-axiological (normative) dimension
This dimension is structuring within the concept, the variables on values and norms shared by group members due to gender differences, the level of interpersonal knowledge, the similarity of opinions, beliefs, anticipations, rumours, based on the items defined in table no. 2.

<table>
<thead>
<tr>
<th>Question</th>
<th>No.</th>
<th>Validated answers</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Agree</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Not agree</td>
</tr>
<tr>
<td>4. Cognitive (normative)-axiologic dimension</td>
<td></td>
<td></td>
</tr>
<tr>
<td>There is an atmosphere on board the ship where everybody can express his/her opinion freely.</td>
<td>8</td>
<td></td>
</tr>
<tr>
<td>Personnel with different opinions and considerations on various topics are valued.</td>
<td>9</td>
<td></td>
</tr>
<tr>
<td>Women act pursuing a role model.</td>
<td>10</td>
<td></td>
</tr>
<tr>
<td>Women in Navy are likely to experience some form of sexual harassment</td>
<td>11</td>
<td></td>
</tr>
<tr>
<td>It is hard for women to find higher appointments on board Navy ships because the commanding staff is biased against women military.</td>
<td>12</td>
<td></td>
</tr>
<tr>
<td>Working onboard a Navy ship is more challenging than most female crew members thought it would be.</td>
<td>13</td>
<td></td>
</tr>
<tr>
<td>The decisions and ideas of female Navy staff are continuously criticized and questioned by the male colleagues and superiors.</td>
<td>14</td>
<td></td>
</tr>
</tbody>
</table>

3.1.3. Instrumental-executive dimension
The nominated concept includes variables that express the specificity of functional working relationships among the group members as result of gender differences, professional personal affirmation, leadership style and formal leader competence, rigor in the application of regulations, professional performance in carrying out work tasks, based on the items described in table no.3.

<table>
<thead>
<tr>
<th>Question</th>
<th>No.</th>
<th>Validated answers</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Agree</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Not agree</td>
</tr>
<tr>
<td>4. Instrumental-executive dimension</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Working onboard Navy ships, in a multi-cultural environment, makes the female crew members anxious in regard of the task and objective content.</td>
<td>15</td>
<td></td>
</tr>
<tr>
<td>The commanding staff use to encourage women cadets to assume and to carry similar tasks at sea as male military, stating similar objectives to perform.</td>
<td>16</td>
<td></td>
</tr>
</tbody>
</table>
When a military woman succeeds in her carrier, male staff will be jealous of her. 17
The successful achievements of a military female are usually ignored. 18
When a female crew member makes a mistake, the feedback and reaction are exaggerated. 18
The female military are less rewarded even if perform the same task as men 20
The male colleagues believe that the presence of military females onboard Navy ship will cause a trouble there. 21
Women military in Navy, serving at sea have less chances to be promoted to higher positions than male officers. 22

### 3.1.4. Diversity management on gender issue dimension

Built around variables that measure prejudices, stereotypes, gender discrimination asymmetries, emerging values and norms of the military organization, respect for otherness, principality, traditions and organizational customs as presented for the items in the table no.4.

<table>
<thead>
<tr>
<th>Question</th>
<th>No.</th>
<th>Validated answers</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Agree</td>
</tr>
<tr>
<td>4. Diversity management on gender issue dimension</td>
<td></td>
<td></td>
</tr>
<tr>
<td>The military staff onboard Navy ships is not prejudiced against individual differences (such as gender, race and religion).</td>
<td>23</td>
<td></td>
</tr>
<tr>
<td>Individual diversity is appreciated and used in solving out the problems.</td>
<td>24</td>
<td></td>
</tr>
<tr>
<td>Military male staff accepts women as equal on various tasks on board the Navy ships.</td>
<td>25</td>
<td></td>
</tr>
<tr>
<td>The women officer should be encouraged to work onboard Navy ships.</td>
<td>26</td>
<td></td>
</tr>
<tr>
<td>I prefer one or more women to work with me on a ship as crew member.</td>
<td>27</td>
<td></td>
</tr>
</tbody>
</table>

### 3.2. Collecting data and selecting the target group for study

The study was conducted by the authors using the questionnaire survey method and the instrument used for organizational climate analysis allowed to obtain useful data relevant to the dynamic interpersonal relations within the profile, with practical applicability in the issue of diversity on the basis of gender identity. The scientific value of the socio-professional climate analysis in the Navy structures arise from the methodology used, so that the scales of assessment consists in dichotomous questions that require empirical responses in terms of YES or NO to ensure good internal consistency for each rated dimension.

The dimensions of the organizational climate investigated in the presented study are non-parametric dimensions, which implies that, on larger samples, empirical data do not tend to be distributed according to the Gaussian curve.

Regarding the independent variables, the research group had comprised:
- 53 subjects, military Navy cadets (3rd year deck officers);
- 32 (60.37%) of them male biological gender, and 21 (39.63%) female gender;

The "biological gender" variable determines the research groups so that inferences on military cadets’ perceptions related to the gender differences in socio-professional activities on board Navy ships are centred on the four dimensions of the organizational climate as defined.
4. Results and interpretations
The psychosocial analysis followed structured procedures involving the collecting and systematization of information in order to obtain an objective description and to identify the perceptions and attitudes of the military cadets from the Naval Academy, in relation with the gender differences in the specific activities onboard the Navy ships and to generate countermeasures to optimize them. The data processing and interpretation have asserted similar responses of investigated subjects, without statistically significant differences between men and women.

4.1. The social-affective dimension

After applying the questionnaire, the collected results regarding the social affective dimension were submitted in the figure no. 1, the major drawn conclusions suggesting the following ideas and remarks:

→ positive-tier evaluations received questions about "effective and effective female staff relationships" with leading staff (91%), crewmates (81%) and subordinate staff (81%).

→ 90% of respondents believe that crew members are friendly with female staff and provide support to women in difficult tasks - it is worth noting the positive tone of interpersonal relationships with regard to professional collaboration and maintaining a nonconflictual working climate, regardless of gender identity of subjects.

→ 77% of subjects do not condition the acceptance by gender, declining that “female staff on board feel helpless or isolated.”

→ in terms of effective communication, 91% of the cadets believe that "shipboard communication between crew members is effective."

In conclusion these views express the high quality of formal communication procedures, but also the increased value of informal communication rules on board Navy ships even from the training stages conducting to a more flexible diversity culture in case of military leaders.

4.2. The cognitive-axiological (normative) dimension

Further on, the collected results regarding the cognitive-axiological dimension were depicted in the figure no. 2, the major drawn conclusions suggesting the following ideas and remarks:
→ for this variable, we have noticed the homogeneity of opinions, beliefs, values as unanimously shared by the group: 72% of the cadets have a personal career pattern projection while high scores were obtained on gender issues acceptance.

→ 89% of respondents denied the likelihood of a woman to confronting sexual harassment behaviours onboard Navy ships and 88% believe it is not difficult for a woman to find a higher positioned appointment in Navy because the commanding staff avoid prejudices against women military.

→ 75% of respondents do not think that for most women working on board Navy ships is more difficult than the initial assumptions and have disagreed that women's decisions or ideas on board are permanently criticized and questioned.

In conclusion, the Navy culture is accepting the assumption of balancing the gender chances alongside the carrier path, the normative dimension embedded by rigorous rules and procedures regarding the carrier evolvement making this perspective possible. Since the cadetship, the students are accepting the rules and comply with the gender issue with no restrictions.

4.3. The instrumental - executive dimension

For the instrumental-executive dimension the collected results have been centralized depicted in the figure no. 3, but for for the purpose of efficiently operating this concept, the authors have grouped 8 items statistically to construct 3 subdimensions in order to distinctively measure:

✓ the work task (items 15, 16),
✓ the objective evaluation of the subordinates (items 17, 18, 19) and
✓ the organizational equity (items 20, 21, 22).

4.3.4. The work task analysis in Navy crew

As observed in the figure no. 3.1 the next observations were drawn:

→ the responses of the cadets about the subjective perceptions regarding the objectives’ clarity, the involvement in task definition and decision-making processes in the presence of the gender diversity, have invalidated in high positive percentages the idea that working in a multicultural environment will cause anxiety for female staff in relation with the performed tasks (77%).
also, most of the respondents have considered that is not difficult for a military woman to perform and to achieve objectives onboard Navy ships because due to the organizational culture the commanding staff is already familiar with the female personnel, treating them with the same level of tasks (89%), admitting that the officers are usually encouraging the objective pursuing by their female colleagues.

In conclusion, the Navy culture is promoting the objective target and the task focusing approach in the daily basis crew profile settings and the cadets’ perspective after their first voyage at sea confirms the rooted practices onboard encouraging the women cadets to strive for higher effectiveness.

4.3.5. The objective evaluation of the subordinates in Navy structures

As observed in the figure no. 3.2, regarding the objective evaluation process the next remarks were concluded:

→ The indicator aims at objectively evaluation procedures of subordinates according to clear goals and criteria, providing feedback and job-improvement solutions on carrier management considering the gender issue.

→ In this respect, a determined "no" is supported statistically by 79% of the subjects who consider that a woman’s promotion in career on board the ship will not determine the the crew members’ envy, as 97% believes that women's successes are often ignored.

→ on the other hand 92% of cadets replied “no” for “a woman, as Navy crew member, committing a mistake or a mistake, will determine exaggerated reactions.

Conclusion: The Navy culture is promoting an equilibrate promotion procedure, encouraging the performance and objective achievement, which makes the carrier perspective more attractive form women personnel, against any gender bias and other misconceptions.

4.3.6. The organizational equity in Navy crews

→ the 3rd indicator of the instrumental-executive dimension of the organizational climate connected to gender diversity refers to the organizational equity whose attributes are: the correctness of the military decisions regarding the distribution of tasks and resources, the system of rewards and punishments, organizational behaviours.
We also observe the homogeneity of the subjects' answers, that have denied negative aspects of organizational equity in relation to the gender asymmetry. Thus, 96% of cadets consider that the women military are rewarded on the same level when performing the same task as men.

→ 81% of them denied that men staff believe that women's presence is causing problems onboard Navy ships considering that female officers on board Navy ships have same chances to promote than male colleagues.

In conclusion, due to its complexity, the military tasks onboard Navy ships require for a better functional connectivity within the crew, the team members considering that they are depending one to each other. There is not much likely wither to pursue for advantages as women in a crew or to ask for special treatment in relation with male crew members.

4.4. Diversity management on gender issue dimension

For diversity management vector, the collected results have been reflected in the figure no. 4, the major drawn conclusions suggesting the following remarks:

→ 87% of respondents agreed that the Navy onboard personnel is not discriminated against the individual race, religion or gender and 77% of respondents have perceived that individual diversity is appreciated and sometimes used to solve the occurred problems.

→ most of the cadets are open to encourage the women colleagues to access to the Navy professions, 89% of them preferring to have women colleagues onboard their ships.

In conclusion, the responses of the subjects in our research group are not surprising, there being a real concordance between their perceptions, supported by the positive belief of overcoming the prejudices, stereotypes and women discrimination in the Navy military environment.

5. Conclusions and remarks

The military students who were selected to take part in the research group are cadets from the 3rd (64%) and 4th year of study (36%), men and women, psycho-socially shaped by the Naval Academy organizational culture, through a laborious socialization and social learning and training processes, in compliance with the rigors of the graduate model and the Navy officer’s personality attributes.

It can be observed that the norms of the Navy education and training system, formal or informal, values, beliefs, traditions, military customs, elements of Navy professional culture, often embodying symbolic forms, have been transmitted over the time to each generation, but also from one generation to another, being internalized, integrated and transformed into a core of Navy group values desirable for onboard crew profession.

Also, by social modelling, based on axiological, normative, attitudinal and actional design, the cadets, especially those in the final years, have achieved specific features of the sociocultural personality, succeeding to reconcile their own actions with the military system standards, thus achieving a distinct personality, an own identity that assures the group profile and individual integration, based on diversity management requirements.
Checking for the major remarks depicted for each variable it can be observed that not only the homogeneity of the gender perceptions is influencing the socio-group profile, but also other cumulated specific aspects of the Navy organization: cohesion and camaraderie, (self) control and (self) discipline, the feelings of belonging to the group and to the organization, safety, stability conducting to the individual valorisation as a result of socio-cultural integration of the military group. In the same respect, the process of socialization in the military organization becomes the way in which the individual values and norms are structured in relation with the socio-cultural significance of the gender discrimination processes, with a significant role of drafting the military codes of conducting.

At the level of a deeper definition of the socio-cultural modelling process applied to the Navy cadets during their education in the Naval Academy, there is no gender dichotomies or segregation, mainly because the socio-professional and personality features required in the carrier guide for military personnel does not discriminate professionals the on the gender basis of but only on the key performance indicators. Thus, prejudice, stereotypes or gender discrimination are majorly absent both in the organizational culture of the Navy as in the deeper level of explicit attitudes of cadets, man or women. Is important to mention that the formal substructures in Navy dominates, which implies the mainly existence of procedural and routine activities, a hierarchical functionality, a well-articulated network of statuses and roles, clear and precise regulations to be followed up.

A final observation is that in case of Navy onboard environment, from the cadets’ point of views, there are no significant differences, statistically supported, in the scale of the individual or collective impact, depending on the gender, as deducted from the assessment of the four variables studied based on the applied questionnaire, expressing here the prior positive status of the military culture onset in the education process.

Further on, understanding the particular importance of gender issues in diversity management perspective, for building an effective leadership in Navy, but beyond the academic formation program, becomes very useful to implement different training courses, workshops or instructing modules alongside the Navy personnel carrier, where the military to be accommodated with the gender mixed teams on sustainable basis, in order to consolidate the military culture on this matter.

References