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STRUCTURAL FEATURES IN THE CONATIVE AND RATIONAL SPHERE OF COMBATANTS WITH POST-STRESS PSYCHOLOGICAL DISADAPTATION

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The validity of research. Events in the Eastern Ukraine lead to the actualization and increase of the number of mental processes among demobilized combatants whose phenomenology was not the subject of research in psychology during decades. One of them is the emergence of post-stress psychological disadaptation (PSPD) among demobilized. There is limited knowledge about the structure of emotional traumatic experience with PSPD among combatants, which is complicated by the lack of information regarding the features of the conative and rational sphere.

The aim of the study is to determine the peculiarities of the structure in the conative and rational sphere among the Ukrainian demobilized with post-stress psychological disadaptation.

Research methods - Mississippi Scale for Combat-Related PTSD, The Life-Sense Orientation Test (LSO) according to D.A.Leontiev), Individual motivation test (IMT). For mathematical and statistical processing: φ - Fisher's angular transformation, Mann-Whitney U test, Kendall rank correlation coefficient (τ -Kendal). The results were processed using the SPSS 16 software.

Results of research: In the rational area of the demobilized combatants, there are phenomena of the "groundhog day" (fixation on past events) and "level of decline" (all senses of life orientation are below the norm). Life purpose domain of demobilized combatants with PSPD reflects the received symptom complex "disorientated disappointment". For the motivational sphere of demobilized combatants with PSPD, there is a low level of the following motives: appeal for preservation / achievement (i.e. high level of motivation for preservation - by the key method), knowledge and interest, creativity and independence, relationships, overcoming and growth, prestige. In the motivational sphere of both groups there is a "gluing" of most motives with each other. Immaturity, disadaptation and lack of resourcefulness of the motivational sphere are observed among the Ukrainian demobilized combatants with PSPD. The phenomena of "gluing" and "contaminating" are the general mechanism for the *conative and rational sphere* of the demobilized combatants with the PSPD.

Keywords: *post-stress psychological disadaptation, conative and rational sphere, demobilized participants of combat operations.*

Структурні особливості мотиваційно-сенсової сфери учасників бойових дій з постстресовою психологічною адаптацією

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Актуальність проблеми. Події на Сході України призводять до актуалізації та зростання їх кількості психічних процесів у демобілізованих учасників бойових дій, феноменологія яких десятиліттями майже не була предметом дослідження в психології. Одним з них є виникнення постстресової психологічної дезадаптації (ППД) у зазначених демобілізованих. Обмеженими залишаються знання щодо структури емоційного травматичного досвіду з ППД у них, що ускладнюється дифіцитарністю інформації стосовно особливостей мотиваційно-сенсової сфери.

Мета дослідження - визначити особливості структури мотиваційно-сенсової сфери у демобілізованих учасників бойових дій в Україні з постстресовою психологічною дезадаптацією.

Методи дослідження – Міссісіпська шкала для оцінки посттравматичних реакцій (військовий варіант), Тест смисложиттєвих орієнтацій (за Д. А. Леонтьєвим), Тест індивідуальної мотивації (ТІМ). Для математико-статистичної обробки використовувалися: φ - кутове перетворення Фішера, U - критерій Манна-Уїтні, коефіцієнт рангової кореляції (τ -Кендала). Обробка результатів проводилася з використанням пакету електронно-статистичних програм SPSS16.

Результати дослідження: У сенсовій сфері демобілізованих учасників бойових дій спостерігаються феномени «дня сурка» (фіксованість на минулих подіях) та «рівневого зниження» (всі сенсожиттєві орієнтації нижче норми). Сенсожиттєву сферу демобілізованих учасників бойових дій з ППД відображає отриманий симптомокомплекс «дизорієнтоване розчарування». Для мотиваційної сфери демобілізованих учасників бойових дій з ППД характерна низька вираженість таких мотивів: мотивація збереження/досягнення (тобто високий рівень мотивації збереження – за ключем методики), пізнання та інтерес, творчість та незалежність, взаємовідносини, подолання та зростання, престиж. В мотиваційній сфері обох груп спостерігається «злипання» більшості з мотивів між собою. У демобілізованих учасників бойових дій в Україні з ППД спостерігається незрілість, дезадаптивність та брак ресурсності мотиваційної сфери. Феномени «злипання» та «контамінації» є загальним механізмом мотиваційно-сенсової сфери демобілізованих учасників бойових дій з ППД.

***Ключові слова:** постстресова психологічна дезадаптація, мотиваційно-сенсова сфера, демобілізовані учасники бойових дій.*

Problem statement and its relevance for the theory and practice:

Events in the East of Ukraine lead to the actualization and growth of the number of mental processes among demobilized participants in hostilities, whose phenomenology almost for decades has not been the subject of research in psychology. One of them is the emergence of post-stress psychological disadaptation (PSPD) among demobilized. Limited knowledge remains about the structure of emotional traumatic experiences with PSPD, which is complicated by the lack of information regarding the characteristics of the motivational and semantic sphere.

The existing approaches to the conceptualization of mechanisms and factors for the formation of the PSPD reflect the medical and psychological aspects. The study of the traumatic experience of servicemen through the idea of forming PSPD among them was reflected in the work of many domestic scientists: M.V. Markova, L.F. Shestopalova, D.M. Bolotov, V.S. Pidkorytov, N.O. Maruta, V.G. Belov, H.S. Rachkauskas and others (Voloshyn et al, 2002, Belov & Parfenov, 2010). The motivational-semantic sphere is essential in the full functioning of the psyche, however, the peculiarities of its structure among demobilized combatants with a preclinical level of traumatic experience to which the PSPD belongs, almost have not been studied, although outside of this context, the motivation and value sphere of servicemen was examined in the works of such scientists as V. Yagupova, P. Krivoruchko, E. Potapchuk, I. Prikhodko, M. Doroshenko, G. Gaidukevich, G. Grebenyuk, L. Dunets, V. Klachko, M. Korolchuk, I. Lipatov, A. Safin (Siryi, 2015).

The term “post-stress psychological disadaptation” was introduced and justified by M.V. Markova (Markova & Kozyra, 2015). The author understands the post-psychological psychological disadaptation as the “pre-nosological level of response to a stressful situation, which can manifest itself in adaptation disorders at the behavioral, emotional and cognitive levels”. P.V. Kozyra notes that “psychological disadaptation most fully characterizes the general deviant personality adaptation syndrome”, which are not specific and the polymorphic manifestations of which represent this pre-nosological level of response to a stressful situation. P.V. Kozyra (2017) notes that, from the point of view of such scientists as A.A. Bulan, V.M. Zagurovsky, Yu.A. Aleksandrovsky, P.S. Gurevich, the specificity of the reaction to stress of servicemen depends on the characterological, personal characteristics, maturity and the adequacy of defense mechanisms, duration and intensity of action of stress factors (Psykhohenyy v ekstremalnykh sytuatsiyakh, 1991). From our point of view, it is advisable to consider the idea of an emotional scheme proposed in the concept of process-experiential or emotion-focused therapy (PE-EFT) L. Greenberg, R.

Elliott (Elliott, Watson, Goldman, Greenberg, 2004). Emotions are considered as the main component of this scheme, which has a certain connection with the motivational and cognitive spheres, bodily manifestations and the memory system. To create a unified concept of the structure of the traumatic emotional experience of demobilized participants in hostilities with the PSPD, it is necessary to explore the motivational-sensual sphere.

The aim of the study is to determine the peculiarities of the structure of the motivational-semantic sphere among demobilized participants in hostilities in Ukraine with post-psychological psychological disadaptation.

Methods of research. Mississippi scale for assessing post-traumatic reactions (military option). This scale is designed to diagnose the degree of influence of the traumatic experience on the psyche of the individual and to identify signs of PSPD among servicemen. The Life-Sense Orientation Test (LSO) according to D.A. Leontiev is an adapted version of the James Crumbaugh Purpose-in-Life Test (PIL), which represents 20 pairs of opposing statements. The use of this test makes it possible to diagnose the "source" of the meaning of life, which person can find in the past, present, future, or simultaneously in all three constitutings. The test includes 5 subscales: 1) goals in life, 2) process of life (or - interest and emotional intensity of life); 3) effectiveness of life (or - satisfaction with self-realization), 4) locus of control - Self (or - I am the master of life), 5) locus of control - life (or - life management). Additionally, it is possible to calculate the overall measure of the meaningfulness of life.

Table 1 shows average values and deviations of the subscales and the overall meaningfulness of life for the age from 30 to 55 years (for men and women), which were proposed by E.A. Petrova and A.A. Shestakova.

Table 1

Indicators for subscales according to the LSO test

Subscale		M± Std.Dev.
1	Goals in life	38,91±3,20
2	Process of life	35,95±4,06
3	Effectiveness of life	29,83±3,00
4	Locus of control - Self	24,65±2,39
5	Locus of control - Life	34.59±4,44
	Overall meaningfulness of life	120,36±10,21

Individual Motivation Test (IMT) by V.V. Altukhov and A.B. Zahoruiko consists of 56 questions and is designed to diagnose the main motives of professional activity and significant and insignificant motivational factors for the person. The motivational profile of an individual consists of the following scales: cognition and interest, certainty, health and comfort, creativity and independence, money, relationships, coping and growth, prestige, motivation of preservation — achievement motivation, intrinsic motivation — extrinsic motivation. For mathematical-statistical processing, the following were used: Mann–Whitney U test, Kendall rank correlation coefficient (τ -Kendall), and ϕ - Fisher's angular transformation. Processing of the results was carried out using the SPSS 16 software. The study was conducted on the basis of the Kharkiv regional organization of ATO veterans. Two groups with a total number of 200 people were created. The first group consisted of 100 demobilized combatants with PSPD (group 1), which is the prenosological level of adaptation disorder. Those demobilized which were not treated in the hospital and did not have a diagnosis of PTSD. Signs of PSPD diagnostics using the Mississippi scale for assessing post-traumatic reactions (military option).

Subjective psychological signs of PSPD, obtained during the survey were the following (Table 2): anxiety, irritability, aggressiveness, fear, sleep disturbance, decrease and mood swings, changing attitudes towards yourself and others. The second group consisted of 100 middle-aged men without post-stress psychological disadaptation, which are the demobilized participants in hostilities (group 2).

Table 2

Subjective psychological signs of PSPD

	A.	I	D.M	A	F.	S.D.	C.A.
G.1(%)	46	67	38	68	37	74	36
G.2(%)	14	16	21	27	13	16	9
ϕ	5,19**	7,74**	2,65**	6,12**	4,03**	8,82**	4,79**

Note: G – group, G 1 – demobilized with PSPD; G 2 – demobilized without PSPD; ϕ - Fisher's angular transformation; A – anxiety, I – irritability, D. M - decrease and mood swings, A. – aggressiveness, F. – fear, S. D. – sleep disorder, C. A. - changing attitudes towards yourself and others; ** - p=0,01.

Results. To identify the features of the motivational-semantic sphere of demobilized, we used the scales of the life-sense orientation test (according to D.A.Leontiev) and the individual motivation test (IMT). The indicators

for subscales according to the LSO method were compared using the Mann–Whitney U test. Difference in expressiveness of life-sense orientations is presented in Table 3.

Table 3

Reliability of differences in expressiveness of life-sense orientations between groups orientations between groups 1 and 2

Subscale	Mean		U
	Group 1	Group 2	
Goals in life	28,40	36,22	1182**
Process of life	23,73	28,45	1362*
Effectiveness of life	19,43	27,12	1192**
Locus of control - Self	17,11	21,17	1385*
Locus of control - life	28,97	32,46	1448*
Overall meaningfulness of life	90,67	122,85	987**

Note: Mann–Whitney U test; * - $p \leq 0,05$; ** - $p \leq 0,01$.

Based on the results presented in Table 3, differences were found in all life-sense orientations between groups, what is confirmed by essential difference in overall indicators of life meaningfulness. Considering data of mean values of expressiveness of the life-sense orientations given in this table and Table 1, it is possible to speak about standard of expressiveness of life-sense orientations among demobilized participants in hostilities without PSPD, and expressed below the standard mean values of life-sense orientations among demobilized with PSPD. It indicates a significantly lower level of meaningfulness of their own life for those demobilized with PSPD, and distinctness of the “yesterday’s events” for them, the perception of their life process as not interesting, not filled with meaning and positive emotions, dissatisfaction with past and present, fatalism, lack of confidence in the conscious control of own life, illusiveness of freedom, uselessness of planning something for the future, lack of faith in own strength.

The specifics of interconnection of life-sense orientations of demobilized of both groups, provided in Table 4.

Table 4

Peculiarities of the interconnection of life-sense orientations among demobilized groups 1 and 2

Subscale	Goals in life	Process of life	Effectiveness of life	Locus of control - Self	Locus of control - life
Goals in life	-	-0,05	0,09	0,14*	0,04
Process of life	0,22**	-	0,10	0,22**	0,25**
Effectiveness of life	0,14*	0,17*	-	0,21**	0,06
Locus of control - Self	0,27**	0,09	0,14*	-	0,19*
Locus of control - life	0,23**	0,31**	-0,07	0,20**	-

Note: the top of the table - the results for group 2 (without PSPD); the bottom of the table - the results for group 1 (with PSPD); * - $p \leq 0,05$; ** - $p \leq 0,01$.

Figures 1 and 2 show the correlation multitude of life-sense orientations of demobilized of both groups.

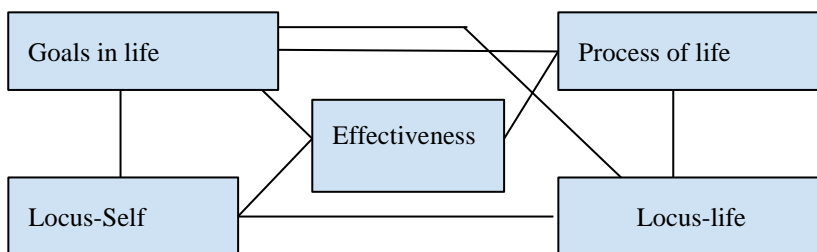


Fig. 1. Interconnection of life-sense orientations in group 1

Note: *Effect.* – Effectiveness of life; *Locus-Self* – Locus of control - Self; *Locus-life* – Locus of control - life.

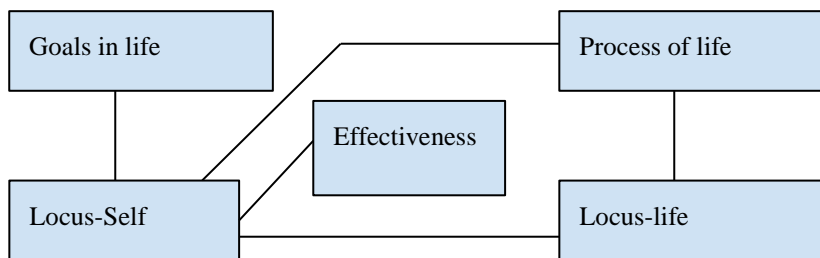


Fig. 2. Interconnection of life-sense orientations in group 2

*Note: Effect. – Effectiveness of life; Locus-Self – Locus of control - Self;
Locus-life – Locus of control - life.*

Results presented in Table 4 and Fig. 1-2, confirm existence of a certain difference in organization of the sphere of life-sense orientations among demobilized with and without PSPD. Taking into account that mean indicators on life-sense orientations among demobilized with PSPD are below the norm, and within norm among demobilized without PSPD, and data from the above tables and figures, it can be noted that semantic sphere of group 1 is characterized by the “decrease level” phenomenon. Life-sense sphere reflects the received complex of symptoms "disorientated disappointment", which is the confluence between almost all life-sense orientations, none of which perform as resource for this structure.

This complex is an undifferentiated education, by its psychological nature close to the previously identified structure of infantile traumatic experience among demobilized with PSPD and features of the structure of their emotional sphere, which include: among demobilized with PSPD, the trauma of abandonment, humiliation and injustice, which leads to potentiation of mental stress; potentiation of these injuries indicates their pathogenicity; “Sticking” of negative emotionalism with sthenic and asthenic circle; destructive connotation of positive emotions “joy” and “surprise”, where “Joy” is contaminated with grief (“impossible to enjoy”), and “surprise” - “contempt” and “fear”, which reflects general closeness, non-inclusion into the world (“There is nothing to be surprised "); the presence of the phenomenon of the potentiation of negative emotionality - "sticking" of negative emotions pre-empowers the strengthening of their destructive action, general inflation of negative emotionality; loss of resource "anger" contaminated by "fear"; 5) existence of "cross-cutting" emotions of fear, anger, grief and shame, which become the core characteristic of the emotional sphere (Kocharian, 2018). Among

demobilized without PSPD, such complex of symptoms of the life-sense sphere was identified as “strong personality”, in which Subscale “locus of control - Self” takes the pivotal place, which unites all others: past, present and future. So, this complex testifies about strong personality, which has a sufficiently conscious freedom of choice in order to build its life in accordance with its own goals and having a sufficient level of satisfaction regarding to the past, present and future.

The next stage of the study was to identify the characteristics of the motivational sphere of demobilized people with PSPD. Since the low intensity level of the motive in the IMT technique indicates a demotivated behavior, the number of people demobilized with and without low PSPD for each motive was calculated. The difference in the low expression of motives between groups 1 and 2 is given in Table 5.

Table 5
Difference in low significance of motives between groups 1 and 2

Motive	% in 1st group with low motive expression	% in 2nd group with low motive expression	ϕ - Fisher's angular transformation
M. C/A	63	24	5,73**
E/I M.	52	48	0,57
K. and I.	51	19	4,87**
C.	16	12	0,82
H. and C.	9	13	0,91
C. and I.	48	12	5,83**
M.	10	6	1,05
R.	39	17	3,53**
C. and G.	34	16	2,98**
P.	41	29	1,79*

Note: M. C/A – conservation / achievement motivation; E/I M. – external / internal motivation; K. and I. – knowledge and interest; C. – certainty; H. and C. – health and comfort; C. and I. – creativity and independence; M. – money; R. – relationships; C. and G. – coping and growth; P. – prestige; * - $p \leq 0,05$; ** - $p \leq 0,01$.

The motivational sphere of demobilized combatants with PSPD is characterized by low expression of such motives: conservation / achievement motivation (high level of conservation motivation — according to the methodologies key), knowledge and interest, creativity and independence, relationships, coping and growth, prestige. Thus, these demobilized people are characterized by demotivation in the desire to have an interesting job, in acquiring new knowledge and skills, creative self-

realization, improvisation, autonomy and independence, communication and improvement of relationships with other people, optimization of communication in working team, initiative, ability to take risks and show activity in various spheres of life, recognition by society, acquisition of self-worth, is supported by the desire to minimize risks, unwillingness to change, more a clear perception of uncertainties, desire for peace, guarantees and confidence in the future. The specifics of the motivational sphere among demobilized of both groups are given in Table 6.

Table 6
Features of the motivational sphere among demobilized of groups 1 and 2

Motive	M. C/A	E/I M.	K. and I.	C.	H. and C.	C. and I.	M.	R.	O. and G.	P.
M. C/A	-	-0,07	0,15*	0,07	0,24**	0,09	0,07	0,23**	0,24**	0,09
E/I M.	0,07	-	0,11	0,08	0,02	0,09	0,02	0,03	-0,08	0,12
K. and I.	0,23**	0,03	-	0,21**	0,07	0,16*	0,15*	0,07	0,17*	0,04
C.	0,17*	0,02	0,06	-	0,07	0,03	-0,05	0,11	0,09	-0,04
H. and C.	0,14*	0,11	0,04	0,18*	-	0,07	0,15*	0,17*	0,05	0,02
C. and I.	0,09	0,11	0,16*	0,06	0,08	-	0,02	0,06	-0,05	0,09
M.	0,23**	0,27**	0,15*	0,15*	0,05	0,14*	-	0,16*	0,08	0,14*
R.	0,15*	-0,08	0,17*	0,26**	0,04	0,19*	0,06	-	0,09	0,07
O. and G.	0,09	0,18*	0,09	0,08	0,16*	0,08	0,03	0,25**	-	0,03
P.	0,17*	0,07	0,04	-0,05	0,05	0,14*	0,17*	0,11	0,27**	-

Note: table top - group 1 results (with PSPD) table bottom - group 2 results (without PSPD); M. C/A – conservation / achievement motivation; E/I M. – external / internal motivation; K. and I. – knowledge and interest; C. – certainty; H. and C. – health and comfort; C. and I. – creativity and independence; M. – money; R. – relationships; O. and G. – overcoming and growth; P. – prestige;; * - $p \leq 0,05$; ** - $p \leq 0,01$.

In the motivational sphere of both groups, there is a “sticking” of the majority based on the motives among themselves, while in the demobilized without PSPD such sticking is much more than in group 1. At the same

time, the motivational motive of the demobilized with PSPD is contaminated by motives which have a low level of expression, thus depriving the whole sphere of resources as a whole. Thus, among demobilized participants of hostilities in Ukraine with PSPD, there is immaturity, maladjustment and lack of resource motivational sphere.

Discussion

The results obtained in this study are fully consistent with the data provided by O.S. Kocharian (2014). In addition, the results obtained are consistent with the results of studies of the structures of the emotional sphere and the infantile traumatic experience of demobilized combatants in Ukraine.

Conclusions

1. In the semantic sphere among demobilized combatants, the phenomenon of “groundhog day” (fixed on past events) and “level of decline” (all life-sense orientations are below norm) are observed. This testifies about significantly lower level of finding life-sense among demobilized with PSPD in one’s own life, perception of the process of one’s life as interesting, not filled with positive emotions, dissatisfaction with past and present, fatalism, conviction of being outside the conscious control of one’s life, illusion of freedom, and the futility of planning something for the future, lack of faith in one’s own forces.

2. The meaningful life sphere of demobilized combatants with the PSPD reflects the resulting complex of symptoms “disoriented disappointment”, which is the sticking of almost all life-sense orientations to each other. This complex is an undifferentiated formation of meanings, none of which is a resource component for this structure.

3. The motivational sphere of demobilized combatants with PSPD is characterized by low expression of such motives: conservation / achievement motivation (high level of conservation motivation — according to the methodologies key), knowledge and interest, creativity and independence, relationships, coping and growth, prestige.

4. In the motivational sphere of both groups, there are “stickings” of the majority of motives between each other, while such stickings in demobilized without PSPD are much larger, but characteristic of the motivational sphere of those demobilized with PSPD is the contamination of motives with high expression by those motives that have a low level of expression, depriving in a such way resources of the whole sphere. Thus, the demobilized participants in the hostilities in Ukraine with the PSPD are observed with immaturity, maladjustment and lack of resources of motivational sphere.

5. The phenomenon of "sticking" and "contamination" is a general mechanism of the motivational and semantic sphere of demobilized combatants with PSPD, as they are found both in the structure of meanings and in the structure of the motives of these demobilized.

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