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Real self and ideal self of pregnant and postpartum women with symptoms of perinatal depression

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Summary

Aim. To assess real self and ideal self in pregnant and postpartum women with symptoms of perinatal depression in the area of psychological needs and topical scales.

Methods. The study involved 239 pregnant women whose gestational age ranged between 32 and 40 weeks, and 105 postpartum women (2 to 5 days after childbirth). The Edinburgh Postnatal Depression Scale questionnaire was used as a screening test for antenatal and postnatal depressive symptoms. Personality profiles were assessed using the Adjective Check List test.

Results. Pregnant and postpartum women with symptoms of perinatal depression varied in their self-assessment of a number of their real psychological needs, while they presented similar scores with respect to their ideal (expected) self. The differences between pregnant and postpartum women correspond to changes in roles and activities related to pregnancy and the postpartum period; women presenting more passive attitudes in pregnancy become more active in the postpartum period. A positive change in the real self-image related to motherhood in the postpartum period occurs despite depressive symptoms.

Conclusions. Numerous significant differences between the ideal and real self in both pregnant and postpartum women with perinatal depressive symptoms demonstrate their lack of self-acceptance, which requires individualized psychological intervention.

Key words: depression, perinatal care, personality

Introduction

Personality predispositions are still relatively little-known factors although their influence on the incidence and course of ante- and postnatal depression may be consi-

derable [1]. In the standard perinatal depression screening programs, using tools such as the Edinburgh Postnatal Depression Scale (EPDS) [2, 3] or the Beck's Depression Inventory (BDI) [3-5], personality traits are not assessed. Austin and Lummley [6] indicate, that this may be the reason for the lower sensitivity and positive predictive value of these tests in the detection of fully symptomatic depression among women in pregnancy and after childbirth. This often leads to delayed therapy for ante- and postnatal depression or the lack thereof, which may involve serious health consequences for the mothers and their children, and affect their future mutual relationships along with the function of their families.

Thus, it seems justified to include psychological diagnosis, aimed at the evaluation of high-risk personality traits, particularly with respect to the real and ideal self, in the programs of perinatal depression prophylaxis. In contemporary psychology, particular attention is paid to the role of „self" structure, particularly in the context of widely understood psychological support. Therefore the results of this study add to this trend, expanding relevant knowledge on pregnant and postpartum women. In view of the established and accepted theory, the content of the "self" expressed by self-description could be used both in prevention and in other forms of psychological support, as important resources of personality. In our opinion, previous attempts towards psychological support were focused on negative signs and emotions rather than on the resources included in such important personality structure as the "self" structure.

In his theory, Murray demonstrated that personality reflects a persons' behaviors controlled by their psychological needs [7]. While a number of needs are temporary and changeable, others are deeply rooted in human nature, as they function primarily at the level of unconsciousness and are critical in the development of personality. This concept provided the basis for the development of a widely used psychological tool used to study different aspects of human personality, the Adjective Check List (ACL) by Gough and Heilbrun [8]. The ACL includes 300 adjectives grouped into 37 scales within five primary categories including 15 need scales [7-9]. The test allows for the assessment of self-image (the real self and ideal self) with respect to needs, and the detection of discrepancies therein. It is these discrepancies in the self-image and the inability to satisfy one's psychological needs that result in discomfort, the distorted assessment of psychological function, and various potential psychopathologies [7, 9].

Pregnancy, labor, and the puerperium together form a period of dynamic biological and psychological changes. One's adaptation to these changes depends on a great number of factors [10-14]. The self-image is of critical importance, with a special focus on psychological needs. Contrary to popular belief, pregnancy and the care of a newborn child do not protect women from experiencing difficult emotional states, which may considerably intensify and impede the performance of parental duties or even the woman's function in the family and society. Obviously, women in the prenatal and postnatal period have different expectations connected to various factors, such as prior emotional disorders, increased fear, neuroticism, preferred manners of coping with stressful situations, the sense of safety in their relationship, acceptance of pregnancy, earlier procreation experiences, and patterns of maternal and partnership relations in their homes [10-16]. In extreme situations these factors may intensify ne-

gative emotional reactions in the perinatal period and affect the woman's self-image and satisfaction from her social roles, inducing perinatal depressive symptoms. The identification of factors triggering depressogenic mechanisms and specific personality traits predisposing women in the perinatal period to the development of depression seems to be of critical importance for the prophylaxis and treatment of this frequent and serious pre- and postnatal disorder. Despite its significance, there are no studies concerning this issue, and in particular the real and ideal self.

The authors seek to answer the question of whether or not pregnant and postpartum women with or without symptoms of perinatal depression differ in terms of their assessment of their real and ideal self.

Material

A total of 239 patients admitted to the Department of Feto-Maternal Medicine at the Pomeranian Medical University in Szczecin (Poland) in 2006-2007 were recruited for the study. The authors received the consent of the Commission for Bioethics of the Pomeranian Medical University as well as that of the recruited patients to conduct their studies. The study involved 134 pregnant women whose gestational age ranged between 32 and 40 weeks, and 105 women (2 to 5 days postpartum).

Method

Apart from the detailed clinical evaluation of patients conducted by the doctors within the routine obstetric/gynecological history, the EPDS questionnaire was used as a screening test for the appearance and severity of perinatal depression symptoms. A score of 12 or more on a scale of 30 indicated depressive symptoms [17]. Based on the EPDS score, women were assigned to either the study group (S) or control group (C), which were further subdivided into a total of four subgroups based on their antenatal or postpartum status: 1) pregnant women with symptoms of perinatal depression (PS, n=50), 2) postpartum women with symptoms of perinatal depression (PPS, n=26), 3) pregnant women without symptoms of perinatal depression (PC, n=84), and 4) postpartum women without symptoms of perinatal depression (PPC, n=79).

As a supplement to the EPDS, each patient was supplied with a demographic questionnaire including data on age and education.

The assessment of personality traits was performed by the ACL test, using the Polish version by Juros and Oleś [9]. The patients filled in the test twice, selecting the adjectives best characterizing themselves and by answering the question: "What am I like?" (real self) and "What would I like to be like?" (ideal self). The change in personality structure was assessed in 3 out of the 5 categories of scales included in the ACL test. The first category included manners of self-expression and self-description. This group contained a number of adjectives selected to describe personality: Number Checked – Nck, Number of Favourable Adjectives – Fav, Number of Unfavourable Adjectives – Ufv, and Communality – Com. The second category included 15 Need Scales: Achievement – Ach, Dominance – Dom, Endurance – End, Order – Ord,

Intraception – Int, Nurturance – Nur, Affiliation – Aff, Heterosexuality – Het, Exhibition – Exh, Autonomy – Aut, Aggression – Agg, Change – Cha, Succorance – Suc, Abasement – Aba, and Deference – Def. The third category included 9 Topical Scales concerning the personality traits selected: Counseling Readiness – Crs, Self-Control – Sch, Self-Confidence – Sef, Personal Adjustment – Pad, Ideal Self – Iss, Creative Personality – Cps, Military Leader – Mls, Masculine – Mas, and Feminine – Fem. The ACL results were analyzed by means of software developed by the Computing Centre of the Catholic University of Lublin (Poland). The results allowed for the assessment of the real self and ideal self in patients presenting antenatal and postnatal depression symptoms as well as in the control group of pregnant and postpartum women without symptoms of depression.

ACL scores were presented as arithmetic means with their standard deviations (SD). Normal distribution was tested by Shapiro-Wilk test. Arithmetic means between certain groups were compared with ANOVA and Tukey post-hoc test. Calculations were performed using Statistica 7 (StatSoft®, Poland) software, and statistical significance was defined as $p \leq 0,05$.

Results

As regards age, the differences between the compared groups of patients (pregnant women and postpartum women with and without perinatal depressive symptoms) were insignificant.

Pregnant women with symptoms of perinatal depression (PS), describing their real self in the category of manner of self-expression and self-description presented significantly lower scores as compared to the control group (PC) with respect to the number of favorable adjectives, and significantly higher scores with respect to unfavorable adjectives. As regards the need scales, pregnant women with symptoms of perinatal depression demonstrated significantly lower scores in Achievement, Dominance, Endurance, Intraception, and Affiliation, and significantly higher scores in Succorance and Abasement. As regards topical scales, pregnant women from the study group presented significantly lower scores in Self-Confidence, Personal Adjustment, Ideal Self, Creative Personality, and Masculine. Compared to the control group (PC) they demonstrated a higher score only in Readiness for Change (Table 1).

Compared to the control group (PPC), postpartum women with symptoms of perinatal depression (PPS) demonstrated significantly lower scores in Endurance, Personal Adjustment, Ideal Self, and Creative Personality, and significantly higher scores with respect to unfavorable adjectives and Succorance (Table 1).

Significant differences in all scales were found between pregnant women and postpartum women with perinatal depressive symptoms (PS and PPS) describing the real self. Pregnant women in the study group presented lower scores with respect to the number of favourable adjectives, Achievement, Dominance, Intraception, Affiliation, Self-Confidence, Personal Adjustment, and Ideal Self, and significantly higher scores in Abasement and Readiness for Change (Table 1).

Table 1. **Comparison of the real self of pregnant women (PS) and postpartum women (PPS) with perinatal depressive symptoms and pregnant (PC) and postpartum (PPC) women without these symptoms**

ACL Scales	PS (n = 50)	PPS (n = 26)	PC (n = 84)	PPC (n = 79)	p Value
Category1. Ways of self-expression and self-description					
Nck	31.67±5.29	33.04±5.77	31.22±5.74	32.80±6.93	0.299
Fav	37.96±8.13*	41.46±7.95	41.88±7.60	43.43±8.21	0.002
Ufv	49.75±9.48	48.35±8.54	45.15±5.08*	45.37±6.52*	0.001
Com	36.20±7.57	37.08±8.10	38.14±6.53	37.95±8.21	0.473
Category 2. Needs Scales					
Ach	45.16±6.35	46.92±7.38*	48.24±6.72*	48.86±9.02*	0.041
Dom	45.92±7.29	49.96±7.15*	50.40±6.55*	50.77±7.49*	0.001
End	47.35±8.81	48.38±8.33	51.31±7.84*	52.78±8.80*	0.002
Ord	49.98±8.37	49.23±9.33	52.26±8.11	53.35±9.23	0.065
Int	40.22±6.66	42.00±8.02*	43.20±7.34*	44.04±8.41*	0.040
Nur	43.43±7.75	46.38±6.86	44.81±6.68	46.20±7.28	0.131
Aff	37.02±8.69	41.31±9.39*	43.27±9.97*	43.85±10.18*	0.001
Het	44.06±9.84	46.92±7.55	45.55±6.69	45.91±8.60	0.461
Exh	50.06±7.61	53.77±7.36	52.59±6.32	52.12±7.26	0.108
Aut	48.43±5.84	51.12±6.78	49.67±4.49	50.47±6.12	0.134
Agg	51.86±7.48	52.54±6.29	51.22±6.13	50.41±7.04	0.455
Cha	44.24±6.34	43.42±7.04	43.92±6.96	43.02±6.61	0.741
Suc	54.29±5.81	53.15±8.43	49.25±6.14*	49.62±6.45*	0.000
Aba	53.14±8.12	49.42±6.63*	48.81±6.59*	48.63±7.07*	0.002
Def	49.55±6.50	52.04±5.98	49.76±5.78	49.84±6.46	0.354
Category 3. Topical Scales					
Crs	48.69±7.20	43.88±5.90*	45.26±6.99*	45.91±8.92*	0.030
Scn	49.33±7.03	48.00±7.15	49.78±5.97	50.75±6.11	0.249
Scf	44.71±9.33	49.62±9.31*	50.31±8.05*	50.65±9.37*	0.001
Pad	39.67±6.51	42.73±7.01*	44.27±5.60**	45.40±7.50**	0.000
Iss	48.43±9.81	51.62±8.28*	52.41±7.89*	56.06±8.02**	0.000
Cps	46.65±8.24	46.77±5.69	48.56±6.23*	50.40±7.76*	0.016
Mls	41.78±6.72	43.15±7.95	43.95±6.17	44.49±8.52	0.204
Mas	44.22±6.06	47.38±8.49*	46.48±7.05*	48.02±8.89*	0.049
Fem	39.53±7.25	40.46±8.76	40.20±7.21	40.68±6.15	0.836

The p values were determined on the basis of ANOVA analysis, significant differences between groups were indicated as * or ** (post-hoc Tukey test, $p \leq 0.05$).

Only one difference was found between the control groups of pregnant and postpartum women without symptoms of perinatal depression (PC vs. PPC) describing the real self. It was related to the Ideal Self which scores were significantly lower amongst pregnant controls (Table 1).

There were considerably fewer differences found in patients in terms of the ideal self (Table 2). Compared to the respective control groups (PC and PPC), either pregnant (PS) or postpartum women with depressive symptoms (PPS) presented significantly higher scores in Affiliation. As regards the ideal self, no significant differences were found between pregnant and postpartum women with perinatal depressive symptoms (PS vs. PPS) or between pregnant and postpartum women in the control groups without these symptoms (PC vs. PPC).

Table 2. **Comparison of the ideal self of pregnant women (PS) and postpartum women (PPS) with perinatal depressive symptoms and pregnant (PC) and postpartum (PPC) women without these symptoms**

ACL Scales	PS (n = 50)	PPS (n = 26)	PC (n = 84)	PPC (n = 79)	p Value
Category1. Ways of self-expression and self-description					
Nck	31.16±6.41	31.27±5.45	29.63±3.43	29.83±4.69	0.248
Fav	42.46±7.82	43.15±9.29	40.13±7.14	39.92±7.94	0.145
Ufv	42.30±5.66	42.54±3.02	41.63±2.26	42.51±5.95	0.704
Com	32.10±8.94	34.50±8.85	30.41±6.71	30.75±6.36	0.104
Category 2. Needs Scales					
Ach	51.60±7.08	53.23±6.85	51.56±6.89	50.34±7.78	0.410
Dom	55.52±4.75	55.19±6.92	55.34±6.67	54.21±7.07	0.720
End	53.44±7.32	54.73±6.86	52.39±6.42	50.92±8.27	0.126
Ord	55.44±7.47	56.65±5.97	54.25±7.60	54.28±8.56	0.492
Int	41.80±5.93	43.15±7.61	42.98±6.93	42.47±7.42	0.791
Nur	41.24±5.95	40.23±6.53	39.91±5.35	39.70±5.10	0.513
Aff	41.30±7.05	42.77±11.36	37.92±8.19*	37.81±9.91*	0.026
Het	45.50±7.69	45.08±8.19	42.67±6.55	42.75±7.44	0.112
Exh	55.06±4.73	54.54±4.16	54.13±5.46	54.13±5.25	0.752
Aut	53.30±5.35	53.65±5.82	53.86±5.99	53.64±5.85	0.966
Agg	52.92±5.19	52.00±4.41	52.20±5.56	52.42±5.75	0.875
Cha	43.64±5.62	44.04±6.84	43.95±5.53	43.72±5.99	0.988
Suc	40.18±7.26	41.19±7.50	39.59±7.38	38.62±6.59	0.464
Aba	40.78±5.27	42.12±6.50	41.02±6.09	41.04±6.76	0.834
Def	44.42±5.13	44.42±5.62	43.75±5.20	44.42±6.14	0.890

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Category 3. Topical Scales					
Crs	48.46±6.62	48.38±9.83	50.47±6.35	49.96±8.34	0.429
Scn	47.46±5.38	47.58±5.19	46.77±5.02	47.13±5.42	0.875
Scf	58.08±7.30	58.58±9.06	57.58±9.53	57.68±9.16	0.962
Pad	44.54±5.40	46.69±5.61	44.72±5.99	43.94±8.04	0.357
Iss	64.60±6.69	65.81±7.92	65.19±7.85	64.32±7.40	0.830
Cps	55.52±6.46	58.15±8.28	57.48±7.33	56.98±6.73	0.372
Mls	43.54±5.43	45.08±6.60	42.55±5.30	42.34±6.70	0.207
Mas	53.84±7.58	55.69±9.27	53.66±8.94	53.74±8.86	0.761
Fem	36.12±6.02	38.08±7.09	35.48±6.93	34.87±5.13	0.184

The *p* values were determined on the basis of ANOVA analysis, significant differences between groups were indicated as * (post-hoc Tukey test, $p \leq 0{,}05$).

Discussion

Current studies on self-image in pregnant and postpartum women are scarce. The studies conducted by Kornas-Biela [18] demonstrated that compared to non-pregnant women, women in pregnancy demonstrate changes in their self-image which are sufficiently significant to be reckoned with by their environment. As regards the need scales, high scores in Succorance and Agreeableness, and low scores in Change, Openness to Experience, and Affiliation should be highlighted. The satisfaction of or failure to satisfy these needs affects the specific function of women during pregnancy. This specificity is also connected with the quality of the marital relationship, which in turn influences the manner in which women experience pregnancy. Although this was not considered in the studies, results of our previous studies demonstrate that there is a connection here [19].

The present study on the real self and ideal self of pregnant and postpartum women with depressive symptoms indicates that, compared to control individuals, significant differences are noticeable primarily with respect to the image of real self. The differences concern the number of favorable and unfavorable adjectives used to describe personality: the need scales such as Achievement, Dominance, Endurance, Intraception, Affiliation, Succorance, and Abasement, and the topical scales concerning personality traits such as Readiness for Change, Self-Confidence, Personal Adjustment and Creative Personality. Differences observed between pregnant and postpartum women with depressive symptoms in term of the real self-assessment, and in particular the identification of one's own needs and selected personality traits, may be affected by the different situations of these women, and primarily by the change in their roles – from (in a sense) the passive anticipation of labor and the related anxiety and fears, to the active caregiving to the newborn child. Generally, the results prove that pregnant women with perinatal depressive symptoms present less active, introverted, and somewhat seclusive attitudes, while postpartum women with perinatal depression are in their self-assessment more active and open to their environment. They present a higher degree of Dominance and Self-Confidence and a lower degree of Abasement and Readiness for Change. Such results may suggest

that, compared to pregnant women, postpartum women with perinatal depression tend to focus on childcare while prior fears concerning labor disappear; however, they still need support from their husbands, partners, or other family members.

It seems that perinatal depression in pregnant women disturbs primarily their real self. Thus, pregnant women with depression are found to be different in the description of their personality from postpartum women. This may result from both psychosocial factors (the different psychological situation related to the new situation after giving birth, which involves more duties and responsibility, i.e. excessive strain resulting from the new role) and biological factors (the influence of hormones and physiological effects of sleep deprivation) related to the condition of pregnancy and the postpartum period. Presumably, fundamental differences between pregnancy and the postpartum period constitute a strong determinant of the changes in real self-image from a more passive one in pregnancy towards a more active one after childbirth. At the current stage of studies it is only possible to say that considerable differences in the image of the real self amongst pregnant women result from a higher incidence of perinatal depression. Yet, it is still possible that such disproportions in self-image predispose women with certain personality traits to continued depression. This was not, however, the subject of our studies. Regardless of the direction of changes in the differences between mood disorders and differences in the real self, it should be assumed that distinct differences with respect to real self-assessment indicate the lack of self-acceptance, and that in turn is related to depression disorders.

Our results indicate that psychological intervention is needed in this group of patients, and in our opinion it should be offered both during hospitalization and within the framework of routine outpatient care. Early psycho-therapy may eliminate depressive symptoms, which would translate into psychological improvement, a higher assessment of the real self, as well as better childcare.

Conclusions

In conclusion, this study showed that pregnant and postpartum women with perinatal depression symptoms differ in terms of manner of self-expression and self-description as well as in the description of their needs and selected personality traits with respect to the real self-image, but no significant differences exist in the ideal (expected) self -image. The differences between pregnant and postpartum women correspond to the change of their role related to pregnancy and the postpartum period; passive attitudes in pregnancy give way to active attitudes after childbirth. A positive change in the real self-image, related to motherhood in the postpartum period, is observed despite the persistence of depressive symptoms. Numerous significant differences in the real self-image in pregnant women with perinatal depressive symptoms demonstrate their lack of self-acceptance, which usually concurs with the clinical picture of depression.

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