Incidence of postpartum abuse in women with a history of abuse during pregnancy

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Objective: To determine whether women with a history of physical abuse during pregnancy have an increased incidence of physical abuse in the 3 months after delivery.

Design: Follow-up survey.

Settings: A primary care community-based prenatal clinic, private obstetricians' and family physicians' offices in a large city, family physicians' offices in a small town and a tertiary care university teaching hospital.

Patients: Thirty-six women identified in a study of physical abuse during pregnancy; 30 (83.3%) agreed to participate.

Outcome measures: Number of incidents of physical abuse during the 3 months before conception, during the first, second and third trimesters of pregnancy and during the 3 months after delivery. General Health Questionnaire (GHQ) score to determine psychologic distress and predict psychiatric morbidity. Interview to diagnose psychiatric disorders according to defined criteria.

Results: Twenty-seven (90.0%) of the 30 participants reported a total of 57 incidents of abuse in the 3 months after delivery. For each period, the mean number of incidents of abuse per woman abused in that period was calculated and was found to be significantly higher for the postpartum period (2.1) than for the 3 months before conception (1.5) or for the first, second or third trimesters (1.4, 1.3 and 1.1) (F = 18.87, p < 0.001, one-way repeated measures analysis of variance.) This finding was confirmed by the Newman–Keuls post-hoc test, which also showed that the means for the preconception period and the three trimesters did not differ significantly between themselves. Nineteen (95%) of the 20 women who were abused in the first trimester were abused in the 3 months after delivery. Fourteen women (51.9%) obtained medical care for injuries from the postpartum abuse. The mean GHQ score was 7.7 (a score of 3 or more suggests psychiatric morbidity); from the psychiatric interview, 16 women (53.3%) were found to meet the diagnostic criteria for a major depressive episode, 9 (30.0%) had another psychiatric disorder, and 5 (16.7%) had no psychiatric disorder.

Conclusions: A significant increase was found in the mean number of incidents of physical abuse per woman abused during the 3 months after delivery over the mean number of incidents per woman abused during each of the three other periods. Physicians should be alert to physical abuse in postpartum women and should make specific enquiries if there is a history of abuse, current injury or depression.

Objectif: Déterminer si les femmes qui ont déjà été victimes de violence physique au cours de la grossesse le sont encore davantage au cours des 3 mois qui suivent l'accouchement.

Conception: Enquête de suivi.

Contexte: Clinique prénatale communautaire de soins primaire, cabinets privés d'obstétriciens et de médecins de famille d'une grande ville, cabinets de médecins de famille d'une petite ville et hôpital d'enseignement universitaire de soins tertiaires.

Patients: Trente-six femmes identifiées dans le cadre d'une étude sur la violence physique au cours de la grossesse, dont 30 (83,3 %) ont consenti à participer à l'étude.

Mesures des résultats: Nombre d'incidents de violence physique au cours des 3 mois qui ont précédé la conception, au cours des premier, deuxième et troisième trimestres de la grossesse et au cours des 3 mois qui ont suivi l'accouchement. Résultats du General Health Questionnaire (GHQ) afin d'évaluer l'état de détresse psychologique et de prédire la morbi-

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dité psychiatrique. Entrevues pour diagnostiquer les troubles psychiatriques selon des critères définis.

Résultats: Vingt-sept (90.0 %) des 30 participantes ont signalé au total 57 incidents de violence au cours des 3 mois qui ont suivi l'accouchement. On a calculé pour chaque période le nombre moyen d'incidents de violence subis par chaque femme violentée au cours de cette période, pour constater qu'il était beaucoup plus élevé après l'accouchement (2,1) qu'au cours des 3 mois précédent la conception (1,5) et qu'au cours des premier, deuxième et troisième trimestres de la grossesse $(1.4 \ 1.3 \ \text{et } 1.1 \ \text{respectivement})$ (F = 18,87 p < 0.001, analyse de variance à mesures répétitives à sens unique). Ce résultat a été confirmé par l'épreuve postérieure de Newman-Keuls qui a démontré aussi qu'il y avait peu d'écart entre les moyennes de la période antérieure à la conception et celles des 3 trimestres. Dix-neuf (95 %) des 20 femmes victimes de violence au cours du premier trimestre l'ont été aussi au cours des 3 mois qui ont suivi l'accouchement. Quatorze femmes (51,9 %) ont fait traiter médicalement des blessures causées par des actes de violence postpartum. Le résultat moyen du GHQ a été de 7,7 (un résultat de 3 ou plus indique une morbidité psychiatrique). À la suite de l'entrevue psychiatrique, on a constaté que 16 femmes (53,3 %) répondaient aux critères diagnostiques indiquant un accès majeur de dépression, 9 (30,0 %) souffraient d'un autre trouble psychiatrique et 5 (16,7 %) ne souffraient d'aucun trouble psychiatrique.

Conclusions: On a constaté une augmentation importante de la moyenne d'incidents de violence physique subis par chaque femme violentée au cours des 3 mois suivant l'accouchement, par rapport aux moyennes d'incidents subis par chaque femme violentée au cours des trois autres périodes. Les médecins devraient être à l'affût de la violence physique subie par les femmes après l'accouchement et devraient poser des questions précises devant des antécédents de violence, une blessure ou une dépression.

ecent interest has focused on the high prevalence of physical abuse of pregnant women. Rates ranging from 4% to 20% have been described in diverse areas across North America, and associations have been found between physical abuse during pregnancy and miscarriage, low birth weight, delayed prenatal care, substance abuse and other behaviours posing a risk to health. 1-9 The American Medical Association and the American College of Obstetricians and Gynecologists have recommended that practitioners be alert to signs of domestic violence in pregnant women and urge early referral when abuse is found. 10,11 Nevertheless, a recent Canadian study showed that less than 3% of physically abused pregnant women were identified by their prenatal care providers, even though injuries were often visible.12

Despite the current interest in physical abuse during pregnancy, there appear to be no studies on the abuse of women after childbirth. The postpartum period is known to be stressful. The couple must cope with the demands of a new baby, role adjustments to parenthood in their own relationship and in interactions with others (e.g., parents), sleep deprivation, increased financial responsibility, reduced sexual activity and the physical and hormonal changes experienced by the mother.^{13,14}

We recently reported the results of a questionnaire on physical abuse during pregnancy completed by 548 English-speaking women at 20 weeks' or more gestation.¹² The women were selected consecutively from a community-based prenatal clinic in a poor neighbourhood, private offices in large cities and small towns, and a maternity ward of a university teaching hospital in a large city.¹² Thirty-six (6.6%) of the women reported physical abuse during their pregnancy.

A follow-up study was undertaken involving these 36 women to determine the incidence of abuse in the 3 months after delivery and to determine whether women with a history of physical abuse during pregnancy are at increased risk post partum.

Methods

Study population

All of the women who reported abuse during pregnancy in the earlier study and disclosed their names were contacted by telephone 2 months after the expected date of delivery and asked to meet "the study doctor" in her hospital office to complete two brief questionnaires and an interview.

Instruments

The questionnaire designed for this follow-up study had face validity and asked participants about the occurrence of physical abuse (whether they had been hit, choked, slapped, punched, kicked, injured with a weapon or other object, or otherwise injured), the perpetrator of any abuse, and the number of incidents during the 3 months before conception, the first, second and third trimesters, and the 3 months after delivery.

The women also completed the General Health Questionnaire (GHQ), a widely used, valid and reliable indicator of psychologic distress and a predictor of psychiatric morbidity. This instrument has previously been used in studies involving battered women. The 12-item version used in this study excludes physical symptoms likely to be worsened by pregnancy or child care.

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In addition, I performed a diagnostic psychiatric interview using the criteria of the revised third edition of the Diagnostic and Statistical Manual of Mental Disorders. 16

The study was approved by the hospital's Institutional Research Ethics Board.

Statistical analysis

The analysis was done with the Statistical Package for the Social Sciences (version 4.0, SPSS Inc., Chicago). One-way repeated measures analysis of variance (ANOVA) and the Newman-Keuls post-hoc test were used.

Results

Thirty (83.3%) of the 36 women who reported abuse during pregnancy agreed to complete a questionnaire package and be interviewed 3 months after delivery. Of the remaining six, four had not disclosed their names on the prenatal questionnaire, one had moved without a forwarding address, and one refused to participate.

Twenty-seven (90.0%) of the 30 women who participated in the follow-up study reported a total of 57 incidents of abuse in the 3 months after delivery (Fig. 1). The number of abuse incidents post partum per patient varied from none to six. For each period, the mean number of incidents per woman abused in that period was calculated and was found to be significantly higher for the postpartum period (2.1) than for the 3 months before conception (1.5) or for the first, second or third trimesters (1.4, 1.3 and 1.1) (F = 18.87, p < 0.001, oneway repeated measures ANOVA). This finding was confirmed by the Newman–Keuls post-hoc text, which also showed that the means for the preconception period and the three trimesters did not differ significantly between themselves.

Of the 20 women abused in the first trimester 19 (95.0%) were abused in the 3 months after delivery.

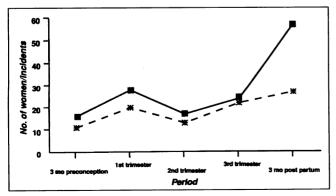


Fig. 1: Number of women physically abused (*) and number of incidents of abuse (*) in a sample of 30 women physically abused during pregnancy.

Fourteen (51.9%) of the women who were abused post partum had obtained medical care for injuries from the postpartum abuse, but none had volunteered or remembered having been asked the cause of their injuries.

The mean GHQ score post partum for the 30 women in the study was 7.7 (standard deviation [SD] 1.7). A score of 3 or more suggests psychiatric morbidity. Although the mean GHQ score obtained in the earlier study was lower (6.4 [SD 2.5]) the difference was not statistically significant.

From the psychiatric interview I found that 25 of the 30 women met diagnostic criteria for a current psychiatric disorder: 16 for major depressive episode, 4 for dysthymic disorder, 3 for post-traumatic stress disorder and 2 for adjustment disorder with depressed mood. Only two women who were physically abused after delivery did not meet the criteria for a current psychiatric disorder; three of the five women who did not have a psychiatric disorder were no longer being abused.

The incidents of physical abuse were perpetrated by common-law, legal or ex-husbands in 21 of the 27 cases (77.8%), boyfriends or ex-boyfriends in 5 (18.5%) and by a parent in 1 (3.7%).

Discussion

In this small sample of 30 women who were physically abused during pregnancy the mean number of incidents of physical abuse per abused woman was significantly higher in the 3 months after delivery than in the 3 months before conception and during pregnancy. This increase, which has not previously been described, is perhaps due in part to the increased stress of the postpartum period secondary to sleep deprivation, a crying baby, decreased sexual activity and the financial and emotional stresses of the transition to parenthood. Because 95.0% of the women who were abused in the first trimester were also abused in the 3 months after delivery, physical abuse during the first trimester should be regarded as a risk factor for postpartum abuse. To improve the rate of identification and optimize intervention after the discovery of abuse, physicians should enquire about abuse in early pregnancy and repeat this enquiry during and after pregnancy. Questions should also be asked about the safety of the infant and any other children in the homes of women who are abused.

Community resources for family violence include shelters for battered women and their children, childwelfare authorities, individual and group counselling for battered women, counselling for battering partners and a variety of social, psychiatric and legal referral sources. Physicians can often obtain a list of local resources through community social agencies or shelters for battered women.

The mean GHQ score was significantly elevated for the women who suffered postpartum abuse, and 25 (92.6%) of these women met diagnostic criteria for a

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current psychiatric disorder, most frequently depression. Because the incidence of postpartum depression in the general population has been shown to be 10% to 20%, abused women would seem to be at a much greater risk for depression. ^{13,14} This association between physical abuse and postpartum depression requires further study. In the meantime, physicians should consider abuse-related morbidity in women who present with depression or post-traumatic stress disorder post partum. Clearly, women in abusive relationships carry a heavy load of emotional suffering and psychologic disturbance.

Limitations of this study include a small sample and recall bias, to which the participants' reports about abuse before conception and during early pregnancy are subject. The relatively short 3-month period of follow-up after delivery leaves uncertainty about the pattern of abuse over a longer period after childbirth. Furthermore, although the number of incidents of physical abuse appeared to increase post partum, it is not yet known whether the postpartum period is a time of increased risk for women not abused during pregnancy.

This study needs to be followed up by a larger, prospective epidemiologic survey of physical abuse over a longer period after delivery in women with and without a history of physical abuse. Meanwhile, physicians should be alert to the possibility of physical abuse in postnatal patients and should ask specific questions, particularly of women with a history of abuse who present with injuries or depression.

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