Impact of Gender-based Violence on Psychological Distress and Happiness in León (Nicaragua)

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The researchers' aim for the current study is to analyze the impact of gender-based violence on mental health and happiness. The sample is composed of 136 women victims of gender-based violence, who were living in poverty. The participants contacted through the country's Commissariat for Women and Children and other associations working with the National Police from Nicaragua, a country with low levels of development. The results of the structural equation model show that the frequency of abuse has a direct effect on psychological distress and an indirect effect on overall happiness. The deterioration of mental health and social support have a direct effect on overall happiness. Consequently, emotional recovery and social support play an important role in the future of women victims of gender-based violence. This information can be useful to reduce psychological distress and improve care for women in specialized services.

Keywords: gender-based violence; anxiety; depression; happiness; social support.

Gender-based violence is considered a worldwide public health and human rights problem (Bott, Guedes, Goodwin, & Mendoza, 2012; Ellsberg & Emmelin, 2014). It is a global phenomenon embodied in different forms of physical, psychological and sexual violence, including control, aggression, threat, abuse, and assault (Guruge, Roche, & Catallo, 2012). Intimate partner violence is one of the most frequent manifestations of this phenomenon. Even social awareness has recently increased, it is still a serious problem today that requires urgent formal and informal resources and actions (Álvarez-Dardet, Padilla & Lara, 2013). Its major impact on the physical and mental health of women victims has been widely demonstrated (Al-Modallal, Peden & Anderson, 2008; García & Matud, 2015; Ishida, Stupp, Melian, Serbanescu, & Goodwin, 2010; McGarry, Ali & Hinchliff, 2016; Naismith, Ripoll, & Pardo, 2020; Plazaola-Castaño & Ruiz, 2004; Santos & Monteiro, 2018), however, the relationship between suffering violence and the subsequent effects on health is very complex, and the available published data is often limited, so new research, methodology and procedures are needed (World Health Organization, 2013).

A study conducted by the World Health Organization, involving a sample of more than 24.000 women from 10 countries with different cultural backgrounds, found that between 15% and 71% of ever partnered women had experienced physical and/or sexual violence inflicted by their partner, although in most regions the rates ranged between 29% and 62% (García-Moreno, Jansen, Ellsberg, Heise & Watts, 2006; García-Moreno, Jansen, Watts, Ellsberg & Heise, 2005). More recently, World Health Organization (2013) conducted a systematic review of scientific data on the prevalence of gender-based violence from 79 countries. The results reported that approximately one in three ever-partnered women worldwide had been a victim of physical and / or sexual violence inflicted by their intimate partner at some point in their lives. Furthermore, this

report showed that, in the Americas, 36.1% of women aged 15 years and over had ever suffered either non-partner sexual violence and/or physical or sexual intimate partner violence (World Health Organization, 2013). Variability of gender-based violence across cultures highlights the need to know the particularities of each context (Fischbach & Herbert, 1997).

In Nicaragua, according to the National Institute of Development Information (INIDE, 2008), 50% of ever-partnered women have been subjected to violence (physical, psychological or sexual) by an intimate partner during their lifetime. Looking at the different types of violence individually, 47.8% of those women have experienced psychological violence, 27% physical violence and 13.1% sexual violence. Physical, psychological and sexual violence against Nicaraguan women are related to levels of male power and control reflecting relationship dynamics (Grose & Grabe, 2014), and the use of violence seems to be part of the value system that guides family dynamics (Rivas, Bonilla & Vázquez, 2020a). In Leon, where the study was carried out, the estimated percentage of ever married women who had experienced physical violence was 52%, whereas it was 71% for emotional violence (Ellsberg, Peña, Herrera, Liljestrand & Winkvist, 2000). Likewise, in León it has been found that these two forms of violence (physical and psychological) are related, so the greater the frequency of psychological abuse, the greater the frequency of physical abuse and vice versa (Rivas, Bonilla, Redondo, Panadero & Vázquez, 2020b).

The study of the relationship between gender-based violence and women's mental health has recently got the attention of the scientific community, and has become a public health issue (Ellsberg, Jansen, Heise, Watts & García-Moreno, 2008; García-Moreno et al., 2005). Academic literature in the field of mental health shows that some of the most common consequences of gender-based violence are post-traumatic stress

disorders, anxiety, depression, low self-esteem and suicidal thoughts (Beydoun,

Beydoun, Kaufman, Lo & Zonderman, 2012; Campbell, 2002; García & Matud, 2015;

Golding, 1999; Ishida et al., 2010; Labrador, Fernández-Velasco, & Rincón, 2010;

Naismith et al., 2020; Pico-Alfonso et al., 2006). World Health Organization (2013)

reports that women who have suffered violence by an intimate partner are more likely to

develop stress, alcohol use disorders, depression and suicidal behaviour. Accordingly,

physical and psychological violence seems to be a predictor of depressive episodes and

state anxiety in women (Hegarty, Gunn, Chondros & Small, 2004; Pico-Alfonso et al.,

2006). The results of a multi-country study on women's health and gender-based

violence showed an existing relationship between experiences of violence and self-

reported poor health and specific health problems, such as memory loss, difficulty with

daily activities, emotional distress, suicidal thoughts and suicidal attempts (Ellsberg et

al., 2008). García-Moreno et al. (2005) highlight that some of the most recent health

problems of women are related to violence throughout life, so it may be possible that

the physical effects of gender-based violence could last over time even if the abuse

relationship has ended.

  Although the relationship between gender-based violence and its health effects

has been widely studied, most studies of its impact on women's health have been carried

out in high-income countries, and as such the situation in less-developed countries is

unknown (Ellsberg & Emmelin, 2014; Meekers, Pallin & Hutchinson, 2013). The

amount of studies in countries with lower levels of development is quite small, and

therefore the results of researches in high-income countries may not reflect the reality of

developing countries such as Nicaragua (Rivas, Bonilla & Vázquez, 2020c; Rivas-

Rivero & Bonilla-Algovia, 2020). The studies that have been carried out in the country

show that women who have experienced violence by an intimate partner are more likely

to report unintended pregnancies (Salazar & San Sebastian, 2014) and emotional distress (Ellsberg, Caldera, Herrera, Winkvist & Kullgren, 1999). In fact, ever-married women who had suffered severe violence during the last year, compared to women who had never suffered it, were approximately 10 times more likely to experience emotional distress, including anxiety and depression (Ellsberg et al., 1999). It has also been found that gender-based violence in Nicaragua is associated with suicide attempts (Rivas et al., 2020c) and post-traumatic stress disorder (Rivas-Rivero & Bonilla-Algovia, 2020).

On the contrary, social support is a protective factor against gender-based violence (Coker et al., 2002; Plazaola-Castaño, Ruiz-Pérez & Montero-Piñar, 2008), reduces the risk of suffering from health disorders, contributes to mental well-being and resilience, and mitigates the impact of violence (Machisa, Christofides & Jewkes, 2018; Stewart, Umar, Tomenson & Creed, 2014; Sylaska & Edwars, 2014). It also fosters positive moods and has a cushioning effect on women exposed to gender-based violence (García & Matud, 2015; Vázquez, Panadero & Rivas, 2015). Social support is particularly important when it comes from the people closest to the victim: family, friends and other people close at hand (Rivas, Panadero, Bonilla, Vásquez & Vázquez, 2018). In general, social relationships have a major influence on people's happiness and subjective well-being (Diener y Seligman, 2002). This subjective state of well-being is related to various factors and variables that interact with each other (Alarcón, 2001). Among victims of gender-based violence, the time elapsed since the most recent episode of violence and having somebody to turn to in case of need are factors that have a positive effect on women's happiness and expectations for the future (Vázquez et al, 2015).

Nicaragua has a population of approximately 6 million inhabitants and is one of the Latin America countries with the lowest Human Development Index (HDI) and

Gender Inequality Index (GII) (United Nations Development Programme, 2018). It ranks 124 in the HDI rank (value = .658) and 106 in the GII rank (value = .456). León, the city where participants live, has an estimated population of 185.000 inhabitants and is one of the most important cities of Nicaragua. It is a city with significant groups of people living in situations of extreme poverty and social exclusion (Suárez, Berríos, Bonilla & Vázquez, 2018; Vázquez, 2016; Vázquez, Berríos, Bonilla & Suarez, 2019; Vázquez & Panadero, 2016). The situation of poverty in the country can increase the vulnerability of women who suffer gender-based violence (Rivas, Bonilla & García, 2017), and the lack of institutional resources and support devices makes it difficult for them to break the cycle of violence (Rivas -Rivero & Bonilla-Algovia, 2020).

In this context, the researchers have analized different aspects surrounding psychological distress, general happiness and social support, in a sample of female victims of gender-based violence in Nicaragua, a developing country. The scenario proposed by researchers was that women who had been more frequently abused would report higher levels of psychological distress, which would affect perceived happiness levels; however, the investigators considered that social support from people around would increase women's happiness and expectations for the future.

Method

Participants

The study included 136 women victims of gender-based violence in the city of León (Nicaragua), who were contacted through the country's Commissariat for Women and Children and other associations working with the Nicaraguan National Police. A non-random sampling strategy was designed. The following criteria were used when selecting the participants: being over 18 years old and having suffered from gender-based violence. The participants are a difficult-access group, since they were women

living in poverty, which means a high level of social vulnerability. Table 1 presents the main socio-demographic characteristics of the sample. They were aged between 18 and 57 years old (M = 31.67; SD = 8.921). A mean figure of 4.48 people (SD = 2.488) live in the women's' homes, and 41.9% of the interviewees lived with their abuser. The interviewee was the main breadwinner in 24.8% of cases; nevertheless, 90.3% had weekly incomes of less than thirty Dollars. For this work, after the information on 16 participants who failed to answer the complete questionnaire has been discarded, the sample was made up of 120 women.

INSERT TABLE 1

Instruments

1. *Sociodemographic characteristics*. The information gathered related to age, number of children, social class, income level, employment status, marital status, interviewee's approximate income level, level of education, etc.

2. *Deterioration of Mental Health.* For this item, the Kessler Scale (Kessler et al., 1992) was used, adapted to Spanish by Vargas, Villamil, Rodríguez, Pérez & Cortés (2011). This scale evaluates non-specific psychological disorders in relation to anxiety and depression. It consists of 10 items with a Likert type response ranging from 1 (never) to 5 (always). The Kessler Scale score ranges are from 10 to 50 points. The higher the score on the instrument, the greater the psychological distress. The ranges of interpretation are as follows (Vargas et al., 2011): low (10–15), moderate (16–21), high (22–29) and very high (30–50). Cronbach's Alpha indicates an adequate level of reliability (α = .947).

3. *Multidimensional Scale of Perceived Social Support* (Zimet, Dahlem, Zimet, y Farley, 1988). The Spanish adaptation by Arechabala and Miranda (2002) was

used. This instrument consists of 12 items, which evaluates the social support received from family, friends and other important people. It is composed of three factors, each of which is related to one of these three areas (family, friends and people close to the women) (Rivas et al., 2018). The response options are a Likert-type scale of 4 points (1, hardly ever; 2, sometimes; 3, often; 4, always or nearly always) and the score on the scale ranges from 12 to 48 points. The higher the score, the higher the level of social support. The Cronbach's alpha obtained was .911.

4. *Conflicts Tactics Scale* (CTS, Straus, Gelles y Steinmetz, 1980). The Spanish adaptation by Larraín (1994) was used. This scale measures different forms of violence experienced in partner relationships. Some questions were selected to measure physical and psychological violence suffered by the participants. The questions were adapted to the Nicaraguan context to facilitate understanding. The answer format used is a Likert-type scale of 5 points: 0, never; 1, once; 2, sometimes; 3, often; and 4, very often.

5. *Frequency of episodes of abuse*. In order to calculate the frequency of abuse in the context of the intimate partner relationship, the women were asked about the general frequency of the abuse, and were given 4 response options: daily, 2-3 times a week, once a fortnight, and once a month.

6. *Perceived general happiness* (Vázquez et al., 2015). A single-question scale combining illustrations and text was used to evaluate the participants' general happiness. The response format is a Likert type ranging between 1 (very unhappy) and 7 (very happy).

Procedure

The empirical evidence was gathered with the help of professionals at institutions and associations working with women victims of gender-based violence in León. These include the Commissariat for Women and Children. These institutions contacted the women who had filed a complaint for abuse in the previous year, and the women who had requested their help despite not having filed a complaint. The objectives of the study were explained to the women, who participated anonymously and voluntarily, and informed consent was asked in order to respond to a questionnaire. The information was gathered using a heteroapplied structured interview. These interviews were performed by professionals with extensive experience in dealing with women victims of gender-based violence, and lasted between 45 and 80 minutes.

Data analyses

The database was designed using the SPSS statistical software package (IBM SPSS Statistics 22.0). The average scores on the General Happiness Scale and the Kessler Scale were compared with the *Student-t* test for independent samples *and one-factor ANOVA tests*, depending on the number of response options. A multivariate analysis was performed using SEM methodology (*Structural Equation Models*) to evaluate the relationship between the violence experienced, the frequency of the episodes of abuse, psychological distress, social support and general happiness. The structural equation model was designed with the AMOS software package (IBM AMOS 24.0). In specific terms, a *Path Analysis* was performed, and the Maximum Likelihood (ML) estimation technique was used. The multivariate normality was analysed using the Mardia Test (Mardia, 1974). The overall fit of the structural equations model was evaluated based on various factors: a) correlation between the variables in the model; b) factor loadings of the exogenous or predictor variables (p value $\leq .05$); c) absolute goodness of fit measures (χ^2, *df*, p value, CMIN/DF, RMSEA y RMSR); d) incremental and

parsimonious goodness of fit measures (GFI, NFI, CFI, TLI y AGFI). In order for a result to be considered statistically significant, a probability of committing a type I error of $p \le .05$ was adopted.

Results

The mean age when the relationship with the abuser began was 19.94 years old (SD = 4.912) and the women lived with him for a mean of 9.02 years (SD = 6.348). The mean duration the situation of abuse was 6.25 years (SD = 5.221) and it began when women were 22.22 years old on average (SD = 5.652). The entire sample had been the victim of some form of physical and psychological violence. Approximately 68% of the participants had been beaten by their partner (M = 1.53; SD = 1.484) and 75% had suffered from frequent or very frequent shouts and insults (M = 3.16; SD = .917). As regards the frequency of abuse, 9.5% of the women reported that the episodes of abuse occurred once a month; 24.1% that it did so every fortnight; 46.6%, several times a week; and 19.8%, every day.

Psychological distress was analysed using the scores obtained on the Kessler Scale (Kessler et al., 1992). Table 2 shows the mean scores and the frequency of symptoms of psychological distress. 70% of the women had felt tired for no reason in the previous month several times, and 58.4% had felt so nervous that nothing could calm them down. Meanwhile, 63.4% and 76.7% reported that they had felt hopeless and depressed respectively on several occasions. The average score obtained on the scale was 28.23 (SD = 8.377), which indicates high levels of psychological distress in women victims of gender-based violence (Vargas et al., 2011): 50.8% have very high psychological distress, 25% high psychological distress, 19.2% moderate psychological distress and 5% low psychological distress.

INSERT TABLE 2

Table 3 analyses the deterioration of mental health according to the frequency of episodes of violence. To do so, the response options for the frequency of abuse were recoded into two values: abuse taking place once or twice a month (1) and abuse taking place several times a week (2). The results show that psychological distress is related to the frequency of violence by the partner experienced, and as such, women who have been abused several times a week report higher levels of psychological distress (see Table 3). Statistically significant differences were obtained for the total Kessler Scale score according to the frequency of the episodes of abuse: the interviewees who experienced violence several times a week (M = 30.19; SD = 8.382) scored higher than those who suffered from violence once or twice a month (M = 25.67; SD = 6.690) (t = -2.932; p = .004).

INSERT TABLE 3

The average score on the happiness scale was 4.77 (SD = 1.200). 13.3% of the women consider themselves unhappy; 30.8% neither happy nor unhappy; and 55.8% happy. Four groups of women were created according to the score obtained on the Kessler Scale, in order to examine the relationship between the deterioration of mental health and general happiness. Women's levels of perceived happiness decrease as psychological distress increases: women with low psychological distress (M = 6.50; SD = .548), women with moderate psychological distress (M = 5.39; SD = .988), women with high psychological distress (M = 4.87; SD = .937) and women with very high psychological distress (M = 4.31; SD = 1,177) (F = 11,742; p = .000).

Table 4 shows the different scores for psychological distress according to general happiness. As is apparent, the women who considered themselves unhappy reported higher levels of psychological distress. The total score on the Kessler Scale reiterates the differences in terms of general happiness. The results were as follows:

women who considered themselves happy (M = 26.00, SD = 8,839), women who did not consider themselves happy or unhappy (M = 29.54, SD = 5.714) and women who considered themselves unhappy (M = 34.56, SD = 8.091) (F = 8.306; p = .000).

INSERT TABLE 4

The proposed structural equation model analyses the relationship between six observable variables (see Figure 1): physical violence, psychological violence, frequency of episodes of abuse, deterioration of mental health or psychological distress, general happiness and social support from a close friend. Mardia's coefficient was 5.616, and as such the *Path Analysis* was estimated using the Maximum Likelihood technique (Bollen, 1989). The goodness-of-fit indexes are suitable (Hu & Bentler, 1999) for both absolute goodness-of-fit measures and for incremental and parsimonious goodness of fit measures (χ^2 = 10.673; df = 8; p value = .221; χ^2/df = 1.334; RMSEA = .053; RMSR = .058; GFI = .971; NFI = .910; CFI = .974; AGFI = .923; TLI = .951). The structural model explains 23% of the variance of the "frequency of episodes of abuse", 20% of "deterioration of mental health" and 21% of "general happiness".

INSERT FIGURE 1

Table 5 shows the standardised regression weights and the significance of the relationships in the structural model. All the factorial loads (covariance relationships and causal relationships) are significant at the level of $p \leq .05$. Deterioration of mental health can be predicted based on the physical violence experienced (β = .324; $p < .000$) and the frequency of the episodes of abuse (β = .204; $p < .021$). Social support (β = .309; $p < .000$) and deterioration of mental health (β = -.340; $p < .000$) have a direct positive and negative effect on general happiness respectively. The frequency of episodes of abuse has an indirect effect on general happiness, which is mediated by the deterioration of mental health and psychological distress.

INSERT TABLE 5

Discussion

Although gender-based violence has been recognised as a human rights violation and is a public health problem worldwide (Fischbach & Herbert, 1997; World Health Organization, 2013), most of the research focusing on this phenomenon and studying its impact on the victims' mental health has been carried out in countries with high levels of development (Ellsberg & Emmelin, 2014; Meekers et al., 2013), meaning that an examination of the situation of the countries that are less visible in the scientific literature is required. This investigation reports on data concerning the relationship between abuse, mental health, social support and general happiness in a sample of women victims of gender-based violence; adds information to the lack of studies carried out in Nicaragua, a developing country with few studies thereon (Rivas-Rivero & Bonilla-Algovia, 2020; Rivas et al., 2020c); and highlights the consequences that violence of this type has on the health of Nicaraguan women.

The data for the prevalence of gender-based violence in Latin America and the Caribbean are very worrying, and show that it is one of the region's major problems (Bott et al., 2012). In the Americas more than a third of women have ever suffered either sexual non-partner violence and/or intimate partner violence at some point in their lives (World Health Organization, 2013). In Nicaragua, half of the ever-partnered women have suffered violence by an intimate partner (INIDE, 2008). This research shows that half of the participants were living with their abuser when the interview took place, and the duration of cohabitation with him was 9 years. Ellsberg et al. (2000) found that the abuse situation in Nicaragua lasted, on average, 5 years, while this research shows that it lasts more than 6. All the participants had been subjected to some form of physical or psychological violence, and more than 90% reported that the

episodes of abuse took place a few or several times in a month. This results, together with the ones previously found in international research (Bosch & Ferrer, 2003; Labrador et al., 2010), show that after violence has become established in the dynamics of the couple's relationship, abuse occurs repeatedly and is increasingly frequent. Nevertheless, unlike what was found in these studies, it seems that the frequency of the abuse against Nicaraguan women is higher and coincides with that of other developing countries such as El Salvador (Navarro-Mantas, Velásquez, Lemus & Megías, 2018).

In Latin America, experiencing physical and psychological violence by a partner, of varying degrees of intensity, is associated with the deterioration of women's mental health (Ellsberg et al., 1999; Santos & Monteiro, 2018), and women who are exposed to violence are more likely to experience symptoms of poor mental health than the non-victims (Ellsberg et al., 2008; García-Moreno et al., 2005; García & Matud, 2015; Ishida et al., 2010; Meekers et al., 2013). In this study, similarly to what was found in the ones mentioned above, the levels of psychological distress are related to the frequency of episodes of abuse. In other words, the impairment of women's mental health grows as the frequency of violence increases. Women who were abused several times a week have significantly more symptoms of psychological distress (tiredness, nervousness, restlessness, discouragement, hopelessness and feeling of uselessness) than women who were abused less than twice a month. Therefore, in line with research carried out in countries with high human development (Beydoun et al., 2012; Campbell, 2002; Hegarty et al., 2004; Labrador et al., 2010; McGarry et al., 2016; Pico-Alfonso et al., 2006), the data shows that exposure to gender-based violence in Nicaragua is related to the impairment of women's mental health.

The fact that most women reported episodes of abuse several times a month seem to have mediated in the scores obtained on the Kessler Scale (Kessler et al., 1992),

since the participants were found to have high levels of psychological distress, including symptoms of anxiety and depression. Bott et al. (2012) and INIDE (2008) reported that 58.1% of Nicaraguan women who had experienced violence by a partner in the last 12 months presented such levels of anxiety or distress that they could not complete their duties. The current study found that 75.8% of women victims reported high or very high psychological distress, 19.2% moderate psychological distress and only 5% low psychological distress (Vargas et al., 2011). The impact of gender-based violence on women's mental health seems to be higher than in other countries. Bernstein et al. (2016), found that, in a sample of pregnant women who had experienced violence by a partner, 14% scored above the psychological distress threshold in Kessler Scale. Pico-Alfonso et al. (2006) found that 36% of women who had suffered physical and psychological violence by an intimate partner had mild depression, 17.3% had moderate depression, 17.3% had severe depression and 29.3% had no depressive symptoms. Thus, high levels of psychological distress in Nicaraguan women seem to be related to the severity and frequency of gender violence in the country (Ellsberg et al., 1999).

Social support provides protection against gender-based violence (Coker et al., 2002; García & Matud, 2015; Plazaola-Castaño et al., 2008) and improves the expectations for the future of women who suffer from it (Vázquez et al., 2015). The structural equation model found in the study reports that gender-based violence has a direct effect on the deterioration of mental health and an indirect effect on perceived happiness. The more frequent the violence, the greater the psychological distress and the lower the levels of happiness. In contrast, social support from people around them increases women's perceived happiness and expectations for the future, creating a cushioning effect against violence. Supporting social relations is related to subjective well-being (Diener y Seligman, 2002; Vázquez et al, 2015) and has a positive influence

on women who are experiencing abuse (Rivas et al., 2018; Stewart et al., 2014; Sylaska & Edwars, 2014). Also, it may even favour the development of coping skills and psychological resilience (Machisa et al., 2018). Social support must therefore be one of the priorities for centres working with women survivors of gender-based violence.

It is important to keep in mind that in Nicaragua the negative attitudes of some sources of support could perpetuate the situation of abuse (Rivas et al., 2018), and also the situation of poverty of women in the country could make it difficult to leave the relationship (Rivas et al., 2017), so that institutional support must be guaranteed and aid devices must be accessible to all women. The high impact of violence on health suggests that the women victims will use the various social and healthcare services, even without reporting that they are experiencing abuse, which is why these services have a crucial role to play in identifying possible cases and in providing the support that women need (Álvarez-Dardet et al., 2013; Coker et al., 2002; Plazaola-Castaño & Ruíz, 2004). With this study, the researchers have shown that tiredness, nervousness, restlessness, discouragement, hopelessness and feeling of uselessness are frequent symptoms of psychological distress in Nicaraguan women who have suffered gender-based violence. Consequently, identifying these psychological sequelae can help healthcare professionals to spot gender-based violence and, if needed, refer women to other specialized resources such as legal, social or healthcare services (Swailes, Lehman, Perry, & McCall-Hosenfeld, 2016; World Health Organization, 2013).

The research provides new information regarding the influence of gender-based violence on psychological distress, and highlights the characteristics of this type of violence in Nicaragua, a developing country about which there have been few studies on this subject. It also identifies the role of social support in the women victims' expectations for the future. However, it is important to mention that the study has some

limitations, such as the transversal methodology used, and the fact that the women in the sample were exclusively from León. It is therefore necessary to conduct research with samples from all over the country, and to further study the implications of gender-based violence for mental health. Given the heterogeneous nature of women who suffer from abuse, and the varying degree of prevalence between one country and another (Abramsky et al., 2011; García-Moreno et al., 2005; 2006), the results of the study can facilitate the implementation of intervention strategies. In addition, it goes beyond the traditional approach centred on individual factors, and includes variables from the social environment that provide the analysis with a broader perspective, thereby contributing to the study of gender-based violence as a social and public health problem (Bott et al., 2012; Ellsberg & Emmelin, 2014; Fischbach & Herbert, 1997).

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Table 1

Sociodemographic Characteristics of the Sample

	N	%	Mean (SD)
Mean age (SD)			31.67 (8.921)
Womens with children	124	91.2	
Number of children (SD)			2.23 (1.655)
Marital status			
Single	33	24.3	
Married	31	22.8	
De facto union	46	33.8	
Separated	22	16.2	
Divorced	4	2.9	
Level education			
No education	4	2.9	
Primary education	93	68.4	
Medium leve lof education	24	17.7	
Higher education	15	11.1	
Interviewee's approximate income level			
No income of her own	48	35.8	
Less than 15 dollars a week	43	32.1	
15 to 30 dollars a week	30	22.4	
Over 30 dollars a week	13	9.7	
Main breadwinner in the home			
Interviewee	33	24.8	
Spouse or partner	57	42.9	
Others	43	32.3	

Table 2

Scores on the Kessler Scale

	Never or hardly ever		Sometimes		Almost always or always	
	n	%	n	%	n	%
In the past 30 days, how often have you felt…						
…tired for no reason?	36	30%	61	50.8%	23	19.2%
…nervous?	23	19.2%	66	55%	31	25.8%
…so nervous that nothing could calm you down?	50	41.7%	53	44.2%	17	14.2%
…hopeless?	44	36.7%	53	44.2%	23	19.2%
…restless or uneasy?	39	32.5%	61	50.8%	20	16.7%
…so restless that you could not sit still?	52	43.3%	51	42.5%	17	14.2%
…depressed?	28	23.3%	62	51.7%	30	25%
…so depressed that nothing could cheer you up?	47	39.2%	51	42.5%	22	18.3%
…that everything involved a great deal of effort?	47	39.2%	50	41.7%	23	19.2%
…useless?	56	46.7%	47	39.2%	17	14.2%

Table 3

Scores on the Kessler Scale according to the frequency of the episodes of abuse

	Frequency of episodes of abuse		
	Several times a week (n = 77)	Once or twice a month (n = 39)	*T de Student*
In the past 30 days, how often have you felt…			
…tired for no reason?	3.14 (1.048)	2.64 (.707)	2.694**
…nervous?	3.29 (.971)	2.90 (.680)	2.500*
…so nervous that nothing could calm you down?	2.83 (.951)	2.41 (.966)	2.240*
…hopeless?	3.04 (1.106)	2.59 (.751)	2.282*
…restless or uneasy?	3.09 (.989)	2.49 (.823)	3.278***
…so restless that you could not sit still?	2.87 (1.030)	2.44 (.852)	2.267*
…depressed?	3.23 (1.099)	2.95 (.647)	1.754
…so depressed that nothing could cheer you up?	3.04 (1.032)	2.49 (.854)	2.876**
…that everything involved a great deal of effort?	3.00 (1.051)	2.49 (.914)	2.590**
…useless?	2.66 (1.096)	2.28 (1.025)	1.804

*p ≤ .05; **p ≤ .01; ***p≤ .001

Table 4

Scores for psychological distress according to happiness

	Unhappy (n = 16)	Neither happy nor unhappy (n = 37)	Happy (n = 67)	*ANOVA*
In the past 30 days, how often have **you felt…**				
…tired for no reason?	3.56 (1.031)	3.03 (.600)	2.70 (1.115)	5.392**
…nervous?	3.56 (1.031)	3.24 (.548)	2.93 (1.034)	3.735*
…so nervous that nothing could calm you down?	3.19 (1.167)	2.84 (.727)	2.40 (1.016)	5.442**
…hopeless?	3.56 (1.153)	2.92 (.722)	2.63 (1.099)	5.746**
…restless or uneasy?	3.44 (.964)	2.92 (.795)	2.70 (1.030)	3.915*
…so restless that you could not sit still?	3.25 (1.065)	2.84 (.834)	2.45 (1.034)	5.056**
…depressed?	3.94 (.929)	3.14 (.631)	2.85 (1.104)	8.358***
…so depressed that nothing could cheer you up?	3.50 (1.033)	2.89 (.809)	2.58 (1.075)	5.722**
…that everything involved a great deal of effort?	3.25 (1.125)	2.95 (.705)	2.61 (1.154)	2.999
…useless?	3.31 (1.078)	2.78 (.821)	2.15 (1.091)	10.601***

*p ≤ .05; **p ≤ .01; ***p≤ .001

Table 5

Standardised regression weights of the relationships in the structural model

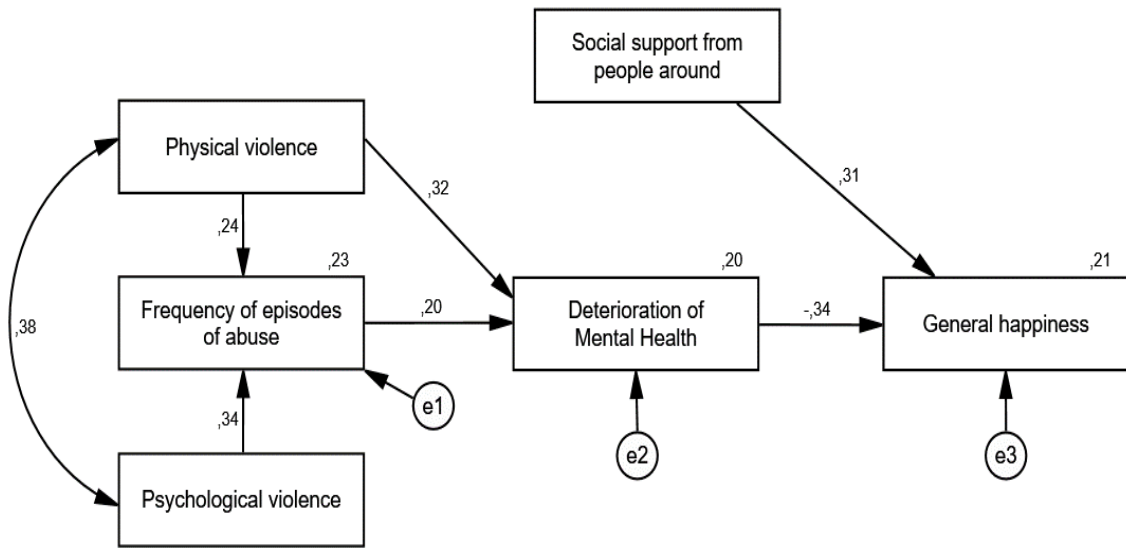| Causal relationships			Standardised regression weights	*p*
Physical violence	→	Frequency of episodes of abuse	.238	.006
Psychological violence	→	Frequency of episodes of abuse	.341	.000
Physical violence	←→	Psychological violence	.377	.000
Frequency of episodes of abuse	→	Deterioration of mental health	.204	.021
Physical violence	→	Deterioration of mental health	.324	.000
Deterioration of mental health	→	General happiness	-.340	.000
Social support from people arround	→	General happiness	.309	.000

Figure 1. Path Analysis