Mental Health and Paranoid Thoughts in College Students from Juarez.

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Abstract

Paranoid thoughts are a psychological consequence of the social violence lived by the people in Juarez, which in 2010 was the most violent city in the world. Most people in Juarez report some degree of paranoid thoughts and these thoughts have been related to mental health. This study analyzes the relationship between paranoid thoughts and mental health. The sample consisted of 315 college students with a mean age of 23.05 (SD = 0.59) years, 70.5% females and 29.5% males. Most of the sample was single (86.0%) and married (9.2%). The Paranoid Thoughts Scale and the Symptom Checklist-90-Revised were used to measure paranoid thoughts and mental health (e.g. depression, or anxiety), respectively. All of the mental health factors had statistically significant correlations with paranoid thoughts with correlations ranging from .38 to .57. The people that reported higher levels of paranoid thoughts also reported higher levels of psychological problems or distress. Paranoid thoughts can be considered a predictor of low mental health in people from Juarez.

Keywords: Depression, anxiety, mental health, violence

Introduction

Juarez City is located in the north of Mexico, across the border from El Paso, Texas, USA. For many years Juarez has been an important city for drug cartels to cross many types of drugs into the US. The Juarez Cartel used to control the city, but in 2008, the Sinaloa Cartel came into the city, declared a war against the Juarez Cartel, and the City of Juarez became a witness and a victim as a consequence of this war. President Felipe Calderon

intervened with sending armed forces to the city, bringing more violent confrontations between cartels and armed forces. At the end, the Sinaloa cartel took control over the city and the Juarez Cartel was relegated to a secondary role. The year 2009 had a big increment in violence, where one of every three dead people in all of Mexico was murdered in Juarez (Ibarz, 2009). The following year, 2010, Juarez was above the national mean in homicides by 757% (Milenio, 2010). In 2008 the homicide rate was 101 homicides per 100,000, and it increased to 191 per 100,000 people in 2010, when Juarez became the most violent city in the world with higher rates than San Pedro Sula, El Salvador, Caracas, Guatemala, Cali and even Baghdad (Milenio, 2010) (Milenio, 2010).

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Juarez became more violent than Medellin, Colombia, in 1991, when it reached its most violent year, 139 homicides per 100,000 people, when the Cartel of Pablo Escobar was fighting against the Cali Cartel (Milenio, 2010).

According to the Mexican government, the number of homicides in Juarez in the most violent years were the following: 1,587 murders in 2008 (Rodríguez, 2011), 2,643 murders in 2009 (Rodríguez, 2011), 3,103 murders in 2010 (Rodríguez, 2011), and 1,956 murders in 2011 (Observatory of Citizen Security and Coexistence, 2011) for a total of 9,289 murders in Juarez. From 2008 to 2010, there was an increase in violence, but in 2011 violence started to decrease. People in Juarez knew that the people being murdered were the ones involved with drug related activities, so even though there were a lot of homicides, people knew that if they were not involved they were safe. The problem came when other criminal groups started to target all of the people in Juarez, specifically those with higher socioeconomic status or business owners, who were being kidnapped or extorted. The rates for kidnaps reached 100 cases per one million people in 2009, a rate six times higher than Venezuela in 2008, the country with the most kidnaps for that year (Society and Technology, 2010). Another important consequence for the city was the children that were left orphaned, around 10,000, and with 40,000 family members that were affected directly (Blancas, 2010). (Blancas, 2010).

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The violent acts in Juarez had a negative impact in people, but the worst characteristic of them was that these acts were random and unpredictable. Before 2008, there was violence in the city, but it only occurred at certain times and in certain places that people avoided to be safe, since the violence was predictable. But in 2008, this violence increased and became unpredictable, since murders happened in schools, on the streets with a lot of traffic, in churches, in the supermarkets, during the morning, afternoon or night. There was no place or time that felt safe since anything could occur at any time everywhere. As mentioned earlier, people in Juarez knew that the murders were targeted at people involved in drug related

activities, but other criminal groups took advantage of the violent situation and started to target all people with extortions, kidnaps, carjackings and housejackings. People felt in danger, insecure, and not even the police or armed forced gave people peace since many people felt that people from these police groups were also involved with criminals. All of this violence in the city brought psychological consequences in its people like symptoms of depression, anxiety, and posttraumatic stress disorder (PTSD) among others (Quiñones, Esparza, & Carrillo, 2013).

As part of the psychological consequences of the violence in the community, Esparza, Gutiérrez, Montañez, and Carrillo (2016), reported an observed phenomenon which they called "Paranoid Thoughts", that most people reported even those that were not direct victims of violence. They validated the Paranoid Thoughts Scale that included items like "When a stranger comes up to me on the street or a public place, the first thing I think is that he/she will hurt me" and "When I see people with recent-model cars, I feel that a violent act can occur". People from non-clinical populations that experience traumatic events can develop paranoid thoughts (Gracie et al., 2007), and the experience in Juarez suggests that these events can affect people vicariously. Studies have primed people with no history of mental illness to have paranoid thoughts in virtual reality environments using news of street violence (Isnanda, Brinkman, Veling, van der Gaag, & Neerincx, 2013). This suggest that paranoid thoughts can be present in people with no history of mental illness in Juarez by being exposed to violence in the media and from word of mouth from other people. Paranoid thoughts are a symptom of PTSD, and according to the Diagnostic and Statistical Manual of Mental Disorders (5th ed.; American Psychiatric Association, 2013) PTSD is characterized by being indirectly exposed by knowing that a close friend or relative was exposed to trauma (Criterion A), and by having negative al

Methods: Participants

The sample consisted of 315 undergraduate students of the Autonomous University of Juarez City with a mean age of 23.05 (SD = 0.59) years, 70.5% female, and with 52.7% having a job. The reported marital status was: 86% single, 9.2% married, and 3.8% living together. The range of grades (10-point system) was from 6.5 to 9.9 with a mean of 8.9. Students who took classes in the morning were 24.4%, students who took classes in

the afternoon were 43.8%, and students who took classes in both morning and afternoon were 20.0%.

Instruments

Paranoid Thoughts Scale (PTS; Lozano et al., 2011). This scale is composed of eight paranoid thoughts that are related to social violence with response options that include never, sometimes, often, and always. The scale was written in Spanish, it only has one factor, and the reported internal reliability is α = 0.85 (Esparza et al., 2016; Esparza & Quiñones, 2012).

Symptom Checklist-90-Revised (SCL-90-R). This is a self-report scale that assesses psychological problems and psychological distress (Derogatis & Savitz, 1999). This instrument has nine factors that include somatization, obsessive compulsive, depression, anxiety, phobic anxiety, hostility, interpersonal sensitivity, paranoid ideation, and psychoticism. Participants are asked to rate the severity of 90 symptoms over the last week on a five-point response scale ranging from "not at all" to "extremely".

Procedure

Participants were recruited from the Autonomous University of Juarez City, they were asked to participate, and then they were given a consent form that explained their participation in the study, their rights, and they had an opportunity to ask questions about their participation. Students were given the scales previously described and at the end they got a more thorough explanation of the study. The data was captured in IBM SPSS Statistic computer program. To analyze the relationship between the factors of the SCL-90-R and the PTS, we used Person Correlation Coefficients.

Results:

Person correlation coefficients were computed to assess the relationship between each of the nine dimensions of the SCL-90-R and the Paranoid Thoughts Scale. Table 1 shows the correlation coefficients between each of the psychological subscales and paranoid thoughts.

Table 1	Pearson	Correlation	Coefficients	between th	ıe SCL-90-F	R and the PTS.

	Paranoid Thoughts		
Somatization	.44***		
Obsessive-Compulsive	.54***		
Interpersonal Sensitivity	.46***		
Depression	.40***		
Anxiety	.46***		
Hostility	.38***		
Phobic Anxiety	.48*** .44*** .47*** .57***		
Paranoid Ideation			
Psychoticism			
Total SCL 90			

*** *p* < .001.

Discussion and Conclusion

All correlations were statistically significant and the range was from r = .38 to r = .57, moderate to strong correlations (Cohen, 1992). The factors of the SCL-90-R correlated with paranoid thoughts. These paranoid thoughts were a consequence that was observed in people in Juarez after the violence started to increase. Even though most people had not experienced violent

started to increase. Even though most people had not experienced violent acts directly, they started to report these thoughts that were accompanied by feelings of anxiety. It has been found that people with no history of mental illness, that read news related to violence in the community, started to report thoughts of paranoia (Isnanda et al., 2013). This is similar to what happened in Juarez, when people listened experiences from others, read it in newspapers, or saw it in the television news, they started to feel unsafe, insecure, and started to report these thoughts related to paranoia

These traumatic events that the people of Juarez witnessed triggered paranoid thoughts in them. This study reports the correlation between psychological problems and distress measured by the SCL-90-R and paranoid thoughts. People with higher levels of paranoid thoughts also reported higher levels in somatization, obsessive compulsive, depression, anxiety, phobic anxiety, hostility, interpersonal sensitivity, paranoid ideation, and psychoticism. Even though this is not an experimental study and we cannot infer causality, we can see a strong relationship between both constructs, indicating that people who report higher levels of paranoid thoughts will also report higher levels of mental distress.

This finding suggests that mental health professionals who work with

This finding suggests that mental health professionals who work with people that live in communities with social violence, like Juarez, should implement a component in their interventions to deal and work with paranoid thoughts that are present. These paranoid thoughts, if not attended, can nurture feelings of being unsafe or insecure even if people are safe and secure, but because they are constantly exposed to news about violence in their communities, these thoughts will not disappear and will keep affecting people psychologically.

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