

Differential Impact of Secondary Traumatic Stress on Burnout Among Secondary School Teachers in Rural and Urban Areas of Delta State

Kate Ekedama¹, Trustee Efayena², Faith Iniabasi Imafidon³ Andrew Moyioritse Megbele⁴, Barnabas Othuke Umuoighoro⁵, Sunday Obro⁶

¹Department of Guidance and Counselling, Delta State University, Abraka, Nigeria.
ORCID: <https://orcid.org/0009-0004-1535-6242>; Email: kateekedama@delsu.edu.ng

²Department of Educational Management and Foundations, Delta State University, Abraka, Nigeria.
ORCID: <https://orcid.org/0009-0002-3754-8929>; Email: tefayena@gmail.com

³Department of Guidance and Counselling, University of Delta, Agbor, Nigeria.
ORCID: <https://orcid.org/0009-0009-1927-3803>; Email: faith.imafidon@unidel.edu.ng

^{4,5}Department of Educational Psychology, College of Education, Warri, Nigeria.
Email: megbeleandrew@gmail.com; Email: bbfego@gmail.com

⁶Department of Social Science Education, Delta State University, Abraka, Nigeria.
ORCID: <https://orcid.org/0000-0002-7675-9166>; Email: sobro@delsu.edu.ng

Correspondence: Sunday Obro, Department of Social Science Education, Delta State University, Abraka, Nigeria.

Received: January 5, 2026

Accepted: February 21, 2026

Online Published: February 26, 2026

doi:10.11114/jets.v14i3.8509

URL: <https://doi.org/10.11114/jets.v14i3.8509>

Abstract

This study investigated the differential impact of secondary traumatic stress on burnout among secondary school teachers in rural and urban areas in Delta State. This study utilised a descriptive design, with a population of 13,064 secondary school teachers and a sample of 388 teachers, comprising 204 from urban areas and 184 from rural areas. The Teachers' Secondary Traumatic Stress and Burnout Questionnaire, comprising 30 items, was used to collect data. Research questions were addressed using Mean statistics. A t-test was utilised for hypothesis testing at 0.05 level. The study findings demonstrated a significant disparity in the impact of intrusion on teachers' burnout between rural and urban centres. The study concluded that secondary traumatic stress has an effect on the degree of burnout of teachers, with the rural teachers having a bigger impact of the three aspects of avoidance, intrusion, and arousal. Among the recommendations are that education management and school authorities must come up with regular psychological support schemes, including counselling sessions and peer-support workshops, to enable teachers to cope with intrusive thoughts and emotional loads caused by the traumatic experiences of the students.

Keywords: differential impact, secondary traumatic stress, burnout, urban, rural, psychological support, secondary school teacher

1. Introduction

Teaching is a career and profession characterised by high and substantial emotional demands, persistent workload pressures, and increasingly complex student needs. No wonder Ekedama (2025) described the school system as a fundamental institution of socialisation, providing students with the knowledge, abilities, and attitudes they need to contribute effectively and positively to society. At the heart of this transformative process are teachers, indispensable agents not only in shaping behavioural and academic outcomes but also in advancing national development. Empirical evidence shows that many teachers experience significant psychological strain, including decreased well-being and elevated signs of exhaustion and detachment (Fiase et al., 2016; Chukwu et al., 2016; Aharandu & Nwankwo, 2023; Adeleye & Mahmud, 2023). This is concerning, as teacher well-being directly impacts student success and overall school performance.

A study identified that psychological distress and diminished professional fulfilment are linked with teachers' perceived inability to meet both academic and socio-emotional demands (Ajoku et al., 2021). Consequently, the quality of instructional delivery, teacher retention, and ultimately, student outcomes may be affected when such stressors remain unaddressed (Dasarath & Barman, 2016). This backdrop underscores the urgency of understanding the underlying mechanisms that lead to

emotional and professional decline among teachers. The consequences of neglecting teacher well-being can have long-lasting effects on the level of teaching that students receive. The existing education system frequently neglects the welfare and mental healthiness of teachers, resulting to burnout/tiredness and reduced job fulfilment (James et al., 2015; Ozoemena et al., 2021).

Among the various stress exposures that educators face, one less visible yet increasingly acknowledged pathway is the emotional burden that arises from intimate contact with individuals who have gone through trauma, suffering or distress. This phenomenon involves indirect exposure to traumatic narratives and the ongoing relational demands of witnessing or supporting those affected (Ormiston et al., 2022). Within this context, teachers in schools serving high-need populations or in environments with elevated student trauma often report higher psychological loads, which can manifest through intrusive thoughts, avoidance behaviours, or heightened physiological activation (Oberg, 2023; Acquadro-Maran, Dolce & Colombo, 2023). These responses highlight how the dimensions of this indirect trauma exposure each contribute in unique ways to teacher stress dynamics.

Specifically, teachers may experience repeated, unwanted recollections of students' trauma stories (intrusion), efforts to avoid engaging in emotionally challenging interactions (avoidance), and persistent hypervigilance or physical tension related to trauma exposure (arousal). Studies indicate a positive correlation between these experiences and the probability of professional emotional decline, with higher levels of these subcomponents significantly predicting increased exhaustion and disengagement in teaching roles (Schmidt et al., 2022). In school settings, rural and urban alike, the structural context (such as resource availability, class size, and student behaviour) may affect the degree to which these indirect trauma pathways influence teachers, highlighting the importance of differentiating by locale for investigation. Here, urban schools are those located within the local government headquarters and have basic amenities, such as electricity, tarred roads, and piped water, while rural schools are those located outside the local government headquarters and lack these basic amenities.

Given these relational and contextual demands, it becomes essential to examine how these indirect trauma exposures combine with existing job stressors to culminate in professional exhaustion and reduced efficacy. In many developing country contexts, research further suggests that workload, lack of institutional support, and unclear role expectations exacerbate the emotional load on teachers (Tsagem & Lema, 2022). It is based on the foregoing background that understanding the differential impact of Secondary Traumatic Stress (STS) on burnout among teachers in rural and urban centres has become necessary.

Historically, in Nigeria, a secondary school teacher's job has been known to be stressful, as teachers often have large class sizes and limited resources. Additionally, they are expected to cover several subjects and cater for diverse learning needs among students. However, this situation to date is what it has always been known for, leading to many teachers now experiencing deep emotional strain from working closely with students who struggle with psychological, social, or academic difficulties. Common issues include repeated exposure to students' traumatic experiences and managing behavioural problems such as aggression, truancy, and peer conflicts. For instance, a teacher in a rural community may often deal with students affected by domestic violence or local crises. At the same time, those in urban schools face overcrowded classrooms and the emotional weight of students' urban-related stress and trauma.

The aforementioned daily and ongoing pressures often lead to exhaustion, loss of motivation, and emotional detachment, which, in turn, affect teachers' overall performance and well-being. The consequences of these challenges extend well beyond individual teachers; they also affect the quality of teaching and the emotional climate of the classroom. Teachers who endure ongoing emotional strain often show lower enthusiasm, reduced empathy, and reduced instructional effectiveness, ultimately affecting students' learning and development. In such circumstances, the underlying factors of STS, intrusion, avoidance, and arousal can play a major role in shaping how teachers respond to and recover from these emotional demands. It is against these conditions that this study was considered timely and necessary.

1.1 Research Questions

- (1) How does intrusion affect teacher burnout in rural and urban schools?
- (2) How does avoidance affect teacher burnout in rural and urban schools?
- (3) How does arousal affect teacher burnout in rural and urban schools?

1.2 Hypotheses

- (1) There is noteworthy disparity in the impact of intrusion on teachers' burnout in urban and rural schools.
- (2) There is noteworthy disparity in the impact of avoidance on teachers' burnout in urban and rural schools.
- (3) There is no noteworthy disparity in the impact of arousal on teachers' burnout in urban and rural schools.

2. Conceptual Clarification

2.1 Secondary Traumatic Stress and Dimensions

STS is the stress people feel when they are indirectly exposed to others' traumatic situations, often as a result of caring

or professional activities (Woo et al., 2020). Despite not having been physically exposed to trauma, STS symptoms can include things like hyperarousal, intrusive thoughts, nightmares, avoidance behaviours, and reluctance to engage in activities that are associated with post-traumatic stress (Mancini, 2019). Inabnett (2023) found that trauma-stricken teachers were more likely to internalise their students' traumatised situations and experiences while working with these students. STS is commonly conceptualised in terms of three interrelated dimensions: intrusion, avoidance, and arousal (Woo et al., 2020; Mancini, 2019). Intrusion involves recurrent, distressing thoughts, images, or memories of the traumatic experiences witnessed or heard about. Avoidance reflects deliberate efforts to avoid or dodge things that remind them of their trauma. They are trying to escape the memories, emotions, and ideas associated with it.

Arousal, also termed hyperarousal, is characterised by persistent physiological activation, including irritability, heightened vigilance, and sleep disturbances. Empirical studies support the three-factor structure, demonstrating that these dimensions can differentially predict outcomes such as burnout, emotional exhaustion, and attrition (Inabnett, 2023; Bradford, 2024). For instance, intrusion may directly increase emotional exhaustion, while avoidance might lead to depersonalization in professional settings (Tyagi, 2025).

2.2 Burnout

Burnout is an occupational condition that arises from sustained exposure to work-related stress. According to the World Health Organisation (2019), the main symptoms of this condition are depersonalisation, emotional tiredness/exhaustion, and a decline in intellect, sense or knowledge of one's own or personal success. Emotional tiredness/exhaustion denotes the sensation of being depleted and overwhelmed by occupational demands; depersonalisation involves adopting distant, indifferent, or negative attitudes towards those served; whereas a decreased sense of personal success/achievement indicates a decrease in how one feels about their efficacy and accomplishments at work (Woo et al., 2020). In teaching, burnout has been linked to excessive workload, insufficient support, and exposure to student trauma, resulting in adverse effects such as reduced teaching effectiveness, increased absenteeism, and higher attrition rates (Bradford, 2024; Tyagi, 2025).

2.3 Literature Review

Alexander, Aikaterini, and Marina (2013) reported that the respondents experienced significant job-related stress.

Tsagem, Abubakar and Musa (2014) found that job stress is associated with job satisfaction. Nwimo and Onwunaka (2015), in their study on stress among secondary school teachers, reported that occupational stress significantly predicted burnout. Chukwu et al. (2016) examined how occupational stress is associated with burnout tendencies among teachers. The results showed that most teachers reported low to moderate occupational stress and low burnout. The correlation between occupational stress and burnout among teachers was minimal. Fiase et al. (2016) examined work-related stress among teachers. Findings revealed that nearly all respondents experienced significant job-related stress. Major sources of stress identified included inadequate and delayed salaries, slow promotion processes, and involuntary transfers, all of which reflected poor working conditions and were considered highly stressful by participants.

Karabatak et al. (2019) opined that stress negatively affects job satisfaction. Manal (2020) affirmed in her study that teachers experience work stress and that it can be both a physiological and a psychological source. Ozoemena et al. (2021) reported that the existing education system frequently neglects teachers' welfare and mental health, resulting in burnout/tiredness and reduced job fulfilment. Ajoku et al. (2021) identified that psychological distress and diminished professional fulfilment are linked with teachers' perceived inability to meet both academic and socio-emotional demands.

Aharandu and Nwankwo (2023) and Adeleye and Mahmud (2023) provided empirical evidence that many teachers experience significant psychological strain and elevated signs of exhaustion and detachment. In a similar study, Aharandu and Nwankwo (2023) examined the predictive influence of teachers' occupational stress on burnout tendencies. The findings indicated that occupational stress significantly predicted burnout tendencies among teachers in Rivers State. Ogunne and Annie-Ogan (2023) reported an association between stress and burnout. Bradford (2024) and Tyagi (2025) concluded in their studies that excessive workload, insufficient support, and exposure to student trauma lead to adverse effects, including reduced teaching effectiveness, increased absenteeism, and higher attrition rates.

3. Method

3.1 Participants (Subject) Characteristics

The population for this study consisted of 13,064 teachers distributed across Delta State 467 public secondary schools. A sample of 388 teachers, comprised of 204 teachers from urban areas and 184 teachers from rural areas, were employed using a stratified sampling procedure. The sample was first stratified into rural and urban schools to ensure representation from both contexts. Here, urban schools are those located within the local government headquarters and have basic amenities, such as electricity, tarred roads, and piped water, while rural schools are those located outside the local government headquarters and lack these basic amenities. Within each stratum, teachers were purposively selected based on criteria including teaching experience (minimum of three years), regular interaction with students, and

willingness to participate in the study. This sampling approach ensures that participants are both knowledgeable about the study variables and reflective of the different environmental contexts (urban vs rural).

3.2 Instrument

The instrument developed for this study was the Teachers' STS and Burnout Questionnaire (TSTS-BQ) developed by Laackmann and Dania (2025). It is a 30-item self-constructed questionnaire divided into three clusters, each corresponding to a study objective: Cluster A covered items on Intrusion, Cluster B on Avoidance, and Cluster C on Arousal. A four (4) point rating was used (Strongly Agree= 4, to Strongly Disagree= 1. The items measure the intensity of teachers' experiences across STS dimensions and their relation to burnout indicators.

3.3 Instrument Validity

The instruments content validity was ensured through expert review by professionals in Educational Psychology, Guidance and Counselling. Experts evaluated items for clarity, relevance, and alignment with the study purposes. In addition, to validate the contents, the cumulative variance was explained by all items on each scale in the instruments. The entire TSTS-BQ was 76.16%. The STS Scale accounted for 74.25% of variance across its 15 items with 25.75% unexplained, while the Burnout scale explained 84.81% of variance across its 15 items, with 15.19% unexplained.

The instrument's dependability/reliability was established and demonstrated utilising the Cronbach's alpha coefficient. Pilot data from 20 teachers yielded the following reliability indices: Intrusion=.87, Avoidance=.85, Arousal=.88. Overall, the instrument reliability is 0.90, indicating high internal consistency and suitability.

3.4 Procedure

Data were collected by direct administration of the instrument to teachers in their respective workplaces with the assistance of research aides over a period of one month. The school principals were duly consulted beforehand to ensure their consent. To guarantee precise answers, the questionnaires were handed out with detailed instructions. Participation was voluntary, and confidentiality of responses was strictly maintained.

3.5 Study Design

This study adopted a descriptive design.

3.6 Data Analysis

To address the various research questions, descriptive statistics (average/mean) were utilised, and hypotheses were tested using a t-test with a significance threshold of 0.05.

The data obtained from the 4-point scale were analyzed utilizing the arithmetic mean and standard deviation. A criterion mean of 2.50 was set to assess the relevance of each aspect. The calculation involved determining the mean of the scale values $(4+3+2+1)/4=2.50$. Thus, any item with a mean score of 2.50 or higher was classified as 'Agreed' or 'Significant,' but any item with a mean score below 2.50 was deemed 'Rejected' or 'Insignificant.'

The sample size comprised 388 teachers: 204 from urban areas and 184 from rural areas; 172 male and 216 female; with teaching experience ranging from 2 to 25 years across the three senatorial districts of Delta State.

4. Results

RQ1: How does intrusion affect teacher burnout in rural and urban school settings?

Table 1. Mean of the impact of intrusion on burnout among teachers in rural and urban centres

S/N	Items	Urban (n = 204)			Rural (n = 184)		
		$\bar{x}$	SD	Remark	$\bar{x}$	SD	Remark
1.	I frequently have unwanted thoughts about students' traumatic experiences	2.82	0.91	Agree	3.04	0.74	Agree
2.	I relive students' distressing events in my mind even when off duty	2.98	1.15	Agree	3.46	0.62	Agree
3.	I experience repeated images of students' trauma in my thoughts	3.28	0.84	Agree	3.42	0.74	Agree
4.	Students' traumatic experiences interfere with my sleep	2.81	1.19	Agree	3.58	0.69	Agree
5.	I have nightmares related to situations my students have experienced	3.16	1.09	Agree	3.57	0.55	Agree
6.	I feel emotionally affected by the accounts of students' personal hardships	2.75	1.11	Agree	3.11	0.85	Agree
7.	I find it hard to focus on my teaching because of students' traumatic stories	3.00	1.14	Agree	3.54	0.68	Agree
8.	I often recall distressing classroom events involuntarily	3.36	0.75	Agree	3.60	0.54	Agree
9.	I feel tense or anxious when reminded of students' difficulties	2.53	1.03	Agree	3.04	0.90	Agree
10.	I am mentally preoccupied with students' suffering outside school hours	3.00	1.05	Agree	3.07	0.85	Agree
	Grand Mean	2.97			3.34		

Table 1 revealed the impact of intrusion on burnout among teachers in rural and urban centres of Delta State. The result showed that teachers in urban locations agreed with items 1-10, with mean values exceeding the benchmark score of 2.5. This implies that teachers in urban centres frequently have unwanted thoughts about students' traumatic experiences, and relive students' distressing events in their minds even when off duty, among others, which contributes to burnout. On the other hand, the result showed that teachers in rural locations agreed to items 1-10, with mean values exceeding the benchmark score of 2.5. Consequently, the grand mean of 2.97 for teachers in urban locations and 3.34 for teachers in rural locations indicates that teachers in rural locations are more affected by intrusion STS, which in turn contributes to the level of burnout among teachers, than those in urban locations.

RQ2: How does avoidance affect teacher burnout in rural and urban school settings?

Table 2. Mean of the impact of avoidance on burnout among teachers in rural and urban centres

S/N	Items	Urban (n = 204)			Rural (n = 184)		
		$\bar{x}$	SD	Remark	$\bar{x}$	SD	Remark
11	I try to avoid discussions about students' personal or traumatic experiences	3.22	0.90	Agree	3.10	0.83	Agree
12	I limit my interactions with students who are likely to share distressing experiences	2.82	1.02	Agree	3.04	0.91	Agree
13	I avoid thinking about the difficulties some students face	3.24	0.91	Agree	3.30	0.67	Agree
14	I find myself steering clear of situations that remind me of students' trauma	3.21	0.92	Agree	3.39	0.68	Agree
15	I tend to distance myself emotionally from students who share upsetting experiences	2.18	1.13	Disagree	1.87	0.97	Disagree
16	I minimise involvement in extracurricular or counselling activities due to emotional strain	2.96	1.01	Agree	3.08	0.89	Agree
17	I avoid addressing sensitive issues in class to protect myself from distress	2.39	1.11	Agree	2.40	1.06	Disagree
18	I feel detached when students discuss their problems	3.01	0.85	Agree	3.11	0.51	Agree
19	I consciously change the topic or redirect students when they bring up trauma	2.71	1.14	Agree	2.48	1.24	Disagree
20	I avoid recalling specific students' traumatic events to reduce stress	2.95	1.03	Agree	3.24	0.65	Agree
Grand Mean		2.87			2.90		

Table 2 revealed the impact of avoidance on burnout among teachers in rural and urban centres. The results showed that teachers in urban locations agreed with items 11-14 and 16-20, with mean values exceeding the benchmark score of 2.5, whereas they disagreed with item 15, with a mean score below the benchmark of 2.5. This implies that teachers in urban centres try to avoid discussions about students' personal or traumatic experiences, and they also avoid addressing sensitive issues in class to protect themselves from distress, among other factors, which contributes to burnout. On the other hand, the result showed that teachers in rural locations agreed with items 11-14, 16, 18, and 20, with mean values exceeding the benchmark score of 2.5, while disagreeing with items 15, 17, and 19, with their mean score less than the benchmark score of 2.5. Consequently, the grand mean of 2.87 for teachers in urban locations and 2.90 for teachers in rural locations indicates that teachers in rural locations are more affected by avoidance STS, which in turn contributes to the level of burnout in secondary schools, than those in urban locations.

RQ3: How does arousal affect teacher burnout in rural and urban school settings?

Table 3. Mean of the impact of arousal on burnout among teachers in rural and urban centres

S/N	Items	Urban (n = 204)			Rural (n = 184)		
		$\bar{x}$	SD	Remark	$\bar{x}$	SD	Remark
21	I feel irritable or easily angered due to students' stressful experiences	3.08	0.86	Agree	3.35	0.55	Agree
22	I am constantly on alert for potential emotional or behavioural issues among students	3.01	1.06	Agree	3.47	0.74	Agree
23	I feel tense or anxious during interactions with students affected by trauma	3.03	0.96	Agree	3.30	0.53	Agree
24	I experience increased heart rate or sweating when dealing with challenging student situations	3.09	0.91	Agree	3.35	0.78	Agree
25	I find it hard to relax after a stressful school day	2.82	1.15	Agree	3.53	0.69	Agree
26	I am hyper-vigilant to student behaviours that may indicate distress	3.11	1.07	Agree	3.57	0.64	Agree
27	I feel mentally exhausted even after minor incidents with students	2.51	1.12	Agree	2.46	1.10	Disagree
28	I experience difficulty sleeping due to worrying about students' well-being	2.72	1.09	Agree	2.59	1.08	Agree
29	I react strongly to students' expressions of fear, anger, or sadness	3.18	0.93	Agree	3.49	0.71	Agree
30	I feel physically and emotionally drained after a day of teaching students with complex needs	2.43	1.10	Disagree	2.58	1.06	Agree
Grand Mean		2.90			3.17		

Table 3 reveal the impact of arousal on stress/burnout among teachers in rural and urban centres. The results showed that teachers in urban locations agreed with items 21-29, with mean values exceeding the benchmark score of 2.5, whereas they disagreed with item 30, with a mean score below the benchmark of 2.5. This implies that teachers in urban centres are hyper-vigilant to student behaviours that may indicate distress, and react strongly to students' expressions of fear, anger, or sadness, among others, which contributes to burnout. More so, the results shows that teachers in rural locations agreed with items 21-26 and 28-30, with mean values exceeding the benchmark score of 2.5, whereas they disagreed with item 27, with a mean score below the benchmark of 2.5. This implies that teachers in rural centres are constantly on alert for potential emotional or behavioural issues among students and find it hard to relax after a stressful school day, among other factors, which contribute to burnout. Consequently, the grand mean of 2.90 for teachers in urban locations and 3.17 for teachers in rural locations indicates that teachers in rural locations are more affected by arousal STS, which in turn contributes to the level of burnout in secondary schools, than those in urban locations.

Hypothesis 1: There is noteworthy disparity in the impact of intrusion on teachers' burnout in rural and urban centres.

Table 4. t-test on the disparity in the impact of intrusion on teachers' burnout in rural and urban centres

Location	n	$\bar{x}$	SD	df	tcal.	tcrit.	Sig.	Cohen d	Eta-Squared
Urban	204	2.971	5.62	386	8.58	1.96	0.00	0.87	0.16
Rural	184	3.368	2.94						

Table 4 indicates a notable disparity in the impact of intrusion on teachers' burnout between rural and urban school settings. The calculated value is 8.58, whereas the tabulated value is 1.96, with an effect size of 0.87. With Cohen's $d = 0.87$ and eta-squared = 0.16, the t-test results show a significant variance with a large effect size. Therefore, as the calculated value surpasses the tabulated value, the null hypothesis is rejected. Consequently, there is a notable disparity in the impact of intrusion on teachers' burnout in urban and rural schools.

Hypothesis 2: There is noteworthy disparity in the impact of avoidance on teachers' burnout in urban centres.

Table 5. t-test on the disparity in the impact of avoidance on teachers' burnout in urban and rural centres

Location	n	$\bar{x}$	SD	df	tcal.	tcrit.	Sig.	Cohen d	Eta-squared
Urban	204	2.878	4.81	386	0.57	1.96	0.57	0.058	0.029
Rural	184	2.902	2.86						

Table 5 indicates no notable disparity in the effect of avoidance on teachers' burnout in urban and rural schools. The calculated value is 0.57, whereas the tabulated value is 1.96, corresponding to an effect size of 0.058. With Cohen's $d = 0.058$ and eta-squared = 0.029, the t-test results indicate that the between-group variance is not statistically significant and that the effect size is negligible or very small. Consequently, because the calculated value is less than the table value, we accept the null hypothesis. Thus, there is no noteworthy disparity in the avoidance impact on teachers' burnout between urban and rural centre schools.

Hypothesis 3: There is noteworthy disparity in the impact of arousal on burnout among teachers in rural and urban centres.

Table 6. t-test on the disparity in the impact of arousal on teachers burnout in rural and urban Schools

Location	N	$\bar{x}$	SD	df	tcal.	tcrit.	Sig.	Cohen d	Eta-squared
Urban	204	2.712	8.87	386	6.49	1.96	0.00	0.66	0.31
Rural	184	3.152	2.56						

Table 6 indicates a notable disparity in the impact of arousal on teachers' burnout in urban and rural schools. The value calculated is 6.49, while the table value is 1.96, corresponding to an effect size of 0.66. With Cohen's $d = 0.66$ and eta-squared = 0.31, the t-test results indicate that a significant variance and that the effect size is of medium effect. Therefore, since the value calculated exceeds the table value, we reject the null hypothesis. In other words, there is a notable disparity in the impact of arousal on teachers' burnout in rural and urban centre schools.

5. Discussion

The results of hypothesis one revealed a notable disparity in the impact of intrusion on teachers' burnout and fatigue between rural and urban centres. This indicates that teachers in rural areas are more affected by intrusion STS, which in turn contributes to higher levels of burnout/tiredness in secondary schools in Delta State, than those in urban areas. The result concurs with that of Chukwu et al. (2016), who found that occupational stress and STS are positively and significantly associated with teachers' tendency toward burnout. Ozoemena et al. (2021) reported that the existing education system frequently neglects teachers' welfare and mental health, resulting in burnout/tiredness and reduced job fulfilment. Ajoku et al. (2021) identified that STS, psychological distress and diminished professional fulfilment are linked with teachers' perceived inability to meet both academic and socio-emotional demands.

The results of hypothesis two indicate no significant difference in the impact of avoidance on teachers' burnout and fatigue between urban and rural schools. This indicates that teachers in rural areas are more affected by avoidance STS, which in turn contributes to higher levels of burnout/tiredness in secondary schools, than those in urban areas. The findings align with those of Fiase et al. (2016), who found that teachers experienced significant job-related stress and burnout. The majority of respondents agreed that factors such as low salaries, delayed payments, lack of timely promotion, and involuntary transfers significantly contributed to their stress levels, indicating generally unfavourable working conditions. The study is also consistent with Aharandu and Nwankwo (2023), who reported that occupational stress significantly predicted burnout among teachers. Ogunne and Annie-Ogan (2023) reported an association between STS and burnout.

The results of hypothesis three revealed a notable disparity in the association between arousal and burnout/tiredness among teachers in rural and urban centres of Delta State. This is evidence that teachers in rural locations are more affected by arousal STS, which in turn contributes to the level of burnout/tiredness in secondary schools, than those in urban locations. This finding aligns with that of Aharandu and Nwankwo (2023), who reported that occupational stress among teachers significantly predicts their likelihood of experiencing burnout.

5.1 Conclusion

The study concluded that STS influences the level of burnout/tiredness or exhaustion among teachers in Delta State, with rural educators exhibiting a greater effect on the three dimensions of intrusion, arousal, and avoidance. It shows that the rural teachers are more vulnerable to the psychological impacts of exposure to the distressing experiences of students, as they frequently have to work in more problematic conditions with fewer resources and emotional support. This increased exposure leads to higher levels of emotional burnout, diminished professional gratification, and greater susceptibility to burnout. Thus, STS management is essential to improving teachers' well-being and maintaining the effectiveness of education in rural and urban schools.

5.2 Recommendations

1. Education management and school authorities must come up with regular psychological support schemes, including counselling sessions and peer-support workshops, to enable teachers to cope with intrusive thoughts and emotional loads caused by the traumatic experiences of the students.
2. The teachers should be given professional development and training based on trauma-informed training to enhance their coping skills and promote positive interaction with students, rather than experiencing emotional withdrawal, especially in rural areas.
3. The Ministry of Education and school administrators make the work environment more conducive by decreasing workload on teachers, improving welfare conditions, and putting in place relaxation or wellness programs that will assist the teachers to manage physical and emotional reactions and responses to stress.

5.3 Study Limitations

The limitations of this study warrant caution in interpreting the results and indicate the need for future investigation. A limitation of the stratified sample method used in the study is its complexity and high cost, dependence on unavailable data, and the potential for bias arising from inadequate teacher stratification. Consequently, the applicability of the findings to other teacher cohorts is constrained. Secondly, teachers may have minimised their stress levels owing to social desirability bias. The study also fails to consider individual factors related to teacher stress, including age, experience, personality type, self-efficacy, coping mechanisms, social support, and subjective perceptions.

Acknowledgments

The researchers acknowledge the participants in the study and the scholars whose work was utilised in this study.

Authors contributions

Not applicable.

Funding

Not applicable.

Competing interests

Not applicable.

Informed consent

Obtained.

Ethics approval

The Publication Ethics Committee of the Redfame Publishing.

The journal's policies adhere to the Core Practices established by the Committee on Publication Ethics (COPE).

Provenance and peer review

Not commissioned; externally double-blind peer reviewed.

Data availability statement

The data that support the findings of this study are available on request from the corresponding author. The data are not publicly available due to privacy or ethical restrictions.

Data sharing statement

No additional data are available.

Open access

This is an open-access article distributed under the terms and conditions of the Creative Commons Attribution license (<http://creativecommons.org/licenses/by/4.0/>).

Copyrights

Copyright for this article is retained by the author(s), with first publication rights granted to the journal.

References

- Acquadro-Maran, D., Dolce, V., & Colombo, L. (2023). Editorial: Secondary traumatic stress: Risk factors, consequences, and coping strategies. *Frontiers in Psychology*, 14, Article 1148186. <https://doi.org/10.3389/fpsyg.2023.1148186>
- Adeleye, M. A., & Mahmud, A. (2023). Organizational behavior and its impact on teacher burnout in public secondary schools. *Jurnal Pendidikan Indonesia*, 12(3), 511–518. <https://doi.org/10.23887/jpiundiksha.v12i3.66845>
- Aharandu, C. O., & Nwankwo, C. A. (2023). Occupational stress as predictor of burnout tendency of secondary school teachers in Rivers State. *Socialscientia Journal of the Social Sciences and Humanities*, 8(1), 76–84. <https://journals.aphriapub.com/index.php/SS/article/view/2037>
- Ajoku, E. A., et al. (2021). Assessment of sociodemographic and psychological well-being of primary school teachers in Enugu State, Nigeria. *BMC Public Health*, 21, Article 2327. <https://doi.org/10.1186/s12889-021-12397-x>
- Alexander, S. A., Aikaterini, P., & Marina, N. (2013). Occupational stress and professional burnout in teachers of primary and secondary education: The role of coping strategies. *Journal of Psychology*, 4, 34, 349–355. <https://doi.org/10.4236/psych.2013.43A051>
- Bradford, A. M. (2024). *Effects of secondary traumatic stress and burnout in special education teachers*, *Electronic Theses and Dissertations*. 573. <https://scholarworks.sfasu.edu/etds/573>
- Chukwu, C., Nwankwo, F. E. E., & Nwankwo, C. A. (2016). Relationship between occupational stress and burnout tendencies among secondary school teachers in Anambra State. *Journal of Guidance and Counselling Studies*, 1(2). Retrieved from <https://journals.unizik.edu.ng/jgcs/article/download/2391/1912/5777>
- Dasarath, U., & Barman, P. (2016). Teaching effectiveness of secondary school teachers in relation to their psychological well-being. *Journal of Humanities and Social Science*, 21(7), 50–58. <https://doi.org/10.9790/0837-2107075063>
- Ekedama, K. (2025). Emotional intelligence and job performance of teachers in Delta State, Nigeria. *Contemporary Research Analysis Journal*, 2(7), 377–382. <https://doi.org/10.55677/CRAJ/01-2025-Vol02I07>
- Fiase, T. M., Chukwu, E. O., Haruna, H., & Dawa, K. K. (2016). An assessment of work stress among secondary school teachers in Gboko Local Government Area of Benue State, Nigeria. *South American Journal of Academic Research, Special Issue* (May 2016), 1. <https://doi.org/10.21522/TIJAR.2014.03.01.Art029>
- Inabnett, M. S. W. (2023). *Secondary traumatic stress and other contributors to teacher burnout and attrition*. Unpublished Masters thesis, Department of Psychology, Louisiana State University. https://repository.lsu.edu/gradschool_theses/5847
- James, C. C., Stanick, C., Trautman, A., Crosby, L., Devlin, M., & Adams, S. (2015). Secondary traumatic stress in public school teachers: Contributing and mitigating factors. *Advances in School Mental Health Promotion*, 8(4), 244–256. <https://doi.org/10.1080/1754730X.2015.1080123>
- Laackmann, O. M., & Dania, P. O. (2025). Stress management strategies and social studies teacher classroom effectiveness in upper basic schools in Delta State. *Contemporary Research Analysis Journal*, 02(02), 93–98.

<https://doi.org/10.55677/CRAJ/03-2025-Vol02I02>

- Mancini, M. N. (2019). *Development and validation of the Secondary Traumatic Stress Scale in a sample of social media users*. Unpublished Masters thesis, Department of College of Sciences and Health Professions, Cleveland State University. <https://engagedscholarship.csuohio.edu/etdarchive/1132>
- Nwimo, I. O. & Onwunaka, C. (2015). Stress among secondary school teachers in Ebonyi state, Nigeria: Suggested interventions in worksite milieu. *Journal of Education and Practice*, 6(26), 93-100. <https://www.iiste.org/Journals/index.php/JEP/article/view/25715>
- Oberg, G. (2023). Compassion fatigue and secondary traumatic stress in teachers: How they contribute to burnout and how they are related to trauma awareness. *Frontiers in Education*, 8, Article 1128618. <https://doi.org/10.3389/feduc.2023.1128618>
- Ormiston, H. E., Nygaard, M. A., & Apgar, S. (2022). A systematic review of secondary traumatic stress and compassion fatigue in teachers. *School Mental Health*, 14(4), 802–817. <https://doi.org/10.1007/s12310-022-09525-2>
- Ozoemena, E. L., Agbaje, O. S., Ogundu, L., Ononuju, A. H., Umoke, P. C. I., Iweama, C. N., ... & Obute, A. J. (2021). Psychological distress, burnout, and coping strategies among Nigerian primary school teachers: A school-based cross-sectional study. *BMC Public Health*, 21, Article 2327. <https://doi.org/10.1186/s12889-021-12397-x>
- Schmidt, K. J., Milliken, D. B., González Morales, A. M., Traini, H. Q., & Velez, J. J. (2022). When teaching hurts: Exploring the secondary traumatic stress experiences of early-career SBAE teachers. *Journal of Agricultural Education*, 63(3), 216–232. <https://doi.org/10.5032/jae.2022.03216>
- Tsagem, S. Y. & Lema, M. M. (2022). Occupational stress and burnout among secondary school teachers in Sokoto Metropolis- Nigeria: How does coping strategies matter? *International Journal of Social Science and Human Research*, 5(7), 2889-2895. <https://doi.org/10.47191/ijsshr/v5-i7-16>
- Tyagi, S. (2025). A study of impact of burnout on organisational climate of secondary school teachers. *International Journal of Research & Innovation in Applied Science*, 10(8), 40–47. <https://doi.org/10.51584/IJRIAS.2025.100800040>
- Woo, T., Ho, R., Tang, A., & Tam, W. (2020). Global prevalence of burnout symptoms among nurses: A systematic review and meta-analysis. *Journal of Psychiatric and Mental Health Nursing*, 27(6), 347–364. <https://doi.org/10.1111/jpm.12674>
- World Health Organization. (2019). Burn-out an “occupational phenomenon”: International classification of diseases. <https://www.who.int/news/item/28-05-2019-who-classifies-burn-out-as-an-occupational-phenomenon>