



Attention deficit hyperactivity disorder and student academic performance in Biology

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ABSTRACT

The research investigates the influence of Attention Deficit Hyperactivity Disorder (ADHD) on the academic performance of Biology students in senior secondary schools in the Ondo East Local Government Area, Ondo State, Nigeria. The study adopted the descriptive survey research design. The study sample comprised 100 SSII Biology students in the Ondo East Local Government Area, Ondo State, Nigeria. The instrument used for data collection was the Attention Deficit Hyperactivity Disorder Questionnaire (ADHDQ). The instrument consisted of twenty items. Responses were based on a moderated Likert four-point rating scale. Experts in Biology, test measurement, and evaluation validated the instrument. A reliability coefficient of 0.85 was obtained. The Data collected were analyzed using mean and standard deviation to answer research questions. The findings showed that ADHD greatly influences students' academic performance in Biology. The issues of forgetfulness towards assignments, fidgeting, and blurting out answers all resulted in poor academic performance among ADHD students. It was recommended that the Government, parents, and Ministry of Education should pay close attention to affected students and find possible ways to help them. Trained counselors are to be employed and posted to all schools to provide counseling services to disordered (ADHD) students.

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ABSTRAK

Penelitian ini menyelidiki pengaruh Attention Deficit Hyperactivity Disorder (ADHD) terhadap prestasi akademik peserta didik Biologi di sekolah menengah atas di Ondo East Local Government Area, Negara Bagian Ondo, Nigeria. Penelitian ini mengadopsi desain penelitian survei deskriptif. Sampel penelitian terdiri dari 100 peserta didik Biologi SSII di Ondo East Local Government Area, Negara Bagian Ondo, Nigeria. Instrumen yang digunakan untuk pengumpulan data adalah Attention Deficit Hyperactivity Disorder Questionnaire (ADHDQ). Instrumen ini terdiri dari dua puluh item. Respons didasarkan pada skala penilaian empat poin likert yang dimoderasi. Instrumen ini divalidasi oleh ahli biologi, pengukuran dan evaluasi tes. Koefisien reliabilitas diperoleh sebesar 0,85. Data yang dikumpulkan dianalisis menggunakan mean dan deviasi standar untuk menjawab pertanyaan penelitian. Temuan penelitian menunjukkan bahwa ADHD memiliki pengaruh besar terhadap prestasi akademik peserta didik di Biologi. Masalah pelupa terhadap tugas, gelisah, dan melontarkan jawaban semuanya mengakibatkan prestasi akademik peserta didik ADHD yang buruk. Direkomendasikan agar Pemerintah, orang tua, dan Kementerian Pendidikan memberikan perhatian yang seksama kepada peserta didik yang terdampak dan mencari cara yang mungkin untuk membantu mereka, konselor terlatih harus dipekerjakan dan ditempatkan di semua sekolah untuk memberikan layanan konseling kepada peserta didik yang mengalami gangguan (ADHD).

Kata Kunci: Attention Deficit Hyperactivity Disorder (ADHD); Biologi; prestasi akademik

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INTRODUCTION

In any society, at a particular age and time, socially, emotionally, and morally, certain behaviours are expected from individuals according to their developmental stage. Failure to exhibit expected behaviour and attitude at such a stage may be seen as an issue that requires intervention. So also, a confident attitude exhibited by a child or adult that showcases hyperactivity and lack of attention seeks due scrutiny. Attention-Deficit/Hyperactivity Disorder (ADHD) is a persistent deliberating disorder that may impact many aspects of a child's life, including difficulties and social skills problems (Martin et al., 2012; Kofler et al., 2019).

ADHD is the most commonly diagnosed behaviour disorder in young persons. Attention Deficit Hyperactivity Disorder (ADHD) affects an estimated five to seven percent of youth, including school-aged children (Abdelnour et al., 2022). It is even stated that 90% of children with ADHD will continue to experience ADHD symptoms into adulthood (Sibley et al., 2022). Everyone has occasional difficulty sitting still, paying attention, or controlling impulsive behaviour. However, for some children and adults, the problem interferes with their daily lives at home, school, work, and in social settings. People with ADHD can be very successful in life. However, without appropriate identification and treatment, ADHD can have serious consequences, including school failure, depression, conduct disorder, failed relationships, and substance use. Therefore, early identification and treatment are essential.

Attention Deficit Hyperactivity Disorder (ADHD) is a neuro-developmental disorder that many recognize as a childhood disorder (Rosler et al., 2010 & DuPaul et al., 2016). Therefore, individuals with ADHD can be undertreated and may fail to receive a diagnosis of ADHD and sufficient treatment, which can result in life-long challenges and difficulties. Research has shown that adults with ADHD often complain of psychological and psychosocial difficulties that can impair functioning, well-being, and health-related quality of life in adulthood (Martin et al., 2012; Kappi & Martel et., 2022).

Affected individuals continue to show significant symptoms of ADHD into adulthood. Parents and educators are expressing common complaints about children who never sit still, act without thinking, are easily distracted, and cannot keep on to one task. They forget assignments, talk excessively, and fidget; they find it challenging to wait their turns and blurt out answers before completing questions. They carry behavioural problems into school. While in school, they equally pose problems to their educators and peers. They lack self-control and are sometimes aggressive, with short attention spans. Everything in their environment catches their attention. ADHD students jump from one activity to another without accomplishing any (Abikwi & Egbochuku, 2012; Widding-Havneraas et al., 2023; Zendarsky et al., 2017). They require different treatments based on their needs. Parents and educators may not understand these children's difficulties in learning.

Compared with adults without ADHD, adults with ADHD have a higher risk of developing depression, anxiety, substance abuse, anti-social behaviours, and lowered socioeconomic status due to work-related stress (Barkley et al., 2004; Chan et al., 2016), social skills deficiencies due to difficulties in affect recognition (Rappport et al., 2002; Kofler et al., 2019), increased anger expression (Richards et al., 2006; Sawyer et al., 2017), are more likely to commit anti-social acts and be arrested (Barkley et al., 2004; Chan et al., 2016), and an increased risk for motor vehicle accidents (Swensen et al., 2003; Brunkhorst-Kanaan et al., 2021). ADHD can hurt finances, career opportunities, income, retirement funds (due to impulsive spending), friendship groups, families, and coworkers (Bolic et al., 2013; Gnanavel et al., 2019). As a result, there is often a substantial psychological and psychosocial burden associated with undiagnosed and untreated ADHD.

When pupils with ADHD are left unidentified by parents and educators, the cumulative effects of low self-esteem, chronic school failure, and inadequate social skills may lead to adolescent antisocial behaviour,

which includes alcoholism, drug abuse, dropouts, and even suicide. The situation may be worse when the parents also manifest symptoms of ADHD (Brod et al., 2012; Kofler et al., 2019).

Several authors agree that academic performance is the result of learning prompted by the teaching activity of the teacher and produced by the student. Academic performance is the product students give and is usually expressed through school grades (Ogundiwin et al., 2024). Therefore, student grades are the result of students' performance in school, which also reveals their level of academic performance in the school itself (Adewumi et al., 2024a; Fasanya et al., 2023; Segun et al., 2024). On the other hand, students with ADHD may experience learning difficulties that affect their academic performance. In addition, ADHD is a disorder with several probable causes, one of them is there interactions between genetics, the environment, social factors, and some specific cases are related to an underlying medical condition affecting mother and child, infection or trauma to the brain (Martin et al., 2012; Kappi, & Martel, 2022).

Biology is one of the important science subjects. It is a pre-requisite subject for admission in higher institutions of learning. As stated by the Nigeria Federal Ministry of Education in 2013, one of the objectives of teaching Biology is to develop the ability to bring in principles in Biology to issues affecting individuals, community, environmental, societal health, and financial states. The influence ADHD has on the performance of Biology students cannot be overlooked. The adverse effect is not only on Biology as a subject alone but also on other subject areas. For this study, Biology will be the area of concentration.

The influence of ADHD on Biology students cannot be underestimated. The problem, ranging from lack of attention to hyperactivity and short-term memory loss, poses many problems to teachers and students. Despite the various works on the issue of attention-deficit hyperactivity disorders, it still poses challenges on the influence it has on the performance of Biology secondary school students. This disorder hinders many students from assimilating and focusing on lessons, and they exhibit impulsive attitudes. Most often, students with such disorders are not recognized for this and get on the nerves of both teachers and students. Other research works have focused on the influence of other forms of disorder on students. However, little or no work has been done on its effect on the Biology performance of secondary school students in the Ondo East Local Government Area, Ondo State, Nigeria. Hence, the researchers focused on the influence of attention-deficit hyperactivity disorder (ADHD) on the academic performance of Biology students in senior secondary school in the Ondo East Local Government Area of Ondo State, Nigeria.

This study sought to determine the influence of attention-deficit hyperactivity disorder (ADHD) on the academic performance of Biology students in senior secondary school in the Ondo East Local Government Area of Ondo State, Nigeria. The study aimed explicitly to 1) Examine the influence of ADHD on the academic performance of Biology students in senior Secondary in Ondo East Local, Ondo State; 2) Investigate the problems faced by ADHD students; 3) Investigate the complex encountered by teachers of ADHD students; and 4) Find out challenges faced by classmates of ADHD students.

LITERATURE REVIEW

Attention-deficit/hyperactivity disorder (ADHD)

Attention-deficit/hyperactivity disorder (ADHD) is an illness characterized by developmentally inappropriate impulsivity, inattention, and in some cases, hyperactivity. There are three different types of ADHD, each with different symptoms such as (1) predominately inattentive; (2) predominately hyperactive/impulsive, and (3) combined, that is a combination of inattentive and hyperactivity/ impulsivity (David, 2015; Faraone et al., 2006; Morgan et al., 2023).

ADHD patients exhibit symptoms found in both adults and children. A child with ADHD is susceptible to some actions and behaviors such as failure to give close attention to detail or making careless mistakes,

difficulty sustaining attention, attentiveness, struggles to follow through on instructions, difficulty with organization, dislikes tasks requiring sustained mental effort, easily distracted, forgetful in daily activities, fidgets with hands or feet or squirms in a chair, difficulty remaining seated, running around or climbs excessively, difficulty engaging in activities quietly, acts as if driven by a motor, talks excessively, Blurts out answers before questions have been completed, Has difficulty waiting or taking turns, Interrupts or intrudes upon others (Kaisari et al., 2017). In adults, poor attention, excessive distractibility, physical restlessness or hyperactivity, excessive impulsivity, saying or doing things without thinking, Excessive and chronic procrastination, difficulty getting started on tasks, difficulty completing tasks, frequently losing things, poor organization, poor planning and time, management skills, excessive forgetfulness. The cause of ADHD in both a child and an adult could be a result of genetic factors, dietary factors, brain injuries, environmental factors, etc (Abikwi & Egbochuku, 2012; Zendarsky et al., 2017).

The issue of genetics plays a significant role in every individual. Genes are passed down from parents to children, having some inherent traits and disorders that are biologically inherited. In addition, restrictive eating behavior is a symptom of attention deficit hyperactivity disorder (Kaisari et al., 2018). The impulsive nature of ADHD has long been associated with eating disorders, one of the symptoms of ADHD being increased eating disorders (Bisset et al., 2019; Martin et al., 2020). Besides, diet from infancy plays a significant role, as does the environment a child develops in both the womb and after birth. Brain injuries are also an important element to be noted as a cause of ADHD. However, a review of the literature as well as longitudinal studies of individuals with ADHD reveals that symptoms of ADHD can persist into adulthood (Abikwi & Egbochuku, 2012; Evans et al., 2016). Other psychiatric disorders can dominate the picture, causing symptoms of ADHD to be overlooked or even undiagnosed (Murphy et al., 2004; Morgan et al., 2023).

Researchers confirmed that children exhibiting some behaviors or characteristics associated with ADHD lacked attentiveness, impulse control, self-regulation of activity intensity, and organizational skills (Sonuga-Barke et al., 2003; Saya et al., 2018). For example, a study that examined executive function (EF) in 202 school-aged children with clinically diagnosed ADHD and/or DBD (disruptive behavioral disorder) found an association between deficit executive function, impaired inhibition, and ADHD condition (David, 2015). In addition, previous research has shown that these qualities have adverse effects on the presenting students' social functioning, ability to concentrate on schoolwork and lessons, inability to complete schoolwork, changing schools, school suspension, and expulsion, thus limiting the students' academic success and can lead to academic problems.

Three Theories of Dysfunction Associated with ADHD

This study is guided by three key cognitive and behavioral theories of dysfunction associated with ADHD: The Executive Dysfunction theory of ADHD, The Delay Aversion theory of ADHD, and the Social Construct Theory. These theories shall form the basis for examining the influence of ADHD on the Biology performance of the student and the knowledge of subtypes for categorization and management. The Executive Dysfunction theory of ADHD infers that ADHD behavioral manifestations are due to deficiencies in executive functioning, which is a result of abnormalities in the way biochemical operations of the brain perform, in particular, the front-parietal and front-striatal neural networks (Weiss et al., 2010; O'Connor & McNicholas, 2020). The Delay Aversion theory describes a behavioral attribute of preferring small instant gratification to a more significant delayed compensation (choice impulsivity). When the delay is anticipated, children with ADHD tend to be inattentive and become hyperactive as a reaction to avoid delays (Schubiner et al., 2000; Arruda, 2022). The social construct theory has a different ideology to the entire concept of ADHD. It suggests that the disorder is not necessarily a disease that requires medication, therapy, and other modes of treatment. However, it is a socially created theory to describe behaviors that are divergent from the norm.

METHODS

The descriptive survey research design was used to investigate the influence of ADHD on the academic performance of Biology students in senior secondary schools in the Ondo East Local Government Area, Ondo State. The population comprised all SSII Biology students in Ondo State. The study sample consisted of 100 Biology students randomly selected across 20 senior secondary schools in Ondo East Local Government, Ondo state, Nigeria. The researchers designed the instrument to collect data for the Attention Deficit Hyperactivity Disorder Questionnaire (ADHDQ) study. The questionnaire (ADHDQ) consisted of twenty (20) items used in the study. Responses were based on a moderated Likert four-point rating scale of Strongly Agree (SA), Agree (A), Disagree (D), and Strongly Disagree (SD). Experts in Biology, test measurement, and evaluation validated the instrument. The test-retest of reliability was adopted on 15 students outside the study area with the same characteristics, and a coefficient of 0.85 was obtained. The data collected were analyzed using descriptive analysis (mean and standard deviation) to answer the research questions.

RESULTS AND DISCUSSION

This research study explores the influence of attention-deficit hyperactivity disorder (ADHD) on the academic performance of Biology students in senior secondary school in the Ondo East Local Government Area of Ondo State, Nigeria. Four research questions were formulated and used to gather data from the respondents.

Statistical Analysis On The Influence Of ADHD On Students Academic Performance

Table 1. Respondents' view on the influence of ADHD on the academic performance of Biology students

S/N	ITEMS	SA	A	D	SD	\bar{x}	SD	R
1.	I find it hard to organize my thoughts during the pronunciation and identification of terms in Biology	30	60	7	3	2.85	0.24	A
2.	It is often difficult for me to pay full concentration while reading text in Biology	4	88	8	-	2.62	0.22	A
3.	I find it hard to sit in one place for a long time during the process of learning.	-	94	6	-	2.66	0.22	A
4.	I often forget to do my Biology assignment at home.	54	41	5	-	3.12	0.26	A
5.	Biology is my best subject but I don't do well in it.	41	34	6	19	2.65	0.17	A

Sources: *Field Survey, 2023*

Table 1 above revealed the analysis of the influence that ADHD has on the academic performance of Biology students in senior Secondary in Ondo East Local, Ondo State, Nigeria. Table 1 shows that the mean responses of item 1 have a mean of 2.85, which is greater than the cut-off point of 2.5. Thus, respondents agreed that they find it hard to organize thoughts during the pronunciation and identification of terms in Biology. The mean response of item 2 is 2.62, more significant than the cut-off point of 2.5. As a result, respondents agreed that it is often difficult to concentrate fully while reading Biology. The mean responses of item 3 with a mean of 2.66 is greater than the cutoff point 2.5. This suggests that they find it

hard to sit in one place for a long time during the process of learning. The mean responses of item 4 with a mean of 3.12 is greater than the cutoff point 2.50. Respondents agreed they often forget to do their Biology assignments at home. The mean response of item 5 with the mean of 2.65 is greater than the cutoff point of 2.5, which shows that respondents agree that Biology is their best subject but do not do well in it.

Statistical Analysis on the Problem Faced by ADHD Students in Academic Environment

Table 2. Respondents' views on the problems being faced by students with ADHD in the academic environment.

S/N	ITEMS	SA	A	D	SD	\bar{x}	SD	R
6	I often fidget with my hand and feet during classes.	11	75	-	4	3.00	0.24	A
7	I sometimes intrude on my teacher and classmate during classes.	-	85	15	-	2.64	0.22	A
8	I often blurt out answers before questions are completed.	-	91	9	-	2.74	0.22	A
9	I get punished most times due to my attitude.	-	86	14	-	2.8	0.23	A
10	There is difficulty in playing or engaging in leisure activities quietly.	12	75	11	2	2.9	0.24	A

Sources: Field Survey, 2023

Based on **Table 2**, it is known that overall, the items show an average value higher than the cut-off point, which is 2.50. The highest score is obtained in item 6, which gets an average score of 3. This shows that most respondents often fiddle with their hands and feet during class, likewise with item 7, which shows the attitude of respondents who often disturb teachers and classmates during class, where the average score on item 7 is 2.6. Furthermore, in item 8, the average response shows a value of 2.74, which is also greater than the cut-off point. Item 8 focuses on the attitude of blurting out answers before the question is finished, so it is known that respondents often have this attitude. The average response to item 9 was 2.8, more significant than the cut-off point of 2.50, showing that respondents agree they are most often punished for their attitude. The average response to item 10 is 2.9, showing respondents agree that there is difficulty in quietly playing or engaging in recreational activities.

Statistical Analysis on the Difficult Encountered by the Teachers of ADHD Students in the School

Table 3. Respondents' view on the difficulties teachers encountered with ADHD students

S/N	ITEMS	SA	A	D	SD	\bar{x}	SD	R
11	The teacher frowns at my attitude during lessons.	13	74	11	2	2.78	0.23	A
12	The noisy, disruptive and untidy attitudes cause distraction to my teacher.	12	82	4	2	2.95	0.24	A
13	My teacher complains about my inability to comprehend lessons taught.	-	86	14	-	2.6	0.22	A
14	My teacher complains about my forgetfulness towards my assignment.	4	92	4	-	2.92	0.77	A
15	I get reported often by my teachers to the school authority	12	83	4	1	2.85	0.74	A

Sources: Field Survey, 2023

Table 3 relates to respondents' views on the difficulties teachers face in dealing with ADHD students, where overall, the average score for each item is above the cutoff point of 2.50. This shows that respondents have a high level of agreement with each question item. In item 11, most respondents agree that their teachers frown at their attitude during the lesson as indicated by the average score of 2.78. Item 12 obtained the highest score in this category with an average of 2.95, which is greater than the limit of 2.5. Item 12 shows that respondents agree that noisy, disruptive, and untidy attitudes cause disturbances to their teachers, likewise with item 13, which also exceeds the limit point, where the average response to item 13 is 2.6, which is greater than the limit of 2.5. Accordingly, respondents agree that their teachers complain about their inability to understand the lessons. The average response to item 14 was 2.92, thus indicating that respondents agree that their teachers complain about their forgetfulness of their assignments. Item 15 obtained an average of 2.85, greater than the big point. Most respondents agree that their teachers often report them to the school.

Statistical Analysis of Challenges Faced by the Classmates of ADHD Students in the School

Table 4 below revealed the statistical analysis of challenges faced by classmates of ADHD students in the school in senior Secondary in Ondo East Local, Ondo State, Nigeria.

Table 4. Respondents' view on the challenges faced by classmates of ADHD students

S/N	ITEMS	SA	A	D	SD	SD	R	
16	My classmates complain about my attitude in class.	10	86	3	1	2.93	0.24	A
17	The sudden blurting out answers make my classmates frown at me	4	90	6	-	2.93	0.24	A
18	My classmate refuses to play with me in school.	30	50	16	4	2.53	0.22	A
19	My mates report me regularly to my teacher for noisemaking	18	80	-	2	3.13	0.81	A
20	My mates refuse to pair seat with me.	69	20	5	6	2.62	0.24	A

Source: Field Survey, 2023

Table 4 shows the data processing results of respondents' answers related to teachers' difficulties with ADHD students at school. Similar to other categories, the analysis results show that each average value of the items in this category, namely items 16 to 20, exceeds the limit point of 2.50. This shows that most respondents agree with the attitudes asked in each item. Item 16 obtained an average value of 2.93, indicating that their classmates complain about their attitudes in class. The response to item 17, with an average of 2.93, also exceeds the limit point of 2.5. Accordingly, respondents agree that the sudden answer makes their classmates frown. The average response to item 18 is 2.53, which is also greater than the limit point of 2.5, so it is known that respondents agree that their classmates refuse to play with them at school. The average response to item 19 is 3.13, more significant than the limit point of 2.50. Based on this, it is known that respondents agree that their friends report them regularly to their teachers for making noise. The last item, item 20, shows that respondents agree that their partners refuse to sit with them, as evidenced by the average value of 2.62, which is greater than the cutoff point 2.5.

Discussion

The analysis of research question one (1) in **Table 1** focused on influences of ADHD on academic performance of Biology students in senior secondary school in Ondo East Local Government, Ondo State, Nigeria. It was revealed that Attention-Deficit Hyperactivity Disorder hinders the teaching and learning process of Biology in senior secondary school in Ondo East Local Government, Nigeria. It makes concentration difficult and can also make the identification of terms and the organization of processes in Biology complex on the part of the students, posing a significant challenge to the teachers. Attention deficit hyperactivity disorder affects learners' performance in the classroom (Bisset et al., 2019). Parents and educators are expressing common complaints about children who never sit still, act without thinking, or are easily distracted and, as such, cannot keep to one task (Zendarsky et al., 2017).

The second (2) research question in **Table 2** focused on the problems ADHD students face in an academic environment. It was discovered that ADHD students forget assignments, talk excessively, and fidget; they find it challenging to await their turns and blurt out answers before questions have been completed, they find it difficult to pay attention in class, and they talk excessively. This is following the statement that ADHD is a neuro-developmental disorder that can persist into adulthood if not properly attended to, for it affects the behavioural pattern of the adolescent (Martin et al., 2020; Hayman, 2018; Rosler et al., 2010; DuPaul et al., 2016). These findings highlight the critical need for early intervention and implementation of supportive educational strategies to help students with ADHD succeed academically and socially where every school is required to provide appropriate guidance and education to students with special needs so that they can develop even though the strategies used in learning will be different from other students (Alfiyah et al., 2023).

The third (3) research question in **Table 3** focused on the difficulties encountered by teachers of ADHD students in the school. It was revealed that they exhibit behavioral problems in school. The teacher frowns at ADHD students' attitude during lessons; they make noise, are disruptive, and have untidy habits, causing distraction to the teacher in the classroom. The teacher complains about ADHD students' inability to comprehend lessons taught in the classroom. Because of ADHD, students will find it challenging to be still and active (David, 2015), which may be challenging for teachers. Even so, schools need to emphasize their role as mentors, where teachers must be able to pay more attention to students with ADHD (Alfiyah et al., 2023). That way, students with ADHD will be fully supervised by teachers when the learning process is taking place to minimize certain attitudes, such as moving around a lot, not focusing, and so on.

The fourth (4) research question in **Table 4** focused on challenges faced by classmates of ADHD students. It was discovered that ADHD classmate complain about their attitude in the classroom; they refuse to play with them and even report them to their teacher for making noise in the classroom. Failure to identify ADHD in pupils early on may result in the buildup of negative experiences, such as low self-esteem, repeated academic struggles, and social difficulties (Abikwi & Egbochuku, 2012; Kappi & Martel, 2022). Over time, this may worsen, leading to mild to severe antisocial behavior — ranging from disruptive behavior such as randomly answering questions to more serious problems such as substance abuse, dropping out of school, and even suicide.

The aforementioned research questions were raised during the study for both teachers and students, and the responses from respondents show that, indeed, ADHD affects the academic performance of students. Researchers reported that Biology is a pre-requisite subject, especially for science students who intend to study science-related courses in the citadel of higher learning (Ogundiwin et al., 2024; Adewumi, 2024 & Adewumi et al., 2024b). Therefore, there needs to be an approach for teachers and parents to be alert and understand the symptoms, such as carrying out proper supervision of students, and paying careful attention to students, so as not to have a negative impact on the academic achievement of ADHD students (Sholikhah & Pratisti, 2024), in the field of Biology or other subjects.

CONCLUSION

From the results, this study concludes that ADHD significantly influences the academic performance of Biology students in senior secondary school in Ondo East Local Government, Ondo State, Nigeria. Attention deficit hyperactivity disorder (ADHD) is associated with poor grades and abnormal behavior, which negatively affects students with ADHD and their classmates. Inconclusively, ADHD shows poor academic performance and poor educational outcomes. In advanced countries like Canada, the USA, and Europe, their government and schools authorities have made a standard support for students with ADHD in different ways such establishment of special schools for ADHD students, provision of educational assistants, etc.

The study's findings lead to the following suggestions being made: 1) The government should help provide facilities and necessary things needed by teachers of ADHD students. The Ministry of Education should ensure that trained counselors are posted in to the schools to provide counseling services for students who have this disorder; 2) School administrators should help educate and enlighten teachers about this disorder so that when they come across a student with this disorder, they can easily help out with the proper teaching method. Also, provisions should be made for them; 3) Parents should play their roles also by encouraging their kids with their disorder and letting them know that they can learn and excel in their academics while providing them with the right environment for them and the right mindset towards excelling; 4) School counselors, teachers, parents, and government agencies should actively participate and get involved with students who are disorders and help them manage these disorders and find their purpose and excel in their academic performance. Inconclusively, school administrators, teachers, parents, and guardians have a crucial role to play in monitoring students with ADHD symptoms.

AUTHOR'S NOTE

The author declares that there is no conflict of interest regarding the publication of this article and confirms that the data and content of the article are free from plagiarism.

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