Original Research Paper



Nutrition Science

IMPACT FOOD HABIT AND NUTRITION ON THE ACADEMIC PERFORMANCE OF THE STUDENTS.

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ABSTRACT Proper nutrition that abides by Central Government Guidelines is critical in the cognitive, behavioral, emotional, and physical functioning of students. Food and drink choices that students make are heavily based on their preferences and what is available to them. Students who consume balanced, nutrient dense food and drink perform better in areas of participation, behavior, attendance and get their assigned tasks done more completely than students who do not eat well. Young people of today will be functioning members of society in the future so equipping them with proper education and skills for success is a critical role that educators must capitalize on, however, improper nutrition often poses a serious barrier to equipping students with the necessary tools and skills for success. Many factors are to be associated with the lack of knowledge and initiative to make amendments within the system. In addition, many steps can be taken to implement the correct changes. This paper outlines the causes of malnutrition, the affects of poor nutrients, the vitality of specific nutrient, and ways to help the problems cease. Attention to the strong research and statistics, leads to transformation of the traditions and barriers of individuals choosing unhealthy lifestyles to see the benefits a healthy diet and exercise has on the academic success of students.

KEYWORDS: Nutrition, Food habit and Academic Performance

INTRODUCTION:

With more focus being placed on grade point average and overall academic performance in School, it is important to explore how life style factors, particularly eat- ing behavior, can influence students' academic success. As high scholars transition to School, oftentimes their health- related habits will change as they adjust to new resources, lack of parental guidance, and a different environment. It has been widely acknowledged that university students are far from reaching the public, national, and global health recommendations when it comes to dietary patterns.

A number of published studies have explored the correlation of eating habits and associated grades; however, most of this research focused on students in high school. On the other hand, there are only a limited number of studies concerning School students. Nonetheless, these studies are consistent with providing evi- dence that poor eating habits adversely impact academic performance, while healthy dietary behaviors are favorable predictors of academic success. Most of the studies involving School students have looked at risky health behaviors such as drug and alcohol use rather than routines that are encouraging health. The review by Burrows et al. confirmed that School students are an understudied population in regard to eating habits that foster academic success. Burkhalter and Hillman⁵ stated that the study of School students' health behaviors and their relationship to academic achievement is in its infancy. The purpose of this study was to further explore the influence eating habits of university students have on their overall academic performance by using GPA as an outcome measure. It was hypothesized that academic performance of School students would be better when healthy eating behaviors were practiced more frequently.

Although some studies reported higher academic achievement for School students who consumed a greater volume of fruits and vegetables, it has also been reported that a vast majority of undergraduates do not meet the recommended daily serving of fruits and vegetables. When School students did consume a larger amount of produce, their GPA was enhanced by as much as 0.15 points. A systematic review on the relationship between eating habits and academic success for university students looked at seven different studies and found that five of those reported higher academic achievement with increased fruit intake. Alternatively, students who had an increased intake of fast food experienced a decrease in GPA in another study

Need Of The Study:

The purpose of this paper is to examine relationships between nutrition and how it affects student success in school. Nutrition from food is critical for both physical and mental function and growth. National guidelines exist which regulate what constitutes adequate nutrition to support the body, and these guidelines have been at least partially integrated into most school curriculums, as well as food and wellness policies. Although adequate nutrition is critical for the body and mind to function, it is less attainable by some students due to a variety of factors, such as socioeconomic status, cultural barriers, and specific

preferences. Many of the academic and behavioral obstacles that students face in the classroom are fueled by inadequate nutrition and lack of understanding about what nutrition is and its importance. There are many actions that can be taken in attempts to ameliorate the issues of nutrition illiteracy and misunderstandings. These actions rely on central themes such as collaboration, creativity, and patience. Attempting to fix the issue of majorities of student populations suffering from obesity, eating disorders, or undernourishment is critical in the quest for advancements in all areas of school achievement and the assurance of bright futures for all students.

DISCUSSION:

Affects of Poor Nutrition

While the risks of unhealthy lifestyles are known to cause one to become overweight and be more at risk for diseases, students' academics are in jeopardy. Hungry and malnourished students have difficulty learning due to poor concentration, apathy, irritability, and a lack of energy and motivation. With these risks of malnourishment, the ability to effectively learn through engagement and hand-on activities are decreased In addition, if students are malnourished, the sleep cycle can also be disrupted due to a lack of vitamins and inability to sleep on an empty stomach. Between these consequences and the more serious factors of difficulty to problem solve, remember, and focus, students are more likely to have poor grades and a reduced academic performance. The biggest influence of students' academic performance is based on physical activity and diet because of the negative consequences comprised with it.

Affects of Nutrients

The lack of nutrition in students' lives raises questions to determine the impact of various vitamins on the students' achievement. Especially during the development and formative years, the student is growing and changing. When the proper nutrients are not obtained, proper growth and development cannot take place. It is not merely a matter of obesity and "cosmetic" reasons to encourage healthy eating, cognitive functioning is also in jeopardy. Children that lack proper nutrients when growing, perform lower in general academics and specifics such as reading, math, and vocabulary due to possibilities of delayed development.

Many specific nutrients are important in the development of healthy students, physically and cognitively. These include calcium, vitamin A, thiamin, riboflavin, and iron However, iron is of the greatest nutrients that affects achievement due to it's significance of transporting oxygen to the body to provide energy, influencing the attention span and overall cognitive ability of the student Research done by Halterman et al. (2001) determined math scores of iron deficient children scored lower than children with normal iron levels. Additional research has been done to determine the impact of nutritional supplements, such as a multivitamin on the students' lives. While a multivitamin would help students to achieve the Recommended Dietary Allowances (RDA) of vitamin and mineral levels needed to be healthy, there has not been strong evidence to point to the intellectual benefits on student achievement to encourage the intake of additional supplements that help to meet RDA standards The

position of the RDA has is to provide information and policies to people on the most vital nutrients and foods to eat to help supply information on needs for a healthy life by monitoring programs and diets (Goldberg, 1998). Consequently, information must be made available to others to demonstrate the impact of nutrients on achievement and success.

Advocates of child health have experimented with students' diets in Telangana States for more than ten years. Initial studies focused on benefits of improving the health of students are apparent. Likewise, improved nutrition has the potential to positively influence students' academic performance and behavior. Though researchers are still working to definitively prove the link, existing data suggests that with better nutrition students are better able to learn, students have fewer absences, and students' behavior improves, causing fewer disruptions in the classroom.

Improve Nutrition to Increase Brain Function

Several studies show that nutritional status can directly affect mental capacity among school-aged children. For example, iron deficiency, even in early stages, can decrease dopamine transmission, thus negatively impacting cognition. Deficiencies in other vitamins and minerals, specifically thiamine, vitamin E, vitamin B, iodine, and zinc, are shown to inhibit cognitive abilities and mental concentration. Additionally, amino acid and carbohydrate supplementation can improve perception, intuition, and reasoning. There are also a number of studies showing that improvements in nutrient intake can influence the cognitive ability and intelligence levels of school-aged children.

Provide a Balanced Diet for Better Behaviors and Learning

Good Nutrition helps students show up at school prepared to learn. Because improvements in nutrition make students healthier, students are likely to have fewer absences and attend class more frequently. Studies show that malnutrition leads to behavior problems, and that sugar has a negative impact on child behavior. However, these effects can be counteracted when children consume a balanced diet that includes protein, fat, complex carbohydrates, and fiber. Thus students will have more time in class, and students will have fewer interruptions in learning over the course of the school year. Additionally, students' behavior may improve and cause fewer disruptions in the classroom, creating a better learning environment for each student in the class.

Promote Diet Quality for Positive School Outcomes

Sociologists and economists have looked more closely at the impact of a student's diet and nutrition on academic and behavioral outcomes. Researchers generally find that a higher quality diet is associated with better performance on exams, and that programs focused on increasing students' health also show modest improvements in students' academic test scores. Other studies find that improving the quality of students' diets leads to students being on task more often, increases math test scores, possibly increases reading test scores, and increases attendance. Additionally, eliminating the sale of soft drinks in vending machines in schools and replacing them with other drinks had a positive effect on behavioral outcomes such as tardiness and disciplinary referrals.

Every student has the potential to do well in school. Failing to provide good nutrition puts them at risk for missing out on meeting that potential. However, taking action today to provide healthier choices in schools can help to set students up for a successful future full of possibilities.

CONCLUSION

After assessing the impact of nutrition and exercise on academic achievement, it is evident to see the value and need to provide assistance to students affected by the primary causes of poor nutrition. One's nutritional lifestyle affects the cognitive function and development level, influencing the academic achievement, school attendance, self- esteem, health risks, and weight of the student. Many factors such as knowledge, resources, environment, nutritional choices, and income attribute to the resulting figures. Since many studies have been performed to determine the needs that must be met to address these issues, knowledge has been established to understand changes need to be made in the school system to provide students with healthy meals, physical activity, and the knowledge to teach students to make healthy decisions for themselves. When areas as such are addressed, students' test scores and performances within the classroom will be attained, levels of cognitive functioning will result, and developmental areas will be met. As made evident in this paper, the

better the health and habits of students, the more successful students will be academically and in their overall lives No matter the realm, when students experience success, it will breed success.

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