



THE IMPACT OF EFFECTIVE RECESS DURATION ON ACADEMIC PERFORMANCE OF ELEMENTARY SCHOOL CHILDREN

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ABSTRACT

Background: It always is a priority for school administrators and policy makers to improve student's achievement scores. Reducing recess or break time to increase instructional time, has become a common practice in many parts of the world. Recess Breaks during continued subjective undertakings should lessen psychological obstruction and boost learning and accomplishment.

Objective: The objective of the study was to analyze the effect of increased recess time, adopting unstructured sports on English reading and Recall scores of 3rd and 4th grade students.

Methodology: The study employed a cross-sectional research design with pre-test and post-test scheme, experimental and control group, having 30 students each group from the elementary school of District Okara, Pakistan. The experimental group was assigned with an increased recess time of 60 minutes and the control group with 30 minutes a day. Sample was taken from the school by the simple random sampling using equal allocation, providing same difficulty environment. A scoring system was developed based on standardized tests. Statistical analysis was done by using t- test.

Results: Results indicate a significant difference between pre and post scores of experimental groups in English Reading and English Recall.

Conclusion: Policy makers and educationists must review policies and procedures regarding recess and must note its role in the academic performance.

Key Words: Physical activity, recess break, academic performance.

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Introduction

A few minutes relax time during the job or having a little recreational or free period with in an academic, physical or mental activity is beneficial (Jarrett, Marwell and Dichorson, 1998). There has been little research recorded about the historical backdrop of break (Ridgway, 2013). Most grown-ups can recollect the fervor of break, the chance to run free and play. Break gives youngsters a chance to enter the universe of imagination. Youngsters utilize their creative mind to turn into a fireman, mother, or genius competitor. Agreeing Ling, (2014), the break is important for people to be gainful, much like a recess or a break from a mechanical production system for grown-ups. In academic fields, recess is to have a mind relaxation for the preparation of next coming tasks. The recess is a little escape from the scheduled school routine. Mostly unstructured physical activities /sports are preferred during recess breaks (Huberty et al 2011). Additionally, break is a spot to rehearse compromise, participation, alternating, critical thinking, and correspondence. Cognitive ability in psychology is as vital as carbon in chemistry (Brand 1987, P 257). Infact it effects all phases of human life strongly. Breaks during continued subjective undertakings should lessen psychological obstruction and boost learning and accomplishment. The open door for peer connection during break encourages kids to pick up certainty while learning significant social aptitudes fundamental for fruitful connections all through school. So as to take an interest with peers during break, kids must figure out how to get on expressive gestures, tune in to other viewpoints, convey viably, control their conduct, and keep arranged principles. These practices are subjectively requesting; in any case, the high inspiration of play takes out psychological impedance. Best and Miller suggested in their review, both severe and light activities can bring better health functions, academic field /area / sessions. More academic learning hours covers the most of time, which is responsible for decrease in overall academic efficiency. The balance between academic learning and physical activity should be maintained by all concerns. Many researchers have proved that how recess break brings changes in social, physique and academic related qualities of school child.

According to WHO, obesity has increased with 100% ratio in the last three decades in the developed countries, so physical activity is essential to avoid obesity in children. One of the common reasons for children is to have enough good and sufficient meal and having less physical activity or low energy burn per day, with an average sitting duration of about 8.5 hours per day (Colley RC, et al 2011). Researchist and physical educators think that physical activities are a good

substitute of recess. Recess breaks provide an advantage to students to not spend sedentary lifestyle in schools. Otherwise, these types of sedentary school hours may affect their fitness, social and academic efficiency (McManus et al., 2015). Obesity is becoming a most serious health issue of this century (WHO, 2017). Every third child of America will be said obese (Castelli DM et al; 2015). The ratio roughly corresponds with other studies, which state one-in-four Pakistani adults as being overweight (Jafar, Tazeen H.; Chaturvedi, Nish; Pappas, Gregory (2006). Obese children face severe issues relating to the mental growth (Kamijo K, et al; 2012).

Chen, (2017) announced that there are four advantages of break: (1) expanded physical action, (2) improved consideration, (3) improved insight and (4) practice of shared social aptitudes. The fourth advantage is frequently ignored, yet it is the key range of abilities. Physical movement increased through break is emphatically connected with expanding the youngsters' mental prosperity, improves bone wellbeing, and upgrades engine aptitudes (Chang, 2015). Often adolescents suffer in each part of their improvement if they are not exhibited to adequate play time. Improvement, through the sort of physical activity, extends the number and utmost of veins in the cerebrum, which helps transport of oxygen, water, and glucose (Kriemler, 2011). Researchists detailed that numerous instructors found that break helped their understudies concentrate better when they came back to the study hall in the wake of having break. Shafer, (2017) found rather that financial status (SES) had more to do with scholastic execution than their physical action. Friend cooperation's at break "encourages the improvement of social aptitudes important to collaborate with others decidedly and gainfully" (Perera, 2015). The improvement of these social aptitudes come in a wide range of structures and produce different abilities including exchange, collaboration, sharing, critical thinking, constancy, poise, and the capacity to adjust to one's condition (Railey, 2016). As indicated by Chen, in China each youngster is to take an interest in at least one game occasion (Chen A, 2015). Turner, Chaloupka and Chriqui (2013) examined the American National Polices identifying with break. They finished up on the bases of computation, that polices in the support of break are not adequate to acquire improvement in this field. The Pediatrics Academy of America (2013) printed an examination in which rationales on break benefits were given for the younger students. As indicated by article understudies wish to play unstructured games and are not happy with having free minute as it were. Maximum girls and boys having low skill level try to spend that time without performing any physical activity (Ridger et al., 2012)

In European nations, they have embraced the "Wellbeing Promoting School" approach (Stewart B, 2006). Finland like other propelled nations didn't expand subject learning span and didn't diminish physical training length (Piipari, 2014). In Finland, break for physical activity is likewise given, alongside the PE classes (Jubha K, 2017). Most extreme schools in Australia are furnished with playing offices identifying with fields and sports gears (Brendon PH, Barbara C, Leanne L, 2015).

According to a Researchist, for participation in games during recess break, girls and boys having low skill level, try to spend that time without performing any physical activity (Ridger et al., 2012). Administrators remain worried about the sufficient time periods for academic activities to achieve best results. In every few articles, the recess duration through physical activity is specified to gain effective academic performance / outcome. In maximum developed countries such as in USA and European countries, the recess duration is squeezing day by day (Shaffer & Whitehouse, 2017).

As per Rhea, (2016), the prescribed measure of time for kids to have in the break is more noteworthy, equivalent to 20 minutes out of each day. While the National Association for Sport and Physical Education suggests an hour of physical movements every day. So, the effective duration would be considered from 30 minutes to achieve well academic efficiency. There are different patterns regarding recess duration, throughout the world. In some countries of Europe, recess is provided once or twice in a day, often just before or after lunch. Its duration is from 15 minutes to 45 minutes. In Japan, students are given 5-to-10-minute breaks between consecutive class sessions. Many elementary schools also include a 20-minute recess. In most countries, like America, 15 to 20 minutes' recess is introduced. In a very few countries, 30 minutes or more activity duration is allowed to children, like China.

In this study, efforts are made to reveal that in schooling systems physical activities/sports during recess breaks bring positive effect on academic efficiency of students.

Objective

The study was conducted to analyze the effect of increased recess time adopting unstructured sports on English Reading Scores and English Learning Recall Scores.

Ha: There will be a significant effect of increased recess time on English Reading and English Learning Recall Scores.

Ho: There will be no significant effect of increased recess time on English Reading and English Learning Recall Scores.

Study Design

The study employed experimental research (cross-sectional research design). In this examination, the free factor was break. The trademark present gathering was recognized as the gathering in which break was enhanced. The control group was recognized as the gathering in which the break was controlled. The result measured the third and fourth grade English accomplishment scores. The examination was intended to decide the impact of break and scholarly accomplishment for 08 weeks. The experimental bunch had an everyday hour long rather than a 30-minute day by daybreak. Break occurred outside on the school's play area. Understudies approached play area hardware, for example, slides, swings, and they approached bounce ropes, and football. Break was directed by guaranteed educators and understudies were allowed to take an interest in their preferred actions with their preferred companions.

The study was conducted from the school of Okara (Punjab), the city of Pakistan. A total number of 60 students were recruited from the school and the experiment and control; both groups consisted of 30 students each. The simple random sampling method/technique was utilized. According to the statistical literature sample of 30 is considered a good sample size.

Data Collection & Analysis Procedure

The scores of English reading and English recall, for every understudy were kept up on everyday schedule for two months. The information was based on a 10-point rating scale and scores for every one of the detailing classes.

The information was treated into SPSS (23.0), which was utilized with the end goal of information examination. Data obtained by the experiment conducted was analyzed through Excel. The investigation of the information included Independent Sample t-test. The degree of criticalness was set at 0.05.

Ethical Consideration

The rules and regulations set by the ethical committee of university of Lahore were followed while conducting the research and the rights of the research participants were respected.

- All information and data collection were kept confidential.
- The subjects were informed that there are no disadvantages or risk on the procedure of the study.
- They were also being informed that they will be free to withdraw at any time during the process of the study.
- Data was kept in under key and lock. In laptop it was kept under password.

Results

Table-1

English Recall Pre & Post Results

Group		Pre-English Recall	Post English Recall
Experimental	Mean	5.2333	7.2667
	N	30	30
	Std. Deviation	.43018	.63968
Control	Mean	5.2200	5.0667
	N	30	30
	Std. Deviation	.41139	.25371
Total	Mean	5.2267	6.1667
	N	60	60
	Std. Deviation	.41736	1.20966

At pre-test, the mean scores of both the groups for English Recall were almost equal i.e., 5.23 for the experimental group and 5.22 for the control group. At post-test, it increased to 7.2 for the experimental group as shown in Table-1 above the lines.

Table-2

Comparison of students of experimental group for pre and post result

	Mean	SD	t-score	p-value
difference(d)	-4.23	1.98	11.701	.00001

Value of t-score and its p-value i.e., .00001 shows that difference between pre performance of the students and post-performance of the students in experimental group is significant it means, more than 30 minutes rest effects the students positively.

Table-3

English Reading Pre & Post Results

Group		Pre-English	Post English Reading	
		Reading		
Experimental	Mean	5.2000	7.4000	
	N	30	30	
	Std. Deviation	.40684	.62146	
Control	Mean	5.2200	5.2000	
	N	30	30	
	Std. Deviation	.41139	.40684	
Total	Mean	5.2100	6.3000	
	N	60	60	
	Std. Deviation	.40576	1.22544	

At pretest, the mean scores of both the groups for English Reading were almost equal i.e., 5.20 for the experimental group and 5.22 for the control group. At posttest, it increased to 7.4 for the experimental group as shown in Table-2 above the lines.

Table-4

Comparison of students of control group for pre and post result

	Mean	SD	t-score	p-value
difference(d)	0.73	2.13	1.877	.035

Value of t-score and its p-value i.e., .035 shows that difference between pre performance of the students and post-performance of the students in control group is insignificant it means, 30 minutes rest does not affect the students positively.

The above results depicted indicate the difference in experimental group. The post test result is higher/greater than the pretest result.

Discussion

The investigation shows, educators and heads are in consistent support of break. In any case, they are terrified of the time it takes from scholastics and different intricacies, for example, injuries. Break is useful to the understudy in taking into consideration a period for them to discharge repressed vitality (Cawley, 2012). Educators in the break investment bunch showed that they accepted the under studies delighted in and required break. It is prescribed to expand break for 100 minutes out of each week for 20 continuous minutes day by day to make it 50-an hour out of every day (Bezold, 2014). Teachers endeavor to give a situation where understudies develop and improve their physical wellbeing, social aptitude, and scholastic accomplishment. The break cooperation understudies possessed enormous squares of energy for guidance without breaks, for example, physical education, lunch or break. Notwithstanding proof that free time or break have a significant influence on kid's physical, psychological, and social advancement (Chang, 2015), numerous schools have dispensed with or decreased break for extra instructional time.

Moreover, the investigation was delimited to scholastic accomplishment of third and fourth grade understudies in two school regions. The analyst suggests repeating the investigation in different schools with shifted socioeconomic status.

Conclusion

There is a sufficient variation between pre & post academic outcomes due to the involvement in sports activities in experimental group. So, reasonable sport time brings academic improvement in students. It is significant for all understudies to get a break or some likeness thereof with the expectation of complimentary play during the school day. The youthfulness of kids' sensory systems and their absence of encounters render them incapable to perform more elevated level subjective errands with a similar effectiveness as more established kids and grown-ups, and legitimately impact their educability. Break is a period understudies appreciate, where they can invest energy with their companions that they may not generally get. It is the point at which they can take their very own opportunities, make up their own principles and do what they genuinely need to do with that time. Considering this experiment, it was discovered that understudies anticipate this time and advantage from having it.

Policy makers and educationists must review policies and procedures regarding recess and must note its role in the academic performance.

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