



RESEARCH PAPER

Revisiting High School Students' Learning Styles in English Subject

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PAPER INFO	ABSTRACT
Received: January 14, 2019 Accepted: June 24, 2019 Online: June 30, 2019	The prime motive for this endeavor was to explore the tenth grade English class students' preferred learning styles studying in government secondary school so that English subject teachers could tailor their pedagogical strategies in relation to their students learning needs. Further aim of this study was to identify any significance difference among the students on gender basis, area basis and different categories of school basis. The population of this study consisting of all the secondary level schools working in the government sector and positioned in the province of Punjab. The multi stage cluster sampling method was employed while selecting the study sample from the population. The scale used for the identification of students' learning styles in this study was developed by Grasha-Riechmann. The data collected through learning style scale was analyzed by employing descriptive statistics technique. The results from data analysis depict that learning styles of the majority of students found to be Collaborative and Competitive. Overall, no considerable difference was surfaced between male-female, urban-rural, general-other categories of 10 th grade English class students learning styles
Keywords: Learning style, Learning style scale, Grade, Government sector	
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Introduction

From last two decades, a plethora of researches have been conducted by different researchers on the learning styles of the students (Kayes, 2007; Garcia et al., 2007; Coffield et al., 2004; Li, Chen, & Tsai, 2008; Welsh et al., 2007; Reynolds & Vince, 2007; Herbert & Stenfors, 2007; Sievers, 2007; Hyde, 2007; Armstrong et al., 2008). By the efforts of these researchers a vast literature was surfaced finding the connection among the learning styles of the students, teaching styles of the

teachers and its ultimate consequences on the performance of the students. The latest researches strongly suggested that by tailoring instructions, learning modules and material the ultimate performance of the students could be enhanced (Liegle & Janicki, 2006; Yazıcı, 2005; Cengizhan, 2007; Arslan & Babadoğan, 2005). The researchers believed that the prior knowledge about the students' learning process considerably facilitate the instructors to decide the appropriate instructional method and technique which will be most suitable for the students. On the basis of these researches, a good teacher tries to have prior knowledge about the preferred learning styles of his students' so that he can better arrange and design his teaching ways, learning activities and material. The prime objective of present endeavor is to explore the preferred learning styles of the English subject students at the tenth grade level so that their instructor can tailored. Adjust and develop their pedagogical strategies for English subject course for their grade tenth students.

Literature Review

It is very difficult to have a precise definition about the term 'learning style' due to the fact that every researcher defined it in different perspective. Kolb (1984), describe the learning style as a process of thought. Hunt's (1979), consider learning styles which consists of those learning conditions under which an individual probably try to learn. Keefe's (1982) considered learning styles in a behavior way and elaborated the three aspect of behavior as cognitive, affective, and psychological. These characteristics of behaviors provide the certain indications about a learner that how he receives, process, interact and respond to the different learning environments. Dunn's (1984) viewed the learning style an approach by which a learner receive and retain some knowledge or information irrespective description of the process. James and Gardner (1995) consider the learning styles as a response of the individual to various distinct environments of learning. Grasha (1996), considered individual's learning styles as the individual special attributes which persuade the ability of a student to get knowledge, students' interaction with its teachers and classmates and his participation in experiences of learning.

The venerable belief about that every individual learns in a different and unique way most likely has its origin in primeval Greeks civilizations (Wratcher, et al., 1997). Since a long, researchers and writers pointed out that several individuals have a preference towards certain learning methods over and above other individuals. This distinct character of every learner is named as learning style, which describe each students' exclusive preference of learning or preferred way of learning and which is quite helpful for instructors for the purpose of small group planning and make easy students individual instruction process (Kemp, et al., 1998). Grasha (1996), considered individual's learning styles as the individual special attributes which persuade the ability of a student to get knowledge, students' interaction with its teachers and classmates and his participation in experiences of learning.

According to Fritz (2002), the evolution and development in learning style field is very much associated and based on the evolution and development of research in human cognitive and brain development, human psychology, and his interaction with its society, culture and values. Just like as every instructor possesses a distinctive fashion of presenting, delivering and imparting instruction, similarly their students possesses a distinctive way of getting this education, knowledge of different disciplines and various skills. These distinctive features of every student for getting and processing the classroom instruction, information and various skills are referred to their preferred learning styles (Fritz, 2002).

The researchers believed that the having knowledge of the individual learning process considerably facilitate the instructors to decide the appropriate instructional method and technique which will be most suitable for the students. On the basis of these researches, a good teacher tries to have prior knowledge about the preferred learning styles of his students' so that he can better arrange and design his teaching ways, learning activities and material. The prime objective of the current study is exploring the learning styles of the English subject students at the tenth-grade level so that their instructor can tailor. Adjust and develop their pedagogical strategies for English subject course for their grade tenth students.

Objectives of the Study

The present study was an attempt to accomplish the objectives given hereunder:-

1. To identify the tenth grade English class students learning styles.
2. To explore any difference in learning styles of male-female students.
3. To explore any difference in learning styles of urban-rural students.
4. To explore any difference in learning styles of General - Comprehensive - Pilot - DPS schools students.

Research Questions

1. What are the learning styles of Secondary School English students?
2. Does any difference exist in male and female students' learning styles?
3. Does any difference exist in rural and urban students' learning styles?
4. Does any difference exist in general, pilot, DPS, and comprehensive schools students' learning styles?

Material and Methods

The current study was an associated research of a PhD Dissertation entitle as "Teaching Styles of Secondary School English Teachers and Learning Styles of their Students and Relationship of Teaching Learning Style Match with Student's Achievement". All the tenth grade English subject teachers and their class students of all the secondary schools working under the government sector and located in the Punjab province was the theoretical population of the present study. The multi

stage cluster sampling technique was used while selecting the study sample from the population. Since the province of Punjab is consist of nine administrative Division, From these nine administrative divisions, four schools from each division (two male schools from each urban and rural area, two female schools from each urban and rural area) and two schools (one male and one female) from the category of Central Model Schools, Pilot Secondary Schools and Comprehensive Schools were randomly selected. Forty two schools was selected by simple balloting method. The sample of this study was consists of all the English subject teachers of tenth grade and their class students of the Forty two schools of the Punjab province which were randomly selected. To measure the learning styles of 10th grade students, Grasha-Riechmann Student Learning Styles Scale was adopted by the researcher and subsequently was employed in the current study. There are 60 items in this instrument having five-point likert-type scale; which fluctuate from the strongly disagree to strongly agree range. Six distinct learning styles approachers could be identified by employing this learning style scale (Grasha, 1996). Although the validity and reliability issues of this scale were already established by the Grasha and Riechmann in their study (Grasha, 1996), for this study, Cronbach-alpha reliability coefficient of Grasha learning style scale was found to be 0.86.

Results and Discussion

Grasha-Riechmann Student learning Style scale was administered amongst the 10th grade English subject students in a typical class room setting. The data gathered through this learning style scale was statistically analyzed by using computer software SPSS. The results of the data analysis and findings thereof are narrated hereunder:-

Findings

Research Question 1: Learning styles of Tenth Grade English Class Students

Mean scores of the sample students were first calculated by the researcher on the basis of six sub categories of the scale then a comparison was made of the resultant scores with the different range of the learning scale as proposed by Grasha (1996), as exhibited below:-

Table 1
Grasha-Riechmann Learning Style Scale -on six learning style categories

Styles	Low	Moderate	High
Independent	1.0-2.7	2.8-3.8	3.9-5.0
Avoidant	1.0-1.8	1.9-3.1	3.2-5.0
Collaborative	1.0-2.7	2.8-3.4	3.5-5.0
Dependent	1.0-2.9	3.0-4.0	4.1-5.0
Competitive	1.0-1.7	1.8-2.8	2.9-5.0
Participant	1.0-3.0	3.1-4.1	4.2-5.0

The information depicted in the above table presented the mean scores of the students on six categories of the learning styles. It is clear from the table that students mean scores on the Collaborative and Competitive learning styles are 3.92 and 3.80 respectively which implied that on the categories of collaborative and Competitive learning styles, students mean scores were fall under the category of "High". The sample students also scored "Moderate" on four learning styles i.e. "Dependent, Avoidant, Participant, Independent," Learning Styles. According to this data, the majority of students learning style found to be *Collaborative* and *Competitive*.

Table 2
Mean Scores of the Students on Six Categories of Scale

Styles	Student Mean Scores	Students Rank
Independent	3.56	Moderate
Avoidant	2.30	Moderate
Collaborative	3.80	High
Dependent	3.88	Moderate
Competitive	3.92	High
Participant	3.94	Moderate

The mean score analysis on the six categories of learning styles of the students shown in the table demonstrated that sample students learning styles of the schools under study found to be as *Collaborative* and *Competitive* learning styles.

Research Question 2: Male and Female students learning styles

The comparison between male and female students' was performed by the researcher on six sub categories of the Scale so that to get the response of the above research question. The resultant outcomes of the process is depicted in the below table respectively.

Table 3
Comparison between Male and Female students' learning styles at secondary school

Gender	N	Mean	S.D	df	T	P
Male	1445	97.89	10.14	244	1.308	.002
Female	1496	84.29	8.34			

An independent-sample t-test was conducted to check the differences in the learning styles of Tenth Grade English Class Students. There was significant difference in scores for males ($M = 97.89$, $SD = 10.14$) and females ($M = 84.29$, $SD = 8.34$; $t(244) = -1.308$, $p = .002$). Result showed that there was difference in students' learning styles at secondary school level. It is concludes that male and students

focuses on learning styles in the subject of English as compared to the female students' in English subject.

Research Question 3: Urban & rural students' Learning Styles

The researcher performed the comparison between Urban and Rural English school students by using Grasha-Riechmann Learning Style Scale on the six categories so that to have the response of this research question. For this purpose, first mean score and SD of urban and rural students were computed and afterward, to have a comparison between urban and rural sample students, the researcher conducted the t-test of the urban and rural students mean scores on six sub categories of learning style scale. The resultant outcomes of the process is depicted in the below table respectively.

Table 4

Comparison between students 'learning styles regarding locality (rural & urban)							
	School localit	N	Mean	S.D	T	df	Sig.
Students' learning style	Rural	1582	2.978	0.968			
	Urban	1359	2.944	1.017	0.344	406	0.731
	Total	2941	6.988	1.311			

An independent-sample t-test was used to check comparison between rural and urban secondary school students' learning styles. There was no significant difference between rural ($M=2.978$, $SD=0.968$) and urban students' perception ($M=2.944$, $SD=1.017$; $t(406) = 0.344$, $p = 0.731$) about learning styles. The result shows that rural and urban students have same learning styles in English subject at 10th grade.

Research Question 4: Learning Styles of Students studying in different categories of Schools

The researcher performed the comparison amongst the General, Comprehensive, Pilot and DPS school students using the Grasha-Riechmann Learning Style Scale as the instrument on its six subcategories so that this research question could be addressed. For this purpose, first mean score and Standard Deviation of general, comprehensive, pilot and DPS school students were computed and afterward, to have a comparison amongst the sample students of the above mentioned schools, the researcher conducted the one way ANOVA of Mean scores of the general, comprehensive, pilot and DPS school students from sample schools on six sub categories of learning style scale. The resultant outcomes of the process is depicted in the below table respectively.

Table 5
One Way ANOVA Results of Mean Scores of General, Comprehensive, Pilot, DPS Schools students

LEARNING STYLES		SS	df	MS	f	Sig
Independent	Between Groups	1.432	3	.678	3.868	.037
	Within Groups	32.337	2938	.188		
	Total	33.769	2941			
Avoidant	Between Groups	.036	3	.018	.073	.941
	Within Groups	44.051	2938	.253		
	Total	44.087	2941			
Collaborative	Between Groups	.231	3	.103	.437	.645
	Within Groups	41.205	2938	.221		
	Total	41.436	2941			
Dependent	Between Groups	.779	3	.394	1.962	.146
	Within Groups	34.936	2938	.203		
	Total	35.715	2941			
Competitive	Between Groups	1.532	3	.677	3.871	.038
	Within Groups	32.347	2938	.189		
	Total	33.879	2941			
Participant	Between Groups	1.987	3	.970	3.916	.032
	Within Groups	41.995	2938	.255		
	Total	43.982	2941			

It is evident from the information generated in the above table revealed that no considerable difference was established among the mean scores of the students of General, Comprehensive, Pilot & DPS school on the sub categories of Competitive, Dependent, Collaborative, Independent styles of learning as in all these cases the value of $p > .05$. On the contrary, a considerable difference surfaced amongst the mean scores of the students belonging to General, Comprehensive, Pilot & DPS schools on the sub categories of *Avoidant* and *Participant* learning styles as in these cases the value of $p < .05$.

Summary

The current study was a descriptive study founded on the method of survey research. The prime objective of this study was to investigate the 10th grade English class students' learning styles in anticipation that their class room teachers can adapt to and change or adjust their preferred teaching styles with students' learning styles in a view to enhance the learning outcomes in the English subject. The present study was performed in the secondary schools of the Punjab province working under the government sector. In this study the Grasha-Riechmann Teaching Style scale was adopted to explore and find the learning styles of the students in their actual learning environments. This inventory was administered to the sample students in their class room setting. The data collected through learning style inventory was analyzed using statistical techniques through SPSS computer software. The results emanating from the descriptive statistics techniques of this

study suggest that the learning styles of a great number of students of the sample school were found to be *Collaborative* and *Competitive*.

Discussion

This study investigated the learning styles of the 10th grade English class secondary school students in order to facilitate their English subject teachers to formulate their strategies for teaching the English subject so that learning outcome could be enhanced. Grasha-Riechmann learning style inventory was used as a research tool and for the categorization of students' learning styles on the categories as described by the Grasha. After analyzing the data collected from the sample students, the dominant learning styles of the sample students of government sector schools were discovered as the collaborative learners and competitive learners. Further analysis of the data showed that gender related difference was found between students learning styles but no difference was found between urban-rural and different categories of schools of government sector in Punjab province which means that group learning styles of urban and rural students are similar nature.

Results produced by the present study have importance for the English subject teachers of secondary schools because it can help the teachers to construct and formulate their teaching strategies for better delivery and learning of English language. In this study, since the results pointed out that the students' learning styles of the majority of the students were identified as collaborative and competitive learners, the teaching strategies of the English teachers should be in consonance of students these preferred learning styles.

Grasha(1996) described the characteristics of the collaborative style learners that these learners prefer to get information in the class room by collaborating with other students of their class and they share their learning experiences and ideas with their classmates. The English subject teachers should employ such teaching methods and teaching techniques that are more suitable and match for collaborative style students. The main focus of these teaching strategies should be that the these strategies urge and emphasize the English subject students to work collectively in different groups on the learning tasks as designed by the instructors or students' designed working projects. The class teacher should build their learning task on concrete concepts with the help of examples which come first of these learning tasks. This learning task must match the learning objectives of their course work and should be in order of difficulty levels. Students may be assigned in different groups randomly and students may be asked to find solution of some problems, topics or course related assignments. The formation of groups and activity sessions of the students must be pre designed and time bound. All the groups and the students working within the groups should feel independence in their individual learning and then reach on conclusion after deliberating collectively. The outcomes of every groups should be compared with other groups and the teacher should synthesize their learning efforts and further elaborate,

clarify, explain and answer their questions. The teacher should always leave them thinking on some new food of thoughts relating to heir course work. The role of the teacher is very crucial when working with collaborative style of learner as this teaching learning environment demands a cordial relationship with students and a strong rapport with his students. A teacher feels a challenging task while working such students.

The other dominant learning style of the sample students of this study is competitive learning style. The students having this style of learning are very enthusiastic about their learning due to the fact that they always want to compete with other students of their class. They want to perform better in their coursework so that they can perform better than other students. The motivation behind their hard work is the personal recognition and certain rewards. They are always instructor-centered learner and very attentively involved what their class teacher gives the information. They have certain leadership qualities and always strive for the prominent position in the class. The teachers should pay attention such students and encourage such students so that they can build more leadership qualities.

As the characteristics of learning styles which were identified in this study, fall under two corner of learning style continuum, the question moot up is for the consideration of the class teacher is how he or she will select or modify his/her instructional styles for a class of students having both collaborative and competitive style of learners. How a teacher can maintain a balance between these two learning styles requires certain considerations for a teacher. A teacher should know the various teaching styles methods and approaches so that he can better perform in the class room. The learning environment should be students and subject centered so that different style of learners could easily be accommodated. The collaborative style of learners could perform better in students-centered learning environment. The learning task should be designed in such a way that students can work both individually and in groups. Cooperation and competition among the students should be created by developing such learning task that students can develop their individual knowledge for the future. The teacher should always have an up to date knowledge about the individual as well as collective learning preferences of their students.

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