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ABSTRACT

This study investigated whether seventh- and ninth-grade students who did prewriting activities in English class preceding a related literature comprehension test would produce higher raw test scores on literal and interpretive questions than would students who did not use prewriting. The study took place in 1993 and 1995. Participants included two each of average seventh- and ninth-grade English classes. Intervention group students participated in a prewriting activity prior to the literature comprehension test. The activity involved writing about personal knowledge, experience, or emotion related to the story. Control group students did not participate in prewriting. Students in both groups read the same story and had the same test questions. Data analysis indicated a majority of higher scores for all four ninth-grade experimental groups in nearly every itemized comparison with the control groups. However, for the seventh grade, the same indications were not as evident. In some comparisons, the seventh-grade control groups outperformed the experimental groups. However, in general, prewriting increased students' performance on reading comprehension tests, even when students in one of the intervention group initially had lower overall grade point averages than did students in the corresponding control group. (SM)



A CONSTRUCTIVIST TECHNIQUE WHICH IMPROVES READING COMPREHENSION © Copyright 1995

by June Raleigh Los Angeles Unified School District

Constructivism is where learning essentially involves finding out about something through our own actions, and making some sense of the result through our own thinking. The educational reform movement today advocates constructivism with a hands-on approach, hands-on is the area that is severely lacking; that is, in most respects, we don't know how to tap into the student's own thinking.

Therein lies the true value of this technique, in that it establishes a psychological connective between the student and the literature, allowing constructivism to occur successfully, naturally.

This new strategy, which improves reading comprehension employs the use of psychology, engaging the reader's recall of his own world into an identification with the text. The difference between this technique and those used in previous studies is that there is a writing activity inserted before the reading of the text, designed to stimulate the reader's orientation toward the main themes of the literature, thereby allowing him to perceive a correspondence between it and his own life/world.

DEVELOPMENT OF HYPOTHESIS.

The hypothesis is that junior high and high school (specifically 7th and 9th grade) English class students who do pre-writing activities preceeding a related literature comprehension test will produce higher raw test scores on Literal and Interpretive questions than those students who do not use pre-writing.

Pre-writing provides students with a lead into the forthcoming literature, and this extension of a theme establishes empathy, or projective response, through subjective, personal experience.

Specifically, the scores of the Interpretive based questions of the Experimental groups should increase significantly above the Control group's scores on same, because the former is relating to the answers in a deeper subjective fashion than the latter; this because they have already established a connection through the pre-writing exercise.

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METHODS, MATERIALS, SUBJECTS.

This study was done over two, non-consecutive years: 1993 and 1995. The subjects were two each of 9th and 7th grade average, English classes. In 1993 the 9th grade class with the lower overall GPA between the two was chosen to be the Experimental group. The class with the higher overall GPA was the Control group, which did not use the technique of pre-writing, as a bridge prior to a 10-question literature comprehension test using Literal and Interpretive questions. The Experimental group was given a discussion with the topic "Have you ever witnessed or been in a natural disaster?" The teacher listed on the board examples that the class gave, such as floods, earthquakes, etc. The teacher offered the example of being trapped in the snow. Several natural disasters were listed, all were briefly discussed, and they were told that the forthcoming short story "To Build A Fire" was about a man trying to survive in the snow. Next, the Experimental group wrote a two paragraph, creative writing paper on a natural disaster of their choice, reflecting on their own past experience, or knowledge of such. The following day they read the story and took the test, which consisted of five Literal (text based) and five Interpretive (text plus personal life/opinion based) questions. All the tests throughout this experiment were closed book tests. All stories were analyzed with the Fry Readability graph.

The Control group, on the other hand, was not given a pre-writing activity. Everything else was the duplication of the Experimental group's lessons: the same story and the same student answer sheets were used. Each Control group in this study simply read the short story, then took the test.

The other short story used, "How To Win," followed the exact format as the first, except of course, the pre-writing question was appropriate to it. The Experimental group was given a discussion by the teacher, as she lead with the question "Have you ever felt nervous before playing a sport? What happened?"

In 1995 the two 7th grade classes were interchanged as the Control and Experimental groups, to obtain a more accurate assessment of the effectiveness of the pre-writing technique. Again the short story "To Build A Fire" was employed, but a different second short story was used: "The Sniper." The pre-writing question for "The Sniper" was "Have you ever hurt someone you loved, but didn't mean to? How did it make you feel?" Both classes completed all the work within a two hour block of time, during their Fall semester final exam, two days apart from each other. Each class started off as an Experimental group, did the pre-writing activity first, immediately taking the test thereafter. Each group ended as a Control group, with a second test.



RESULTS AND DISCUSSION

After both experiments were completed, which included a total of four classes, the analysis of percentage scores showed a majority of higher marks for all the Experimental groups, in nearly every itemized comparison with the Control groups, pertaining to the 9th grade classes. However, for the 7th grade, these same indications are not as evident from looking at the Selective Results Page, as they are from reading the Class Summary Record Analysis Sheets.

JUXTAPOSITION OF LOWER GPA TO HIGHER GPA GROUPS. On the 1993 Selective Results page, the top 5 scorers from each 9th grade class, and the top 5 students with the highest GPA's in those classes (determined by their cumulative scores on 15 English assignments) were listed against each other. Although the Experimental group has the lower averaged GPA of the two, they still performed better than the Control group in all four comparisons: whether approaching the findings in the context of listing both groups' highest scores on each test, or in the context of listing both groups' highest GPA's, the Experimental group consistently outperformed the Control group every time. Also on this page, we find the greatest difference is a 30 point spread between the top five achievers (GPA) of each class: the GPA's of the Control group are dramatically higher than the Experimental group's GPA's, yet the astounding result is this 30 point variance on behalf of the Experimental group.

Looking at the results indicating the least differences in performance between 9th grade classes on the Class Summary Record Analysis Sheet (in regards to the harder test, "How To Win") there is no significant gain in the Experimental group over the Control group. However, the average GPA of the Experimental group is slightly lower than the other; also, there are less members in the Experimental class than the Control class, indicating less chance for success. Additionally, even with lesser GPA averages the Experimental group still evenly matched the Control group's results, and on the Selective Results Page, exceeded them.

LOWER ACHIEVERS BENEFITTED. Using a 2.0 GPA as the separating point between higher and lower GPA groups, collective, group totals and averages were determined for all Interpretive scores. The result was that the lower GPA (-2.0) Experimental group students outperformed the higher GPA (2.0 and above) Control group students on the same tests, each and every time, for both the 7th and 9th grades. This finding suggests the technique is most useful for average to low achieving students, who somehow compensate for lack of rote memorization skills (Literal response) with an increased ability to incorporate a personal, subjective understanding (Interpretive response) to the text. STATISTICAL RELEVANCY TO AGE: OLDER AS INDIVIDUAL, YOUNGER AS COLLECTIVE EMOTIONAL RESOURCE. The most significant difference between the two 9th grade classes is found on the Class Summary Record Analysis Sheet in the percentage totals of the Interpretive questions, particularly in the first story "To Build A Fire," where we see a 10.5% difference. There is less of a difference in Interpretive question percentiles shown in the second story "How To Win," a much more intellectually demanding story (based on the Fry readability check); also, the Experimental group scored lower than the Control group by only 2.5%. In other words, the "harder" test came back with more evenly matched results, while the



"easier" test showed a higher variation in performance of Interpretive test questions.

Looking at the 1995 Selective Results Page, there is quite another story: the 7th grade students in the Control groups outperform the Experimental groups in every comparison except the easier test "To Build A Fire," where the raw score totals are identical. It is on the Class Record Analysis Sheets where it is clearly found that the Experimental groups outperform each of the matched Control groups, on both the Interpretive and the Total Correct percentages, on each story's tests. That parallels the results from the 1993 "To Build A Fire" Class Summary Record Analysis Sheets.

The 9th grade students' abilities tapered off more equally on the harder test, but with the 7th grade students the superior performance by the Experimental group becomes even more pronounced. This suggests that the younger the student, the more subjective recall can be employed under an increased stress factor, probably due to a more higher emotional participation, or a more basic emotional memory than those older. It would appear, from the inconsistency between the 7th grade Selective Results Page and the Class Summary Record Analysis Sheets, and the consistency between the above same 9th grade findings, that the older students tend to benefit in a more individualized context, while the younger students benefit collectively. This may explain why on the 1995 Selective Results Page the top GPA students do not statistically benefit from the pre-writing activity, although the entire class does. And, this is logical from a pychological perspective, in that we become more individual persons as we age, and also tend to suppress, or control our emotions more.

TECHNIQUE IS AN OVERALL USEFUL TOOL. 7th grade Experimental group percentile scores from both tests were higher than the Control groups' scores in five out of six categories, in the Literal, Interpretive, and Total Correct percentiles. The most significant gains are in the Interpretive answers from the harder test, "The Sniper," (+8%), and the Literal answers from the easier test, (+6.9%). This shows that especially for younger students, pre-writing could prove a useful tool in improving reading comprehension, since it affords them a way to tap in to their own, subjective worlds. For the older students, it seems apparent that they have been trained longer to rely on rote memory, and thus, it may not be as accessible for them to connect with their inner responses, unless this technique is employed at an earlier age. This may explain why the 9th grade Control group fared slightly better on the Literal answers of the easier test (+1.6), because basically, the text was easier, so data recall was easier, and this caused less dependence on a subjective, interpretive strategy. The 9th grade Control group did slightly better on the Interpretive answers of the harder test (+2.5%), but the Experimental group matched them by scoring higher on the Literal answers (+2.5%), and by scoring the same as them in the Total Correct column (50%). On the harder test, the Control group 9th grade class reached a threshold on the Literal answers, as the Experimental group out-performed them on the Literal questions. Conversely, on the harder test, the Experimental group 7th grade class reached a threshold on the Literal answers, but scored higher than the Control group in the Interpretive and Total Correct categories. It would seem that the beneficial effects gained from a pre-writing activity diminish slightly as the students get older and the reading material



becomes more demanding, until we take into account that in the case of the 9th grade students, the Experimental group has a lower cummulative GPA than the Control group, especially evident on the "Selective Results Page." In the case of the 7th grade students, the beneficial effects gained from the pre-writing activity of the harder test show the greatest percentile gain in the Interpretive column (+8%), (on behalf of the Experimental group). Interpretive scores based on the easier reading material "To Build A Fire," were higher for both 7th and 9th grade Experimental groups (+3.4% and +10.5%). This was because the lower grade reading material was less stressful to comprehend, and this, coupled with the psychological boost afforded them from the pre-writing activity, actually increased accessibility to, and therefore usage of abstract thinking ability.

CONCLUSION

Obviously all the Experimental groups had an advantage over the Control groups, as shown by the relative phenomena which took place. Overall, pre-writing did prove to increase student performance on reading comprehension test scores, and this supports the original hypothesis of the study.

The home is the strongest influence for achievement, and the school can do very little to effect socio-economic status. However, we can offer achievement strategies to help overcome disadvantages and promote learning. By providing the link between the child's personal experiences and the academic literature, we can make the student more aware of the valid, positive interaction between his own home environment and opportunities he finds in school. Pre-writing topics can be included as a prelude to study of literature comprehension lessons, to establish a relative base from which to build subsequent knowledge upon. In this manner, the student learns that he can effect his achievement scores through tapping in to his own life; this is established through the technique described in this research experiment.



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All statistical data and test materials are available upon request.

References

Fry Readability Graph

by Edward Fry, Rutgers University Reading Center, New Brunswick, N.J. 08904

King, Billie Jean

How To Win. Women Sports Magazine, June 1974.

London, Jack

To Build A Fire. Copyright 1985, 1980 by Harcourt Brace Jovanovich, Inc.

O'Flaherty, Liam

The Sniper from The Short Stories of Liam O'Flaherty. Copyright 1981, 1978 by Houghton Mifflin Co. All rights reserved.



Primary (Experiment/Observation) Research Paper Selective Results Page - 1993

"To Build A Fire"

Peri	od 3	Per	iod 5	
Control Group:No Pr Top 5 scorers:	e-writing	Experimental Gro Top 5 scorers:	oup:Pr	e-writing
GPA	Raw score	•	GPA :	Raw score
Solorio Wendy 3.0 Munoz Tony 3.7 Soto Bladimir 2.2 Nevarez Anthony 1.8 Orozco Janette 1.3	90 90 80	Pulido Ryan Ball Michael Hernandez Maria Le Van DeCosta Athena	1.9 2.9 2.8	100 90 90 90 80
Totals:	440			450
Top 5 GPA in class: GPA	Raw score	Top 5 GPA in cla		Raw score
Munoz Tony 3.7 Sukara George 3.5 Gregory Kolleen 3.2 Solorio Wendy 3.0 Mejia Katrina 2.7	70 70 100	Dimaano Monette Hernandez Maria Le Van DeCosta Athena Herrera Victor	2.9 2.8 2.1	80 90 90 80 70
Totals:	380			410
"How To Win"				
	od 3	Per	iod 5	
Peri Control Group:No Pr		Experimental Gr		 e-writing
Peri			oup:Pr	e-writing
Perince Perinc	e-writing Raw score 80 80 70 70 60	Experimental Gr	GPA 1.9 3.0 1.6 2.9	Raw score 80 80 80 70 70
Peri Control Group:No Pr Top 5 scorers: GPA Munoz Tony 3.7 Nevarez Anthony 1.8 Sinohue Jason 1.1 Velasco Reggie 2.1	e-writing Raw score 80 80 70	Experimental Gro Top 5 scorers: Ball Michael Dimaano Monette Trinh Du Hernandez Maria	GPA 1.9 3.0 1.6 2.9	Raw score 80 80 80 70
Perince Perinc	e-writing Raw score 80 80 70 70 60	Experimental Gro Top 5 scorers: Ball Michael Dimaano Monette Trinh Du Hernandez Maria	Oup:Pr GPA 1.9 3.0 1.6 2.9 1.4	Raw score 80 80 80 70 70
Perince Perinc	e-writing Raw score 80 80 70 70 60 360 Raw score 80 60 60 40	Experimental Gro Top 5 scorers: Ball Michael Dimaano Monette Trinh Du Hernandez Maria Latin Sandra	Oup:Pr GPA 1.9 3.0 1.6 2.9 1.4 3.0 2.9 2.8 2.1	Raw score 80 80 70 70 380



Primary (Experiment/Observation) Research Paper "To Build A Fire"

1993 Class Summary Record Analysis Sheet

Period 3 Control Group-No Pre-writing:	GPA	Lithl	Intronty	Total Correct
1. Acosta Eurie	1.5	60%	40%	50%
2. Aguirre Regina	-6	40%	40%	40%
3. Carillo Ruben	.2	80%	20%	50%
4. Contez James	1.5	40%	40%	40%
5. Gallardo David	0	60%	80%	70%
6. Garcia Mike	.9	60%	0%	30%
7. Gregory Kolleen	3.2	60%	80%	70%
B. Hiwatig Jonathan	.8	40%	40%	40%
7. Marin Arturo	0	40%	0%	20%
10.Mejia Katrina	2.7	40%	60%	50%
11.Munaz Tony		100%		90%
12.Narag Gavin	1.8	60%	60%	60%
13.Nevarez Anthony	1.8	80%	90%	80%
14.Orozco Janette			80%	80%
5.Raminez Launa			80%	80%
16.Santana Edward			60%	70%
l7.Sinohue Jason	1.1	100%	60%	90%
18.Solonio Wendy			100%	
19.Soto Bladimir			100%	90%
20.Sukana Geo ng e			90%	
31.Torres Damian			a 0%	50%
22.Velasco Natalie		40%		50%
Averages of class totals				
of connect answers:	1 🚣	A5.4%	59%	42.27



Primary (Experiment/Observation) Research Paper

"To Build A Fire"

1993 Class Summary Record Analysis Sheet

Total

Period 5

Experimental Group - Pre-Writing:	GPA	Litrl	Intrprtv	Correct
1. Anaya Yanira	.6	60%	80%	70%
2. Avila Nathan	1.8	60%	60%	60%
3. Ball Michael	1.9	80%	100%	90%
4. Davis Michelle	1.2	40%	60%	50%
5. DeCosta Athena	2.1	60%	100%	80%
6. DelaCruz Olivia	1.4		40%	50%
7. Dimaano Monette	3.0	80%	80%	80%
8. Giles Jennifer	2.0	80%	60%	70%
9. Gomez Armando	1.0	40%	40%	40%
10.Hernandez Maria	2.9	80%	100%	90%
11.Herrera Victor	2.1	80%	60%	70%
12.Lang Jerry	1.8	100%	40%	70%
13.Latin Sandra	1.4	40%	80%	60%
14.Le Van	2.8	80%	100%	90%
15.Pulido Ryan	1.1		100%	100%
16.Rios Jose	0	40%	60%	50%
17.Rodriguez Monica	.8	60%	20%	40%
18.Trinh Du	1.6	80%	60%	70%
19.Trujillo Adam	. 9		80%	50%
20.Valencia Norma	1.7	60%	80%	70%
21.Vasquez Edward	1.3	40%	60%	50%
Averages of class totals				
of correct answers:	1.5	63. ⁸ %	∉ે.5%	66%



Primary (Experiment/Observation) Research Paper "How To Win"
1993
Class Summary Record Analysis Sheet

Period 3 Total Control Group-No Pre-writing: GPA Litrl Intrprtv Correct 1.5 60% 40% 1. Acosta Eurie 1.2 40% 60% .2 40% 60% .9 0% 40% 50% 2. Canedo Zahired 50% 3. Carrillo Ruben .9 0% 4. Garcia Michael 20% 3.2 60% .8 20% 60% 40% 5. Gregory Kolleen 60% 6. Hiwatig Jonathan 30% 2.7 0% 80% 0 0% 40% 3.7 60% 100% 1.8 40% 60% 1.8 60% 100% 1.3 40% 60% 40% 7. Mejia Katrina 8. Marin Arturo 20% 9. Munoz Tony 80% 50% 10.Narag Gavin 11.Nevarez Anthony 80% 50% 12.Orozco Janette 1.2 40% 60% 1.5 40% 80% 1.3 60% 60% 1.1 40% 100% 13.Ramirez Laura 50% 14.Santana Edward 60% 60% 15.Servillo Crystal 70% 16.Sinohue Jason 60% 3.0 20% 2.2 20% 3.5 40% 40% 17. Soloric Wendy 60% 80% 60% 20% 60% 18.Soto Bladimir 40% 60% 19.Sukara George 1.4 60% 1.5 0% 20.Torres Damian 60% 10% 21. Velasco Natalie 70% 22. Velasco Reginald 2.1 80% 23.Wammack Shannon 1.3 20% 80% 50% Averages of class totals 1.7 36.5% 63.4% 50% of correct answers:



Primary (Experiment/Observation) Research Paper "How To Win"

1993 Class Summary Record Analysis Sheet

Period 5

Experimental Group- Pre-writing:	GPA	Litrl	Intrprtv	Total Correct
1. Avila Nathan 2. Ball Michael 3. Davis Michelle 4. DeCosta Athena 5. DelaCruz Olivia 6. Dimaano Monette 7. Giles Jennifer 8. Gomez Armando 9. Hernandez Maria 10.Herrera Victor 11.Lang Jerry 12.Latin Sandra 13.Le Van 14.Pulido Ryan 15.Rios Jose 16.Rodriguez Monica 17.Romero Beatrice 18.Trinh Du 19.Trujillo Adam 20.Valencia Norma 21.Vasquez Edward	.6 1.9 1.2 2.1 1.4 3.0 2.0 1.0 2.9 2.1 1.8 1.4 2.8 1.1 0.8 1.6 1.7	20% 60% 20% 40% 20% 40% 20% 40% 40% 40% 40%	60% 80% 60% 40% 40% 40% 40% 80% 80% 80% 80% 80% 80% 80% 8	50% 80% 60% 30% 30% 80% 40% 70% 50% 70% 40% 30% 40% 50%
Averages of class totals of correct answers:	1.59	39%	60.9%	50%



'The Sniper"

Period 4

Period 6

Control Grou	p:No	Pre-writing	Experime	ntal	Group:Pre-writ	ing
Top 5 scorer	s:	_	Top 5 sc	orer	s :	
•		Raw score	-	GPA	Raw score	
Nerio Louis	1.0	70	Donaldson Lindsay	1.1	60	
Ciani Theresa	3.1	60	Field Tynan	1.0	60	
Ramirez Israel		60	Magallanes Paul	3.9	60	
	.8		Griswold Rory	3.2		
Hwang Andrew		50	Lewis Rae-Lynn		50	ļ
-		•	_			
Totals:		290			280	
						I
Top 5 GPA in cl	ass:		Top 5 GPA in class			
•	GPA	Raw score	-	GPA	Raw score	
						I
Santos Jonathan	3.6	40	Magallanes Paul	3.9	60	I
Hwang Andrew		50	Gudani Jason	3.4	30	
Ramirez Israel		60	Griswold Rory	3.2		
Ciani Theresa			Lewis Rae-Lynn	3.0		
Gozun Rachel		30	Padilla Cosme	2.9	30	
GOZUII IUGIICI	J.U	50	radilla Come	2.,	50	
Totals:		240			190	
To Build A Fire	ــــــــــــــــــــــــــــــــــــــ					
	e Perio	<i>Α</i> Δ	Period 6			
•	Let 10	u 4	161100 0			ļ
Experimental Gro	Oup: P	 re-writing	Control Group:No P	re-wr	iting	
Top 5 scorers:	Jup.i	IC-WIICING	Top 5 scorers:	10	Itting	
10h 2 acorera.	CDY	Raw score	10p 3 scorers.	CDA	Raw score	
	Gr A	VOM SCOTE		OI A	Naw SCOLE	
Buenafe Anna	1.3	80	Griswold Rory	3.2	90	
Thomas Evan	2.1	80	Gudani Jason	3.4		
Gozun Rachel	3.0	70	Ishaq Neseem	2.5		
	3 . U	/11			70	
Oceguera Belen						
	1.6	70	Lewis Rae-Lynn	3.0	70	
Aguilar Frankie	1.6					
Aguilar Frankie Totals:	1.6	70	Lewis Rae-Lynn	3.0	70	
Totals:	1.6 2.0	70 60	Lewis Rae-Lynn Goyette Bianca	3.0 2.7	70 60	
_	1.6 2.0	70 60 360	Lewis Rae-Lynn	3.0 2.7	70 60 360	
Totals:	1.6 2.0	70 60	Lewis Rae-Lynn Goyette Bianca	3.0 2.7	70 60	
Totals:	1.6 2.0 ass: GPA	70 60 360 Raw score	Lewis Rae-Lynn Goyette Bianca Top 5 GPA in class:	3.0 2.7 GPA	70 60 360 Raw score	
Totals: Top 5 GPA in class Santos Jonathan	1.6 2.0 ass: GPA 3.6	70 60 360 Raw score 50	Lewis Rae-Lynn Goyette Bianca Top 5 GPA in class: Magallanes Paul	3.0 2.7 GPA 3.9	70 60 360 Raw score	
Totals: Top 5 GPA in class Santos Jonathan Hwang Andrew	1.6 2.0 ass: GPA 3.6 3.2	70 60 360 Raw score 50 50	Lewis Rae-Lynn Goyette Bianca Top 5 GPA in class: Magallanes Paul Gudani Jason	3.0 2.7 GPA 3.9 3.4	70 60 360 Raw score 50 70	
Totals: Top 5 GPA in class Santos Jonathan Hwang Andrew Ramirez Israel	1.6 2.0 ass: GPA 3.6 3.2 3.2	70 60 360 Raw score 50 50 60	Lewis Rae-Lynn Goyette Bianca Top 5 GPA in class: Magallanes Paul Gudani Jason Griswold Rory	3.0 2.7 GPA 3.9 3.4 3.2	70 60 360 Raw score 50 70 90	
Totals: Top 5 GPA in class Santos Jonathan Hwang Andrew Ramirez Israel Ciani Theresa	1.6 2.0 ass: GPA 3.6 3.2 3.2 3.1	70 60 360 Raw score 50 50 60 50	Lewis Rae-Lynn Goyette Bianca Top 5 GPA in class: Magallanes Paul Gudani Jason Griswold Rory Lewis Rae-Lynn	3.0 2.7 GPA 3.9 3.4 3.2 3.0	70 60 360 Raw score 50 70 90 70	
Totals: Top 5 GPA in class Santos Jonathan Hwang Andrew Ramirez Israel	1.6 2.0 ass: GPA 3.6 3.2 3.2	70 60 360 Raw score 50 50 60	Lewis Rae-Lynn Goyette Bianca Top 5 GPA in class: Magallanes Paul Gudani Jason Griswold Rory	3.0 2.7 GPA 3.9 3.4 3.2	70 60 360 Raw score 50 70 90	
Totals: Top 5 GPA in class Santos Jonathan Hwang Andrew Ramirez Israel Ciani Theresa	1.6 2.0 ass: GPA 3.6 3.2 3.2 3.1	70 60 360 Raw score 50 50 60 50	Lewis Rae-Lynn Goyette Bianca Top 5 GPA in class: Magallanes Paul Gudani Jason Griswold Rory Lewis Rae-Lynn	3.0 2.7 GPA 3.9 3.4 3.2 3.0	70 60 360 Raw score 50 70 90 70	



1995
Class Summary Record Analysis Sheet
To Build A Fire"
Period 4 - Experimental Group: Pre-writing

-		_		Total	
	GPA	Litrl.	Intrprtv.	Correct	
1. Aguilar Frankie	2.0	60%	60 %	60%	
2. Araujo Michiko	1.0	40%	0%	20%	
3. Arriola Victor	.8	20%	0%	10%	
4. Briceno Diane	2.2	40%	40%	40%	
5. Buenafe Anna	1.3	80%	80%	80%	
6. Chang Joanne	.6	60%	40%	50%	
7. Ciani Theresa	3.1	40%	60%	50%	
8. Garcia George	1.0	40%	20%	30%	
9. Gonzalez Lydia	1.7	80%	40%	60%	
10. Gozun Rachellene	3.0	100%	40%	70%	
11. Himes Erika	2.0	60%	60%	60%	
12. Hwang Andrew	3.2	40%	60%	50%	
13. Krenz Susan	1.6	40%	20%	30%	
14. Leon Mitchel	1.4	20%	98	10%	
15. Lewis Kirk	1.1	60%	20%	40%	
16. Marquez Joseph	1.0	60%	40%	50%	
17. Martinez Natalie	2.3	80%	20%	50%	
18. Miller Kenneth	.8	60%	20%	40%	
19. Nerio Louis	1.0	60%	60%	60%	
20. Oceguera Belen	1.6	80%	60%	70%	
21. Portillo Adam	2.7	40%	40%	40%	
?. Ramirez Israel	3.2	60%	60%	60%	
_3. Santos Jonathan	3.6	60%	40%	50%	
24. Serrato Linda	2.5	40%	40%	40%	
25. Thomas Evan	2.1	80%	80%	80%	
Averages of class totals					
of correct answers:	1.87	56%	40%	48%	



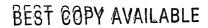
1995 Class Summary Record Analysis Sheet "To Build A Fire" eriod 6 - Control Group: No Pre-writing

					Total
		GPA	Litrl.	Intrprtv.	Correct
1. Alvara	do David	1.8	80%	20%	50%
2. Berdec	ia Jose	1.0	60%	40%	50%
3. Donald	lson Lindsay	1.1	40%	40%	40%
4. Field	Tynan	1.0	40%	0%	20%
5. Flores	Anna	2.5	40%	0%	20%
6. Garcia	Kristen	1.2	20%	40%	30%
7. Goyett	e Bianca	2.7	60%	60%	60%
8. Griswo	old Rory	3.2	80%	100%	90%
9. Gudani	Jason	3.4	80%	60%	70%
10. Hines	Ebony	1.2	60%	40%	50%
11. Ishaq	Neseem	2.5	60%	80%	70%
12. Istanb	olian Vartan	.7	20%	0%	10%
13. Jaquez	Daniel	.1	20%	0%	10%
14. Khan K	asim	2.3	60%	60%	60%
15. Lewis	Rae-Lynn	3.0	60%	80%	70%
16. Magall	anes Paul	3.9	60%	40%	50%
17. Padill	a Cosme A.	2.9	40%	20%	30%
18. Renter	ia Juan	2.9	40%	40%	40%
19. Romero	Kelly	1.1	80%	20%	50%
20. Ruiz S	tevie	2.5	40%	20%	30%
21. Sarmie	nto Maria	1.6	60%	20%	40%
?2. Serrat	o Luisa	2.0	20%	40%	30%
3. Sichle	r Krystal	.7	20%	40%	30%
24. Vargas	Betty	2.3	40%	20%	30%
-	- ,				
_	f class totals			-	
of correct	answers:	1.98	49.1%	36.6%	42.9%



1995
Class Summary Record Analysis Sheet
The Sniper"
.eriod 4 - Control Group: No Pre-writing

				Total
	GPA	Litrl.	Intrprtv.	Correct
 Aguilar Frankie 	2.0	0%	40%	20%
Araujo Michiko	1.0	0%	20%	10%
Arriola Victor	.8	40%	60%	50%
4. Briceno Diane	2.2	20%	0%	10%
5. Buenafe Anna	1.3	20%	20%	20%
6. Chang Joanne	.6	20%	20%	20%
7. Ciani Theresa	3.1	20%	100%	60%
8. Garcia George	1.0	40%	40%	40%
9. Gonzalez Lydia	1.7	0%	40%	20%
10. Gozun Rachellene	3.0	20%	40%	30%
11. Himes Erika	2.0	20%	40%	30%
12. Hwang Andrew	3.2	60%	40%	50%
13. Krenz Susan	1.6	20%	20%	20%
14. Leon Mitchel	1.4	20%	0%	10%
15. Lewis Kirk	1.1	20%	20%	20%
16. Marquez Joseph	1.0	0%	20%	10%
17. Martinez Natalie	2.3	40%	20%	30%
18. Miller Kenneth	.8	20%	20%	20%
19. Nerio Louis	1.0	60%	80%	70%
20. Oceguera Belen	1.6	20%	20%	20%
21. Portillo Adam	2.7	40%	60%	50%
⁷ 2. Ramirez Israel	3.2	60%	60%	60%
Santos Jonathan	3.6	20%	60%	40%
24. Serrato Linda	2.5	60%	20%	40%
25. Thomas Evan	2.1	98	40%	20%
		· 		
Averages of class totals				
of correct answers:	1.87	25.6%	36%	30.8%





1995
Class Summary Record Analysis Sheet
'The Sniper"
Period 6 - Experimental Group: Pre-writing

					Total
		GPA	Litrl.	Intrprtv.	Correct
1.	Alvarado David	1.8	40%	40%	40%
2.	Balancio Richard	2.4	0%	40%	20%
3.	Berdecia Jose	1.0	40%	40%	40%
4.	Bermudez Christian	.2	20%	40%	30%
5.	Donaldson Lindsay	1.1	60%	60%	60%
6.	Field Tynan	1.0	20%	100%	60%
7.	Flores Anna	2.5	20%	20%	20%
8.	Garcia Kristen	1.2	20%	0%	10%
9.	Goyette Bianca	2.7	40%	40%	40%
	Griswold Rory	3.2	20%	80%	50%
	Gudani Jason	3.4	20%	40%	30%
	Hines Ebony	1.2	40%	40%	40%
	Ishaq Neseem	2.5	0%	40%	20%
	Istanbolian Vartan	.7	20%	60%	40%
	Jaquez Daniel	.1	0%	0%	0%
	Khan Kasim	2.3	40%	40%	40%
	Lewis Rae-Lynn	3.0	40%	60%	50%
	Magallanes Paul	3.9	40%	80%	60%
	Padilla Cosme A.	2.9	20%	40%	30%
	Renteria Juan	2.9	0%	40%	20%
	Romero Kelly	1.1	20%	20%	20%
	Ruiz Stevie	2.5	20%	40%	30%
	Serrato Luisa	2.0	40%	60%	50%
	Sichler Krystal	.7	0%	40%	20%
25.	Vargas Betty	2.3	0%	40%	20%
Ave	rages of class totals				
	correct answers:	1.94	23.2	44%	33.6





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