# **Abstract**

Teaching students who have difficulty in comprehending written text to paraphrase enables them to gain a deeper understanding of what they are reading.

Reading is a process that requires the skills of decoding and comprehending. Skilled readers are adept at both processes however it is evident that comprehension skills and decoding skills do not develop simultaneously. Research shows that the teaching of explicit learning strategies enhances the comprehension of all students.

In this active research study, six students from Years 3 and 4 who have displayed lower levels of comprehension were chosen to participate in the explicit teaching of the paraphrasing strategy. Over nine sessions they were taught to provide synonyms for a single word, provide a synonym for a single word in the context of a sentence, paraphrase a paragraph sentence by sentence, paraphrase a paragraph, and identify the main idea of a paragraph.

As all of the outcomes did not show an increase in the level of comprehension, the results were inconclusive but promising. The students' comprehension level did not increase but remained constant when tested on non-fiction texts. However outcomes for the fiction texts demonstrated an increase in this level.

The implications for the teaching of comprehension are that the teaching of strategies needs to be explicit. All students would benefit, especially those who are below their age appropriate level.

# **Introduction**

# **Broad Topic Targeted**

By the middle of their primary years of schooling, many students have attained an acceptable level of decoding skills. Conversely, comprehension skills are considerably lower than their reading age which impacts adversely on their motivation to read for information and enjoyment.

As students progress through the middle and senior years of primary school a greater emphasis is placed on comprehension. Students require comprehension skills for researching information and the appreciation of literature. Students must learn to automatically translate written text into vocabulary that they understand otherwise their reading could be compared to a person reading text in a foreign language of which they possess only the pronunciation skills.

### Related Research

Decoding text is the first step in learning to read, however it is vital that the reader comprehends the written word and the information contained in the text. Skilled readers are good comprehenders (National Reading Panel, 2000; Snow, Burns & Griffin, 1998). Parker, Hasbrouck and Denton identify students who experience failure in reading as those who do not understand key words or sentences, cannot discern how sentences link to each other or how the information in a text fits together in a meaningful way. Without these strategies employed by the student, concentration and motivation to read are lost.

Teaching learning strategies to students enables them to approach a task and complete it efficiently and effectively, increasing their performance. These strategies can be employed in a number of settings – academic and non-academic (Schumaker & Deshler, 1992).

There are several strategies that aid students in the comprehension of text. Each strategy is made up of a number of parts and to help students remember a mnemonic is useful. In the Paraphrasing Strategy (Schumaker, Denton & Deshler, 1984) the acronym RAP was devised.

# Read a paragraph

**A**sk yourself, What were the main idea and details in this paragraph? **P**ut the main idea and details into your own words.

Within any classroom there may be a wide range of abilities and the learning needs of each student are to be addressed and catered for (Giangreco, Baumgart, S Doyle,1995). Traditional instruction, lecture methods and 'skill and drill' approach do not promote learning for students considered at risk or those with learning disabilities(Baker & Zigmond, 1990; McIntosh, Vaughn, Schumm, Haager, & Lee, 1993). Conversely, cognitive strategy training concentrates on changing the way in which students process information. This approach deals with the thinking process and what the student actually does to direct their performance and self-assessment of the task (Deshler, S Schumaker,1986). Teaching learning strategies compared to teaching content equips the student with tools they can employ in multiple situations and disciplines.

Students in middle primary to secondary school are required to construct meaning from text and success of their schooling depends on this skill. The paraphrasing strategy has proved to raise the reading comprehension level of students with and without learning problems (Schumaker, Denton & Deshler, 1984). Another study (Ellis & Graves, 1990), also found it beneficial in improving the reading comprehension skills of middle school students with learning difficulties.

# Links between the literature and the problem.

The students in the control group are skilled decoders and have recorded high scores in oral reading accuracy tests. Where errors were made when reading the text, students made some self-corrections, but at other times continued to read on substituting a word which was not a synonym and the meaning of the text was distorted or lost. Low scores in oral reading comprehension tests, Probe, and written comprehension tests, Torch, showed that the understanding of the text was poor before any intervention was employed.

The objective of the present investigation is to extend the earlier research by directing students to find synonyms for singular words in a text, which is to substitute a given word in a sentence so that the meaning of the sentence is not altered. After students have mastered this strategy and discussed the synonyms that the group has offered, the teacher models how to reproduce a sentence using her own words. The students then reproduce this task and again, discuss as a group, which sentence is the closest in meaning to the original. The research regarding the Paraphrasing Strategy consists of three steps – RAP which directs students at larger chunks of the text. The present investigation will engage students in breaking the task into smaller chunks.

### **Prediction**

Teaching students who have difficulty in comprehending written text to paraphrase enables them to gain a deeper understanding of what they are reading. Literal comprehension improves as does inferential.

# Design

The design is a case study OXO design in which the gain in inferential comprehension is monitored for children in Years 3 and 4 who have difficulty in understanding written text even though they are excellent decoders.

# **Participants**

I teach in a multi-age classroom of twenty-nine Year 3 / 4s. Many of the children are from second generation Italian backgrounds.

The participants in the research are a group of six children comprising three Year 4 girls and two boys and a girl in Year 3. All decode well but have difficulty in comprehending written text. The three girls in Year 4 attend a reading support group, two sessions per week.

The sessions for this study are to be conducted in the normal literacy block, over a time frame of three weeks. Each session is to be about twenty-five minutes in duration.

Student 1 is ten years of age and is the younger of two children in the family. Student 1 has experienced social and emotional problems throughout her schooling. She has attended counselling sessions outside the school

environment and has undertaken an educational assessment. She has attended a reading support group for the past two years, this year it is Corrective Reading. She is a fluent but not expressive reader, emphasizing each word read. She fails to understand key sentences, the relationship between sentences and how information fits together in a meaningful way. She also finds it difficult to concentrate and maintain interest. Student 1 reads sparingly at home, always having some excuse as to why it is not done. Her mother has sought help in encouraging her to read and says she became disinterested in Year 3. My observation of this dilemma is that even though she finds little difficulty in decoding text her understanding of it is poor. Student 1 is now at an age where she realizes her shortcomings. Her Reading Age is in the range 9.5 to 10.5 years.

Student 2 is a Year 4 girl who is ten years of age and the younger in a family of two. She has an older brother. She has attended reading support this year. She decodes well but has difficulty with comprehension. Her oral reading is fluent but slow. Her Reading Age is in the range 10.5 to 11.5 years.

Student 3 is ten years of age and has an older brother. She does not understand how sentences relate to each other and how the information fits together in a meaningful way. She attends a reading support program two sessions per week. Student 3 has a reading age in the range 10 to 11 years.

Student 4 is nine years of age and in Year 3. She is an only child. A fluent reader, she decodes efficiently but substitutes the occasional word that does not fit with the meaning of the text and continues to read on. Her reading accuracy is high and her comprehension is building. Student 4's Reading Age is in the range 9 to 10 years.

Student 5 is a Year 3 boy aged nine years. He is the older child in a family of two and his sister is in Prep. He reads fluently in a monotone voice with no expression. His reading accuracy is sound but his comprehension is poor. He does not understand how sentences relate to each other or how information fits together in a meaningful way. Student 5 has quite a good general knowledge and his oral vocabulary is developed in specific areas. He has a Reading Age in the range 10 to 11 years.

Student 6 is a Year 3 boy aged nine years. He is the middle child of three boys Student 6 was tested for learning difficulties and was shown to have high non-verbal intelligence, average verbal intelligence and inefficiencies with information processing. He is a student who benefits from a more structured program rather than the more integrated, self-directed approach. Student 6's reading is fluent but expressionless. His reading accuracy is high but his comprehension level needs to increase. Student 6 has a Reading Age range between 10.5 and 11.5 years.

Entry levels in the intervention are in Table 1 as shown below.

# Materials used included the following-

Each student was assessed individually with the following tests (pre-test)

- ❖ Orthographic reading test to determine the student's knowledge of letter clusters of varying difficulty that are read automatically and accurately.
- ❖ Probe Determiner a list of words divided into 20 sets. The students read the sets of words until there a number of errors observed to ascertain Reading Age range.
- ❖ Torch test Grasshoppers a comprehension assessment in the form of a cloze activity. The missing words are not provided and the students have to fill the gaps with vocabulary that fits the text. This test was administered prior to and following the intervention.
- ❖ Probe Reading Observation, Behaviour & Evaluation of Comprehension fiction and non-fiction at the relevant Reading Age level. There are no pictures and limited title clues accompanying this text to ensure the results are based on comprehension skills. Reading aloud was also evaluated at the pretest stage. The same tests were administered after the intervention.
- Unseen running record, using Probe reading texts.
- Multiple choice questions relating to Bronson, Going Places Year 3 AIM 2003 – post test.

### Procedure

Each session had a focus of substituting words with synonyms. The first sessions began with replacing one word in a sentence, e.g., Sam and John went along the path. The substituted word had to reflect the meaning of the sentence. All students had a turn and a vocabulary list was built up for the underlined word. The students then had to retell the sentence in their own words, changing as many of the words in the sentence as possible. These sentences were recorded on the chalkboard. A discussion about the sentences followed and students commented on which sentence they thought was best and why.

The students were asked to verbalize the strategy they were practising. "Look at the sentence and read it. Think about what the sentence said. Cover the sentence and then say it in my own words."

This strategy was practised each day moving from a word, to a sentence and then to a paragraph; each to be transposed into their own words. The students were asked to verbalize the strategy they were practising before they read.

The nine teaching sessions were held over a three week period at about twenty-five minutes per session. Where possible they were held on consecutive days.

Each day anecdotal notes were made and the students recorded their responses in a book allocated for the sessions.

Session 1 – Find a synonym for a given single word. Words listed.

From a sentence on the chalkboard, the verb is to be replaced by a synonym ensuring the meaning of the sentence remains. Each student takes a turn.

Teacher models the retell of a sentence

Orally, students retell the whole sentence replacing as many words as possible, still ensuring that the meaning remains. Students record their own sentence.

Session 2 – Recall what happened during the previous session. Replace the verb with a synonym.

Retell the whole sentence changing as many words as possible, orally and the teacher transcribes the sentences on the chalkboard.

Students record their own sentence.

Session 3 - Students verbalize the strategy 'What I need to do when I am reading'.

Using a fiction text, students read a sentence, cover it and retell it in their own words, changing as many words as possible.

Session 4, 5, 6, 7 - Verbalize the strategy. Students read a non-fiction text a sentence at a time and paraphrase it. At the end of the paragraph discuss what the main idea is.

Session 8 – Retell the passage from the previous session.

Verbalize the strategy – paraphrasing. Use a non-fiction text for reading – paraphrase sentence by sentence orally.

Students write one sentence to summarize the paragraph.

Session 9 - The approach was enriched by asking the students to read a paragraph of a fiction text, think of the picture in their minds about the text and then draw that picture and label it with relevant words. From this they were to retell the paragraph in their own words in writing. This approach was tried in the hope that the language in the retelling would have a better flow than previously for some students and would make the task easier.

The first paragraph was read by all students and discussed. Each sentence was paraphrased and then students illustrated the paragraph and recorded what it was about.

The second paragraph was to be read by the students to themselves, paraphrasing each sentence. They then had to illustrate the paragraph and retell and record it.

Session 10 – Assessment – Torch test Grasshoppers

Session 11 – Assessment – Comprehension questions with multiple choice

# answers. Session 12 – Assessment - PROBE

# Results

Table 1 (Pre test and post test using PROBE)

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Student	Age	Reading Age	Reading Accuracy	Reading Accuracy	Reading Comprehension		Reading Comprehension	
		<u>7.90</u>	Fiction	Non Fiction	Fiction		Non Fiction	
					<u>Pre</u>	<u>Post</u>	<u>Pre</u>	<u>Post</u>
1	10	9.5 –						
		10.5	98%	95%	30%	70%	20%	20%
2	10	10.5 –						
		11.5	95%	99%	40%	70%	30%	30%
3	10	10.00 –						
		11.00	100%	98%	30%	70%	30%	70%
4	9	9.00 –						
		10.00	98%	97%	60%	60%	70%	60%
5	9	10.00 –						
		11.00	99%	99%	20%	50%	40%	70%
6	9.	10.5 –				•		
		11.5	95%	97%	60%	60%	40%	40%

Table 2 (Comparison between pre and post test scores—Torch — Grasshoppers)

Student	Pre-test	Post-test				
1	40%	67%				
2	69%	57%				
3	78%	100%				
4	72%	78%				
5	55%	63%				
6	52%	88%				

Table 3 (Comprehension test – multiple choice answers)
This assessment was conducted after the intervention was completed.
Multiple choice answers were selected for the fiction text Bronson Year 3 2003 AIM Booklet)

<u>Student</u>	Score Comprehension Accuracy	
1	60%	
2	100%	
3	80%	
4	100%	
5	80%	
6	80%	

The data collated has shown that there has been an overall improvement in all students in the control group. Each assessment task has assessed different areas of comprehension -

PROBE identifies and defines six elements of comprehension – literal, reorganization, inference, vocabulary, evaluation and reaction. These elements provide an overall classification of the student's understanding of the text. It also provides two assessments – fiction and non-fiction at the same reading age level.

TORCH is a cloze activity which assesses literal and inferential levels of comprehension.

Multiple choice assessment which addresses literal, inference and reorganization of text.

### Table 1

It is noted in Table 1 that all students improved favourably in the fiction component of the PROBE reading assessment. The results of the non-fiction assessment however did not represent such a positive outcome for all students. Throughout the research sessions both fiction and non-fiction texts were used. As the sessions progressed the students were totally engaged and very enthusiastic in generating synonyms and putting sentences into their own words.

All students were willing participants but Student 1, in particular, was keen to provide suggestions and in session 8 was able to change the structure of the sentence and retain the meaning of the text. This was quite encouraging as her approach to reading is frequently negative and she is the student who has scored the lowest in all assessments throughout the year, including the Reading Support Group which she attends twice weekly. I believe that Student 1 has reached a stage of maturity where she realizes that she does not understand what she is reading and 'so why bother?'

Student 6 required further explanation of tasks but he did not always follow the task as required. His performance on the TORCH test, however, did demonstrate that he had a clearer understanding of the text. Student 6 does not volunteer information readily but showed a greater willingness to participate within the group. Student 6 has difficulty in expressing himself verbally.

Student 4's results did not support the result I had expected after the intervention except for the multiple choice assessment in which she attained a perfect score.

Student 2's results were inconsistent, achieving a perfect score in the multiple choice but a lesser score in the post test TORCH.

Student 5 made considerable progress in all post assessments and participated consistently in all oral discussions.

Student 3's progress was positive and she responded very well to this intervention strategy. Throughout the control period Student 3 developed more confidence and was willing to provide answers whereas frequently her response is 'I don't know' and is not willing to take a risk and provide an answer.

Overall, my observation is that the paraphrasing strategy provided the students with another tool to aid their understanding of written text, thus increasing their overall confidence in reading.

### Discussion

The focus of this study was to increase the students' level of comprehension of written text by explicitly teaching the paraphrasing strategy.

The students participated actively in the sessions and were keen to 'have a go'. At first two of the students were suggesting words that were not associated with the given word to be changed. However, because of the repetition of the tasks they became aware of the direction of the group and tuned into the suggestions, thus making more suitable suggestions.

Speaking frequently about what was to be done while reading – read, ask what does it mean, find synonyms, put into your own words – tuned the students into the task. They could repeat what they were required to do by the third session. In this session student 6 felt that synonyms were not helpful in aiding understanding, but the other students were positive about it.

The group found it easier to change a random sentence on the chalkboard than a sentence that was part of a paragraph in a book. This was possibly due to the fact that it was in more familiar language (the teacher's) and isolated from any other ideas. The exercise of transposing the sentence became easier. In session 8, student 1 actually changed the structure of the sentence from a text and retained the meaning. This was quite a breakthrough as student 1 finds manipulation of text quite difficult.

At the beginning of some sessions the students were asked to retell text read the day prior. Improved levels of memory were noted together with a better language flow in the retelling.

The post-test results were inconclusive even though higher levels of comprehension were attained by most students except for the non-fiction text scores which recorded no change or a negative result. Only one student showed an improvement using non-fiction text. From the answers given it would appear that some students used their prior knowledge of the subject and did not answer the question using information supplied by the text.

The assessment used with multiple choice questions produced a positive result. From the research noted in the article Improving the reading comprehension of middle school students in inclusive classrooms (Katims, D; Harris, S) the

assessment design was of ten multiple choice questions involving recall and overall understanding. Perhaps it is the case that assessment in this form may provide a more relevant result.

It was also noted in the study reported by Katims and Harris, that the sessions where the paraphrasing strategy was taught was conducted every other school day for a period of twenty minutes over six weeks (15 sessions). A time frame such as this may produce more conclusive results in a study, rather than sessions over three weeks.

Throughout the sessions it was noted anecdotally that the students' oral comprehension levels increased and they were more engaged in the text while reading. One student, student 2, in session 7 was able to put a complete paragraph into her own words.

In session 9 the students were asked to read a paragraph of a story, Bronson, paraphrase each sentence, draw a picture about it and label it with some key words. The students were then to retell it in their own words. Feedback from the students suggests that the imagery they created in their illustrations, together with the paraphrasing, enabled them to produce a retell more easily and accurately.

Since concluding the study student 6 is participating more freely within whole class activities – volunteering information and asking more questions to clarify situations especially during the literacy block.

# Implications for teaching practice

- Teach RAP and encourage students to use it when reading at any time to gain information from written text, especially non-fiction. Extend this strategy to note taking for research projects.
- Display cue cards in the room as prompts for all sessions where reading text is necessary.
- Provide a wider variety of assessment tasks multiple choice questions, questions that require inferential, organization, vocabulary answers, retelling, main idea of a paragraph/story, cloze activities, illustration with labels of a story.
- Explicit teaching of comprehension strategies
- Continually encourage verbalization of strategies 'What you do is tell yourself what you've read. Try to change as many words as you can.'
- Locate key words and sentences

# **Directions for future research**

- Devise a test/s which provide accurate and meaningful results to measure the level of reading comprehension.
- Conduct a study using tests already available that will pinpoint comprehension levels accurately for classroom teachers.

# **Bibliography**

AIM Booklet Year 3 2003 (Victorian Curriculum and Assessment Authority)

Boudah, D.J., O'Neill,K.(1999) Learning Strategies, ERIC Clearinghouse on Disabilities and Gifted Education Reston VA, ERIC/OSEP Digest E577

Clark, F.L., Deshler, D., Schumaker, J.B., Alley, G.R., Warner, M.M. (1984) Visual Imagery and Self-Questioning Strategies to Improve Comprehension of Written Material. Vol17, Number 3, March 1984

Denton, C.A., Hasbrouck, J.E.(2000) Reading Comprehension, Teaching Students with Disabilities to Read. Texas: A&M University.

Katims, D.S., Harris, S. (1997) Improving the reading comprehension of middle school students in inclusive classrooms. Journal of Adolescent and Adult Literacy, 41, 2, 116 – 124.

Parker, R., Hasbrouck, J.E., Denton, C.(2002) How to tutor students with reading comprehension problems. Preventing School Failure, 47,1,45-47.

# Appendix 1

Teaching students who have difficulty in comprehending written text to paraphrase enables them to gain a deeper understanding of what they are reading. Literal comprehension improves as does inferential.

The six children who were involved in this study were from the middle years of the primary school; three girls from Year 4 and two boys and one girl from Year 3. They were taken as a small group within the two-hour literacy block within my classroom. Each group session lasted for around twenty-five minutes. Students were required to record what they had done orally in the session or to repeat the process using the next part of the text without further direction.

The teaching unit will improve the use of paraphrasing strategies while reading to increase sentence level comprehension, which in turn will enable students to paraphrase paragraphs, locating the main idea. Paraphrasing sentences makes the reader aware of each sentence and its meaning and how it fits with the next sentence.

MLOTP model -

Sentence level comprehension.

Topic level – recognition of main ideas in a paragraph.

Prior to beginning a session with the control group, the strategy of paraphrasing is introduced to the whole class on a single word level – finding synonyms for a single word, e.g. then. The teacher lists these words on the chalkboard.

#### Lesson 1

- 1. Group given a word, each provides a synonym.
- 2. Teacher writes a sentence on the chalkboard. E.g. 'Sam and John went along the beach.' Replace the verb went. Each student has at least one turn and these words are listed on a chart.
- 3. The teacher models paraphrasing the whole sentence orally.

  Each student then has a turn of paraphrasing the sentence and the teacher records this on the board.
- 4. When all students have had their turn, discuss which sentence has the most words changed. Tick the words that have been changed but provide a clear meaning of the given sentence.
  'What did you do when you read the sentence?' Responses 'Changed it
  - into our own words, used synonyms'
- 5. The students then record their synonym suggestions and their Sentence in their books.

### Lesson 2

1. Discuss the strategy and students then verbalize it. Tell yourself what you have read. Try to change as many words as you can.

- 2. A sentence is written on the chalkboard. The verb in the sentence is to be exchanged for a synonym, e.g. John <u>said</u> that he would not go to the party. Students provide words and these are listed on a chart.
- 3. John <u>said</u>, 'I will not go to the party'. Students offer synonyms for 'said' in the context of the new sentence.
- 4. A student provides a sentence to be changed into other words but with the same meaning. The children in Year 3 ran races at the sports yesterday. The students orally paraphrase the sentence in turn and the teacher records it on the chalkboard. Discuss which sentence changes the most words and still retains the meaning. Students return to their seats and record their sentence.

### Lesson 3

- 1. Students articulate the strategy they are to practise. Encourage think aloud procedure.
- 2. Using a simple text, read and paraphrase a sentence at a time. Students take turns retelling the sentence orally.
- 3. Complete this procedure for a whole paragraph and then ask what the main idea of the paragraph is.

### Lesson 4

- 1. Students articulate the paraphrasing strategy.
- 2. Provide a single word for replacement, each student is to have one turn.
- 3. A sentence is written on the chalkboard for students to put into their own words
- 4. Read a simple text, e.g. Small Moon, Big Sun, "The News Day and Night"
- 5. Using the first sentence of the article, read and then retell orally. Work through the paragraph with this method.
- 6. Read the first sentence in the second paragraph. Students then retell the sentence and record it.

### Lesson 5

- 1. Students articulate the paraphrasing strategy.
- 2. Read a simple text e.g. Longest and Shortest f from 'The News Day and Night'. First paragraph read each sentence. What does the sentence say? Put it into your own words.
- 3. What is the main idea of the paragraph? Discuss.
- 4. Students record the main idea of the paragraph.

#### Lesson 6

- 1. Students articulate what you do to help you understand what is being read.
- 2. Read text, e.g. In the dark of the night, 'The News, Day and Night'. Paraphrase each sentence orally.
- 3. From listening to each other, the students then say what the main idea of the paragraph is.
- 4. Read the second paragraph together.
- 5. Re-read the article individually. Paraphrase each sentence.

6. Record the main idea of the paragraph.

### Lesson 7

- 1. Review In the dark of the night, from Lesson 6. Students say what the main idea is and this is recorded on the chalkboard.
- 2. Re-read the article.
- 3. Review the main ideas recorded on the chalkboard. Discuss which main idea best describes the article.

Throughout the session, students articulate the strategy, 'When I am reading I put the sentences into my own words. I ask myself, "What does the sentence mean?"

### Lesson 8

- 1. Retell the passage from Lesson 7.
- 2. The students verbalize the paraphrasing strategy.
- 3. Read fiction text Bronson 'AIM Booklet'. Read first sentence twice.
- 4. The students retell the sentence in their own words orally. The teacher records it on the chalkboard. Which sentence has changed the most words? Does each sentence fit with the meaning of the original sentence? Each changed word in a sentence is ticked. Encourage the students to rearrange the sentence structure after the teacher has modelled it.

### Lesson 9

- 1. Students retell paragraph one, Bronson, in their own words.
- 2. Verbalize the strategy they are to employ read, ask what the reading is about, say it in your own words.
- 3. Question students about the picture they have in their minds about Bronson in the first paragraph.
- 4. Illustrate paragraph one and write some key words on the picture.
- 5. Retell, in writing, what paragraph one is about.
- 6. Read paragraph 2 twice, using the paraphrasing strategy whilst reading.
- 7. Illustrate paragraph 2 and write key words.
- 8. Retell paragraph 2.

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