Chapter 8: Qualitative analysis of the student interviews

8.1 Introduction

The previous chapter provided a quantitative analysis of students' responses to questionnaires. The questionnaires probed students' opinions about the role of one cognitive/metacognitive and eight socio-affective factors in influencing their reading behaviour before and after a reading intervention programme. The main finding of the quantitative analysis was that students in the intervention classes improved in their affective levels and strategy-use in relation to reading, which points to the efficacy of the intervention programme. This chapter adds a qualitative dimension to the largely quantitative study in order to gain an in-depth understanding of trends and patterns and to round out the mixed methods design (Ivankova & Creswell 2009: 145; Leedy & Ormrod 2010; Teddlie & Tashakkori 2003:15). According to Teddlie and Tashakkori (2003:15) a mixed methods design enables the researcher "to simultaneously confirm a quantitatively derived hypothesis and explore in greater depth the processes by which the relationship occurred".

Whereas Chapter 7 elicited and analysed students' responses to questionnaire items focusing on the effectiveness of the intervention in terms of the main dimensions of the construct 'socio-affective factors that influence reading behaviour', Chapter 8 looks specifically at students' appraisal of the motivational teaching techniques used in the intervention classes. These techniques map largely onto the following socio-affective factors*: interest, attitude, habits, self-efficacy* and *motivation* in reading, as well as the cognitive factor of *strategy use*. Semi-structured interviews, following the intervention, were used to elicit students' perceptions and evaluations of the intervention in order to determine how the qualitative data supports and elaborates on the quantitative data.

According to the initial research protocol, as expounded in the research proposal for the study, interviews would be conducted in three phases – at the beginning, during and after the intervention – in the form of case studies. Selected students were to be interviewed on three different occasions to determine their perceptions after each phase of the

intervention. However, due to the fluidity of the classes, this was not feasible, and therefore interviews were conducted only after the intervention at the conclusion of the modules. The advantage of scheduling the interviews at the conclusion of the modules was that students did not feel inhibited to express their views or tried to please the researcher, since their work had already been graded, and therefore their responses would not have any positive or negative effect on their achievement in the modules.

8.2 Methodology

The profile of the sample of students who were interviewed and the instrument (interview questions) are presented below, followed by an explanation of the method of analysis. Thereafter, the teaching techniques are presented, with a summary of students' responses to the perceived effectiveness of each technique. The results are then discussed using pseudonyms to identify respondents.

8.2.1 Respondents

As explained in chapter one, all the students wrote a reading test at the beginning of the module, and another at the end of the module. The average for each test was calculated per group. From these two tests two high achieving students, two students with average marks and two with low marks were to be selected from the intervention groups (*At Risk* and *Low Risk*) for the interviews. Thus, there were supposed to be six students per group. However, due to the fluidity of the classes and the fact that the interviews could only take place at the end of the module this selection method was slightly altered. All the students who obtained the highest, lowest and average marks were identified in both pre- and posttests and from both *At Risk* and *Low Risk* intervention groups. These students were contacted by email and by phone and a date and time that were suitable for them were arranged for the interviews. Students were interviewed individually, and the duration of each interview was approximately 45 minutes. Requests for students' consent to these interviews were included in the consent forms for the tests and questionnaires, and were signed by all students at the beginning of the module. Altogether, 47 students were identified, but only 40 were interviewed. The other students could either not be reached or failed to turn up for the interview. Two students from the *At Risk* group with very low marks for the pretest improved to obtain average marks for the posttest but were interviewed only once. A student, also from the *At Risk* group obtained a very high/highest mark in the pre- and

posttests, but was interviewed once. Another student from the *Low Risk* group obtained the lowest mark in both tests, but was also interviewed once. All four students were interviewed once, even though they were listed under two separate performance levels. This reduced the number of students interviewed by four to a total of 36. The distribution according to number of students per performance level is given in table 8.1 below. The numbers in brackets indicate that a student was interviewed under another performance level.

Table 8.1: Number of students interviewed per performance in pre- and posttests

Performance levels

	Pre-test			**Post-test**			
	High	Average	Low	High	Average	Low	Total
High/At Risk	2	4	2	1 (1)	7 (2)	2	18 (3)
Low/No Risk	2	3	2	2	7	2 (1)	18 (1)
Total	4	7	4	3 (1)	14 (2)	4 (1)	36 (4)

8.2.2 Instrument

Semi-structured interviews that allowed students the freedom to express open-ended views to questions were conducted mainly around the areas of motivational teaching techniques that were used for the intervention: *learning goal, relevant texts, teacher support, competence support/strategy instruction, autonomy, collaboration, rewards and praise*. The categories of *classroom learning environment* and *extensive reading*, which were to provide both affective and cognitive enrichment, were also included in the list of interview topics. Students were also asked to comment briefly on any other issues pertaining to the reading intervention programme, and the information is presented under general comments. The operationalisation of these teaching techniques and the main areas of focus in the interviews are presented below.

Table 8.2: Teaching techniques showing areas of focus for interviews

Teaching technique	**Areas of focus for interviews**	**Description /Operationalisation**
Learning and knowledge goals	• Explanations • Linking tasks to outcomes • Encouraging more focus on learning	Emphasis on learning instead of grades Clearly stated goals and outcomes.
Relevant and	• Use of subject- specific passages from textbooks and discipline-	Use of significant, relevant and interesting texts

interesting texts	related texts for strategy instruction, tasks and assignments	
Teacher support and involvement	• Students received individual attention • Extra tuition given to weak students • Referring to students by name	Care and concern of students by lecturer. Affective and academic support
Competence support Strategy instruction	• Explanations and modelling of strategies such as summarising and notetaking • Practicing of speed reading exercises • Teaching of strategies for efficient reading (e.g. previewing, questioning, reviewing and evaluation) • Modelling and practicing of background knowledge application	Strategy instruction: explaining, modelling, scaffolding and practising
Autonomy and choice	• Texts for extensive reading were chosen by students • Texts for practice exercises and assignments had several options for students to choose from • Students had to work on their own to improve speed and use of strategies	Choice in selection of texts and tasks Responsibility for and ownership in learning
Collaborative, social learning (relatedness support)	• Group discussions of texts (main ideas, supporting details, etc) • Group presentations • Gradual progress from teacher (whole class) to peer (group and pair) to individual – scaffolding	Collaborative discussions in class and groups. Collaboratively produced assignments
Rewards and praise	• Identification of best performing students for tasks, assignments, etc. • Acknowledged openly and praised • Rewards (chocolates, sweets, novels) given for best performance	Rewards and praise
Classroom learning environment	• Semi-formal, non-threatening teaching and learning environment	Humanistic teaching approach
Extensive reading	• Scaffolded reading of non-academic texts with an inventory on cognitive and affective issues	Reading for pleasure

The interview questions below were used as guidelines for the interviews, but were not phrased in exactly the same way for each student.

1. **Learning and knowledge goals:**
    - How did you relate to the explanations given in class?
    - Did the linking of tasks to outcomes influence your understanding and motivation in any way?
    - Comment on the enrichment added to the module (the additional tasks, frequent explanations, discussions and so on).
2. **Relevant and interesting texts:**
    - How did the use of discipline-related texts and texts from textbooks affect or influence your understanding and/or learning?
    - Did the use of the discipline-related and general texts increase your interest in the texts and tasks in any way?
3. **Competence support/Strategy instruction:**
    - Have your reading speed, use of reading strategies, understanding of texts, critical reading skills been influenced by the classes?
    - If yes, how did this affect your attitude, motivation and love for reading?
4. **Teacher support and involvement:**
    - Do you think the lecturer supported you in your learning, for example, assisted you in understanding texts better; assisted in your application of strategies – in making learning easier for you, and in motivating you to learn?
    - If yes, explain the effect the lecturer's support had on your learning. If no, explain how.
5. **Autonomy support:**
    - Did the fact that you were asked to choose your own texts for the reading project influence your level of interest and motivation? Explain.
    - Did the fact that you were given various texts to select from for assignments and tasks influence your level of interest and motivation in any way? Explain.
6. **Collaboration:**
    - How did the frequent group and peer discussions influence you?
    - What effect did the group and peer learning have on your understanding and use of strategies?
    - Do you prefer individual or group and pair work in class and in doing projects? Explain.

7. **Rewards and praise:**
    - Were you motivated by the rewards for high scores and good performance?
    - Comment on the praises and performance rewards given in class.
8. **Learning environment:**
    - How did you perceive the learning environment?
    - What influence did it have on your learning?
    - Did it influence your level of interest and motivation?
    - Did you enjoy the class?
    - Were you motivated in any way by the teaching approach?
9. **Extensive reading:**
    - Did the readings for the portfolios influence your reading ability, and in what way?
    - Do you feel that you have been motivated to read more often?
    - When you read novels, do you identify with characters? (share their pain, joy, and so on)
    - Did you get very involved in the reading?
    - Did you become curious about the unfolding of events in the novels?
10. **General comments:**
    - Comment briefly on any challenges, improvements, and developments, and provide suggestions if necessary.
    - What general comment would you like to add?

8.2.3 Procedure

Interview sessions were recorded as handwritten field notes and also tape-recorded. The electronic versions were transcribed and compared with the manual data. Summaries of the salient ideas were made from the two sources (Appendix 6). Resulting from students' feelings of relatedness towards the lecturer-researcher the interviews were quite informal and it was sometimes difficult to keep students on topic. Furthermore, the open-endedness of some of the questions resulted in responses that pertained to more than one teaching technique, or a technique different from the one that constituted the focus of a particular question. As a result some teaching techniques do not have responses from all the students and therefore the number of students' responses varied for each construct.

The summaries were analysed using qualitative content analysis. Taylor-Powell and Renner's (2003) five steps for applying content analysis to qualitative data were followed. The fist step is to indicate the limitations and level of analysis. The second is to focus the analysis by (a) question or topic; or by (b) case, individual or group; or by both (a) and (b). The third step is to categorise the information by coding into identified themes or patterns, and the fourth step is to identify the patterns and connections within and between categories. The fifth and final step is to bring all the information together for interpretation. Details of the the steps, as they were applied to the data, are given in Chapter 4 (§ 4.6.2) where the general methodology is discussed.

8.3 Presentation and analysis of data

The summaries of the interview responses are presented under the teaching techniques that were used in the intervention: *learning goal*, *use of relevant and significant texts*, *praise and rewards*, *competence support* in the form of strategy instruction, *teacher support*, *autonomy support*, and *collaboration*; as well as *extensive reading* and *classroom environment*, which can either enhance or dampen students' affect. In a final open-ended question, students were also asked to comment briefly on any issues pertaining to the reading intervention programme.

From the interviews it was observed that while most indigenous African language speakers (within and outside South Africa) prefer to work in groups and were positive about the collaborative exercises, a number of English and Afrikaans first language speakers preferred individual work. It also came to light that whenever exercises were based on texts from textbooks or related to the disciplines, students became very interested and highly motivated. They reported satisfaction in terms of learning that had direct impact on their coursework. This, they believed, could be transferred to their content modules and assist them in obtaining good grades. Others shared that if they were interested in the topic, they enjoyed the reading, even if the texts were not related to their coursework or subject-field. The details of the interviews are presented below, first for the *At Risk* group and then for the *Low Risk* group, using the teaching techniques as headings.

8.3.1 Learning and knowledge goals

The focus on learning goals, in which explanations, aims and purposes of tasks were given to shift students' attention to learning, greatly improved their understanding. In the *At Risk* group, 79% of the students reported better understanding and higher motivation as a result of the explanations. Thirty-six percent (36%) said the explanations made tasks easier to do, and 21% specifically mentioned improvement in academic performance. One student, Nkosi, stated that because the explanations made learning easier, he believed it contributed to his improvement in the Academic Literacy test in May, in comparison to the March test. Fifty-seven percent (57%) reported that the explanations increased their motivation, and 21% made reference to the fact that it raised their interest in doing tasks. They explained that being reminded of the aims and objectives for doing tasks increased their motivation.

In the *Low Risk* group 80% of the students were positive about the focus on learning goals. Sixty percent said that it helped them gain better understanding and consequently raised their motivation and made them more willing to do tasks. Although it is inferred that by being motivated to read, students would read more frequently, and by frequent reading their reading proficiency would improve, two students in this group, Rampedi and Smith, confirmed this by explicitly stating that their reading ability improved as a result of the explanations. One student, Howard, went further to acknowledge the influence of background knowledge on his understanding of texts. His sentiments were echoed by other students who intimated that the explanations provided relevant background to the texts and made tasks easier to do and helped them to gain better focus.

One student, Marx, reported that she liked to know the reason behind whatever she did, and thus the explanations and the link between tasks and outcomes really motivated her. They gave her a better understanding of events in the classroom. Rampedi summarised students' perceptions of the benefits of learning goal orientation by stating:

> Being given explanations and linking purpose of task to the outcomes is motivating; because you know the reason for doing what you are doing. It also gives one better understanding of the task. You think you are out of high school so you have had a reading experience and you think you have a reading ability, but explanations help improve your reading ability. You see the relationship between the task and the outcomes and you are motivated [….]

The responses of students in both *At Risk* and *Low Risk* groups were very similar. As a result of the intervention, students felt they had gained better understanding of texts and strategies, and were consequently more motivated to read and to do assigned tasks. Almost all the students interviewed responded that the explanations helped to make the tasks easier to do. On the whole, students reported better understanding, which led to increased interest and high levels of motivation.

8.3.2 Relevant texts

As reported by Guthrie and Wigfield (2000), the use of relevant and significant texts for reading instruction is highly motivating to students. These texts include generic texts that are interesting to students as well as subject-specific texts that are relevant to their chosen disciplines. Besides the generic texts that were used for exercises and tasks, discipline-related and module-related texts were also used. The Economics textbook, *Economics for South African students*, was mostly used, as Economics was compulsory for first year students in the Economics and Management Sciences (EMS) faculty (about 60-70% of first-year students taking literacy modules are from the EMS faculty).

With the exception of two students, Maringa and Mondiane (both low performers in the *At Risk* group), who felt that the EMS students had an advantage, all the students found the module- and discipline-related texts very relevant and motivating.

In the *At Risk* group, 73% reported cognitive benefits that contributed to higher affective levels. Thirty-three percent of the students reported that the subject-related texts made it easy for them to apply background knowledge, which assisted with understanding of texts, and 40% stated that it made the tasks easier to do. Fifty-four percent reported being more focussed and having more drive because they could relate to the texts. They claimed that the use of subject- and discipline-related texts made the literacy module more ‘real’ and relevant and motivated them to work hard. Molwantwa for example, reported: “ The texts from my subject-field helped. They made the tasks real and relevant. I felt I would learn something that relates to my subject-field, so I was more focussed”. A student from the faculty of Theology (Muuoja) felt that Economics was relevant in everyday life, and therefore most of the students could relate to Economics texts. Forty-seven percent of the students in this group reported that the use of module- and discipline-related texts raised their interest, and made learning of strategies more interesting. They said that they were

able to link and relate the literacy module to other modules in their various disciplines; as Kekana commented, "this link gave us more drive to do tasks and we made the effort to understand".

Similarly, in the *Low Risk* group students reported that the module- and discipline-related texts increased their motivation and raised their interest. They found the texts relevant and significant, hence making learning enjoyable and interesting. According to them, the tasks were easier to do owing to familiarity with the concepts in the texts. The following responses were given by a noteworthy number of the respondents:

27% indicated that working with interesting texts improved their understanding of strategies and concepts.

53% reported an increase in motivation as a result of the relevance and of the texts.

27% said that it made the tasks easier and motivated them.

52% reported that the texts raised their interest and also made learning interesting and enjoyable.

The majority of the students found the subject-related texts very relevant and motivating. The comments of two students are given below:

> Watson: "The texts relating to my subject field were more interesting and highly motivating. I found them more relevant."
> Brown: "I could apply background knowledge to the texts relating to my subject field, so I was more motivated".

Responses of students in the *Low Risk* group were similar to those of the *At Risk* group. Students also reported that the use of texts from their subject field motivated them. They perceived the texts to be significant and relevant, and this according to them made reading classes interesting and enjoyable. Texts from their subject-field also made it easier for students to understand the strategies, as they were familiar with the contents and could apply background knowledge. In addition to the overwhelmingly positive response to the discipline-related texts, 20% of the students pointed out that the generic texts, specifically those on topics they considered to be interesting, were also motivating.

8.3.3 Competence support: strategy instruction

Competence support was given in the form of strategy instruction. Students were introduced to appropriate reading strategies, such as previewing, reviewing, questioning,

summarising and note-taking, through explanations and teacher modelling. Students had to practise by doing a number of tasks that required the use of taught strategies. As various researchers have confirmed, when students are provided with knowledge of strategies and how to use them, a sense of competence is instilled (Anderson 1999; Grabe & Stoller 2002), which elevates self-esteem and self-efficacy (Guthrie & Wigfield 2000:413).

All the students interviewed reported that their understanding and speed increased after applying the strategies taught in class. Of the 18 students in the *At Risk* group, 78% (14) reported either not having used reading strategies or using inappropriate strategies before the start of the module. Only 21% stated that they had knowledge of reading strategies. In relation to the benefits they had gained from the strategy instruction, 47% reported increase in reading speed and 63% said they had experienced improvement in their understanding of texts. Thirty-seven percent cited specific examples of strategies (e.g. the use of mind maps to distinguish main ideas from supporting details, application of background knowledge to aid understanding, making of inferences and evaluating texts) that had helped them gain better understanding of what they read. Matemane, one of the low performers in the *At Risk* group, reported improvement in academic performance:

> I was not using strategies before the classes. After being introduced to strategies in class, I have been trying to use correct strategies. My speed and understanding have improved. The techniques helped me in studying for other modules. My motivation and confidence have also increased. I passed all my modules.

Due to these cognition-related improvements, 26% stated categorically that their motivation had increased. It is encouraging that 32% of the students reported and illustrated how they had transferred reading strategies to the reading of textbooks in other modules, and found them useful and motivating.

In the *Low Risk* group 40% of the students reported being aware of strategies, or having used them subconsciously, whereas 60% reported either not using them or not being aware of them, especially critical reading strategies. However, students reported gains in using appropriate strategies after instruction. Forty-seven percent of the students in this group reported increased reading speed and 67% reported improved understanding. Twenty-seven percent of the students added that using appropriate strategies enabled them to hold more information in memory. Another 27% stated that their motivation and interest had

increased as a result of using appropriate strategies. Matlala, one of the high performers in this group, stated: "When I started to apply them [strategies] I saw improvement in my understanding, which really motivated me".

In addition to increase in motivation, 27% of the students reported improvement in reading ability and academic performance. Thirty-three percent specifically stated that they transferred their use of strategies to reading in other modules, and cited specific examples of the type of strategies they had used, in which subjects, and how these strategies had been of great help to them. Mtshweni explained:

> I was used to most of the strategies except critical reading. I have started applying it in reading Law, Economics and Accounting and I can see improvement in my understanding. My marks have even improved since I started applying critical reading strategies. Accounting questions require critical reading so I have been applying it.

He added that his Accounting marks had mproved by 15% due to his application of critical reading strategies.

Furthermore, 27% enumerated the benefits of using appropriate reading strategies to prepare for exams and to read examination questions. Marx stated that the use of appropriate strategies enabled her to be more focussed when reading. Howard reported that initially he found critical reading challenging but after the classes he could use the different reading strategies with greater ease. Mputla summed up the effects of strategy instruction in this way:

> I used to read academic texts the way I read magazines but after the classes I started to read with purpose, for example, looking for main ideas, topic sentences and so on. I realised that I could hold more information in memory and also understand better.

In summary, the majority of the students reported that after using the strategies introduced in class, their confidence increased and they felt motivated to read. A number of them admitted to not being comfortable with summarising, distinguishing main ideas and supporting details, before the intervention. However, after applying the techniques and strategies taught in class they could engage in these tasks without much difficulty, and their understanding and speed improved. This confirms the view that increased reading speed at acceptable levels contributes to better understanding (Grabe & Stoller 2002).

Although it emerged from the interviews that a number of reading strategies, especially critical reading, were new to many of the students, they reported that applying appropriate strategies to reading their textbooks deepened their understanding of texts, and that the observed gains in the use of strategies were exciting and motivating for them. The majority of students reported that when they begun to read critically and made the necessary inferences, they experienced improvement in understanding of texts. Thus, the teaching of strategies helped to improve students' reading speed and their use of strategies for better comprehension. Furthermore, the observed improvement in comprehension led to increased self-efficacy and higher motivation.

8.3.4 Teacher support

When students perceive that they are being supported by significant adults (such as teachers and family members), and that these adults care about their progress, they are motivated (Bus 2001; Guthrie & Wigfield 2000:416; Wentzel 2009). Support was provided in the classroom by showing concern for individual students' needs. Weak students were identified and tutorials were provided on an individual basis. These students were given additional tasks for practice and provided with opportunities to resubmit tasks after extra tuition. Frequent teacher modelling and the scaffolding of activities also provided support for the students. Referring to students by name and enquiring about personal or academic challenges, especially those experienced by weak students, created a sense of relatedness, which also contributed to the support.

Students were positive about the readily available support from the lecturer. They stated that it reduced the stress of learning, and made learning easier. It was also motivating for them. It gave them a sense of identity and created a bond between the lecturer and the students as well as among the students.

In the *At Risk* group, 78% of the students highlighted the benefits of the support. Sixty-one percent reported being motivated by the support of the lecturer. Twenty-two percent stated that it helped to reduce the stress of learning, and 17% commented on the bonding and the freedom they had. In addition, 28% reported on the encouragement, enjoyment and interest it provided. Thirty-three percent linked the support of the lecturer to the learning environment. In other words they reported that the support given by the lecturer contributed to an enabling learning environment. Muuoja, one of the high performers in

this group, explained that the environment was not restrictive, and therefore he was able to ask for and receive support from the lecturer. He further indicated that the relatedness between the lecturer and the students motivated him. He reported: "You felt as if you belong and you are cared for, which is motivating and encouraging". Segodi, another high performer, also reported that the environment was supportive, as there was two-way communication in the classroom.

Nkosi added that the available support and the non-threatening environment made her "enjoy classes and learn in a fun way". Maringa (low performer), reported that he initially had difficulty with reading for meaning but after receiving further explanation and coaching from the lecturer, he understood the strategies and was able to apply them appropriately. He added that it increased his motivation. Ndlovu, another low performer, also stated that he believed students who found reading challenging, including himself, were motivated by the support given. He reported that the willingness of the lecturer to assist students motivated him to apply himself and to focus on given tasks.

All the students in the *Low Risk* group were positive about the support they received from the lecturer, whether in the form of explanation, clarification, encouragement, consultations, individual attention, extra tuition or the mere show of concern. Forty-six percent of the students reported that the lecturer motivated and encouraged them to work hard. Twenty-seven percent stated that it eased the tension and gave them a sense of freedom. Another 27% also reported that it created a conducive environment for learning, thus relating the lecturer's support to the learning environment. A quarter of the students in this group reported that they gained immensely from the lecturer's illustrations and modelling, and that their confidence increased. Mahlangu, an average performer in this group, alluded to the spirit of 'ubuntu' by stating that, "the support made one not to feel alone". He added that being supported was important to him, and the lecturer's support motivated him. Mtshweni, an average performer, stated that "the lecturer supported students a lot compared to other lecturers".

Students unanimously agreed that there was available support from lecturer and peers, and that the high level of support helped to ease the tension which first-year students experience at the beginning of the year. The fact that the lecturer made an effort to know students by name gave them a sense of significance and belonging, thus increasing their

motivation. The constant encouragement given by the lecturer and concern for their success also increased students' motivation. The majority of the students agreed that because of the frequent teacher modelling and the many illustrations given in class, they found the application of strategies less challenging and the tasks easier to do. Another view that emerged was that the two-way communication in class and the support received from the lecturer, motivated students to work hard and perform well. A number of students (33% of the *At Risk* group and 46% of the *Low Risk* group) stated that the friendly environment and the awareness that support was available motivated them to put in more effort. In sum, students appreciated the readily available support from the lecturer, especially the weaker students. They reported that the support made class interesting and fun and increased their confidence and motivation.

8.3.5 Autonomy support

One of the ways in which autonomy was infused in the learning was by giving students choices. They had to choose their own texts for extensive reading, and were also given several options to select from regarding assignments and tasks. The project work that they had to do also required responsibility on their part. Only six students provided information on this teaching technique: three average performers in the *At Risk* group and three students in the *Low Risk* group: one low performer, one average performer and one high performer. This limitation became evident after the responses had been compiled (cf. § 8.2.3).

The three average performers in the *At Risk* group who commented on autonomy support stated that being given the choice and the responsibility to choose their own texts were highly motivating, and gave them the opportunity to choose texts that interested them and were at their level of competence. They added that it enabled them to enjoy what they read and consequently became involved and engaged in reading. The fact that they were frequently given the option to choose from several assignment topics also motivated them to work hard. Mabitsela commented that they felt they were in control of their learning instead of being controlled by the lecturer, which was very motivating and exciting for them. Molwantwa stated: "You choose your own text so you are motivated to work hard".

Responses from the *Low risk* group were very similar. Responses from the three students (low, average and high performers) pointed to the fact that the choice given for selection of

texts and assignment topics was motivating and made them put in more effort. Botha, an Afrikaans L1 speaker on the low performing level, reported that the freedom to select her own books enabled her to choose texts at her level of competence, and that interested her. As a result, she enjoyed her reading. She stated, "because you are given freedom to choose […] so you choose what interests you, which motivates you to work hard." Students reported on how the freedom to choose reading texts and selecting from the variety of tasks motivated them and contributed to their becoming involved readers. The fact that students were given a voice encouraged them to come out of their shells and willingly participate in class.

8.3.6 Collaboration

Collaborative learning was practised frequently through group and pair work. Texts were discussed in groups frequently to allow for various interpretations and meanings, before students produced their individual versions of summaries, paraphrases, syntheses and other given tasks. Project assignments were also given, and students had to work collaboratively and do presentations in groups.

Besides three students (16%) who did not perceive collaborative learning favourably, the rest of the students (84%) in the *At Risk* group embraced collaborative learning. Some of the reasons given by the three students were that they would prefer individual work, as they were more focused working alone. They stated that engaging in collaborative exercises made one 'aloof and passive'. Of the 84% in this group who were positive about collaborative learning, 42% reported that collaborative learning was of great benefit, due to the fact that various ideas were shared, which culminated in a better quality end product. Sixteen percent explained that collaborative learning assisted them in gaining better understanding of texts. On the social level, 21% reported that it provided opportunities for interaction and involvement. In addition, 26% reported that it enabled them to make friends, which helped when they needed assistance outside class.

Regarding affect 74% made specific positive comments: 32% stated that engaging in collaborative activities made learning interesting, enjoyable, fun and 'nice', and 42% reported that they found the social learning encouraging and motivating. Individual responses included the following: Mabitsela stated that it increased his confidence in his ability to read successfully; Machaba explained that since he was used to a communal way

of doing things, he found it more acceptable; and Matsei, an average performer, reported how through collaborative learning her comprehension of texts and her use of strategies improved dramatically, which she believed contributed to improvement in her performance in the literacy test. She reported that she "initially did not like it because some students feel one is stupid when you are not on the same level with them, but later I was really enjoying it". She explained that she shared her ideas during one group activity, and the group members thought her ideas were brilliant, and applied them. This really made her 'happy' and motivated her because she perceived her group members as very intelligent. Sharing Machaba's sentiments, she added that she found this approach very appealing, as she was used to a communal way of life. Consequently, she formed a study group based on these collaborative activities.

A number of students shared that collaborative learning made problem-solving activities more interesting and fun:
Meyer: "Group work is more fun. It makes learning more interesting".
Segodi*:* "You see things from different angles".
Aphane: "You don't feel alone. You are able to make friends in class and interact".

Ndlovu summed up the social, cognitive and affective issues by saying that collaboration enabled her to interact and make friends, assisted her in gaining deeper and better understanding of issues, instilled motivation and provided her with opportunities to benefit from ideas shared by other students.

Students in the *Low Risk* group gave similar responses. They responded that collaborative activities that fostered interaction were helpful to students. However, 24% reported that they would prefer working on their own. Students who preferred to work on their own cited the challenges of collaborative learning (e.g. time frames, personality clashes, and so on) as reasons. The rest (76%) either had a high preference for collaborative activities or preferred a balanced combination of the two. Of the 76% of students in this group who embraced collaborative learning, 88% reported on the benefits of collaborative learning and how it provided opportunities for different perspectives to be presented. Twenty-four percent reported that it helped improve their understanding, and added that it enabled them to obtain higher grades than when working on their own. Fifty-three percent stated that it was motivating, encouraging and exciting, and generated enjoyment.

Unlike the students in the *At Risk* group, of which 21% mentioned interaction as a benefit of collaborative learning, only one student in the *Low Risk* group made reference to interaction. Whereas a number of *At Risk* students seemed to cherish interaction, it did not seem to be an important issue for the *Low Risk* group. The *Low Risk* group emphasised cognitive gains, whereas the *At Risk* group focused more on the affective and social gains.

Rampedi explained that scaffolding activities (i.e. starting with collaborative discussions and then following with individual work) was helpful and motivating. She stated,: "You get ideas from others. When you are given a group task, others come up with ideas that you have not thought of, so you learn a lot from others, and you are motivated". Mogomotsi, an average performer, explained that "various ideas and opinions are shared which help improve your understanding. You are also encouraged to work harder in these group activities. It increases your motivation". Watson explained how he used strategies learnt from other students in the group and found them useful. Segodi, a high performer, defended his support for collaborative projects by stating that "[t]he end product is a reflection of different views".

Although some of the students preferred to work on their own, the majority (84% *At Risk* and 76% *Low Risk*) reported on the gains they received through collaborative learning. A number of these students (44% *At Risk* and 57% *Low Risk*) reported better understanding and increase in self-efficacy due to the sharing of ideas, discussing of problems and undertaking of group projects. Students were also very positive about the different views that emerged during collaborative learning.

Another insight that was revealed in the interviews was the importance of social interaction, specifically making friends during the collaborative activities. A number of *At Risk* students reported that they had felt very lonely, but could not make friends in other classes due to the large numbers and the non-interactive approach. The interactive approach used in the intervention class made it possible for them to make friends. Despite giving students the opportunity to make friends, which was not an intended aim, the approach also afforded students the platform to participate in both social and academic activities together. According to Gardner (2011), when students do two or more activities together they achieve success.

Students who did not embrace collaborative learning cited several reasons. Mlowantwa (*At Risk,* average performer) and Howard (*Low Risk,* high performer) reported that they were more focused when solving problems by themselves, and that they thought through issues better when working on their own. Others also reported that they found collaborative learning less challenging, as the problems were tackled by a group of students. Naidoo *(At Risk,* average performer) and Mahlangu (*Low Risk,* average performer) explained that some students do not contribute, and others insist on their own views. The greatest concern of these students was the fact that group work takes longer to complete as there are many views to integrate. They cited length of time, personality clashes and contradictory ideas as problematic in collaborative work.

Although the majority of students interviewed reported benefits of collaborative learning, it was clear that some students preferred to work on their own for various reasons. The majority, who found this social learning approach beneficial, reported that it allowed them to see different perspectives on an issue and be introduced to various views and solutions to a problem, which they found exciting and motivating.

8.3.7 Rewards and praise

Besides awarding marks to students' work, they were also praised for good performance. Sometimes packets of sweets or bars of chocolates were given to best performing students or groups. At other times, novels were awarded to best performing students. The type of reward depended on the difficulty of the task. For all these rewards, students were either asked to raise their hands or stand up in class and were applauded by classmates.

Whereas 22% of the students interviewed from the *At Risk* group reported not being motivated by the rewards for best performance, 78% admitted to being motivated, especially as a result of the acknowledgement and recognition that accompanied the rewards. Thirty-three percent added that the praises they received from the lecturer motivated them to work hard. Seventeen percent reported that they became more involved in their work in order to excel and receive rewards, recognition and the accompanying praises. Phalane reported that he was motivated to work harder to obtain a reward and the recognition that accompanied it. He stated, "You want your mates to know of your good performance. You want others to see that you are also good". Muuojo reported that

"knowing that your efforts are recognised is highly motivating". Molwantwa said she was motivated to work hard and receive a reward, and that "It feels nice when you do well and receive recognition". Masanabo added that "geting a reward provided a pleasant feeling".

In the *Low Risk* group, 27% reported not being motivated by the rewards. However, 73% reported that they felt motivated to work hard to receive rewards. It is interesting to note that one of the students, Nkhondo, who reported not being interested or motivated by rewards, obtained the lowest mark in both pre- and posttests. Thirteen percent stated categorically that praise and rewards made the classes interesting and that their motivation was more in the enjoyment and interest that the giving of rewards brought to the classes. Mogomotsi, who received a reward for best performance in a task, stated that she felt highly motivated to work harder and receive more rewards. Others also said that they were motivated to take tasks seriously and to perform well because of the incentives. Matlala commented on the issue of interest and said that"…it also made the class interesting". Marx, one of the students who received a reward for best performance in one of the class tasks, stated that "[i]t is motivating. It gives you something to look forward to and makes you put in time and effort".

The majority of the students were motivated by the rewards and also the recognition**.** They reported being motivated to attend classes and do their best in order to receive a reward, with the associated recognition. More than three quarters of the students interviewed hailed the incentives approach and stated that it made them work hard. Others reported that it made the classes interesting.

In the *At Risk* group, a number of students reported that though the incentives motivated them, they were particularly motivated by the recognition they received for good performance – the identification, the acknowledgement, the praise and the applause. They reported that they strived to do better in order to be recognised. The *Low Risk* group differed from the *At Risk* group in the sense that they appreciated the rewards, but did not attach as much value to the recognition, acknowledgement and the praises that accompanied the rewards, although these issues seemed important to the *At Risk* group.

8.3.8 Learning environment

A non-threatening, free environment was created to provide students with the opportunity to interact freely and to feel safe to participate in the process of learning. Usually, the lecturer provided explanations and modelled the strategies before students were required to participate in problem-solving activities, first collaboratively, then either in pairs or individually. Students were given the freedom to consult with peers or the lecturer for further explanations. The lecturer moved around assisting students and providing academic and affective support (encouragement and motivation) to students. The challenging part to this free learning environment was being able to control the class and also create a free learning environment.

Apart from two students who felt that the environment made them too relaxed, the rest of the students (16) in the *At Risk* group had only praises for the learning environment. Fifty-three percent of these students reported that they enjoyed the classes. Thirty-five percent of the students said they felt free in class, and 65% reported that the environment enabled them to think more clearly and creatively, confirming the assumptions of the Universal Learning Theory (Burton 2011). Twenty-nine percent of the students reported that it fostered interaction and provided them with opportunity to form friendships. Eighteen percent of the students said the learning environment made classes interesting and made them interested in attending classes. Forty-seven percent reported that they were highly motivated due to the learning environment. Fifty-three percent reported that it made learning less stressful and 35% added that it made them feel comfortable and relaxed, which made learning easier. Fifty-two percent (9 of the 17 students) reported on the easy manner in which ideas were shared in class, and added that students did not feel hesitant or inhibited. Kekana (average performer) stated succinctly that it helped to make adjustment to university easy, which was what first-year students needed. Matemane (low performer) expressed the belief that the less stressful the environment is, the better he could apply himself and the more productive he became. He stated that "the interaction was motivating", and further explained that:

> [T]he environment was conducive to learning, and we were able to make friends and learn. I always looked forward to attending classes [….] The freedom to share ideas and apply our social and educational background in solving problems was interesting, and motivating.

Meyer, an average performer, reported that the environment made her feel comfortable and relaxed in class, which she believed contributed to her increased motivation and high level of interest in the module. She added that she did not miss any of the classes. Muuojo (high performer in both pre- and posttests) explained that the bond that existed between the lecturer and the students and among students, owing to the free environment, was motivating. He added that the bonding made classes enjoyable and learning fun. Nkosi (average performer) reported that the environment and the approach increased his motivation, and gave him a reason to attend classes. Students in this group consistently reported making friends, sharing ideas and enjoying the classes due to the environment and the teaching approach.

The overall response of the students in the *Low Risk* group was also very positive. Thirty-one percent reported that there was a good balance between formal and semi-formal and that the environment was appropriate for a literacy support module. They explained that they would have resented a restrictive learning environment in a literacy module. Thirty-eight percent reported that the environment was motivating and enjoyable. Forty-four percent explained that the environment promoted clear thinking and made learning easier. Almost half of the students in this group (44%) reported that the freedom provided by the environment enabled them to learn with less stress, which made classes interesting and exciting. One student, Mtshweni, commented on the opportunity it provided for interaction. Although four of the eighteen students in the group would have preferred a more restrictive environment, three stated that it was an appropriate environment for a first-year module offered in the first term, as many of them arrived at the beginning of the year being timid, and feeling insecure, apprehensive and uncertain. Thus, according to the students, an affective, supportive teaching environment that provided students with ample opportunity to interact and overcome their insecurities enabled them to learn better.

Maluleka added that the freedom to be able to ask for assistance, and the interest the lecturer showed in their performance, created a friendly atmosphere that was motivating and made him interested in attending classes.

Matlala, a high performer, reported that class discussions were free-flowing and spontaneous. They attributed their enjoyment and interest in the classes to the environment, and reported that it gave them a break from the strict, formal, and usually

tense environment of lectures in their subject-fields. They felt the approach was very appropriate in a support module. Rampedi (average performer) said that the environment promoted learning and that "it was not hectic". Webb reported that at the beginning of the year most first-year students feel insecure and would benefit from such an environment. Howard commented that:

> The environment was motivating. It was a break from the formal and tense environment of the lectures. I prefer a support module not to be stressful. The environment made learning exciting, which made me always look forward to attending classes.

The non-threatening environment was appreciated by the majority of the students. Students reported that the level of freedom they had in class enabled them to think freely and creatively without being stressed. They reported that the environment promoted interaction and enhanced learning by making it enjoyable and less stressful. The non-threatening, free environment also allowed them to form relationships with other students, which many of the students from the *At Risk* group claimed was particularly helpful when one needed further explanations or assistance.

The majority of the students considered the environment conducive to clear thinking. They reported that because the classes were interesting and exciting, and hence motivating, they never felt bored.The challenge for the lecturer was to be able to maintain the free, friendly and non-threatening environment while maintaining an academic focus. This was difficult, as there were times when some students exploited opportunities for collaboration, such as group discussions, to become noisy. As indicated by Bernhardt (1991) the approach where the lecturer/teacher is in and out of class control is challenging and would need skilful teachers to administer successfully.

8.3.9 Extensive reading

Students were required to read for pleasure on a weekly basis and to record their affective and cognitive experiences in an inventory (see Chapter 6). They chose their own reading texts, for example, short stories in magazines or anthologies and novels. Furthermore, students timed and monitored their reading and recorded great improvements in speed and comprehension.

Fifty-six percent of the students interviewed in the *At Risk* group did not participate, as the extensive reading project was voluntary. The main reasons cited for non-participation were poor time management and inability to cope with academic work. It is interesting to note that three of the four students who obtained the lowest marks in this group did not participate, while, through extensive reading, the fourth student improved to obtain an average mark in the posttest. Those who participated in the extensive reading reported as follows:

43% : improvement in reading habits and reading proficiency.

86%: improvement in comprehension.

56%: deeply involved in the texts.

100%: improvement in reading speed and vocabulary.

They reported that the improvement in reading speed made them more interested and motivated to read.

Ndlovu reported that she started the readings simply as a stress reliever at the end of her lecture day, intended merely to meet the requirements set by the lecturer. However, she realised at the end of the activities that she had benefited immensely. First of all she could focus for longer while reading, while initially her mind used to wander when she studied. She reported that she previously lacked concentration and focus in reading, but obtained these while reading for pleasure. She was surprised to find that this ability had transferred to her other modules as well, and her mind no longer wandered when studying. Secondly, her reading speed increased, which motivated her and increased her willingness to read more, as indicated in the following self-report:

> I felt like I could read more and more. I became so involved in a motivational book I was reading that I started practising the suggestions.

Phalane, who had not been reading before the project, remarked, “I could not wait to finish and find out the end of the story”.

The awareness of progress also promoted self-confidence and self-esteem. Aphane confessed that she found the reading difficult initially, but as she continued, she began to enjoy the reading and became very interested in the novels. She reported that her understanding improved and her imagination was very active as she became involved in the story. She added that she felt good because she was aware of her progress. Her newly

developed interest and involvement in reading for pleasure influenced her reading of academic texts. She admitted during the interview session that she used to dislike her Marketing module because it required too much reading, but now enjoyed reading and also had better understanding of what she reads.

Half of the students in the *Low Risk* group did not participate in the extensive reading. Reasons given were similar to those of the *At Risk* students, namely being overburdened by academic work. However, one student, Webb, explained that he was just not interested in reading. This student was one of the low performers. Another student, Maluleka (high performer), explained that he did not participate because he did not think he needed it. For the other 50% who participated, the benefits were considerable. They reported as follows:

75%: increase in reading speed and understanding

50%: transfer of reading improvements to reading of textbooks in other subjects

25%: increase in vocabulary and improvement in the use of reading strategies motivated them to read more

38%: involvement in the stories and enjoyment in reading

25%: confidence in reading

50%: development of interest and motivation, which instilled willingness to read

50%: desire to read frequently especially during the holidays

The majority of the students reported that they had to make the time to read, but once they did, they enjoyed it and became involved. Botha stated succinctly:

> I had to force myself to start reading but once I started I found I became involved and enjoyed it. Then I had to force myself to stop. It's like I am in the story.

She added that her reading speed and comprehension improved. She also admitted that as an Afrikaans L1 speaker she had read only Afrikaans non-academic texts, and therefore found the vocabulary in the novels challenging. However, as she searched on Google, and used the dictionary for finding the meaning of words, she realised that her vocabulary was improving and the unfamiliar words were becoming fewer and fewer as she read. She reported that her motivation to read increased as she became involved in the story and enjoyed the reading, and added that she would be reading more English books during the June holidays. When asked to comment on the intervention programme, she reported that her vocabulary and her ability to read English texts had improved, which had resulted in

boosting her confidence in reading English novels, and that for her LLB programme she intended to switch from Afrikaans instruction to English instruction the following year.

Mogomotsi reported that she "was not much of a reader", but after the intervention, she had been reading a lot since she got into the habit owing to the reading project. She added that the reading project had helped to improve her reading speed and comprehension ability.

The majority of the students (86% *At Risk*; 75% *Low Risk*) reported that they observed great improvement in speed and comprehension as they progressed with the reading. Another general perception was that the reading project had helped to improve their use of reading strategies and had increased their understanding of texts, which they transferred to the reading of their textbooks. They reported that the freedom to select their own texts was motivating. Another general comment was that students found reading to become addictive once they begun the activity and immersed themselves in it. Increase in reading speed was also motivating for them, and encouraged them to read more. As their reading speed increased they reported an increase in comprehension, which instilled higher motivation in them. In turn, students' motivation and willingness to read increased, they read frequently, and as they read, they became involved and engaged. In addition their reading ability improved. These responses confirm Guthrie and Wigfield's (2000:404) claim: "[A]s students become engaged readers, they provide themselves with self-generated learning opportunities that are equivalent to several years of education".

8.3.10 General comments

At the end of the interviews students were asked to add any comments they wished to include. The comments were very diverse, yet interesting and insightful, and related to various issues, but students mostly commented on affective and performance issues.

The issues that were raised by the *At Risk* and *Low Risk* groups are summarised in Table 8.3 below. The issues related to social factors (interaction, forming friendships and bonding), affective factors (enjoyment, motivation, willingness, attitude, self-efficacy, praise and rewards, and interest), cognitive/performance factors (speed, comprehension, transfer of skills, relevant texts, reading ability and academic performance), and reading habits.

Table 8.3: Pertinent issues raised under general comments and percentage of students

	High/At Risk	Low/No Risk
Affective issues	80%	71%
Social issues	67%	64%
Cognitive and performance	60%	93%
Reading habits	40%	29%
Learning environment	25%	27%
Academic workload	25%	-
Self-efficacy and strategy use	-	33%
Transfer of skills	-	27%
Rewards	-	30%

Other issues that emerged were the timing of the tests, and the suggestion to devise more challenging tasks for students who, according to their performance in TALL, had no or negligible risk (literacy level 5). The pertinent issues raised are also presented in Figure 8.1 below.

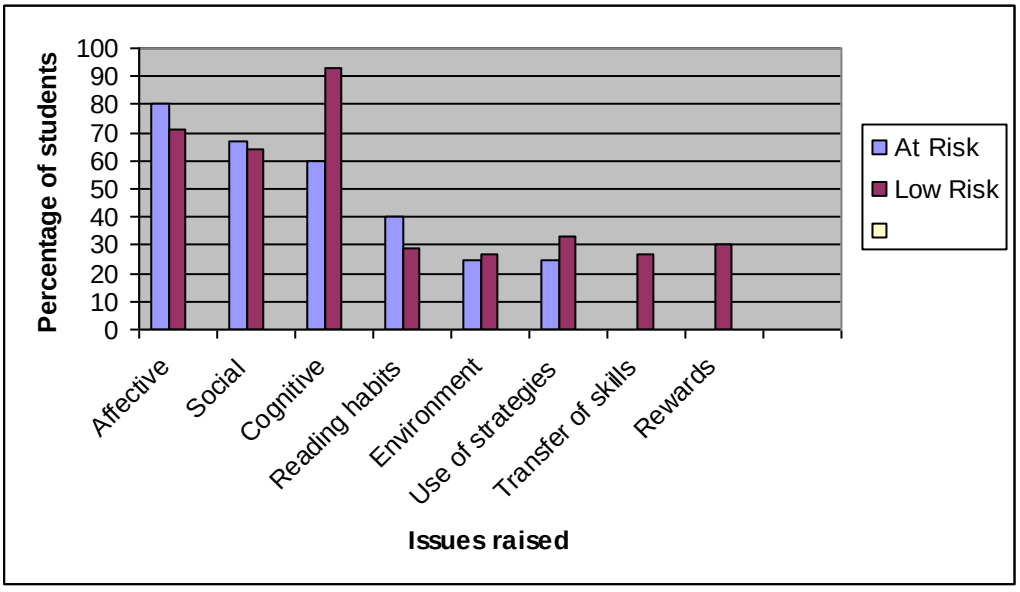

Figure 8.1: Percentage of students in relation to the issues they raised under general comments

A brief summary of the various issues raised is presented in Appendix 6. A more detailed summary is included as Appendix 7 (A, B).

8.4 Discussion

Students in both the *At Risk* and *Low Risk* groups gave similar responses to questions on the teaching techniques, except for the categories of *collaboration* and *rewards and praise,* where there were different emphases. Whereas students in the *At Risk* group emphasised interaction and forming of friendships in response to questions on *collaboration*, the *Low Risk* students did not. A probable reason for the difference in response to *collaboration*, could be that the majority of the students in the *At Risk* group are ISAL speakers from low SES homes where community interaction is highly valued, whereas the *Low Risk* group comprises mainly Afrikaans and English L1 speakers plus a few ISAL speakers from middle and high income families where Western individualism is the dominant lifestyle. Another possible reason could be that *At Risk* students are mainly from township schools, and feel lost at the beginning of the year in a large institution such as UP, whereas *Low Risk* students are mainly from private and former model C schools (these schools are in the towns and cities) and less intimidated by the size and complexity of the institution. Thus collaborative activities that enabled the *At Risk* students to form friendships and interact with their peers in learning help reduce their intimidation of tertiary education in such a large institution, and were therefore important to them.

In relation to the difference in emphasis of the rewards and praises, the *At Risk* students dwelt on the recognition. In other words, whereas recognition, acknowledgement and praises were important motivating factors (in addition to the rewards) for the *At Risk* group, these factors were not mentioned by the *Low Risk* group. For the *Low Risk* group the main motivating factor in the rewards and praise was the excitement they added to the classes, and not the actual recognition and praise. The emphasis on praises by the *At Risk* students could be attributed to a lack of academic confidence and low self-efficacy, which may have been reinforced by a low score on TALL. Therefore, to be recognised and acknowledged as competent, and complimented for academic work, was important to them. In contrast, *Low Risk* students, who, having been identified by the TALL as having relatively higher literacy levels, and the majority having attended better schools, may have more confidence and higher self-efficacy. These findings are corroborated by comparison

between the two groups in the 2009 study (reported on in Chapter 5), which showed that they differ significantly in self-efficacy.

Thus, whereas the *At Risk* students revealed a need for recognition, the *Low Risk* students did not, and whereas the *At Risk* students needed to interact and make friends in collaborative activities in order to overcome their timidity and apprehension, the *Low Risk* students did not have a great need for social learning activities.

Besides the differences in emphasis, in response to the two teaching techniques (i.e. collaboration and rewards and praise) mentioned above, the responses by both *At Risk* and *Low Risk* students were similar, and gave insight into students' perceptions and views on the intervention. Whereas the *At Risk* students expressed overt appreciation for techniques associated with collaboration and rewards and praise, the *Low Risk* group were positive but did not express a strong preference for them. In general, students from both groups responded positively on all the teaching techniques, which imply cognitive, affective and social gains. From their comments it can be inferred that the affective approach had improved their reading ability, which had influenced their self-efficacy and further increased their motivational levels. Thus, students' responses showed they had developed positive affect for reading and had improved in their reading ability.

In answer to the fourth research question, as to the efficacy of the intervention, the qualitative data from the interviews indicate that students had gained from the intervention. According to them, the non-threatening environment in which their affective and social needs were met, made them work harder to improve in reading proficiency and academic performance.

Students' responses can be grouped into three main categories: academic/cognitive, social, and affective. They were motivated because they felt that they were gaining **cognitively** and academically through relevant texts, comprehension, background knowledge, and enhanced learning, among others. They were also motivated because their **social** needs were being met through collaboration, interaction, friendships and sharing of various ideas. Lastly, students were motivated because their **affective** needs were considered and learning took place in a non-threatening environment, which gave them the freedom to make their voices heard. Teacher support, interesting texts, autonomy, and choice, were

among the teaching strategies that facilitated socio-affective learning. These cognitive academic, social and affective gains increased students' motivation and the high motivation encouraged them to read, thus developing their reading proficiency and consequently also their academic performance.

When students' motivational levels increased, as a result of the affective teaching approach, they became engaged readers and their reading proficiency/ability improved, which led to even higher motivational levels, and which further influenced their reading ability. Thus in a socio-affective reading intervention, the resulting processes would appear to be both reciprocal and cyclical, as illustrated in Figure 8.2 below:

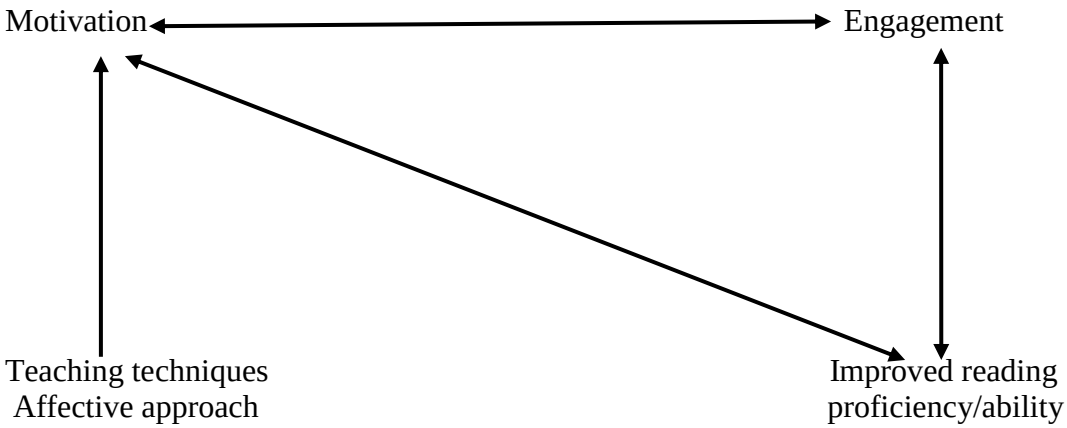

Figure 8.2: Cyclical and reciprocal processes resulting from a socio-affective teaching approach

The aim of the intervention was to cultivate independent engaged readers who would improve their reading proficiency/ability, and consequently reap cognitive gains and improved academic performance. To achieve this, affective factors were targeted and reading instruction that sought to develop cognitive skills was undertaken in an affective manner, within an affective approach. The results confirm the hypothesis that reading instruction that incorporates an affective approach will lead to improved affective levels and consequently improved reading ability.

8.5 Conclusion

This chapter provided further insight into the quantitative results; in particular, it added an in-depth understanding of how students experienced the intervention. The qualitative data from the interviews showed that students felt that they were highly motivated to read and

strove to improve their reading proficiency as a result of the teaching approach. The data also show that the students believed that they had developed positive attitudes and increased interest in reading and reading classes as a result of the affective approach. In addition, students reported being involved (engaged) in both their extensive and academic reading. Furthermore, they linked these affective developments to the positive developments of their reading ability, such as increased reading speed and comprehension, and appropriate use of strategies. It can therefore be concluded from the data that the intervention increased students' affective levels in reading, and the increase in affect contributed to improving their reading ability.

The next chapter integrates the quantitative data presented in Chapter 7 with the qualitative data presented here, and presents a holistic discussion in relation to the fourth research question.

Chapter 9: Integrating the quantitative and qualitative results

9.1. Introduction

Issues relating to academic reading comprehension, the development of such ability and the importance of socio-affective factors in developing students' reading comprehension ability were highlighted in chapters 2 and 3 (the theoretical framework) and these informed the development of a socio-affective model for improving tertiary students' reading comprehension ability (conceptual framework). The overarching element of the proposed model was a needs analysis, which was undertaken and reported on in chapter 5, leading to the framework for the intervention presented in Chapter 6. Chapters 7 and 8 discussed the quantitative phase (pre- and post-intervention questionnaires) and qualitative phase (responses from interviews), respectively. This chapter integrates the quantitative and qualitative data and discusses how the findings from the qualitative analysis corroborate the findings from the quantitative analysis.

9.2 Integrating quantitative and qualitative findings

The quantitative data were analysed using descriptive and inferential statistics, with the inclusion of effect sizes. Findings showed that whereas the responses to the questionnaires before the intervention were similar in control and intervention classes for each group (*At Risk, Low Risk*), the responses after the intervention differed. The intervention classes had improved considerably in their socio-affective levels to reading whereas the control groups had improved minimally and, for some factors even decreased. This finding points to the fact that a socio-affective approach to reading development did improve the intervention students' socio-affective levels in reading.

The qualitative data were analysed by identifying themes and patterns for each teaching technique. Students' responses to interview questions gave valuable insights into how the teaching techniques used in the intervention impacted or influenced their affective levels for reading. Thus, findings from the qualitative data revealed a positive effect of the intervention, from the perspective of the participants, and gave deeper understanding into the findings from the quantitative research. The two data sets (quantitative and qualitative) are discussed in relation to each other below to show how the socio-affective factors that

manifested in the quantitative data are linked to the teaching techniques probed by the qualitative data.

9.2.1 Learning and knowledge goals

The predominant socio-affective factors linked to the teaching technique of learning goal by the students were *intrinsic motivation, interest, self-efficacy* and *attitude*. This teaching technique was aimed at increasing students' motivation, in the sense that when tasks, and the purposes of the tasks and activities are explained to students, their motivation for doing the tasks and for learning increases. As Guthrie and Wigfield (2000:410) point out, a focus on learning goals motivates students to put in more effort. Students reported in the interviews that the explanations made the tasks easier, and also made the purpose of the tasks transparent, which motivated them to work harder. Seventy-nine percent of the *At Risk* students and 60% of the *Low Risk* students reported better understanding after explanations, which gave them confidence in their ability to perform tasks, contributing to increase in self-efficacy. This link between the teaching technique of learning goal and self-efficacy confirms Guthrie and Wigfield's (2000:409) assertion that teachers who emphasise learning goals contribute to students' self-efficacy. The effects of the explanations are further evident in the findings that 78% of the students in the *At Risk* group said the explanations increased their motivation and interest, and in the *Low Risk* group 60% attributed their increased motivation, positive attitude and willingness to do tasks following the explanations.

The findings of the qualitative research confirmed the quantitative results. The quantitative results showed increase in *motivation, interest, self-efficacy* and *attitude* in both *At Risk* and *Low Risk* intervention classes in comparison to the control classes where there was little or no emphasis on learning goals. Quantitative data from t-tests showed statistically significant results for *motivation, interest* and *self-efficacy* in the intervention classes of the two groups (*At Risk*: $p<0.001$ for *motivation,* $p=0.001$ for *interest* and $p<0.001$ for *self-efficacy*; *Low Risk*: $p=0.001$ for *motivation,* $p<0.001$ for *interest* and $p<0.001$ for *self-efficacy*). There were also medium to large effect sizes. However, *attitude* did not show significant results for both groups on independent t-tests but paired t-tests showed significant difference for the *Low Risk* intervention class. It is worth noting that it was in the *Low Risk* group that students specifically mentioned a change in attitude during interview sessions.

9.2.2 Relevant and interesting texts

The predominant socio-affective factors mentioned during interview sessions were *interest, intrinsic motivation* and *attitude*. To make texts relevant for students, discipline-related texts and generic texts on interesting topics that students could relate to were used in class. Texts were also selected in relation to students' level of competence. This teaching technique was to develop students' interest in texts and in the reading of texts. It was also aimed at enabling them to see the relevance and significance of the texts, and thereby develop a positive attitude, as well as willingness to read and to learn. It was expected that when students are interested they would be motivated to work harder and achieve results. When texts are highly above students' level of competence and very challenging for them, they read at frustration levels (Grabe & Stoller 2002; Pretorius 2000) and easily become bored and disinterested. However, texts which are significant to students and are at their level of competence (or slightly above) raise their level of interest.

Students reported that they were interested in the texts, and this made them put in more effort. In relation to the module- and discipline-related texts, an *At Risk* student stated, "we felt we were learning something relevant to our subject fields". This insight strengthens Schiefele's (1992:152) report that interest has a positive relationship with reading comprehension, and Anderson's (1992:218) suggestion that text-based interest should be promoted to develop students' interest in reading. Seventy-three percent of the *At Risk* group said the cognitive benefits of the relevant texts increased their motivation, made them focus on texts and tasks, and gave them more drive to work. In the *Low Risk* group, 80% reported of increase in motivation owing to the relevance of the texts to their disciplines, which made tasks less challenging. More than half of the students specifically stated that their interests were raised by the relevant texts, as well as the topics of the generic texts, which contributed to their enjoying the classes. Students also shared that the relevance of the texts gave them a positive attitude towards tasks and activities.

These results support the quantitative finding that students' level of interest in the classes and in reading had improved significantly, compared to the control classes (*At Risk*: $p=0.001$; *Low Risk*: $p<0.001$). In addition, significant improvements were also shown for *motivation* ($p<0.001$), but for *attitude* statistical significance was only recorded for the *Low Risk* group ($p=0.005$).

9.2.3 Teacher support

Socio-affective factors linked to this teaching technique were *intrinsic* and *extrinsic motivation*, *self-efficacy,* and *attitude*. Thang (2005) contrasts teacher support and students' freedom in a way that makes the two seem exclusive to each other. He explains that students' answers to questionnaires in his study pointed to the fact that they prefer freedom. However, interviews indicated a preference for support. These seemingly contrasting preferences can and should actually co-exist (Bernhardt 1991a; Guthrie and Wigfield 2000; Kumaravadivelu 2003). Students can appreciate support and still experience a sense of freedom in learning. This balance is important, as on the one hand students want to be supported by the lecturer, and on the other hand they need the freedom to express themselves academically. Integrating the two in a well-balanced way increases students' motivation and enables them to feel free to explore and strive to achieve success. Students were given the freedom and also the support through encouragement, extra tuition, individual attention and an open door system.

During the interviews, students reported on the positive effects of the support as well as the freedom in learning; as one student stated: "knowing that support was available and feeling supported was motivating". In the *At Risk* group, 61% reported being motivated by the support of the lecturer, 39% stated that it helped reduce stress and created a bond between the students and the lecturer, and 28% reported on the encouragement, enjoyment and interest it provided, confirming Dörnyei's (2001b) assertion that the teacher's encouragement and support increases students' motivation (cf § 3.4.4.4). Seventy-three percent of the *Low Risk* students listed motivation, encouragement, confidence (leading to self-efficacy), positive attitude and a sense of freedom, as a result of the lecturer's support. In other words teacher support (e.g scaffolding and encouragement) is extremely important for both *Low Risk* and *At Risk* students, particularly in a non-coercive and non-controlling environment.

The quantitative results show significantly improved motivation, self-efficacy and attitude in the intervention classes. This finding seems to relate positively to the qualitative findings on *motivation, self-efficacy* and *attitude.* Statistical results for motivation showed significant p values of $p<0.001$ for the *At Risk* group and $p=0.008$ for the *Low Risk* group. Students' self-efficacy also improved significantly at $p<0.001$ in both groups. Mean figures show improvement in *attitude* and was also statistically significant for the *Low*

Risk group on paired t-tests. Figures 9.1 and 9.2 below show improvement in motivation and Figures 9.3 and 9.4 show improvement in attitudes of the intervention classes in terms of means.

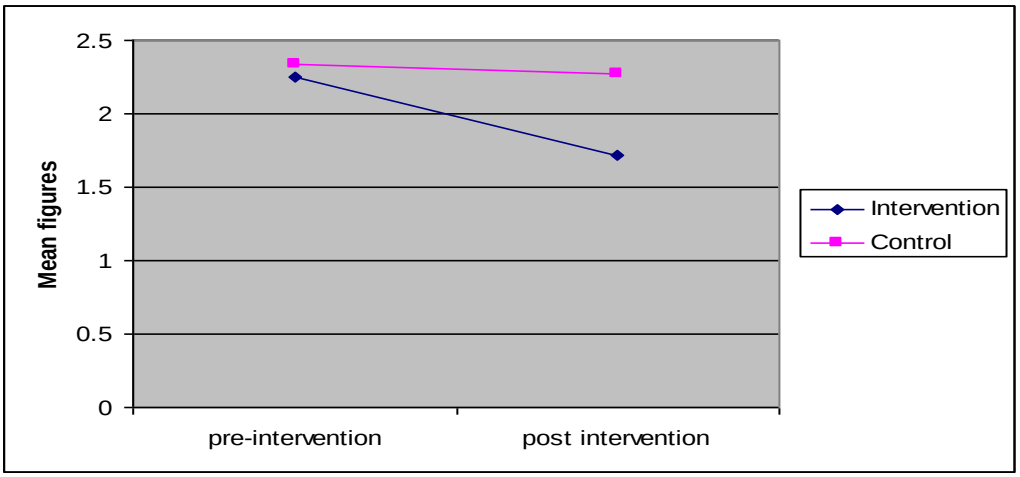

Figure 9.1: Chart showing mean figures for motivational levels of *At Risk* students

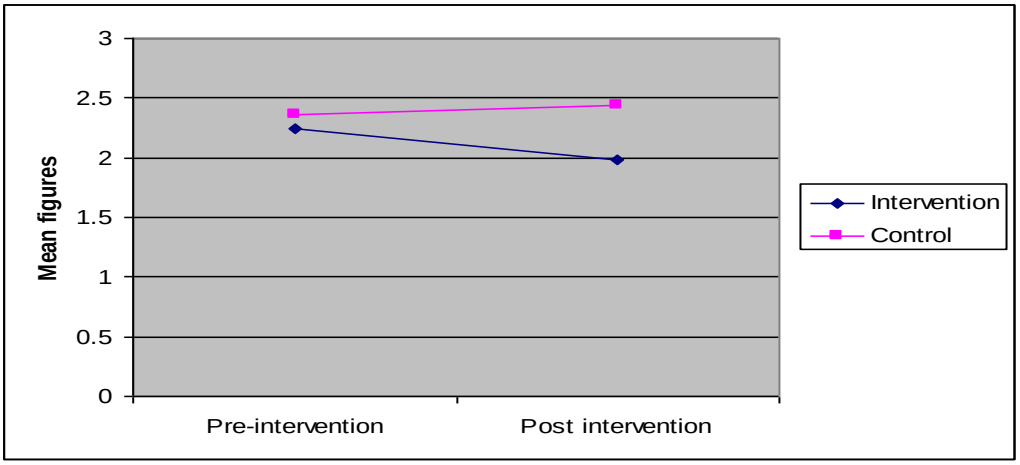

Figure 9.2: Chart showing mean figures for motivational levels of *Low Risk* students

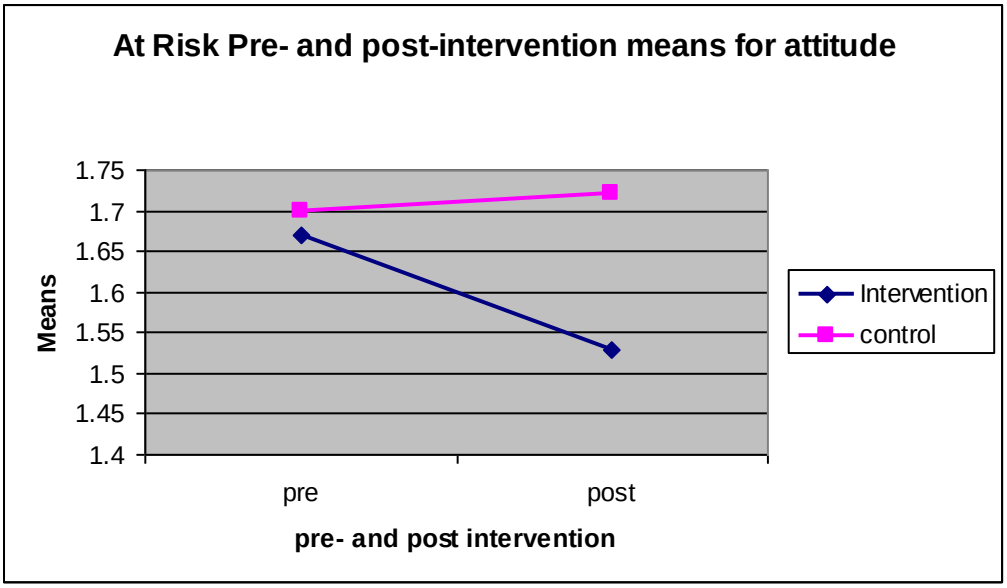

Figure 9.3: Chart showing mean figures for attitudinal levels for *At Risk* students

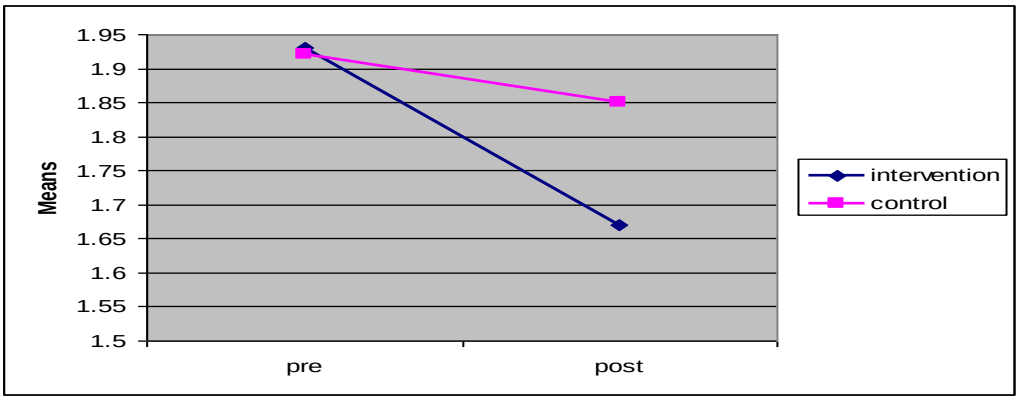

Figure 9.4: Chart showing mean figures for attitudinal levels for *Low Risk* students

The graphs presented above show that the intervention and control classes started off at comparable motivational and attitudinal levels, but differed considerably after the intervention with intervention classes recording more positive attitudes, which corroborate students' interview responses. These results confirm McKenna's (2001:145) claim that instructional intervention is a way of promoting positive attitudes in students (cf. § 3.3.4).

9.2.4 Competence support (strategy instruction)

Students predominantly referred to improvement in *strategy use, motivation, self-efficacy* and confidence in their ability to read efficiently and to do tasks. This confirms various studies that show that strategy instruction promotes appropriate strategy use, and increases

intrinsic motivation and self-efficacy (cf. § 3.4.2.5). The explicit teaching of strategies increases students' competence (cf. Anderson 1991; Anderson 1999), which in turn increases their self-efficacy and perceptions of their ability to be successful readers, and consequently increase their motivation. The development of intrinsic motivation is strongly dependent on students' feelings of competence (Deci & Ryan 2000; Dörnyei 2001). As Guthrie and Wigfield (2000:404) point out, engaged readers use appropriate strategies to comprehend and engaged readers are successful readers. Teaching students the use of appropriate strategies is a crucial means of providing competence support. This teaching technique was to increase their competence, self-efficacy and motivation, and enable them to become engaged readers.

Qualitative findings revealed that a number of students from both *At Risk* and *Low Risk* groups (78% and 60% respectively) were using inappropriate strategies before the intervention; as one student stated, "I used to read my textbooks like the way I read magazines". Thus they highlighted improvement in strategy use in particular. The instruction in strategy use coupled with the scaffolding and guided practice enabled the students to read more strategically and meaningfully, increasing their comprehension abilities, self-efficacy, and consequently their motivation to read. Forty-seven percent in each group (*At Risk and Low Risk*) reported increase in reading speed, and 63% of the *At Risk* as well as 67% of the *Low Risk* students said they had experienced improvement in their understanding of texts owing to use of strategies, which had increased their confidence and self-efficacy. Thirty-seven percent of the *At Risk* students and 33% of the *Low Risk* students cited specific examples of strategies they had used to improve their understanding. Although it could be inferred from the cognitive improvements that students' motivation would increase, 58% of the *At Risk* group and 27% of the *Low Risk* group stated categorically that their motivation had increased.

These findings were echoed by the quantitative results, which showed that students in the intervention classes had improved considerably in their use of strategies and in their self-efficacy, in comparison to the control classes. Paired t-tests showed statistically significant results for self-efficacy in both groups (*At Risk* $p<0.001$; *Low Risk* $p<0.001$) and for strategy-use (*At Risk* $p=0.001$; *Low Risk* $p<0.001$). However, independent t-tests did not show statistically significant results for self-efficacy in the *Low Risk* group and for strategy use in the *At Risk* group. A probable explanation for this finding has been given in Chapter

7 (cf. § 7.4). Nevertheless, mean figures and paired t-test results showed that the intervention group had improved. In the control classes students had either shown minimal improvement in strategy-use (*Low Risk* group) or had failed to improve, or even decreased in their self-efficacy (*At Risk* group).

9.2.5 Collaboration

This social learning technique was aimed at providing students with relatedness support to enhance learning, and to increase students' *interest, motivation* and *self-efficacy*. Students mentioned social (interaction and friendships) and affective (motivation, interest and self-efficacy) gains. A combination of social and affective support improves learning, as well as develops engagement in reading (Guthrie 2008:5). Engaged readers interact socially with peers to construct meaning (Guthrie and Wigfield 2000:409). References provided by Guthrie and Wigfield (2000:414) and Guthrie (2008:5) show that collaborative learning maintains active learning over an extended period of time and instils a disposition in students to read more independently in the future. Also, they argue that intrinsic motivation for reading and learning is closely connected to students' feelings of social support and sense of belonging (Ibid). Qualitative findings from the interviews showed that 84% of the students in the *At Risk* group cited one or more of the social factors (e.g. interaction, friendships, bonding, and sharing ideas) as positively influencing their motivation, interest and learning. In the *Low Risk* group, 76% reported on the benefits of collaborative activities: 24% cited deeper understanding of issues and concepts, and enhanced learning and 53% said it was motivating, (e.g. encouraging, and exciting).

The benefits of collaborative learning, as revealed by students in the interviews corresponded with the quantitative results. Quantitative results showed that students in the intervention classes (*At Risk* and *Low Risk*) had increased interest, higher levels of motivation and self-efficacy. Independent t-tests showed statistically significant improvement for the intervention classes, and paired t-tests also showed statistically significant differences between pre- and post-intervention results (cf. Tables 7.4, 7.5).

Thus, both the qualitative and quantitative findings indicate that social interaction in learning increases affective levels and enhances cognitive gains.

9.2.6 Rewards and praise

The socio-affective factors that may be influenced by giving praise and rewards are *extrinsic motivation, intrinsic motivation, self-efficacy* and *interest* (Brophy 2004, Dörnyei 2001b). Although extrinsic motivation is said to produce temporary effects, it is also argued that it generates success for specific tasks, promoting self-efficacy, and can lead to intrinsic motivation if used appropriately (cf. § 3.2.1). Interview responses indicated that intervention students were highly motivated to work hard in order to excel in tasks and receive rewards. It also generated interest. A quarter of the students indicated that it made the classes interesting. Seventy-eight percent of the *At Risk* students and 73% of the *Low Risk* students intimated being highly extrinsically and intrinsically motivated by the rewards and praises. The acknowledgement and recognition that were accorded to high performers in tasks were also motivating factors, increasing confidence and self-efficacy, as explained by the students in the *At Risk* group. The researcher is of the opinion that this teaching technique promoted hard work on the part of the students. Students had not only been extrinsically motivated, but internalisation and intrinsic motivation had also been developed. I observed that they exerted more effort and applied strategies in order to comprehend. Thus involvement (intrinsic motivation) and comprehension abilities were developed through this teaching technique.

This is evident in the high levels of intrinsic and extrinsic motivation that were shown in the quantitative data, especially in the *At Risk* group where this technique was used intensively. Findings from the questionnaire show that students' extrinsic motivation had increased in both intervention classes. Quantitative results showed significant differences between the control and intervention classes of the *At Risk* group, and on independent t-test significant differences were shown for the *Low Risk* group. The fact that paired t-tests did not show statistically significant results for the *Low Risk* group, may be attributed to the high self-efficacy of most of these students at the beginning of the year, as explained in Chapter 7. Nevertheless, the fact that there was a statistically significant improvement of the intervention group compared to the control group, indicate agreement with the qualitative findings, which show improvement in intrinsic motivation, self-efficacy and interest.

9.2.7 Autonomy

Students' independence, choices and responsibility in learning are cultivated within this teaching technique. The main socio-affective factor associated with autonomy is *intrinsic motivation.* Others are *competence support*, *interest* and *enjoyment*. Research points to the benefits of autonomy support to instil intrinsic motivation and facilitate reading comprehension (Deci & Ryan 2000; Lepola 2004; Reeve & Jang 2006). Although many researchers see autonomous learning as a tool to increase students' motivation, the relationship between the two is bidirectional. Spratt et al. (2002:245) argue that motivation is a key factor that influences the extent to which students gain from autonomous learning, and that teachers should endeavour to instil motivation before involving students in autonomous learning. In other words they claim that autonomous learning alone, without ensuring motivation, may not be ideal. To adopt a balanced stance between the two views, the intervention dealt with both motivation and autonomy simultaneously to enable students to gain in motivation and autonomous learning. Autonomy, in the form of taking responsibility for learning and making choices, increased students' motivation. Choice is motivating (Deci et al. 1991), and when students were given the responsibility to select their own extensive reading texts and to choose assignment texts from a variety of options, they reported that they were motivated. In particular, students revealed that the choices they were given motivated them to "put in more effort" and achieve results. All the students (*At Risk* and *Low Risk*) who made reference to this teaching technique reported being highly motivated by the responsibility given to them to make choices, and consequently became interested in the activities and tasks. The spin-offs were that they put in more effort and benefited cognitively by improving their reading abilities.

The qualitative findings supported the quantitative findings. High levels of motivation, shown in the statistically significant results ($p<0.001$), were recorded. Quantitative results for interest ($p<0.001$) and strategy use ($p<0.001$) were equally high, corresponding with students responses that the choices and responsibility they were given motivated them to work hard and enabled them to select topics of interest.

9.2.8 Learning environment

A non-restrictive learning environment was created for the intervention. This included giving students the freedom to explore in order to generate interest, increasing motivation and enhancing learning. Predominant socio-affective factors that were linked to this

teaching approach were *interest* and *motivation*. Various researchers have intimated that a conducive, non-threatening environment promotes better conceptualisation and enhances learning (Brown 2000; Burton 2011; Cook 2001). Students gain more from the support given, if it is given in a non-threatening, stimulating environment. The combination of a non-threatening environment and adequate teacher support contributes to successful learning (cf. Bernhardt 1991a; Burton 2011; Kumaravadivelu 2003). Students reported that the environment made learning easier. They explained that because the environment was not restrictive, they were able to interact freely and seek assistance without hesitation. Twenty-nine percent of the *At Risk* students referred to the social benefits of the environment that enabled them to interact and make friends. Eighty-eight percent of the *At Risk* students and 82% of the *Low Risk* students mentioned the freedom and the enjoyment they experienced in learning during class time. Sixty-five percent (*At Risk)* and 44% (*Low Risk)* reported that the free environment enabled them to think clearly and conceptualise better. They also reported that the environment made the classes interesting, and this motivated them (44% *Low Risk*; 55% *At Risk*). One of them succinctly stated that "it was fun". This 'fun' way of developing students' reading comprehension provided the interest and motivation for learning.

These findings corroborate the quantitative results. Quantitative results show a high level of interest (*At Risk* $p=0.001$; *Low Risk* $p<0.001$) and motivation (*At Risk* $p<0.001$; *Low Risk* $p=0.001$) in the intervention classes, in comparison to the control classes. It can therefore be concluded that the non-restrictive environment contributed to the high levels of interest and motivation that were indicated in the questionnaires, and the interview responses shed light on how this was achieved – by making the classes enjoyable, exciting and 'fun' for the students.

9.2.9 Extensive reading

Students were required to read for pleasure as one of the means to developing engaged readers (Grabe & Stoller 2002; Guthrie & Wigfield 2000). This activity was introduced to get students to enjoy reading and to be motivated to read frequently in order to develop positive reading habits that will span over time, and produce successful reading. As reading researchers explain, reading efficiencies and proficiency levels develop through reading or frequent exposure to print (Day 2010; Grabe & Stoller 2002; Guthrie &

Wigfield 2000; Horst 2005; Nishono 2007; Pretorius 2000). For students who have had poor reading backgrounds introducing extensive reading to help develop reading proficiency is essential. Students who opted to engage in more reading reported improved reading habits, appropriate use of strategies, higher levels of interest, motivation and self-efficacy. The qualitative data revealed that prior to the intervention a number of students easily became bored when reading, had wandering minds, and found reading burdensome. However, students reported that after the intervention the ability to focus and read meaningfully had transferred to the reading of academic texts, and they could read their textbooks more easily and could comprehend better. Eighty-six percent of the *At Risk* group and 75% of the *Low Risk* group reported increases in reading speed and improvement in comprehension.

In addition, all the students who were interviewed (*At Risk* and *Low Risk*) reported higher levels of interest, motivation and involvement, with 50% of the *Low Risk* students referring to higher levels of self-efficacy. Forty-three percent of the *At Risk* and 50% of the *Low Risk* students referred to improved reading proficiency and reading habit, and 25% *of the Low Risk* students specifically mentioned improved vocabulary and strategy-use. Students in both A*t Risk* and *Low Risk* groups were very positive about their reading habits (100% *At Risk* and 100% *Low Risk*). Some of the students actually told the researcher that they were looking forward to reading more novels during holidays, which for a number of them was a new experience; as one student put it, "something I have never done before". The aim was to develop independent, engaged readers. In as much as students reported to have developed positive reading habits and were willing and excited to read, it can be assumed that the intervention had helped to improve students' reading habits.

This improvement was shown in the quantitative results. Quantitative results corroborated the qualitative findings discussed above. T-test results show that students' reading habits improved considerably, as indicated by the p values *(At Risk* $p=0.002$, $p<0.001$; *Low Risk* $p<0.001$, $p<0.001$). In addition, *strategy use* ($p=0.001$; $p<0.001$) *self-efficacy, interest* and *motivation* show statistically significant improvement for *At Risk* and *Low Risk* intervention groups.

9.3 Summary

In sum, the qualitative data elucidated the quantitative findings, and shed light on how the improvement in socio-affective levels, which is shown by the quantitative data, was achieved. However, there were some seemingly contradictory results. Students' responses to interview questions did not entirely corroborate their responses to the questionnaires on *attitude.* Students' positive responses on affective factors pointed to positive attitudes. In addition *attitude* was specifically mentioned by 25% of the students in the *Low Risk* group in relation to Learning goal and by 15% of the *At Risk* group in relation to the use of relevant and interesting texts. However, quantitative analysis using independent t-tests did not show statistically, significant improvement for both the *At Risk* and *Low Risk* intervention groups in comparison to the control classes. Nevertheless, paired t-tests show significant improvement for the *Low Risk* group (p=0.005) and mean figures show improvement for both *At Risk* and *Low Risk* groups (Figures 9.3 and 9.4). Thus on the basis of paired t-tests for the *Low Risk* group and mean figures for both *At Risk* and *Low Risk* groups the qualitative results support the quantitative findings.

Other quantitative findings that were not entirely confirmed by the qualitative data were *extrinsic motivation* and *self-efficacy* for the *Low Risk* group and *strategy use* for the *At Risk* group. On *extrinsic motivation*, qualitative findings show that 73% of the *Low Risk* students were motivated by the externally (extrinsic) motivating rewards and praises. However, results of independent t-tests for *extrinsic motivation* were not statistically significant for this group. On the other hand, paired t-tests were statistically significant (p=0.036) showing improvement in *extrinsic motivation*, which is in line with the positive qualitative findings from the interviews. On *self-efficacy*, qualitative findings show increase in self-efficacy levels, which were explicitly mentioned by 40% of the *Low Risk* students in relation to *teacher support* and *extensive reading.* However, quantitative results were not significant on independent t-tests. Nevertheless, paired t-test results showed a significant improvement.

The non-significant results of independent t-tests on *extrinsic motivation* for the *Low Risk* group may not be entirely contradictory to the qualitative results, in the sense that even though students were positive about the rewards and praise given in class, they did not dwell as much on them as the *At Risk* students did, especially the acknowledgement and

recognition aspect. As explained in Chapter 7, this group of students had relatively higher self-efficacy at the beginning of the intervention and were not particularly influenced by external factors.

Quantitative results on *strategy use* were not entirely confirmed by the qualitative findings for the *At Risk* group. Students in this group consistently referred to better understanding, and improved reading ability, with 31% specifically reporting improvement in strategy use in relation to the use of relevant and interesting texts, and 50% reporting the use of appropriate strategies in relation to competence support or strategy instruction. However, this was not reflected by the t-test results. Independent t-test results were not statistically significant for *strategy use* for this group. This is probably because the standard programme had to be followed and there was therefore limited time for intensive practice of reading strategies. Nevertheless, paired t-tests showed a significant improvement ($p=0.001$). Despite the fact that the qualitative findings on *extrinsic motivation, self-efficacy* and *strategy use* do not entirely support the quantitative on specific t-tests, on the whole, the qualitative data corroborated and confirmed the quantitative findings.

The correspondence of the quantitative and qualitative results is further strengthened by the general comments given by the students. Qualitative findings in the general comment section show 53% of the *At Risk* students commented on increase in motivation, enjoyment and interest; 27% commented on appropriate use of strategy that improved self-efficacy and 40% commented on improved reading habits. Similarly, 57% of the *Low Risk* students commented on increase in motivation, interest and attitude; 43% commented on use of appropriate strategies and self-efficacy, and 29% commented on reading habits. The quantitative results show high levels of motivation, interest, self-efficacy, strategy use and reading habits.

The quantitative findings from the interviews show that the approach had a positive effect on students' affective levels (cf. Chapter 8). Students found that learning was easier and more interesting, classes were enjoyable, and comprehension increased. The cognitive, affective and performance gains increased their motivation. These gains in cognitive and affective levels also enabled them to develop more positive attitudes towards the literacy modules. These results support the high affective levels recorded in the quantitative findings (cf. Chapter 7), and indicate that to achieve effective and successful reading

instruction, students should be able to enjoy classes and also experience academic and cognitive gains. Pretorius (2000:295) points out that the long-term effects of reading instruction are intimately tied to attitudinal and motivational factors.

However, students' actual reading abilities were not compared to their socio-affective improvement as explained in Chapters 1, 4 and 10.

9.4 Conclusion

This chapter has attempted to support and further understand the quantitative findings by invoking qualitative evidence. It has been shown that the statistically significant improvement in the affective levels, reading habits and strategy use of students in the intervention classes were linked or related to students' views on the effectiveness of affective teaching techniques, a non-threatening environment and extensive reading. Students' responses shed more light on how the affective teaching techniques (e.g. learning goal, collaboration, interesting texts, etc.), non-threatening environment and extensive reading increased their motivation, interest, attitude, self-efficacy, willingness to read and ability to use appropriate strategies.

The final chapter concludes the thesis by summarising the main issues of the investigation, condensing the answers to the research questions posed in chapter 1, discussing the limitations of the research, and making a number of recommendations.