Minority teachers' perceptions of principals' leadership style and students' academic achievement in secondary schools

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ABSTRACT

The purpose of this study was to examine minority teachers' perceptions of principal leadership style and school climate and the relationship between school climate and student academic performance. A total of 160 teachers and 10 principals from ten secondary schools were surveyed concerning their perceptions of their principals and school environment as related with students' achievement. Descriptive statistics including means, t-tests, and ANOVAs, were employed to analyze the data. The relationship between school environment and student's achievement found no statistically significant difference. However, there was statistically significant difference regarding minority teachers' perceptions of level of education and years of teaching experience. This study found no differences in perceptions related to gender and students' academic achievement.

Keywords: Minority teachers, perceptions, school climate, principals' leadership, student achievement

INTRODUCTION

In this study ethnic minority teachers are teachers who do not belong to the nation's majority racial or ethnic group. These teachers may be subject to discrimination that can affect their social inclusion among the other members of staff. They are not ethnic Norwegians and have had their education either from their home country or Norway or a combination of the two. Minority teachers are included in the study to reflect multiculturalism of current schools in Norway. The discrimination and or exclusion of minorities could be addressed through social inclusion by accepting all irrespective of ethnicity and whether they have disabilities (Boyle et al., 2020).

The concept of social inclusion refers to the successful acceptance of teachers with minority background by their majority racial ethnic group, being able to take part in teaching and other academic and social activities, with rightful membership of the school community. Social inclusion is used interchangeably with inclusion. Social acceptance is evident in the way all teachers interact with one another and the relationships they share. Social inclusion pertains to peer interaction, membership in the school environment and social status or relationships. For successful relationships to take place in the school community leadership is crucial (King-Sears, 2020).

Leadership plays an important role in school organization and goals. Academic achievement is one of the most important goals of every school, and the roles that teachers and principals play is crucial. According to Kucukalioglu and Tuluk (2021), school leaders understand how schools operate. Studies have found positive relationships between social inclusion, roles of teachers and principals as well as school climate/environment to impinge on students' academic achievement. With the growing implications of non-selectiveness in schools and the ethnic diverse nature many educational institutions are searching for answers to what will make a difference in a school's overall performance. Teachers are responsible to teach students to achieve. Do their perceptions of principals and leadership styles of these principals affect their teaching qualities? Do teachers' perceptions of other teachers' behaviors affect students' academic achievement? Do teacher background variables of qualification, gender and teaching experience affect students' academic performance? This study examined principals' leadership roles and how these roles affect teaching and students' academic achievement. Under these circumstances, factors that determine the effect of principals and teachers' roles are worth investigating. Consequently, self-efficacy perceptions and leadership styles of principals and teachers in an inclusive school practice set up within

the school climate in Norway are points that are worth stressing, as there is less research in this area in the context of Norway.

Literature Review

Inclusive school practices

Leaders get things done, but leadership does not operate in isolation rather within an interwoven web of school climate, social inclusion, and effective inclusive practices. The Centre for Educational Research and Innovation (CERI) of the OECD (2013) has made a few recommendations regarding good inclusive practices, based on case studies from several countries from Organization for Economic Co-operation and Development (OECD) (e.g., Australia, Canada, Belgium, Austria, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Norway, Italy, the Netherlands, Sweden, the United Kingdom, Switzerland, Spain, and the United States) which practise inclusion. The features include a clear curriculum, strong educational organisation, parental and community involvement, and the provision of support services, training, and resourcing. Class Management (CM) and leadership were also found to be important in students' academic achievement and inclusion. Studies investigating characteristics of effective schools found social inclusion and principals leadership role as crucial factors in academic achievement of students (Slee, 2011; Forlin et al., 2009). Research shows that successful schools are a result of leadership and friendly school climate, and that school leaders improve teaching through social inclusion (Day et al., 2011; Anthoniou, 2013; Kucukalioglu & Tuluk, 2021)). Likewise, according to Rahmawati (2015), school climate significantly influenced staff's work motivation in performing their task. Sucianti (2015) contends that every improvement of school organizational climate by 1%, increased teacher work motivation by 58%. Similary, Mangkunegara (2015) found that school organizational climate and leadership influence teacher's motivation and student's achievement. This explains the importance of the relationship between principals, teachers, students, and other members of staff in each school climate. According to Hoy and Sabo (1998), there are four types of school climate with different features (open climate, engaged climate, disengaged climate, and closed climate) with different interpersonal relationships. Based on their study and other studies, school climate usually investigates perceptions of principals and teachers' behaviors in relation to academic achievement, where leadership within an open school climate and engaged members of staff such as teachers impact academic performance (Pérez-Jorge et al., 2021).

The quality of interpersonal relationships and school management foster inclusive school practices which promotes academic performance. Inclusion supported by teachers'

competencies benefits all and promotes students' academic achievement (Kucukalioglu & Tuluk, 2021; Kuyini et al., 2016). Many claim that since the teachers are the classroom leaders, they also play a motivating role in helping students to achieve (Mastropieri & Scruggs, 2000; Villa et al., 1996). Teachers are powerful instruments since they can either reject or accept changes in the implementation of the entire inclusive process. Mastropieri and Scruggs (2000) outline several teaching behaviours with respect to class management. It is stated that good class management, which constitutes one of the many roles of a teacher enhances social inclusion and students' academic achievement (Majoka, 2019).

Social inclusion

Linking the concept of social inclusion as defined earlier to the roles of principals, teachers and the existing body of the research is "challenging teachers and principals' capacity to be innovative problem solvers and developing followers' leadership capacity via coaching and mentoring of students" (Bass & Riggo, 2006, p. 4). In social inclusion teachers in collaboration with the principal establish good relationships and this helps them in classroom management. Through social interactions and contact, teachers gain more knowledge and acquire social skills while promoting intercultural understanding (Amuzie & Winke, 2009; LiU, 2010; Magnan & Back, 2007; Wang, 2010; Wilkinson, 1998; Mastropieri & Scruggs, 2004). Social skills and other competences, which teachers gain, are passed on to students to increase their self-confidence in the learning process because of collaboration. Studies by Mastropieri and Scruggs (2010) and Philpott et al. (2010) suggest that collaboration is one of many ways of effecting social interaction, due to its significant role of promoting learning and aiding in the acquisition of social competence. Research shows that social inclusion improves educational development and has made OECD countries focusing more on issues related to social inclusion (Stainback & Stainback, 1996; OECD, 2013, 2014d). "Social inclusion supported by teachers' competencies and principal supportive leadership benefits all and promotes students' academic achievement" (Bass & Riggo, 2006, p. 4). According to Majoko (2019), some teachers feel neither included, competent nor confident to teach all students, and this may be a result of teachers' attitudes and self-efficacy (Kuyini, et al., 2021). Relating to how minority teachers are included in the increasingly diverse school system in Norway, Seland (2013) argued that Norwegian school politics give preference to the majority's values and cultural heritage. Are school leaders/principals inclusive in their leadership roles and how does this affect students' academic achievement? Do all teachers experience social inclusion in the Norwegian multi-ethnic schools?

Aim of the study and research questions

Minority teachers have long complained of differential treatment of principals/leaders and their ethnic Norwegian colleges. In this study, the aim was to investigate or explore the perception of minority teachers about their principals' leadership styles and its relationship to 12th grade students' academic achievement to fill the existing gap of minority studies. The subject focused on was students' academic performance in mathematics. Answers to the following questions were sought.

- 1. What are teachers' perceptions of principal's leadership styles on students' academic achievement?
- 2. What are the effects of teacher background variables and teachers' behaviors on students' academic achievement?
- 3. Does social inclusion affect teachers' performance and students' academic achievement?

Method

The methodology of this study is underpinned by the conceptual framework of James Burn's theory of Transformational leadership which describes the behaviors of leaders who encourage, inspire and motivate employees to innovate and create change (Bush, 2014; Hallinger, 2003). Transformational leadership improves schools, changes teacher's classroom practices, enhances quality of teaching, student learning achievement and engagement (Chammas, 2010; Cox, 2010).

School context

At the beginning of this research, conversations were held with principals of various schools in the Viken county of Norway to get a picture of the staff members and students in each school. These conversations helped identify multi-cultural schools needed for the research. A total of ten (10) secondary schools were selected for the study, consisting of five (5) lower secondary schools and five (5) upper secondary schools. It should be noted that the term "teachers" in this study is used in broad sense to cover both formal and non-formal teaching with or without teaching qualifications.

Research design

The research data was a combination of survey design and participant observation. Survey was employed to measure or determine the relationships between

Items used in the research to find variability (Creswell and Creswell, 2018). The observational aspect of the study was designed to provide observation data from teachers' instructional behaviors and practices in the classrooms. Two observations were carried out one in a

mathematics class for 45 minutes and the other observation in a class team meeting for 30 minutes.

Participants

A total of 160 teachers (including ethnic minority teachers) and 10 principals participated in this study. Ethnic minority teachers were purposely selected due to some complains about differential treatment by principals and some departmental leaders as reported by some of the teachers. The study participants were made up of 60 male teachers (37%) and 100 female teachers (63%). Out of the 10 principals four (40%) were male and six (60%) were female. With respect to qualifications, 58 (36%) of the participants were teachers with a master's degree and migration pedagogics (International and Development Education) while 102 (64%) had bachelors' degree in teacher education. Out of the teachers with bachelor's degree 22 (22%) had migration pedagogics. Five (50%) of the principals had training in leadership and administration? Of particular importance is the fact that five (50%) of the 10 principals had no training in school leadership and administration and less experience working in multicultural schools, which lends itself to the problems of skills around inter-cultural relations. On the other hand, most of the teachers (*n* = 106, 66%) had experience working with other minority teachers in secondary schools, with majority of this cohort having been in the classroom for more than five years.

Research instruments and data collection

To collect data on this study, two sets of questionnaires were employed. One of the questionnaires was the Organizational Climate Description Questionnaire (Revised) for Secondary Schools (OCDQ-RS) created by Hoy and Sabo (1998) modified by the researcher to suit the current study. The other questionnaire was "Mathematics Achievement Test" (MAT) adopted by Baloglu and Karadag (2008). The mathematics achievement test (MAT) had a Cronbach-alfa of 0.84.

A preliminary survey was done by contacting the administration of the schools involved, which linked the researcher to minority teachers in the various schools. Participation of teachers was voluntary and only those who consented took part. Participants were given questionnaires (OCDQ-RS and MAT) each of which required about 15 minutes to be completed and were requested to return them after completion.

Data analysis

The data collected were analyzed using the statistic program SPSS 19.0 with a significant level set at < .05. Descriptive statistics, ANOVA, t-tests, and correlations were used to analyze teachers' perceptions of school climate, principal openness, and teacher

openness. A one-way analysis of variance (ANOVA) test was used to address the research hypotheses.

Ethical Procedures

Information about the research was provided to all participants and obtained their informed, signed consent following the guidelines of Norwegian Centre for Research Data (NSD). Permission was granted after it was established that ethical issues of NSD had been fully observed. The informed teachers had the right to withdraw before completing the process without the need for clarification. Participants were assured anonymity and that the results of the research including its validity and reliability were the sole responsibility of the researcher.

RESULTS

Descriptive statistics and t-tests were used to analyze the data relating to teachers' perceptions of principals' leadership role as related to teacher's performance and students' academic achievement. For research question one, the analysis (See Table 1) shows that principals supportive role items were rated above 4 on a 4-point Likert-scale classification, showing the relative principals' supportive behavior of teachers in the Organizational Climate Description Questionnaire (Revised) for Secondary Schools (OCDQ-RS). However, the teachers rated their own behaviors of commitment/engagement and collegial relationships (M = 5.79 and M = 5.78) respectively as the highest and perhaps most important. What is more interesting is that teachers disengaged behaviors is less than principals' restrictive behaviors (M = 3.45 < M = 3.61), indicating that teachers are motivated to teaching irrespective of principals' controlled behaviors.

Table 1.

Descriptive statistics.

Item	N	Mean	Std. Dev	
Principals supportive behavior			<u> </u>	
1. The principal compliments teachers	160	4.77	.473	
2. The principal encourages teacher	160	4.67	.657	
autonomy				
3. The principal goes out of his or her	160	4.65	.624	
way to help teachers				
4. The principal is available after school	160	4.61	.863	

to help teachers when assistance is			
needed			
5. The principal uses constructive	160	4.54	.713
criticism			
6. The principal listens to and accepts	160	4.50	.674
teachers' suggestions			
7. The principal sets an example by	160	4.41	.627
working hard him or herself			
Principals Directive behavior			
8. The principal rules with an iron fist	160	4.35	.874
9. The principal supervises teachers	160	4.28	.837
closely			
10. The principal finds and corrects	160	4.26	.828
teachers' mistakes			
11. The principal monitors everything	160	4.23	.633
teachers do			
12. The principal closely checks teacher	160	3.63	.574
activities			
Principals restrictive behavior items			
13. Teachers are burdened with busywork	160	3.61	.665
and paperwork			
14. Teachers are socially excluded	160	3.59	.662
15. Routine duties interfere with the job	160	3.56	.622
of teaching			
Teacher behavior items			
16. Teacher engaged and committed	160	5.79	.715
behaviors			
17. Teacher collegial behaviors and social	160	5.78	.677
inclusion			
18. Teacher disengaged behaviors	160	3.45	.624
Teacher background items			
19. Level of education- Masters	60	6.12	.713
-Bachelors	100	6.01	.710

20. Teaching experience < 5 years		50	4.80	.701	
	>5years	110	4.91	.709	
77 1: 1 NI (1: 4 · ·)	1.00				

Valid N (listwise) 160

Results of the descriptive statistics based on teachers' behavioral items 16 (engaged and committed behaviors) and 17 (collegial behaviors), show that majority of the teachers are socially connected in the school climate, also supported by observations made in the classrooms and class team. This finding is in line with the studies by Mastropieri and Scruggs (2004 and 2010) and Philpott et al. (2010) suggesting that collaboration is crucial when it comes to social inclusion and school success.

However, some minority teachers perceive their principals supervised them closely, keeping comments, which they must cope with. Minority teachers were of the view that such supervisions were to be carried out irrespective of teachers' ethnic background, but this was not the case. As these actions of principals fell under his/her restrictive behavior, minority teachers were forced to believe that behavior by principals could be different on ethnic Norwegian teachers. Under the presumptions of principal's controlled or uncontrolled behaviors a correlation analysis was carried out to find out the effects of these behaviors on students' academic achievement in mathematics.

Table 2. *Correlation Analysis Results.*

Test Pair	r	p
MAT (Achievement Pretest)- MAT PreS	0.350	< 0.001
(Principal behavior)		
MAT (Achievement Posttest)- MAT	0.351	< 0.001
PostS (Principal behavior)		

Analysis of the results on Students academic achievement in Mathematics in Pretest and Posttest scores of principals' behavior did not show any significant difference (r = 0.350. p < 0.001). The results in both cases were almost the same since the Posttest score proved to be r = 0.351. p < 0.001. This invariably means that school climate had no direct impact on student academic achievement. This finding was also supported by participant observation in the mathematics class, where students were solving mathematics problems with confidence with little help from the teacher.

The mean score for each of the six aspects of principal and teacher behaviors was calculated to obtain a standardized score for the dimension of Principal Openness and Teacher Openness of the OCDQ-RS factors. Significant differences were found in respect of the supportive, collegial and committed factors with supportive principals and committed teachers mean scores being highest (t = 2.26, df = 123, p = .026) (see Table 3).

Table 3.

Means and t-test: OCDQ-RS factors and Performance.

Variable	Factor 1	Factor 2	Factor 3	Factor 4	Factor 5	Factor 6
	(Supportive)	(Directive)	(Restrictive)	(Collegial)	(Committed)	(Disengaged)
Behaviour						Mean, 3.94
	Mean, 5.80	Mean, 5.81	Mean, 2.47	Mean, 5.81	Mean, 5.90	
						Mean, 3.75
Achieveme	Mean, 4.53	Mean, 5.95	Mean, 2.27	Mean, 5.64	Mean, 5.75	.803
nt	2.26	684	1.11	.675		(.424)
(p)	(.026)*	(.495)	(.271)	(.501)		

^{*}p<.05

The effect of background variables on OCDQ-RS item scores, inclusion and students' academic achievement

Gender and Leadership style

Gender had no effect on leadership style of principals and behavior (see Table 4). The step taken here was to contrast the males' mean scores on each of the 19 items of OCDQ-RS with the females' mean scores, to assess whether there was a significant effect due to gender. No significant difference was found on principals' leadership styles as a result of gender, implying gender did not affect principals' behaviour to teachers and rules out the effect of gender on students' academic achievement.

Table 4. Means of t-test; Gender affects behavior and academic achievement.

Item	Means for groups	t.	p.
Behaviour	Teacher gender	2.05	(.042)*
	Male teacher $= 2.02$		
	Female teacher $= 2.22$		
	N = 160		

^{*}P<.05

Qualification/experience and Leadership style

Generally, qualification and experience regarding leadership style had no significant effect on inclusion and academic achievement, except for individual items. The analysis for background variables and the total OCDQ-RS Scale scores showed that they had no influence on teacher perceptions of principals' leadership style and school climate as related to academic achievement of students. However, the analysis with individual items showed significant relationships for Teachers' Qualification and Teaching experience.

ANOVA: Teachers' qualification and scale items scores

The one-way between groups ANOVA for individual items of the OCDQ-RS scale revealed that item 18 (Teacher disengaged behaviors) showed significant differences between teachers, who had Master's degree in their taught subjects and slightly less for teachers having Bachelor's Degree in their taught subjects at the p = .05 level (See Table 5). These results may further differ with group of teachers who may not be teaching in their qualified taught subjects.

Table 5 *The results of the ANOVA test based on teachers' qualification.*

		Sum of		Mean			
		Squares	Df	Square	F	Sig.	Eta Sq.
Level	Between Groups	8.131	3	1.991	2.953	.006	0.108
of	Within Groups	56.762	101	.510			
Educat	Total	64.893	104				
ion							

In accordance with the One-way Between Groups ANOVA test results given in Table 5 for individual items in relation to teaching experience, there are significant differences between teachers with more teaching experience than those with less teaching experience at the p = .05 level. It may be concluded that experience in teaching plays a significant role in student academic achievement.

Table 6The Results of the ANOVA test based on teachers' experience.

	Sum of		Mean			
	Squares	Df	Square	F	Sig.	Eta Sq.
Teach Between Groups	8.163	3	1.891	2.843	.007	0.111
ing Within Groups	52.761	103	.520			
experi Total	60.924	106				
ence						

Experience working with minority teachers and inclusion

Teachers' background variable of experience showed significant difference (t = -2.13, df = 123, p = .035) implying that teachers/principals with experience working with minorities were more inclusive of minority teachers. The mean scores of principals and teachers with experience working with minority teachers were contrasted with the mean scores of those without experience working with minority teachers, based on Factor 1 (supportive), Factor 4 (collegial) and Factor 5 (committed) of the OCDQ-RS scale. The result showed that principals and teachers, who had experience working with minority teachers, were more positive towards social inclusion of minority teachers (see Table 7). The results therefore indicated that principals and teachers differed significantly in their attitudes due to their experience working with minority teachers (t = -2.13, t = 123, t = .035).

Table 7. Means and t-test: Experience working with minority teachers and OCDQ-RS *factors.*

Factors	Means for groups	t	(p)
Factor 1	No experience = 2.18	-1.47	(.144)
(Supportive)	Have experience $= 2.39$		
Factor 4	No experience $= 2.05$	-2.22	(.028)*
(Collegial)	Have experience $= 2.31$		
Factor 5	No experience $= 2.35$	-1.68	(.095)
(Committed)	Have experience $= 2.56$		

^{*}*p*< .05

Social inclusion effects on teachers' performance and students' academic achievement

Social inclusion/exclusion had no effect on teachers' performance and students' academic achievement. However, calculating mean differences and standard deviation showed statistically significant differences regarding exclusion of minority teachers, which also supported by participant observation in a class-team meeting (see Table 8). At this meeting it was observed that the contributions of the mathematics teacher who was the only teacher with minority background were not taken seriously.

 Table 8.

 Means and standard deviations for social exclusion.

Scores	Between groups	Within groups
M	14.67	10.90
SD	5.21	4.50

Further analysis of the outcomes was done in another setting where some minority teachers were tested (see Table 8), to determine the differences between the teachers in terms of social isolation or exclusion. There were statistically significant differences [F(1, 54) = 4.78, p < .03]. Minority teachers saw themselves as much lonelier than their counterparts (see Table 8), with mean differences and standard deviation. Some minority teachers did not feel as being part of their Norwegian teacher counterparts and may perceive this either as not being included in certain social settings or completely ignored. A One-way ANOVA was further carried out between different categories of teachers about their social interactions in Table 9.

Table 9. *One-way ANOVA of social exclusion.*

	Sum of				
	squares	df	Mean square	F	Sig.
Between groups	1419.892	4	354.723	5.256	.000
Within groups	13024.472	193	67.489		
Total	14444.364	197			

The analyses (ANOVA) (see Table 9) revealed no significant group differences between the teachers in terms of initiated interactions with colleagues [F (4, 53) = 0.84, p = 0.50], received interactions [F (4, 53) = 0.43, p = 0.79] and interactions with others [F (4, 53) = 1.00, p = 0.41]. What was found here was mainly perceived isolation. It must be stressed in the case of minority teachers in Norwegian school systems, that in social settings where majority are ethnic Norwegians it is difficult for all Norwegian social codes to be broken and understood by minority teachers, who in most cases have to deal with the running pace of the socialization process by comprehending what aspires. Often most minority teachers voluntarily withdraw from all non-academic socialization events within the school climate.

Discussion

It is evident from the results that the use of both survey design and participant observation has contributed to both broader and deeper understanding of the perceptions of minority teachers about their principals' leadership styles and school climate and its relationship to students' academic achievement. Moreover, this study has impacted the working environment positively by making the voices of minority teachers heard, and thereby contributing to the literature gap in this area of study. As shown in the results of this study in Table 1, the role of principals and teachers within a school climate cannot be overemphasised. Principal's supportive role items were rated above 4 on a 4-point Likert-scale classification, and so were the collegial relationships of teachers (M = 5.79 and M = 5.78). Teachers' commitment and engagement to their work was seen in this study to be high as opposed to their disengaged behaviors (M = 3.45 < M = 3.61), indicating that teachers were motivated to discharge their teaching duties with the best of their abilities. This finding linked to the teacher's commitment and engagement as classroom leaders and principals as school leaders is connected with the theoretical framework where teachers encourage, inspire and motivate students to achieve, whereas principals' supportive roles as leaders of their schools inspired teachers to commit to the vision and goals of the schools.

Principals' leadership role and behaviour and teachers' perceptions did not have any direct influence on student academic achievement, except with the supportive, collegial and committed factors with supportive principals and committed teachers mean scores being highest (t = 2.26, df = 123, p = .026) (see Table 3). The supportive roles of the principal were to create awareness and coordinate actions related to the inclusive process, in an orderly and systematic manner. As noted in the current study and with their supportive roles, principals created forum for both teachers and students to participate in the decision-making process empowering the entire school community to support student's success. Most of the principals and teachers in this study were qualified for the jobs they were doing with few principals having Master's degree in school administration or in education and experience, which made them able to lead for students' success. It was seen in this study as in other studies that the principal played a facilitating role to manage inclusive practices and change in an effective manner creating a friendly school climate which fostered inclusive school practices (Blasé & Kirby, 2000; Borger et al., 1985; Bulach & Malone, 1994; Hoy & Sabo, 1998; Winter & Sweeney, 1994).

Nevertheless, principals' leadership style warranted also being aware of all what was going on in the school, including knowing how members of staff and teachers were working, be able to challenge teachers and establish trust so that all teachers including minorities could have the feelings of inclusiveness.

In an open and engaged school climate where both teachers and principals influenced teaching staff in positive ways the contribution of teachers in school climate and social inclusion is indispensable. As shown in the results of this study, teachers disengaged behaviors was less than principals' restrictive behaviors (M = 3.45 < M = 3.61). Social skills and other competences, which teachers gained also supported by previous studies in social inclusion (Mastropieri & Scruggs, 2004 & 2010; Kuyini et al., 2021) were passed on to students to increase their self-confidence in problem solving in the mathematics class as Achievement Pretest and Posttest in mathematics indicated. Students' achievement was irrespective of principals' behavior and teachers' perceptions. This finding indicates that teachers were motivated to teaching irrespective of principals-controlled behaviors. Teachers' motivational beliefs coupled with their high sense of self-efficacy went a long way to ensure continuous self-beliefs in students to achieve.

Teachers' qualification and experience had significant influence on students' academic achievement. Teachers' background variable except gender showed significant differences between qualified teachers with higher degrees and lower degrees teaching in the subjects they

were qualified for and those not qualified in the subjects they were teaching with respect to individual items such as 19 (level of education) and 20 (teaching experience). Teachers, being key agents in the creation of meaning and in guaranteeing the success of any programme including teaching, effected any changes or modifications suggested by principals. In this sense teachers were not only instructors who simply received orders from their bosses but were part of the entire social process of negotiating inclusion and helping students to achieve. This study found qualified and experienced teachers to correlate with students' academic achievement and not necessarily teachers' perceptions. In view of this finding the current study is in line with many researchers who believe that teachers are the most important factor in the successful implementation of inclusion programmes and students' academic achievement (Pérez-Jorge et al., 2021).), since they were able to assess innovations and methods that could be useful, and make changes, if necessary. Involving teachers in planning individualised educational programmes and collaboration is vital. Many researchers claim that since the teacher is the classroom leader, s/he plays a motivating role in helping students to achieve (Mastropieri & Scruggs, 2000; Villa et al., 1996). Teachers as social facilitators enhance inclusion to promote students learning and academic achievement.

However, there were statistically significant differences [F(1, 54) = 4.78, p < .03] of some minority teachers' perceptions of their principals and other teachers' behaviors regarding social inclusion. Minority teachers saw themselves as much lonelier than their Norwegian counterparts (see Table 7), with mean differences and standard deviation. Nevertheless, it was later on realized that these particular minority teachers had what was termed as perceived isolation whereby the group never took any steps to initiate social interaction neither were they ready to join voluntarily to social groupings or settings initiated by their Norwegian colleagues. As these actions of principals or teachers fell under restrictive behavior, minority teachers were forced to believe that behavior by principals could be different on ethnic Norwegians teachers.

Conclusion

Educators have long believed that school leadership can have both a direct and indirect effect on school effectiveness through behaviors and interactions that shape a school's learning environment (Hallinger & Heck, 1996). Following the tests and examination of this study it was found that the leadership style of principals had no direct effect on students' academic achievement. This result is in line with Sommar's (2009) findings, concluding that leadership styles of principals and for that matter teachers at secondary schools did not have any significant impact on student's achievement. It was interesting to note however, that

students were capable to learn when they believed in their capabilities and the roles of teachers in this case was to instill student's faith in themselves by creating a congenial learning environment, while still sustaining student's belief, depicting the critical roles of teachers and principals.

Again, it was found that gender did not have any significant effect in shaping the behavior of principals in school management, and therefore could not determine teachers' performance concerning teaching and students' achievement. Therefore, teacher's perceptions regarding school climate, principal's openness or closeness and their relationship to student academic achievement was not supported by this study.

On the other hand, the following findings were made in this study:

- i. Teacher qualification had a significant effect on student academic achievement.
- ii. Teaching experience had a significant effect on student academic achievement.
- iii. Principals who have experience working with minority teachers and between teachers themselves had positive impact on social inclusion contributing to the friendly learning environment.

Thus, teachers' knowledge and their teaching experiences might contribute to their self-efficacy broadly described as teachers' thoughts and their capacity regarding instructional practices. Indeed, teachers' perceptions with high self-efficacy were the bottom line of students' achievement. Similar results have been found by researchers, who claimed that teacher's self-efficacy is highly significant for students' academic achievement and success (Somar, 2009; Schunk & Pajares, 2002; Kucukalioglu, & Tuluk, 2021). The study also found that minority teachers' perceptions of their principals' leadership style was restrictive. Even though, there was a reasonable degree of variability in respondent perceptions the findings ought to be taken seriously by policymakers in Norway. These findings provide a pointer to some specific curriculum areas that teacher training institutions and the Norwegian directorate of Education could strengthen in both leadership roles/ and multicultural teaching pedagogy. Although small-scale research was conducted, with data drawn from schools in Viken County, the results could be applicable in a similar context.

The findings of this study have implications for principals' leadership style and teacher's inclusive mechanisms in multi-cultural schools for students' achievement. Firstly, the study showed that The Theory of Transformational leadership (Bush, 2014; Hallinger, 2003) could be useful in inspiring and motivating teachers to commit to a shared vision and goals for schools for professional development. Finally, the finding that many teachers had no

migration pedagogics (International and Development Education) and 50% of the principals lacking both training in leadership and migration pedagogics, policy makers and the Norwegian directorate of Education would need to provide more targeted professional development courses, as well as strengthen the existing teacher education programs to include multicultural teaching pedagogy in colleges and universities.

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