

Tasha Riley

and

Charles Ungerleider

University of British Columbia

## Preservice Teachers' Discriminatory Judgments

*Having pursued policies of human rights and multiculturalism, Canadians regard themselves as tolerant. Yet some critics say that when it comes to Aboriginals, Canadians seem xenophobic and discriminatory. This study is the first empirical test of whether Canadian preservice teachers' judgments about the performance of Aboriginal students are discriminatory. Fifty preservice teachers were asked to assess the records of 24 students and recommend their placement in remedial, conventional, or advanced programs. Preservice teachers systematically devalued the performance of students whom they were led to believe were of Aboriginal ancestry in comparison with their non-Aboriginal counterparts with identical student records.*

*Forts de leurs politiques visant le respect du multiculturalisme et des droits de la personne, les Canadiens se considèrent tolérants. Pourtant, certains critiques maintiennent que par rapport aux Autochtones, les Canadiens semblent xénophobes et discriminatoires. Cette étude constitue la première analyse empirique qui cherche à déterminer si les jugements que portent les stagiaires sur le rendement des élèves autochtones sont discriminatoires. Nous avons demandé à cinquante stagiaires d'évaluer les dossiers de 24 élèves pour ensuite faire des recommandations quant à leur placement dans un de trois programmes : de rattrapage, conventionnel, ou avancé. De façon systématique, les stagiaires ont déprécié la performance des élèves qu'ils croyaient être d'ascendance autochtone par rapport à celle de leurs homologues non autochtones et dont le dossier scolaire était identique.*

### Introduction

The promise of education in a democratic society is that it can ameliorate some of the social conditions that might impede equality of educational success. Although they are not alone, Aboriginal students are among those for whom this promise has been most elusive. Their graduation rates are substantially lower than those of their non-Aboriginal peers (Council of Ministers of Education, 1999). They are less likely than their peers to enroll in the more academically challenging courses offered in secondary schools (Cowley & Easton, 2004), more likely to leave school before graduating, and less likely to return (Council of Ministers of Education). Although progress has been made in recent years, the achievement gap between Aboriginal and non-Aboriginal students remains large (Canadian Council on Social Development, 2000; Council of Ministers of Education, 2003).

---

Tasha Riley is a doctoral student in educational studies. Her current research focuses on teachers' expectations regarding Aboriginal students.

Charles Ungerleider, Professor of the sociology of education is currently Director of Research for the Canadian Council on Learning.

Some researchers have claimed that racism in the wider society and in schools is a factor that impedes the progress of Aboriginal students (Dei, Karumanchery, & Karumanchery-Luik, 2004; May, 1999; Moodley, 1999; Nieto, 1999; Ungerleider, 2003). Some have argued that overt and covert hierarchies in the school system privilege some students and disadvantage others (Dei, 1996; McCarthy & Crichlow, 1993; Moodley), affording unequal opportunities and differential outcomes for students depending on race, ethnicity, gender, sexuality, religion, culture, class, and disability (Dei). Some claim that racism and discrimination negatively influence the expectations teachers have for minority students, which adversely affects their academic achievement (Dei, 2003; Farkas, 2003; Good & Nichols, 2001; Hall, 1993; Strong, 1998). The subtle messages students receive about their attributed abilities may inhibit some minority students in reaching their full potential. Expectations of even well-intentioned teachers may have a devastating influence on students if the decisions made about those students are based on the teacher's erroneous expectations (Hall).

Farkas (2003) has argued that teachers' perceptions and expectations of minority students contribute to the gap between ethnic minority and majority students. In his study he examines racial discrepancies in education, particularly those potentially attributable to discrimination. He discusses how "critics argue that ethnic minority and low-income students are unfairly and disproportionately placed in lower ability groups, in special education, and are held back a grade and that these placements seriously reduce their opportunities for learning" (p. 1126). Farkas goes on to suggest that this may be due to the "possibility of generalized racist attitudes, either conscious or unconscious, on the part of teachers and administrators" (p. 1135). Like other researchers, he believes that the widening gap between ethnic-minority and White students cannot be explained away by socioeconomic or school differences and references a study by Phillips, Crouse, and Ralph (1998) that found that

Even when black and White children have the same prior scores, the same measured socioeconomic status, and attend the same school, black children still gain on average about 0.02 standard deviations less in math, 0.06 standard deviation less in reading, and 0.05 standard deviations less in vocabulary each year. (cited in Farkas, 2003, p. 1127)

In addition, he claims that ethnic-minority students are more likely to be retained in grades or placed in remedial classes and suggests that given the evidence that students placed in higher-tracked classes are more likely to succeed in schools (Brophy & Good, 1974; Oakes, 1995; Sirotnik, 1994), the continual placement of ethnic minorities in vocational classes may be one reason for the persistent gap between minority students and students of European ancestry.

Although claims about low expectations and discrimination toward minority groups are prevalent in the literature, there are few or no empirical data to support claims of discrimination against Aboriginal students in Canada. Some researchers (Dei et al., 2004; Farkas, 2003; Ferguson, 1998a) argue that it is difficult to provide proof of the issues because "the available evidence on the extent and consequences of teacher racism are quite fragmentary" (Farkas, p. 1135). Others (Dei et al.) believe that the need to quantify the

existence of racism undermines the argument by suggesting that racism can only be “proven” sufficiently when validated by the same privileged groups that have allowed these injustices to exist. On the other hand, Moodley (1999) argues that

Oppression and racism are heavy accusations. They should not be bandied around lightly and without evidence, notwithstanding the fact that victims know when they are being discriminated against and that it is not always easy to demonstrate the barriers and hostilities experienced. (p. 141)

Racism is a sensitive subject. If arguments invoking claims of racism appear too indignant or rhetorical in nature, people may become dubious of the legitimacy of these claims or may even ignore them completely. This can be problematic when trying to bring about changes that will alleviate the problem. Empirical proof provides credibility for the arguments surrounding discrimination, reinforces the legitimacy of such claims, and makes it more difficult to deny its existence. Farkas (2003) states that although it may be difficult to provide empirical proof of discrimination in the school system, it is not impossible and that “we should not rule out the possibility of attempting to directly study teacher attitudes by collecting survey data, conducting social psychological field experiments (e.g., during preservice and in-service teacher preparation), or even by directly observing in classrooms” (p. 1135). Similar studies have been successfully undertaken in other potentially sensitive research areas such as racism in the Canadian police force (Ungerleider, 1989). Studies such as this demonstrate that obtaining empirical evidence is not impossible.

#### *The Study in Context*

This study sought to determine whether teachers make discriminatory judgments about students on the basis of attributed characteristics. Teachers were asked to estimate students’ academic achievement based on specific knowledge about those students.

Teachers’ expectations may be formed on the basis of prior or current academic performance, comments made by former teachers, standardized test scores, and information irrelevant to the student’s performance such as ascribed characteristics of race, ethnicity, sex, or physical appearance. The latter may influence a teacher’s expectations even before the student has had an opportunity to perform. Once in the classroom, a teacher’s expectations may be further shaped by the students’ abilities such as following instructions, work habits, motivation, and behavioral compliance (Brophy & Good, 1974; Janes, 1996; Jussim & Eccles, 1992; Rosenthal & Jacobson, 1968).

The expectation literature demonstrates that small self-fulfilling prophecies exist in naturalized settings (Jussim, 1989; Jussim & Eccles, 1992). Teachers’ normative expectations have an effect on students’ certified learning (Williams, 1976) and these normative expectations can be influenced by perceptual biases (Jussim; Jussim & Eccles). In addition, the more rigid these teacher’s expectations are, the less they are subject to change (Brophy & Good, 1974; Clifton, Perry, Parsonson, & Hryniuk, 1986; Jussim, 1986; Kolb & Jussim, 1994). The effects of teachers’ normative expectations will have negative implications for students of racial and ethnic minorities if teachers’ perceptions of students are based on arbitrary factors.

### *Method*

The literature points to the need for a Canadian study that would determine whether teachers' decisions about students are influenced by the students' ascribed characteristics. The meta-analysis of Pygmalion effects by Raudenbush (1984) indicated that "subjective impressions of people are more manipulable when previous information is ambiguous or missing" (Abelson, 1995, p. 152). In other words, if a teacher had prior contact with a student, the teacher would be more influenced by his or her interaction with the student than by abstract information. To eliminate the influence of prior experience with students as a factor in teacher judgments about them, we designed a study of decision-making on the part of participants (preservice teachers) employing fictitious student records.

### *The Task*

The preservice teachers were asked to make decisions based on the records of 24 students. Each record purported to describe a student's prior academic performance from grades 4 through 7 in language arts, mathematics, science, social studies, music, and art. Each record also provided a subtle clue about the student's background as either a student of Aboriginal ancestry (Aboriginal), a student for whom English was a second language (ESL), or a student who was neither of Aboriginal ancestry nor one for whom English was a second language (non-Aboriginal). The academic information about the students' performance was identical for males (M) and females (F) in each group of students. The academic information was identical across the three groups.

We anticipated that respondents would infer a student's background from information included on the fictitious record card. On eight of the records, we included information that the fictitious school board had received funding to provide Aboriginal programming for the student. On a second set of identical records, we included information indicating that the school board had received funding to provide services for ESL students. No such information was included on the third identical set, which led the preservice teachers to infer that the students were neither of Aboriginal ancestry nor students for whom English was a second language. The student records were randomized for presentation on a secure Web site to which the preservice teachers had access, allowing any preservice teachers who volunteered for the study to examine and review the student records at their convenience.

### *Participants*

After the study design had received approval from the University committee that oversees research involving human beings, the voluntary participation of 50 preservice teachers enrolled in a teacher education program was solicited by means of an announcement made in a course enrolling approximately 350 elementary preservice teachers. The mandatory course in which the announcement was made occurred in the final term of a teacher education program that included in its first term a mandatory course that addressed social and educational situations of women, Aboriginals, persons with disabilities and persons for whom English was not a first language. The announcement invited the preservice teachers to take part in a task designed to explore the nature of teachers' judgment and assured them that if they chose to volunteer, they would have complete anonymity. The preservice teachers were informed

that the purpose of the study was to understand the kinds of decisions that beginning teachers make about the programs to which students should be assigned when they make the transition from elementary to secondary school. The preservice teachers were given several days to complete the task.

#### *Procedure*

Participants were directed to a secure Web site where they were presented with the task. Each participant was asked (a) to review the 24 randomized fictitious permanent student records, (b) to consider the criteria for three program options (remedial, standard, or advanced), and (c) to use a scale from 1 to 10 (with one representing the remedial program [*Supplementary Learning Assistance*], five representing the standard program [*Regular Grade Eight Program*], and 10 the advanced program [*Rapid Advance Program*]) to indicate their recommendation regarding the program best suited to each student.

The preservice teachers were told that they could use the full range of numbers from 1 to 10 to locate their recommendation for each student as close to the program to which they thought the student best suited. They were told that the recommendations they made would help inform the placement of each student as she or he made the transition from elementary to secondary (high) school the following fall.

#### *Hypotheses*

If the preservice teachers attended only to the prior achievement of students, the mean score recommended by the preservice teachers would vary only with the prior achievement levels of the students (GPA1, GPA2, GPA3, GPA4) such that students with high prior achievement would receive higher ratings. If the recommendations were influenced by the students' sex (female or male) or by their attributed group membership (Aboriginal, ESL, or neither), the mean recommended scores would also vary across males and females and across members of groups. The specific hypotheses were:

1. The mean score recommended by the preservice teachers will vary in accordance with the prior achievement levels of the students (GPA1, GPA2, GPA3, GPA4).
2. The mean score recommended by the preservice teachers will vary in accordance with the gender of the students (F, M).
3. The mean score recommended by the preservice teachers will vary in accordance with the attributed group membership of the students (Aboriginal, ESL, or neither).

#### *Analysis*

Table 1 describes the responses of those who rated the fictitious students. The table contains the mean responses (and the corresponding standard deviations) the preservice teachers assigned to female (Mean=4.92; *SD*=.75 and male (Mean=4.83; *SD*=.77) students; students for whom English was not a first language (Mean=4.75; *SD*=.83), Aboriginal students (Mean=4.25; *SD*=.90), and students who were neither Aboriginal nor ESL (Mean=5.25; *SD*=.66), and for students at each level of prior school performance [GPA1 (Mean=2.83; *SD*=.820), GPA 2 (Mean=4.83; *SD*=.79), GPA 3 (Mean=4.67; *SD*=1.01), and GPA 4 (Mean=5.0; *SD*=1.11)] as well as the maximum and minimum scores assigned.

Table 1  
Comparison of Mean Recommendations by Sex, Ethnic Group, and Level of Prior Achievement

	<i>Minimum</i>	<i>Maximum</i>	<i>Mean</i>	<i>Standard Deviation</i>
female	4.92	8.17	6.7550	.75657
male	4.83	8.25	6.7367	.77360
ESL	4.75	8.25	6.5800	.83328
Aboriginal	4.25	8.38	6.7375	.90465
non-Aboriginal	5.25	8.25	6.9200	.66613
GPA 1	2.83	6.83	5.0167	.82564
GPA 2	4.83	8.17	6.3967	.79174
GPA 3	4.67	9.50	6.9433	1.01720
GPA 4	5.00	10.00	8.6267	1.11400

The data were subjected to a repeated measures analysis of variance using Pillai's trace to protect against finding a statistical significance when there was none because of the small sample size. Participants gave significantly different ratings to students with varying levels of prior achievement ( $F=130.608$ ,  $p<0.001$ ,  $df=3,48$ ). The differences between the mean ratings of male and female students were not significant ( $F=.046$ ,  $p=.831$ ,  $df=1,50$ ). The differences in the mean ratings assigned to students in the three groups (Aboriginal, ESL, and students who were neither) were significantly different ( $F=11.769$ ,  $p<.001$ ,  $df=2,49$ ). This indicates that the recommendations made by these 50 preservice teachers did not appear to be influenced by the students' sex, but was influenced by the students' attributed group membership. At both the lowest level of achievement (GPA1:  $F=10.704$ ,  $p<.001$ ,  $df=2,49$ ) and the second highest level of achievement (GPA3:  $F=7.849$ ,  $p<.001$ ,  $df=2,49$ ) there were significant differences between the preservice teachers' mean recommendations (see Figure 1).

Because we were predominantly concerned with differences between Aboriginal and non-Aboriginal students, we compared the preservice teachers' recommendations for Aboriginal students and non-Aboriginal students at each achievement (GPA) level. Aboriginal students consistently earned lower recommendations than their non-Aboriginal counterparts ( $F=5.643$ ,  $p=0.021$ ,  $df=1,50$ ) despite the fact that the fictional students in Aboriginal and non-Aboriginal categories had identical records of prior achievement.

Preservice teachers were influenced by the group membership attributed to the students, evaluating identical records of prior achievement as non-identical. This provides empirical support for Wilson's (1991) assertion that teachers prejudice Aboriginal students even before meeting them (Wilson), as well as the claims made by some authors (Dei et al., 2004; Ungerleider, 2003) that racism has an effect on Aboriginal students.

The fact that a significant difference was found among students with a lower GPA level is troubling because it is at the lower achievement levels that students are most at risk of being placed in a remedial classroom. Smith, Jussim, and Eccles (1999), for example, found that decisions made about a

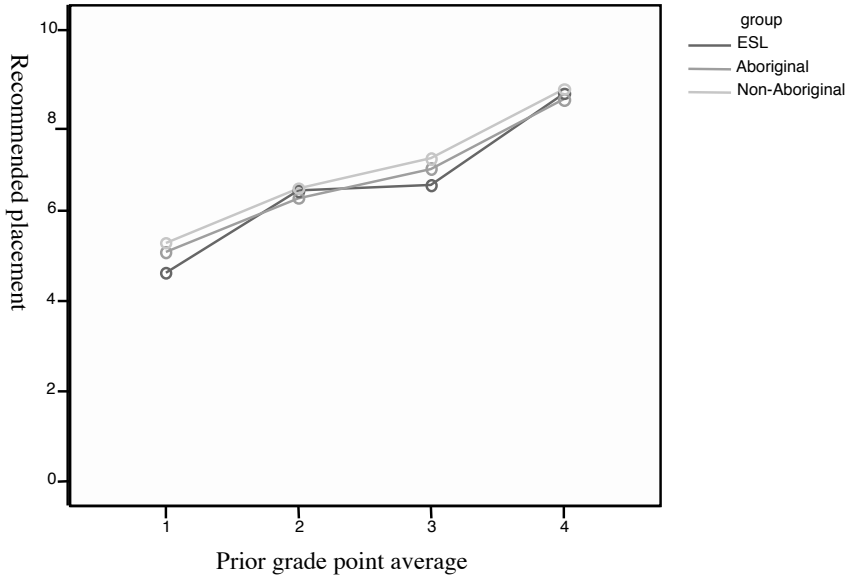


Figure 1. Mean recommended placement by attributed group membership and prior grade point average.

student can have a persistent effect on that student several years later. Students placed in remedial classrooms are less likely to advance to the higher-level courses that may enable them to attain university acceptance. Thus the decision to place a student in a remedial classroom may have significant long-term effects. Significant differences were also found at achievement level 3, indicating that students with particular attributed group memberships may be denied opportunities that are available to other students of equal achievement level.

Anti-racist theorists have been largely critical of the process of tracking (Broussard & Joseph, 1998; Dei et al., 2004; Oakes, 1995; Sirotnik, 1994) and not without good reason. Jussim (1986) stated, “research with actual classrooms has also shown that teachers work harder for high-track classes than low-track classes” (p. 438). Murdock (1999) points out that “studies suggest that opportunities to be mentally active and develop independent thought are more prevalent in higher track as compared to lower track settings” (p. 63). Dei et al. have described the process of streaming as a way to perpetuate the existence of stereotypes and labeling in a way that makes it appear invisible.

In the United States, researcher Blau (2003) remarks,

To the extent that high schools are stratified by race and ethnicity, they create different social and physical spaces for different racial and ethnic groups.

Asians and White mostly share one social and physical space, and black and Latinos mostly share another. (p. 134)

Smith et al. (1999) concluded in their study that “the self-fulfilling prophecy effects that occur in one year may, on average, lead to small differences between targets of high and low expectations that endure for a very long period” (p. 563). A decision to place an Aboriginal student in a remedial classroom may shut the door on opportunities to pursue a university education. It also may

mean that Aboriginal students at higher levels may be overlooked for the same academic opportunities available to their non-Aboriginal peers.

Our purpose in this investigation was to determine whether preservice teachers discriminate arbitrarily against students. The evidence is that some do. St. Denis and Hampton (2002) remark, "On one hand there is very little research and educational literature on racism and Aboriginal people, yet on the other hand, the literature is filled with references to the effects of racism on Aboriginal people in educational institutions" (p. 4). The present research fills an important gap, the lack of Canadian empirical evidence, in the literature on racism and discrimination.

A generalization of the results in any study should be advanced with caution; this study is no exception. First, this study included preservice teachers from one teacher preparation program. More research is needed throughout Canada to determine how teachers' decisions are influenced by arbitrary factors such as a student's attributed group membership. Other status variables such as income level were not included in the current study, but may have an influence on the kinds of decisions teachers make. Subsequent studies of this nature should include income level among its list of potentially influential variables to ascertain whether the basis for discrimination is the students' attributed ethnocultural group membership or their attributed socioeconomic status. Further studies should also investigate the relationship between teachers' characteristics and their judgments of and behavior toward students whose attributed group membership differs. Because the decisions teachers make at any given point may have a significant effect on a child's long-term future, it is imperative to determine the scale of the problem. Future studies should be conducted with teachers already working in the educational system in order to determine whether discrimination is more prevalent among preservice teachers or among teachers who have been working in the system for some time.

The preservice teachers in this study were told to pay attention to the students' prior educational achievement when making recommendations about student placement. The results indicate that teachers did exactly as they were told. Their recommendations appear to have been influenced by educational achievement, as well as by attributed group membership, although without an experimental check to determine whether the manipulation worked one cannot be absolutely certain that the participants were responding to the attributed group membership of the students. Further studies should be conducted that include a manipulation check. In addition, further studies are needed to determine whether the specificity of the instructions would mitigate the likelihood that some preservice teachers would discriminate on the basis of attributed group membership. For example, it would be useful to determine whether a teacher's decision would be equally influenced when instructed to pay attention only to a student's prior performance and to be cautious about being influenced by arbitrary factors such as a student's race, sex, or socioeconomic status.

The study revealed a tendency to rank ESL students lower than others. Future studies should consider the influence of teachers' judgments about students learning the official language used in schools. Replicating this study around the country with the follow-up studies mentioned above will provide



policymakers with a more precise indication of the extent to which discrimination plays a role in the decisions teachers make. This line of work will also clarify what can be done to minimize decision-making bias.

### Conclusion

Racism and discrimination are like rocks thrown into a pond: the ripples persist long after those who cast the rocks have disappeared. Such is the difficulty in identifying critical factors in the lack of educational success among particular students. The eradication of racism and discrimination in schools is contingent on our understanding and awareness of the problem and how it can be addressed. Without empirical data to help identify where the rocks were thrown and who threw them, creating effective strategies to combat discrimination in schools will be difficult. Empirical evidence can aid in this process. Studies such as this have illustrated that such evidence can be obtained.

Racism and discrimination may be the gatekeepers that keep students from fulfilling their potential, either because they no longer trust the system to provide an environment conducive to learning or because they were never even allowed through the gate. Regardless of whether students are excluded from education on the basis of decisions regarding race, sex, class, ability, sexual orientation, or combinations of the above, the squandered human potential is a loss to all society.

### References

- Abelson, R.P. (1995). *Statistics as principled argument*. Hove, UK: Erlbaum.
- Blau, J.R. (2003). *Race in the schools: Perpetuating White dominance?* CO: Lynne Rienner.
- Brophy, J.E., & Good, T.L. (1974). *Teacher-student relationships: Causes and consequences*. New York: Holt, Rinehart and Winston.
- Broussard, C.A., & Joseph, A.L. (1998). Tracking: A form of educational neglect? *Social Work in Education, 20*, 110-120.
- Canadian Council on Social Development. (2000). *Unequal access: A Canadian profile of racial differences in education, employment and income*. Retrieved March 10, 2004, from: [www.crr.ca/EN/Publications/ResearchReports/doc/ePub\\_UneqAcc\\_full.pdf](http://www.crr.ca/EN/Publications/ResearchReports/doc/ePub_UneqAcc_full.pdf)
- Clifton, R., Perry, R., Parsonson, K., & Hryniuk, S. (1986). Effects of ethnicity and sex on teachers' expectations of junior high school students. *Sociology of Education, 59*(1), 58-67.
- Council of Ministers of Education. (1999). *Report of the pan-Canadian education indicators program*. Ottawa: Statistics Canada.
- Council of Ministers of Education. (2003). *Report of the pan-Canadian education indicators program 2003*. Ottawa: Statistics Canada. Retrieved February 13, 2004, from: <http://www.cesc.ca/pceip/PCEIP2003en.pdf>.
- Cowley, P., & Easton, S. (2004). *Studies in education policy: Report card on Aboriginal education in British Columbia; 2004 Edition*. Vancouver, BC: Fraser Institute.
- Dei, G.J.S. (1996). *Anti-racism education: Theory and practice*. Halifax, NS: Fernwood.
- Dei, G.J.S. (2003). Schooling and the dilemma of youth disengagement. *McGill Journal of Education, 38*, 241-256.
- Dei, G.J.S., Karumanchery, L.L., & Karumanchery-Luik, N. (2004). *Playing the race card: Exposing White power and privilege*. New York: Peter Lang.
- Farkas, G. (2003). Racial disparities and discrimination in education: What do we know, how do we know it, and what do we need to know? *Teachers College Record, 105*, 1119-1146.
- Ferguson, R. (1998a). Can schools narrow the Black-White test score gap? In J. Christopher & M. Phillips (Eds.), *The Black-White test score gap?* (pp. 273-317). Washington, DC: Brookings Institute.
- Ferguson, R. (1998b). Can schools narrow the Black-White test score gap? In J. Christopher & M. Phillips (Eds.), *The Black-White test score gap?* (pp. 318-374). Washington, DC: Brookings Institute.
- Good, T.L., & Nichols, S.L. (2001). *Educational Psychologist, 36*, 113-126.

- Hall, J.L. (1993). What can we expect from minority students? *Contemporary Education*, 64(3), 180-182.
- Janes, C.R. (1996). *An examination of the relationship between teacher expectations, attribution theory and student achievement*. Retrieved November, 22, 2004, from: <http://www.mun.ca/educ/faculty/mwatch/fall96/examinat.htm>
- Jussim, L. (1986). Self-fulfilling prophecies: A theoretical and integrative review. *Psychological Review*, 93, 429-445.
- Jussim, L. (1989). Teacher expectations: Self-fulfilling prophecies, perceptual biases, and accuracy. *Journal of Personality and Social Psychology*, 57, 469-480.
- Jussim, L., & Eccles, J.S. (1992). Teacher expectations II: Construction and reflection of student achievement. *Journal of Personality and Social Psychology*, 63, 947-961.
- Kolb, K.J., & Jussim, L. (1994). Teacher expectations and underachieving gifted children. *Roeper Review*, 17(1), 26-30.
- May, S. (1999). Critical multiculturalism and cultural difference: Avoiding essentialism. In S. May (Ed.), *Critical multiculturalism: Rethinking multicultural and antiracist education* (pp. 11-41). London: Falmer Press.
- McCarthy, C., & Crichlow, W. (1993). *"Race," identity and representation in education*. New York: Routledge.
- Moodley, K. (1999). Antiracist education through political literacy: The case of Canada. In S. May (Ed.), *Critical multiculturalism: Rethinking multicultural and antiracist education* (pp. 138-152). London: Falmer Press.
- Murdock, T.B. (1999). The social context of risk: Status and motivational predictors of alienation in middle school. *Journal of Educational Psychology*, 91, 62-75.
- Nieto, S. (1999). Critical multicultural education and students' perspectives. In S. May (Ed.), *Critical multiculturalism: Rethinking multicultural and antiracist education* (pp. 191-215). London: Falmer Press.
- Oakes, J. (1995). Two cities' tracking and within-school segregation. *Teachers College Record*, 96, 681-690.
- Phillips, M., Crouse, J., & Ralph, J. (1998). Does the Black-White test score gap widen after children enter school? In C. Jencks & M. Phillips (Eds.), *The Black-White test score gap* (pp. 229-272). Washington, DC: Brookings Institute.
- Raudenbush, S.W. (1984). Magnitude of teacher expectancy effects on pupil IQ as a function of the credibility of expectancy induction: A synthesis of findings from 18 experiments. *Journal of Educational Psychology*, 76, 85-97.
- Rosenthal, R., & Jacobson, L. (1968). *Pygmalion in the classroom: Teacher expectation and pupils' intellectual development*. New York: Holt, Rinehart, & Winston.
- Sirotnik, K.A. (1994). Equal access to quality in public schooling: Issues in the assessment of equity and excellence. In J.I. Goodland & P. Keating (Eds.), *Access to knowledge: The continuing agenda for our nation's schools* (pp. 159-185). New York: College Entrance Examination Board.
- Smith, A.E., Jussim, L., & Eccles, J. (1999). Do self-fulfilling prophecies accumulate, dissipate, or remain stable over time? *Journal of Personality and Social Psychology*, 77, 548-565.
- St. Denis, V., & Hampton, E. (2002). *Literature review on racism and the effects on Aboriginal education*. Ottawa: Prepared for Minister's National Working Group on Education Indian and Northern Affairs Canada. Retrieved July 5, 2005, from: [http://www.ainc-inac.gc.ca/pr/pub/krw/rac\\_e.pdf](http://www.ainc-inac.gc.ca/pr/pub/krw/rac_e.pdf)
- Strong, W.C. (1998). *Low expectations by teachers within an academic context*. Paper presented at the Annual Meeting of the American Educational Research Association, San Diego. (ERIC Document Reproduction Service No. ED 420 62)
- Ungerleider, C. S. (1989). Intercultural awareness and sensitivity of Canadian police officers. *Canadian Public Administration*, 32, 612-622.
- Ungerleider, C.S. (2003). *Failing our kids: How we are ruining our public schools*. Toronto, ON: McClelland & Stewart.
- Williams, T. (1976). Teacher prophecies and the inheritance of inequality. *Sociology of Education*, 49, 223-236.
- Wilson, P. (1991). Trauma of Sioux Indian high school students. *Anthropology and Education Quarterly*, 22, 367-383.