

# Middle School Students' Perceptions Towards Linguistic Diversity in the Classroom

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*In 2010, a heated political controversy centered on the Arizona Department of Education's desire to prohibit "heavily accented or ungrammatical teachers" from teaching English Language Learners (Blum & Johnson 2012; Jordan 2010). However, although an administrative practice such as this would greatly affect students, their attitudes towards linguistic diversity in the classroom have been largely neglected. By surveying 94 middle school students in a public school district in the southwestern United States, this study sought to understand students' attitudes regarding teachers' and classmates' accents and the factors that may influence them, such as their language background and the presence and quality of previous exposure to accents. Results show that students overwhelmingly have neutral to positive attitudes regarding accentedness, despite differences in ethnicity or home language. These results should be one component considered when contemplating the implementation of administrative practices such as that proposed in Arizona in 2010.*

*Keywords:* accentedness, student attitudes, perceptions, middle school students

## 1 Introduction

Language policy is currently a hot topic in the United States, specifically in the Southwest. Home to an excess of 25 million Hispanic people (Ennis et al. 2011), states like Arizona, New Mexico, Texas, and California are attempting to find ways in which to best address issues of linguistic diversity. In Arizona, this debate often results in controversial ethnic and linguistic policies such as Senate Bill 1070, which aimed to identify, prosecute and deport illegal immigrants, and House Bill 2281, which "prohibits schools from offering courses...that advocate ethnic solidarity" (Lippi-Green 2011: 272). In 2010, more heated political controversy ensued regarding the Arizona Department of Education's desire to prohibit teachers with heavy accents from teaching English Language Learners (for more information on this proposed practice, see Blum & Johnson 2012; Lippi-Green 2011). Although the state cited the No Child Left Behind legislation of 2002 to support its decisions, the United States Departments of Justice and

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Education intervened, halting accent scrutiny on a state level and leaving it up to individual districts to determine acceptable fluency levels of teachers.

A crucial critique of the proposed practice was that the term “accent” was neither defined nor operationalized by the state, and because of this, it was implied to be a binary concept. In fact, as Blum and Johnson (2012:170) noted, “In Arizona, there are only two categories: teachers who have an accent and those who do not.” Thus, the assumption was made that native English speakers (NESs) do not have an accent while non-native English speakers (NNEs) do. This corresponds to Rajadurai’s (2007: 91) claim that the “first misconception” about non-native varieties is that only non-native speech is accented. She argued instead that everyone speaks a language with a particular accent and that labelling “...only non-native speakers of English as having an accent is thus misleading and disparaging.” This manner of thinking is problematic for a number of reasons. First, there is a wide range of accents among NESs as well as NNEs. Second, it inherently presumes that NESs are the standard, or norm, and NNEs are linguistically lacking. Third, the dichotomous constructs of NES and NNE leave little, if any, room for bilingualism, multilingualism, and multicompetence (Cook 1992).

This intersection of the subfields of language policy and speech perception is an interesting one, and it is important that research regarding speech perception and accent discrimination influences educated language policy-making. While much has been done to study accents and linguistic discrimination, very little research has examined how young students view accented teachers. When implementing a policy such as the one attempted in Arizona in 2010, students’ attitudes regarding teachers’ and classmates’ accentedness are a crucial piece of evidence to consider.

This study enhances previous work by exploring student attitudes towards their peers as well as their teachers, adding further empirical evidence for an understudied population, avoiding the conflation of linguistic background and ethnicity in statistical analyses, and considering the relationship between the findings and language education policy. The overarching question addressed is: What are students’ attitudes regarding accented teachers and classmates? The study further aims to uncover, via statistical correlations of students’ self-reported demographic information and responses to attitude questions, any relationships between attitudes about accentedness and ethnicity, language background, previous perceptions of accented speech, and presence and quality of exposure to accentedness, particularly with early adolescents.

## **2 Literature Review**

This section will synthesize the literature on students’ perceptions of diversity in the classroom, attitudes regarding accented teachers, and factors that affect attitudes towards accents.

### *2.1 Students’ Perceptions of Diversity in the Classroom*

According to the Center for Public Education, continued trends in birth rates and immigration will soon result in the disappearance of a majority racial or ethnic group in the United States (Center for Public Education 2012). With this

increasing diversity in K-12 schools, researchers are paying more and more attention to students' attitudes towards others who are of a different ethnicity, race, class, gender, physical capability or sexual orientation (e.g., Brandwein & Donoghue 2011; Clark 2010; Hill 2009). When investigating students' tolerance regarding diversity, results have been mixed. In 2010, Riskowski and Olbricht (2010) administered a questionnaire to 81 middle school students in a rural school in Indiana before and after a multicultural mathematics-based activity and found that their attitudes towards diversity post-activity were more positive than pre-activity. On a five-point scale, the average for all students on 30 questions was a 4.04. Six questions were asked in five categories: gender, socioeconomic status, mental handicap, physical handicap, and race/ethnicity (note that linguistic diversity was not asked about). Of these, the most positive responses were the race/ethnicity score (average total = 4.41). However, this questionnaire was a part of a larger project-based task (Riskowski et al. 2010) with which "[t]he underlying goal was to illustrate to students how their world (i.e., the middle school) encompasses students from different backgrounds and up-bringsings that all share common features and characteristics" (p.5). This focus may have resulted in students answering quite positively, even on the pre-activity questionnaire, due to a perceived desired response.

Additional studies lend support for increased diversity in the school system. For example, in surveying nearly 1,500 6th grade students in the greater Los Angeles area and triangulating students' responses with an objective classroom diversity index, Juvonen et al. (2006: 398) found that as classroom and school diversity increased, self-reported feelings of safety and self-worth also increased while feelings of victimization and loneliness decreased. This prompted them to claim that their "...results indicate that ethnic diversity is associated with feelings of safety and social satisfaction in school" and view that their study provided additional support for the *Brown v. Board of Education* ruling of 1954. In addition, when specifically asked about the opposite side of the coin from diversity, i.e., discrimination, Latino middle school students found it to be a historical phenomenon (one student even claimed that "Martin Luther King stopped discrimination") and distanced it from their personal experiences (Curwen 2011).

However, other research has not found such optimistic results. In 2010, Ngo asserted that multicultural education is not accomplishing its main aim of breaking down cultural barriers but is, instead, reinforcing them. Through her ethnographic research in a large, urban high school in the Midwestern United States, she noted that ethnic groups are still severely segregated in public schools, a segregation which is often accompanied by feelings of dislike and/or fear amongst students. Likewise, in Hughes et al. (2011), ten of sixteen participants noted animosity between racial groups in their multiethnic middle school, a result that may be unsurprising to the general public and educators in particular. Further, it seems as though, in multiethnic environments, different ethnic groups can have quite varied experiences and attitudes regarding diversity. For example, in a longitudinal, collaborative research project that aimed to improve the experiences of Latino/a students in a small, rural town in Utah, Marx and Larson (2012) administered an initial survey to all students at the school, regardless of ethnicity. The 23-item survey asked students their opinions about the impact of race/ethnicity on schooling, how welcome they and their families felt at school, whether they felt they fit in, the importance of

speaking English, and their thoughts about blending into U.S. culture. Marx and Larson found that for every item on the survey, Latino/a students responded less favourably than White students, reflecting more negative thoughts about the school and their experiences at the school than their White student counterparts. The statistical significance found between the two groups clearly marked the difference between their quality of education at the same school; the Latino/a students felt less welcome, liked their teachers and school less, and felt less prepared for and confident about their academic success than did the White students. Following Marx and Larson (2012), the current study analyzes students' responses by self-identified ethnic group in order to determine any differences in perceptions based on ethnicity.

## 2.2 Attitudes Regarding Accented Teachers

While minors are not often the target population for such studies, there is nonetheless a great body of research existing in a classroom context that addresses attitudes regarding teachers' accentedness (e.g., Ahn & Moore 2011; Boyd 2003; Gill 1994). Accent has been found to be correlated with ratings of *suitability to teach* (Boyd 2003), and in Mayer et al. (2003), students who received non-accented instruction on the use of statistical software found it to be more favorable than accented voice instruction. Also, in having participants respond to obscure trivia questions, Lev-Ari and Keysar (2010) observed that accented speech is less believable than non-accented speech and that, even with explicit awareness, listeners were only able to adjust for this phenomenon in mildly accented speech. This finding, although not directly related to the classroom, could have profound impacts if students are constantly second guessing the material being taught by accented teachers.

In a high school context, Boyd (2003) examined the ratings of eight teachers in Sweden by 54 teacher trainers and principals (combined as one group) and pupils. When listening to the teachers' speech samples, teacher trainers' and principals' judgments on accentedness were found to correlate with overall suitability to teach. When students were questioned about accented teachers, two main points became apparent. First, when a Swedish-born teacher had problems managing a situation, students blamed it on his or her inexperience, but when a foreign-born teacher had the same issues, it was blamed on lack of language proficiency. Also, students were often concerned with *others'* perceptions towards accented teachers, worrying that the teachers would be ridiculed by other students.

Due to an ongoing issue in the United States regarding undergraduate perceptions of International Teaching Assistants (ITAs), much of the research covering attitudes regarding teacher accentedness has taken place in a university context. Rubin's seminal (1992) study exposed listeners to a native English speech sample of a university lecture; being told that the speaker was an Asian TA, listeners found the sample accented and, at times, difficult to comprehend. Since that time, there has been a great focus on communication between undergraduate students and ITAs, some of which encouraged a shift in the "communicative burden" from solely the speaker to a balance between speaker and listener (Lindemann 2002). Kang and Rubin (2012) have looked at the possibilities of mitigating undergraduates' attitudes towards ITAs via intergroup contact exercises based on Allport's (1954) intergroup contact theory with

further modification on ideal contact conditions to promote reduction of prejudice (Pettigrew 1998; Pettigrew & Tropp 2005). Kang et al. (2012) incorporated contact activities that spanned an entire semester, one hour per week. They found that after interactions, American undergraduates showed significant increases in ratings of NNEs' speech samples in the categories of accentedness, comprehensibility<sup>1</sup>, and teaching ability. Likewise, Smith et al. (2005) noted that communication, and thus attitudes towards ITAs, could be bettered through use of a "jigsaw classroom," which provides increased contact and cooperative experiences. Smith et al. (2005: 3) also noted that, "prior research has shown that undergraduate students' ratings of their teaching assistants (TAs) correlate consistently with how well they believe their TAs' [sic] speak English."

Likewise, Ahn and Moore (2011) investigated listening comprehension of accented speech and accent perceptions. College students (N = 192) were asked to do two tasks: complete an attitudes questionnaire that focused on accents and perform an instruction-based assessment. The assessment consisted of listening to a tutorial given by one of five different accents (mild Korean, heavy Korean, mild German, heavy German, and a native speaker) and, once completed, answering questions about the presented content. The instruction itself lasted between 10 and 17 minutes and covered basic functions in the Statistical Package for the Social Sciences (SPSS). Students were then asked to rate a number of accents, categorized into Asian, European, South American, and African, out of 5. The researchers found that there were no significant differences in scores dependent on accent alone. However, when groups were divided into whether they gave low or high scores for accent perceptions, it was found that those who rated the Asian accents unfavorably scored lower on the assessment, indicating that there may be a relationship between accent perception and comprehensibility.

Other studies have reported non-native English speakers' (NNEs) attitudes regarding English teachers. Dalton-Puffer et al. (1997) found that Austrian university students had negative attitudes regarding Austrian-accented English, preferring British native English varieties. Likewise, in Chiba et al. (1995), Japanese college students rated American and British English most positively, followed by Japanese-accented and lastly other-accented varieties (Hong Kong Cantonese, Sri Lankan, and Malaysian). Most of the research done in this area has focused on undergraduate students due to convenience of sampling. The current study adds to the scant amount of empirical research exploring children's or adolescents' perceptions of teacher accentedness.

In a rare study of young students' attitudes regarding accented teachers, Butler (2007) explored the relationship between a speaker's accent and listening comprehension, as well as a speaker's accent and student attitudes towards that teacher and teaching style. By administering a questionnaire (and thus eliciting self-report data) to 312 Korean grade 6 students, Butler found that students believed the American-accented speaker had better pronunciation, was more confident in her use of English, and would use more English in the classroom than her Korean-accented counterpart. Also, students noted a preference for an American-accented speaker, reflecting the prevailing attitudes in Korea that native English-speaking teachers are preferable over Korean-accented English teachers (for more on the idea that native English speakers are superior English teachers than non-native speakers, called the *native-speaker fallacy*, see, e.g.,

Braine 1999; Phillipson 1992). However, whereas many of the students in Butler's (2007) study were familiar with both Korean-accented and American-accented English (as discovered by a background questionnaire), many native English speaking students have little exposure to L2 accents, and the exposure they do have is not necessarily with one particular L1 background. Thus, perceptions of accents in an L2 may be very different from perceptions of accents in an L1, especially due to the idea of native-speaker "ownership" of a language. The results are very specific to the culture, clearly showing how the socio-political (and educational) context can exert an influence on accent perceptions.

Butler's research was a first step toward filling the gap of determining young students' perceptions of teachers with non-native speech patterns. However, her study was conducted in the (also linguistically-politically charged) context of Korea, in which the assumption is being made that English is best taught by native-English speakers of an American dialect. While that assumption is common in many parts of the southwestern United States as well, there is a markedly different political climate in Arizona than in Korea. While there is a growing body of research that explores students' attitudes regarding teachers with accents, no study has yet investigated students' attitudes towards accented classmates.

### *2.3 Factors that Affect Attitudes Towards Accents*

The present study investigated the following three factors (i.e., ethnicity, linguistic background, and presence of previous exposure to accents) by means of their correlations with students' accent preferences. Linguistic background and presence of previous exposure were selected based on previous literature (e.g., Bent & Bradlow 2003; Gass & Varonis 1984; Lindemann 2005; Smith & Bisazza 1982), whereas ethnicity was explored due to the large percentage of participants who made an ethnic but not linguistic identification.

#### **2.3.1 Ethnicity**

Much work has been done in the field of educational psychology to investigate children's peer interactions, specifically the idea that children relate better to in-group, rather than out-group, members (Bigler 2005; Bigler et al. 1997; Nesdale et al. 2004, 2005). It has been said that, "[students'] in-group identification is reflected in their bias towards their in-group when they are required to make choices, indicate preferences...as well as in their tendency to display in-group positivity in their trait attributions" (Nesdale et al. 2007: 360). However, in a study of student-teacher relations that involved different ethnicities, students' attitudes towards the out-group, represented by the teachers, improved with enhanced student-teacher interactions (Thijs & Verkuyten 2012).

Effects of ethnicity on attitudes of accentedness have thus far received little empirical attention. Ethnicity as a variable is often confounded with linguistic background (i.e., L1). However, because there are so many Latino students in the United States, especially in Arizona, that speak little, if any Spanish, ethnicity should be viewed as a separate construct from linguistic background. Whereas a common L1 could be advantageous to intelligibility and therefore favorability towards accent (see below), ethnicity could have an effect due to a

more psychological angle. That is, based on in-group theory, it is likely that students have more positive attitudes towards classmates who are of the same ethnicity as they are. For these reasons, the current study distinguishes between linguistic background and ethnicity and analyzes them as separate constructs.

### 2.3.2 Linguistic background

Situated within the body of research that focuses on intelligibility and comprehensibility of accentedness, Bent and Bradlow (2003) conducted a study in which four groups of undergraduate students (native speakers of Korean, Chinese, English, and a mixed native language group) were asked to make judgments about speech excerpts in English from native speakers of English, Chinese, and Korean. Results supported the idea of a “matched interlanguage speech intelligibility benefit,” meaning that the (high proficiency) English accented in one’s own language is as intelligible as is native speaker English. Further, the accented speech of other native languages was at least as intelligible as the native English speaker’s speech, a phenomenon known as the “mismatched interlanguage speech intelligibility benefit.” Bent and Bradlow’s (2003) article implies that high proficiency accented speech is not detrimental to non-native listeners, both from the same and from different language backgrounds.

Other research further supports the idea that speakers may be actually more intelligible to listeners when they share phonological features (e.g., Smith & Bisazza 1982). In Leikin et al. (2009), L2 Hebrew speakers were able to understand Hebrew words in their own L1 accent or a native Hebrew accent with less phonological information than with another foreign accent, although for L1 speakers, accent was not significant. This evidence should be noted in the debate on the accentedness of educators in Arizona public schools, many of whom come from the same language background as their ELL students.

Nonetheless, other studies have not shown such consistent support favoring an L1 background in judgments of accented speech. Major et al.’s (2002) results exhibited mixed support for the matched intelligibility benefit with Spanish speakers scoring better on a listening comprehension test featuring a Spanish speaker than did those from other L1 backgrounds, but other L1 backgrounds having the same advantage. Also, Munro et al. (2006) found high correlations of listeners’ ratings of intelligibility, comprehensibility, and accentedness regardless of L1.

The previous studies prioritized judgments of intelligibility (often along with comprehensibility and degree of accentedness), but did not address participants’ attitudes about the accents themselves. In her 2005 study, Lindemann addressed this gap by exploring folk (perceptual) dialectology. She asked participants to rate 58 countries’ English on how familiar it was (on a 1-10 scale) and on how correct, pleasant, and friendly it was (on the same scale). Countries were then grouped based on scores and connections were hypothesized based on familiarity with the accent, recent immigration waves, recent political relations with the United States, and other sociopolitical factors. Then, students were asked to describe speech of different areas which they wrote on a blank map. The descriptions tended to be evaluative, i.e., value-laden, prompting Lindemann to note,

While respondents sometimes describe specific sounds they like, they describe what non-native speakers do “wrong” in greater detail. Mexico and China were described as getting the most “wrong”; they were described the most often and in the most detail. The salience of these two countries and the larger areas they are perceived as representing is most likely related to their large immigrant populations...(p.206).

This study reflects ideas regarding, and stereotypes towards, accents from specific countries and possible reasons for those judgments.

### **2.3.3 Presence of previous exposure to accents**

It has also been suggested that those who have had more exposure to accented speakers may have a greater tolerance than those with less exposure. Derwing and Munro (1997) found that self-reported exposure to various accents corresponded positively to participants’ comprehension of accented speech. Likewise, Gass and Varonis (1984) found that familiarity with nonnative speech in general, a nonnative accent in particular, and a particular nonnative speaker could improve intelligibility of the target variety. In contrast, there was no statistical significance in Kang and Rubin (2009) when exposure to non-native speakers was compared to listening outcomes. Although these studies focus on comprehension of accented speech rather than attitudes towards it, it could be argued that attitudes would be more favorable with increased comprehensibility.

Accents have also been shown to be viewed more favorably based on familiarity. In Lindemann’s (2005) study of perceptual dialectology, familiarity accounted for 90% of the variance in ratings of how “correct,” “pleasant,” and “friendly” an accent was perceived to be. However, there were some familiar varieties that were not evaluated especially favorably in one or more of the categories. For instance, she stated that “Mexican English was the most familiar non-native variety but this English was not rated as particularly correct or pleasant” (p. 193).

Before implementing policies that will affect hundreds of thousands of public school children, it is imperative that we have a full understanding of those students’ attitudes and perceptions regarding linguistic diversity. To do this, we need to ask such questions as: How do students’ feel about teachers’ and classmates’ accents? Also, what factors (e.g., ethnicity, linguistic background, attitudes regarding accents in general, presence and quality of previous exposure to accentedness) affect these attitudes?

## **3 Methods**

This section will address the participants, instruments, procedures, and analysis, respectively of this study.

### *3.1 Participants*

Sample participants consisted of 94 middle school students (grades 6-8) in a public school district in the southwestern United States. Students ranged in age from 11 to 15 and included both genders (female = 61, 64.9%; male = 33, 35.1%). Students predominantly identified English as the language spoken at home, with



English *and* Spanish being the second most spoken home language situation (English = 73, 77.7%; English and Spanish = 10, 10.6%; see Table 1). Because of this, both English and Spanish versions of consent forms and questionnaires were available; all forms were translated by a Spanish/English bilingual graduate student. Students also identified a category of ethnicity, with White, Hispanic, and American Indian comprising the majority of the student population (see Table 2).

**Table 1.** Self-reported Home Language of Participants

Language	N	Percent
English	73	77.7
Spanish	4	4.3
Navajo	1	1.1
English and Spanish	10	10.6
English and Navajo	4	4.3
English, Spanish, and Other	2	2.1
Total	94	100

The school itself contained between 350-400 students, 98 (26%) of whom qualified for a free lunch and 23 (6%) qualified for a reduced price lunch through the National School Lunch Program (NSLP)<sup>2</sup>. The teacher/student ratio was 20:1. Of the entire school population, sixty-two percent of students were White; twenty percent American Indian; sixteen percent Hispanic; two percent Asian and one percent Other (Public Schools K12).

**Table 2.** Self-reported Ethnicity of Participants

Ethnicity	Frequency	Percent
White	41	45.7
African American	1	1.1
American Indian	12	12.8
Hispanic	22	23.4
Other	2	2.1
Don't Know	1	1.1
White and Hispanic	3	3.2
White and Other	4	4.3
White and American Indian	2	2.1
White and Hispanic	3	3.2
White and Don't Know	1	1.1
Total	94	100

### 3.2 Instruments

This postpositivist, *ex-post facto*, between-groups, quantitative study examined students' attitudes about teacher and classmate accentedness based on their responses to a brief questionnaire. Special care had to be taken in order to devise a questionnaire that would be sensitive to instructional time as well as be comprehensible for middle school-aged children. All questions were in multiple-choice format. Also, because pilot testing showed that middle school-aged children cannot consistently articulate the concept of an accent, all questions were phrased so that they were participant friendly, using semi-synonymous phrases such as "sound different than you (has an accent)." Informal language was used, again with the purpose of being accessible to the target audience (see Appendix A for the entire version of the questionnaire).

Questions pertaining to demographic information (N=5) were presented first in order to increase response rate (Teclaw et al. 2012). Question six sought to uncover any previous attitudes towards perceived accentedness by leaving it decontextualized (If you listen to someone who sounds different than you [has an accent], how do you feel?). Later questions that assessed student attitudes toward teacher and classmate accentedness instructed students to imagine that they had a classmate or teacher who sounded different than they did. Attitudes were measured on a Likert-style multiple-choice scale which ranged from negative to positive attitudes. However, as seen in the previous literature (e.g., Riskowski & Olbricht 2010), students often answer these questions positively, possibly because they believe that those are the "correct" or desired answers. Most students are socialized to not exhibit biased behaviours or express prejudicial thoughts. To combat this phenomenon, the survey was worded so that none of the responses were wholly negative; rather, the shades of negativity were designed so that students would feel comfortable answering truthfully to minimize the impact of social desirability. These variables were all treated as continuous data.

To collect information about presence and quality of previous exposure to accentedness, the questionnaire asked how many accented friends a respondent had as well as if he or she had ever had an accented teacher, and if so, what that experience was like. Dependent variables (attitudes regarding teachers' and classmates' accents) each contained three questions, all six of which were condensed into one variable that indicated students' overall attitudes regarding accentedness (Cronbach's alpha = .811).

It is important to note that only relative, rather than concrete, accents were inquired about. In other words, the questionnaire did not contain questions regarding, for instance, Spanish-accented English. Instead, all questions were worded in such a way that an accent was defined as speech that is dissimilar to one's own. This was done for a number of reasons. First, the idea of accent is a theoretical concept and "in so far as linguists are concerned, the term has no technical or specific meaning...Generally accent can only be understood and defined if there is something to compare it with" (Lippi-Green 2011: 44–45). Second, as indicated by piloting, middle-school aged students are more likely to identify an accent by contrasting a person's speech with their own. With presumably less exposure to accents than adults, they would be less likely able to correctly label the linguistic background of an accent (e.g., German, Spanish, or Australian), but would be able to notice a difference in manner of speaking.

Third, it is not clear who students would consider to be “accented.” Would a native Spanish speaker find Spanish-accented English to be accented? By phrasing questions so that an accent is described as “sounding different than you,” the possibility for this ambiguity is lessened. Lastly, with the political atmosphere in Arizona, sensitivity is necessary when discussing accented teachers. Thus, keeping the concept of accent in relative, rather than absolute, terms is crucial to not perpetuate the dichotomy between native-English speaking and Spanish-accented teachers.

### *3.3 Procedures*

Three content teachers were selected from a local middle school to help administer questionnaires as they had access to most of the school’s student population. They were provided with parental consent forms, student consent forms, questionnaires, and small school supplies as incentives for students to return their signed consent forms. Parental consent forms were distributed to students and a period of approximately two weeks was given for the student to return the signed forms. Only those students who returned parental consent could further complete the student consent and then the questionnaire. The three teachers administering the questionnaires, who were all native speakers of English, had the option of reading them aloud or having the students fill them out individually. They were also instructed to answer any questions the students had regarding any of the items. When finished, the three content teachers then returned all signed consent forms and completed questionnaires. All procedures were conducted in accordance with the university’s Internal Review Board, the Director for Research and Assessment of the school district involved, and the principal of the participating school.

### *3.4 Analysis*

The first research question, which dealt with how students’ perceive their classmates’ and teachers’ accents, was analyzed descriptively. Inspection of frequency values helps to paint a picture of students’ self-reported attitudes regarding linguistic diversity. Then, to determine the factors that may influence these attitudes, analyses of variance (ANOVAs)<sup>3</sup> were run with students’ attitudes towards classmates’ and teachers’ accents as the dependent variable and ethnicity, linguistic background, and general attitudes toward accentedness as independent variables. Finally, two Pearson correlations were conducted to determine if there were any relationships between previous exposure to accents and attitudes towards teachers’ and classmates’ accents, as well as between the quality of that exposure and attitudes towards teachers’ and classmates’ accents.

## **4 Results**

The overarching research question asked how students perceive their classmates’ and teachers’ accentedness. Results of students’ perceptions of classmates’ accents will be presented first, followed by their perceptions of teachers’ accent.

When looking at students’ perceptions of classmates’ accents, the neutral category had the largest number of responses. For example, for question 8

(Imagine your classmate sounds very different from you [has an accent]), 37 students (39.4%) responded, “It wouldn’t bother me.” An additional 43 students (45.8%) had positive responses (“It would be interesting” or “It would be a good challenge—I’d want to try it”) while only 14 (14.9%) had more negative responses (“I wouldn’t want him/her in my class” or “It would be difficult, but it’s ok”) with only one response representing the former item. The two other classmate-related questions met with similar responses (see Tables 3 and 4). Note that in each of these questions, the most negative response was not chosen by any of the participants.

**Table 3.** Responses to Question 9: Do you want your classmates to sound like you (have the same accent you do)?

Response	N	Percent	Valid Percent
I want them to be exactly the same.	0	0.0	0.0
I want them to sound like me for the most part.	3	3.2	3.2
It doesn’t matter to me.	56	59.6	60.2
I like it when they sound different.	18	19.1	19.4
I like it very much when they sound different.	16	17.0	17.2
Total	93	98.9	100.0
Missing	1	1.1	
Total	94	100.0	

**Table 4.** Responses to Question 10: How would you feel if a classmate sounded different from you (had a different accent)?

Response	N	Percent	Valid Percent
I wouldn’t like it at all.	0	0.0	0.0
I wouldn’t like it, but I could deal with it.	2	2.1	2.2
I wouldn’t mind.	53	56.4	57.0
It would be different, but I’d like it.	12	12.8	12.9
I’d think it’s cool—I’d want to be friends with them.	26	27.7	28.0
Total	93	98.9	100.0
Missing	1	1.1	
Total	94	100.0	

Likewise, students’ perceptions of teachers also tended to be either neutral or positive. For example, for question 12 (Do you want your teacher to sound like you [have the same accent you do]?), 57 students (60.6%) answered, “It doesn’t matter to me.” No one wanted it to be exactly the same (answer choice *a*) and

only 13 (13.8%) said that they wanted the teacher “to sound like me, for the most part.” Fifteen students (16.0%) responded, “I like it when he/she sounds different,” and eight claimed to “like it very much when he/she sounds different.” The following tables show similar responses for the other two teacher-related questions.

**Table 5.** Responses to Question 11: Imagine that your teacher sounds very different from you (has a strong accent).

Response	N	Percent	Valid Percent
I wouldn't want that teacher.	4	4.3	4.3
It would be difficult, but it's ok.	23	24.5	25.0
It wouldn't be a problem.	27	28.7	29.3
It would be interesting.	26	27.7	28.3
It would be a good challenge—I'd want to try it.	12	12.8	13.0
Total	92	97.9	100.0
Missing	2	2.1	
Total	94	100.0	

**Table 6.** Responses to Question 13: How would you feel if a teacher sounded different from you (had a different accent)?

Response	N	Percent	Valid Percent
I wouldn't like it at all.	3	3.2	3.2
I wouldn't like it, but I could deal with it.	4	4.3	4.3
I wouldn't mind.	59	62.8	63.4
It would be different, but I'd like it.	15	16.0	16.1
I think it would be good—it's helpful.	12	12.8	12.2
Total	93	98.9	100.0
Missing	1	1.1	
Total	94	100.0	

Data was then statistically analyzed to explore any relationships in the following sub-questions: How do ethnicity and linguistic background affect students' attitudes about teachers' and classmates' accents? How do previously-held, generic attitudes regarding accents affect students' attitudes about teachers' and classmates' accents? How do presence and quality of previous exposure to accentedness (number of accented friends, presence of an experience with an accented teacher, and quality of that experience) affect student attitudes of teachers' and classmates' accentedness?

To answer the first subquestion (How do linguistic background and ethnicity affect student attitudes about teachers' and classmates' accents?), two ANOVAs

were run. For linguistic background (home language), the null hypothesis that linguistic background had no effect on students' attitudes could not be rejected, as no statistically significant difference was found between the groups ( $df, 5, 86$ ;  $F_{obs} = .224$ ;  $F_{crit} = 2.33$ ;  $sign. = .951$ ). In other words, students' linguistic background did not affect their attitudes regarding accentedness. There were likewise no statistically significant findings for ethnicity ( $df, 10, 81$ ;  $F_{obs} = 1.049$ ;  $F_{crit} = 1.95$ ;  $sign. = .411$ ), meaning that again, the null hypothesis that ethnicity had no effect on students' attitudes on accentedness could not be rejected. Like linguistic background, ethnicity was not a factor in students' attitudinal responses.

However, when an ANOVA was run to determine similarities between general (decontextualized) attitudes regarding accents and attitudes regarding classmates' and/or teachers' accents, the results were significant ( $df, 4, 87$ ;  $F_{obs} = 8.615$ ;  $F_{crit} = 2.48$ ;  $sign. = .000$ ;  $p < .05$ ). These results indicate that students do not view accents in the classroom any differently than accents beyond the classroom.

The last research sub-question (presence and quality of previous exposure to accentedness) was split into two parts. First, to test the relationship between number of friends with accents and attitudes of teacher and classmate accentedness, a Pearson correlation was run. It suggested that the more accented friends one has, the more likely he or she is to have a higher tolerance for accents ( $.209$ ;  $sign. = .046$ ,  $p < .05$ ). Of the 92 valid cases, 62 (67.4%) responded that they had had a teacher with an accent. Of those, more than 80% claimed a neutral or better experience with that teacher (see Table 7). When a Pearson correlation was run to test the null hypothesis that there was no relationship between quality of experience with an accented teacher and students' attitudes regarding accentedness, the result was again statistically significant ( $.618$ ;  $sign. = .000$ ,  $p < .05$ ). The null hypothesis can therefore be rejected: There is a positive correlation between the quality of the experience that a student had with an accented teacher and students' attitudes regarding teacher and classmate accentedness. The magnitude of this relationship equaled  $.382$ .

**Table 7.** Responses to Question 15: If you answered 'yes' to having an accented teacher, how was your experience?

Response	N	Percent	Valid Percent
I didn't like it—it was very difficult for me to learn.	3	3.2	4.5
It was difficult, but I could understand most of it.	10	10.6	15.2
It didn't bother me.	21	22.6	31.8
It was interesting.	20	21.3	30.3
I enjoyed it very much—it was easy for me to learn.	12	12.8	18.2
Total	66	70.2	100.0
Missing	28	29.8	
Total	94	100.0	

*Note.* Four students who answered that they had not had a teacher with an accent still answered this question.

## 5 Discussion and Conclusion

While Blum and Johnson (2012) sought to understand laypeople's attitudes regarding accented teachers in general and the Arizona Department of Education's proposed administrative practice in particular, the current study was interested in the attitudes of those whom the practice would affect, namely students. The main research question asked how students perceive their classmates' and teachers' accents. The results above show that in each scenario given, at least 70% of students had a neutral or positive response. In fact, only once was the most negative choice circled for the three questions of classmate accent; of the three teacher accent questions, a total of only seven selections were made for the most negative choice. Out of 92 students, only 4 (4.3%) responded that they would not want a teacher if he or she had a strong accent. This seems to contradict the research done with (mostly) undergraduate students that suggests that students find accented teachers less suitable to teach and/or less favorable than their native-like counterparts (Boyd 2003; Mayer 2003; Rubin 1992). Conducting a longitudinal study in which the same participants were again surveyed five and ten years from now would show any changes in attitude. It is possible that younger children are more open-minded towards linguistic diversity and that more biased attitudes develop as they age. This would explain the difference in findings between the current study and the research conducted with undergraduates. If this is the case, effort should be devoted to understanding the reasons behind this, especially because policies that have the potential to affect NNEs are created and enacted by adults.

For the first subquestion (How do linguistic background and ethnicity affect students' attitudes about teachers' and classmates' accents?), neither was found to have an effect. This finding also contrasted with previous research such as in-group theory. However, this may be due to how accent was operationalized. By reinforcing the relativity of an accent, there was not one privileged, non-accented, "native speaker" variety of speech. Thus, the explicit mention of particular varieties of accented English were avoided, unlike in Lindemann (2005). While the "accented" English referred to by the ADE was not specified, many interpreted it to be L2 accented English. Furthermore, because the majority minority in Arizona is Mexican, it could be reasonably inferred that Spanish-accented English is the variety in question. However, the fact that this was not specified in the survey could be the reason that results were inconsistent with Lindemann's; that is, prejudiced feelings towards Spanish-accented English from Mexico were minimal, if present.

The second sub-question asked how previously held, generic attitudes regarding accents affect student attitudes about teachers' and classmates' accents. Not surprisingly, it was found that students' attitudes regarding classmate and teacher accentedness reflected their decontextualized attitudes. This relationship is logical and is similar to the Cronbach's alpha reliability score (.811); students' attitudes about accents (whether they are decontextualized, classmate, or teacher) are bound to be similar. Thus, if students are open to accentedness in general, they most likely will not take issue with classmates or teachers with accents.

Lastly, the relationships between presence and quality of previous exposure to accentedness (number of accented friends, presence of an experience with an accented teacher, and quality of that experience) and students' attitudes of

teachers' and classmates' accentedness were examined. The Pearson correlation showed that there is a positive relationship between number of close friends with accents and students' attitudes of classmates' and teachers' accents. This corresponds with Lindemann's (2005) general finding that familiarity with an accented English variety improves one's perceptions of it, a factor that is possibly mitigated by increased intelligibility of the accented speech (as can be seen in Derwing & Munro 1997; Gass & Varonis 1984).

However, as with all Pearson correlations, it cannot be said that one variable *caused* another. Do students have more accented friends because they are open to and tolerant of accentedness? Or are they more open to and tolerant of accentedness because they have had positive experiences with their accented friends? Similarly, a Pearson correlation showed a positive relationship between quality of experience with accented teachers and attitudes towards teachers' and classmates' accents. It is possible that students who had accented teachers who taught well and with whom they established a rapport may consequently be more open to others with accents. However, it is equally possible that those students who are more tolerant of accents come into an accented teacher's classroom with a more open mind and thus feel more positively about that teacher.

Previous research has shown a strong correlation between accent preferences and comprehensibility (Scales et al. 2006). Therefore, in order for students to learn most effectively, they should be open-minded towards their teacher's manner of speech. Explicit diversity training, exposing students to positive role models who carry different accents than they do, and grouping students with dissimilar speech patterns are three possible ways of increasing acceptance of linguistic diversity. With regards to the third option, recent research in a university context has shown how structured intergroup contact activities have acted to positively influence native speakers' judgments of non-native speech and attitudes towards international students and international teaching assistants (Kang & Rubin 2012; Kang et al. 2012). Research using similar collaboration methods as an intervention, bookended by pre and post-test assessments, should be extended to younger ages to determine whether these students' attitudes could also be improved with strategic involvement.

Like all research, this study contains a number of limitations that should be addressed in the future. One limitation of this study is that the entire sample came from one middle school. By including additional participants from other schools with different demographics, validity could be strengthened. The sample from this particular school was 45.7% White; a more diverse demographic might offer different results. Likewise, this body of data would benefit from expanding the age, as well as the ethnicity, of the participants by gathering responses from high school as well as middle school students. Also with regard to sample, there is a self-selection factor, as with all questionnaires. This was compounded in this case as consent was required of parents as well as students. Thus, only students whose parents consented and who were responsible and motivated enough to have the consent signed and returned participated (94 students out of approximately 340; 27.6%). This further restricts the representativeness of the sample.

Additionally, this study only serves to address students' perceptions. Information was not collected on student comprehension nor student success in classrooms with accented teachers. This information, along with teacher speech



samples, should be collected in future research to triangulate data, thus showing a more comprehensive picture of classrooms with accented teachers. This is especially important as self-report data is often subject to a more positive portrayal than actually exists, as participants generally gravitate toward the desired response. It is possible that students believe themselves to be, or may want to be perceived as, more open to linguistic diversity than they actually are. Comparing the academic achievement scores of students' in classrooms with NESs and NNEs is the next step in the process of better understanding the role of accent in the classroom.

Finally, although "accentedness" was intentionally operationalized as a relative concept, this approach could also have drawbacks. It is possible that students (even English Language Learners) view native English speakers as non-accented and everyone else as accented. In other words, the assumed norm (i.e., Standard American English) was not necessarily perceived in the same way by all participants in the study. Although this should not have any effect on the results, it would be interesting and potentially beneficial to know how students of different linguistic backgrounds conceptualize accents. One possible method to determine this would be to compare objective linguistic analyses of teachers' authentic speech with students' perceptual judgments, perhaps in addition to student ratings of teachers' speech on accent, comprehensibility, and intelligibility.

Lastly, before any administrative practice or legislative policy is enacted that has the potential to negatively impact a group of people based on latent characteristics such as linguistic differences, it is crucial that the policymakers have access to a comprehensive view of the situation. With regard to the proposed 2010 Arizona practice that was intended to limit or prohibit heavily accented or ungrammatical teachers from teaching English Language Learners, that entails understanding how students comprehend non-native English speakers' speech, how they perceive it, react to it, and identify it, and if (and how) it affects their learning. All those affected by a potential practice should be able to voice their perspectives, especially those for whom the practice would disadvantage (i.e., the NNEs teachers) as well as those for whom it was intended to benefit (i.e., the students themselves). This study indicated that most middle school students have neutral or positive attitudes regarding accents, be they accented teachers or classmates. In fact, only 4.3% (4 students of 92) claimed that they would not want a teacher with a strong accent. Thus, it is clear that students were not taken into consideration when formulating the practice in question. Considering that they were the main putative beneficiaries, it seems imperative that their opinions should have been sought.

## Endnotes

<sup>1</sup> Following Derwing and Munro (1997: 2), comprehensibility is defined in this article as “native speakers’ *perception* of intelligibility” whereas intelligibility is “the extent to which the native speaker understands the intended message.”

<sup>2</sup> The NSLP subsidizes school lunches for students whose parents/guardians’ income falls between 130-185% of the federal poverty threshold. It is a common index in the United States with regard to schools’ economic demographics.

<sup>3</sup> An ANOVA is a statistical test that measures whether the means of two or more groups are equal. For more information, see Tabachnik and Fidell (2013).

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## Appendix A: English Version of Questionnaire

Directions: Read each question carefully. Then, please circle the best answer.

1. What grade are you in?  
(a) 6<sup>th</sup>      (b) 7<sup>th</sup>      (c) 8<sup>th</sup>      (d) Other
2. How old are you?  
(a) 10      (b) 11      (c) 12      (d) 13      (e) Other
3. What is your gender?  
(a) Male      (b) Female
4. What is your ethnicity? (you can circle more than one)  
(a) White      (b) Asian      (c) African American      (d) American Indian  
(e) Hispanic      (f) Other      (g) Don't Know
5. What language do you speak at home? (you can circle more than one)  
(a) English      (b) Spanish      (c) Navajo      (d) Other
6. If you listen to someone who sounds different than you (has an accent), how do you feel?  
(a) It will be impossible to understand – I'm not even going to try.  
(b) It will be difficult to understand – I may try.  
(c) I'm not sure.  
(d) It might be hard at first, but I'll get used to it and it will become easier.  
(e) I like differences – I'd like to try.
7. How many close friends do you have that sound different than you (have an accent)?  
(a) 0  
(b) 1-2  
(c) 3-4  
(d) 5-6  
(e) more than 6
8. Imagine that your classmate sounds very different than you (has a strong accent).  
(a) I wouldn't want him/her in my class.  
(b) It would be difficult, but it's ok.  
(c) It wouldn't be a problem.  
(d) It would be interesting.  
(e) It would be a good challenge – I'd want to try it.
9. Do you want your classmates to sound like you (have the same accent you do)?  
(a) I want them to be exactly the same.  
(b) I want them to sound like me for the most part.  
(c) It doesn't matter to me.  
(d) I like it when they sound different.  
(e) I like it very much when they sound different.

10. How would you feel if a classmate sounded different from you (had a different accent)?
  - (a) I wouldn't like it at all.
  - (b) I wouldn't like it, but I could deal with it.
  - (c) I wouldn't mind.
  - (d) It would be different, but I'd like it.
  - (e) I'd think it's cool—I'd want to be friends with them.
  
11. Imagine that your teacher sounds very different from you (has a strong accent).
  - (a) I wouldn't want that teacher.
  - (b) It would be difficult, but it's ok.
  - (c) It wouldn't be a problem.
  - (d) It would be interesting.
  - (e) It would be a good challenge—I'd want to try it.
  
12. Do you want your teacher to sound like you (have the same accent you do)?
  - (a) I want it to be exactly the same.
  - (b) I want him/her to sound like me, for the most part.
  - (c) It doesn't matter to me.
  - (d) I like it when he/she sounds different.
  - (e) I like it very much when he/she sounds different.
  
13. How would you feel if a teacher sounded different from you (had a different accent)?
  - (a) I wouldn't like it at all.
  - (b) I wouldn't like it, but I could deal with it.
  - (c) I wouldn't mind.
  - (d) It would be different but I'd like it.
  - (e) I think it would be good—it's helpful.
  
14. Have you ever had a class with a teacher that had an accent?
  - (a) Yes
  - (b) No
  
15. If you answered 'yes' to number 14, how was your experience?
  - (a) I didn't like it—it was very difficult for me to learn.
  - (b) It was difficult, but I could understand most of it.
  - (c) It didn't bother me.
  - (d) It was interesting.
  - (e) I enjoyed it very much—it was easy for me to learn.

Thank you for your participation.

## Appendix B: Spanish Version of Questionnaire

Direcciones: Lee cada pregunta con cuidado. Después, encierra la mejor respuesta.

1. ¿En cuál grado estás?  
(a) 6<sup>th</sup>      (b) 7<sup>th</sup>      (c) 8<sup>th</sup>      (d) Otro
2. ¿Cuántos años tienes?  
(a) 10      (b) 11      (c) 12      (d) 13      (e) Otro
3. ¿Cuál es tu sexo?  
(a) Masculino      (b) Femenino
4. ¿A qué etnia perteneces? (puedes encerrar más de uno)  
(a) Blanco   (b) Asiático      (c) Afroamericano      (d) Indio americano  
(e) Hispano   (f) Otro      (g) No lo sé
5. ¿Cuál lenguaje hablas a casa? (puedes encerrar más de uno)  
(a) El inglés      (b) El español      (c) Navajo      (d) Otro
6. Si escuchas a alguien que suena diferente a ti (que tiene acento), ¿cómo te sientes?  
(a) Será imposible entender – no voy a tratar.  
(b) Será difícil entender – quizás trataré.  
(c) No estoy seguro.  
(d) Quizás será difícil al inicio, pero me acostumbraré y será más fácil.  
(e) Me gustan los diferentes – me gustaría tratar.
7. ¿Cuántos buenos amigos tienes que suenan diferente a ti (tienen un acento)?  
(a) 0  
(b) 1-2  
(c) 3-4  
(d) 5-6  
(e) más de 6
8. Imagina que tu compañero de clase suena muy diferente a ti (tiene un acento muy marcado).  
(a) No lo(a) quisiera en mi clase.  
(b) Sería difícil, pero está bien.  
(c) No hay problema.  
(d) Sería interesante.  
(e) Sería un buen reto – Me gustaría intentarlo.
9. ¿Quieres que tus compañeros de clase suenen como tu (tengan el mismo acento que tú)?  
(a) Quiero que sean exactamente igual.  
(b) Quiero que suenen como yo en la mayor parte.  
(c) No me importa.  
(d) Me gusta cuando suenan diferente.  
(e) Me gusta mucho cuando suenan diferente.



10. ¿Cómo te sentirías si un compañero de clase sonara diferente que tu (tuvo un acento diferente)?
- (a) No me gustaría nada.
  - (b) No me gustaría, pero lo podría manejar.
  - (c) No me importaría.
  - (d) Sería diferente, pero me gustaría.
  - (e) ¡Qué bien! – me gustaría que fuéramos amigos.
11. Imagina que tu profesor(a) suena muy diferente a ti (tiene un acento muy marcado).
- (a) No quisiera a ese(a) profesor(a).
  - (b) Sería difícil, pero está bien.
  - (c) No sería un problema.
  - (d) Sería interesante.
  - (e) Sería un buen reto – quisiera tratarlo.
12. ¿Quieres que tu profesor(a) suene igual que tú (tenga el mismo acento que tú)?
- (a) Quiero que sea exactamente igual.
  - (b) Quiero que él/ella suene como yo, más o menos.
  - (c) No me importa.
  - (d) Me gusta cuando él/ella suena diferente.
  - (e) Me gusta mucho cuando él/ella suena diferente.
13. ¿Cómo se sentiría si un/a maestro/a sonara diferente a ti (tiene un acento diferente)?
- (a) No me gustaría para nada.
  - (b) No me gustaría, pero lo podría manejar.
  - (c) No me importaría.
  - (d) Sería diferente pero me gustaría.
  - (e) Creo que sería bueno – Sería de ayuda.
14. ¿Has tenido una clase en la que tu maestro/a tenía un acento (sonaba diferente a ti)?
- (a) Sí
  - (b) No
15. Si respondiste 'sí' al número 14, ¿cómo fue tu experiencia?
- (a) No me gustaba – era muy difícil aprender.
  - (b) Era difícil, pero podía entender la mayor parte.
  - (c) No me molestaba.
  - (d) Era interesante.
  - (e) Me gustaba mucho – era fácil aprender para mí.

Gracias por tu participación.

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