EDICIONES
COMPLUTENSE

Círculo de Lingüística Aplicada a la Comunicación
ISSN-e: 1988-2696

ARTÍCULOS

Do we need to beware of students' perceptions?: immediacy and emotional relationship between students and teachers in the Asian context

Renia Lopez-Ozieblo
The Hong Kong Polytechnic University

https://dx.doi.org/10.5209/clac.101436 Enviado: 30 de julio del 2024 • Aceptado: 15 de noviembre del 2024

Abstract: Immediacy behaviour includes both verbal and non-verbal actions such as praising students, calling students by their names, using humour as well as using gestures, smiling, making eye contact or getting close to students. In a classroom context, immediacy affects the affective relationship between students and teachers as well as the content taught.

From an intercultural perspective, Zhang (2006) and Lopez-Ozieblo (2015) have pointed out that some of the original items used to measure immediacy might not be relevant or appropriate in an Asian classroom, such as touching students or direct gaze. However, the bigger issue is, as Smythe and Hess (2005) noted, that most studies report retrospective students' perception, after the class has finished, and not actual class observations.

This study seeks to confirm previous findings reporting that perceived teachers' behaviours could be correlated to learners' evaluation scores of the class/topic and the teacher and to fill in that gap in the literature by correlating students' perceptions with the reality observed in the classroom. The objective was to identify whether students' perceptions of affective behaviours correspond to what happens in the classroom. Convenience sampling was used to gather naturally occurring data and was video recorded in eight hours of graduate (5 hours) and undergraduate (3 hours) lectures at the same Hong Kong institution. In addition, students were asked to fill in a teacher and class survey, evaluating how they perceived the teachers' behaviours, whether they smiled, called them by their names, etc., during the session under observation. The results of our own observations and the students' perceptions were correlated for the behaviours observed.

Overall, our results confirm the findings of previous studies that correlate teacher immediacy behaviours with better students' performance. Our results also suggest that students' perceptions do usually reflect the reality of the classroom. Results also indicate moderate positive significant correlations between some of the actual behaviours and how learners evaluate the teacher. This suggests that, even in an Asian classroom, teachers should be aware of immediacy-developing behaviours.
Keywords: Immediacy; Asian classroom; learners' perceptions; actual teachers' behaviours.

How to cite: Lopez-Ozieblo, R. (2025). Do we need to beware of students' perceptions?: immediacy and emotional relationship between students and teachers in the Asian context. *Círculo de Lingüística Aplicada a la Comunicación* 102 (2025), 87-102. https://dx.doi.org/10.5209/clac.101436

1. Introduction

The last decades of the 20th century saw the beginning of an extensive body of research on how teacher behaviour is related to learners' affective and cognitive learning and motivation. Learners' emotions, positive and negative, are thought to influence the learning process. A number of internal factors influence these emotions, including learners' self-perception and beliefs (Horwitz et. al, 1986; McIntyre, 1999), personalities (Krashen, 1982) and previous experiences (Coleman, 2008). External factors also affect learners' emotions, such as context-related demands (Dörnyei & Ushioda, 2021), as well as the teachers themselves and their behaviours (Guo et al., 2022; Jiang & Dewaele, 2019; Li, 2021).

The study of teachers' behaviours, including verbal and nonverbal acts, finds its modern roots in the concept of immediacy, a term coined by Mehrabian (1971) to explain how people are attracted to others. People avoid stimuli which do not provide rewards or are punishing, favouring those which are rewarding. Creating immediacy in the classroom has been linked to an increase in learner motivation (Allen et al., 2006; Christophel, 1990; Miller et al., 2014; Velez & Cano, 2008; Wijaya, 2017); lower learners' anxiety levels (Ballester, 2015); enhanced attention (Barcelos, 2020; Frymier, 1994); better attendance and participation (Myers et al., 1998); and an enhanced perception of teachers' credibility (Johnson & Miller, 2002; Xie & Derakhshan, 2021).

Perceived teacher credibility itself has been correlated to improved learners' performance (McCroskey et al., 2004; Myers & Bryant, 2004; Pogue & Ahyun, 2006; Xie & Derakhshan, 2021;). However, how teachers are perceived and whether this corresponds to their actual behaviour is an area little researched. This study was set up to fill in part of this gap by comparing actual teachers' behaviours in the classroom and learners' perceptions of those behaviours. In particular, we focused on nonverbal and verbal behaviours that have been identified as improving immediacy in the classroom in past studies (Zhang, 2006).

2. Immediacy

According to Mehrabian (1971), there are three independent dimensions to emotional states, "pleasure-displeasure, arousal-non-arousal and dominance-submissiveness" (p. 5). In the classroom, teacher behaviour can enhance or minimize each of these elements, thus creating an environment more conducive to success (Frymier, 1994). Power is an inherent dimension of the teacher but it can be manipulated through speech, such as quantity of talking (Sorrentino & Boutillier, 1975) and also through non-verbal behaviours that help learners feel more relaxed such as the teacher smiling or minimizing the teacher-learner power distance by getting physically closer to the learner (Mehrabian, 1971). Arousal is mostly conveyed through nonverbal behaviours, such as changes in body position, gesture, facial expression or voice. While pleasure, 'liking', can be strengthened by using inclusive speech, first names, humour, praise or by nonverbal behaviours such as gaze, smiles, gestures and proximity (Richmond et al., 1987). More recent studies linking teachers' behaviours to learners' emotions point to strategies that engage learners (arousal) and reduce face-threats (liking) while maintaining credibility by proving competence (Dewaele et al., 2022). Some of these strategies include presenting clear and well-organized content at the right level for the learners (Chesebro & McCroskey, 2001; Sidelinger, 2010; Sidelinger & McCroskey, 1997); minimizing the face-threat of feedback to learners (Kerssen-Griep et al., 2003) by deploying more explanatory than imperative statements, using less formal and more complimentary language, introducing humour and self-disclosure in the classroom discourse (Witt & Kerssen-Griepp, 2011). Self-disclosure, talking about oneself, has also been linked to immediacy, as teachers might be perceived as being more approachable (Miller et al., 2014).

2.1. Development of studies on immediacy in the classroom

One of the earliest studies on immediacy in the classroom correlated learners' perceived use of nonverbal behaviours by teachers and affective learning (Andersen, 1979). Affective learning refers to how learners acquire skills and knowledge through emotional experiences. Andersen found that smiling, eye contact, direct body orientation, relaxed attitude and body movements, gestures, touching and being vocally expressive could develop immediacy which in turn lead to higher learning scores. A number of studies found corroborating results, in liberal art colleges (Christensen & Menzel, 1998; Richmond et al., 1987), larger universities (Gorham, 1988) and high schools (McDowell, et al., 1980). Nonverbal behaviours were found to be even more important in larger classes to minimize the physical distance imposed by the environment (Gorham, 1988).

Richmond et al. (1987) added the verbal dimension to immediacy studies, following Weiner, Johnson and Mehrabian's theories (1968). Many of the verbal immediacy behaviours would later be associated with dimensions of credibility, such as being inclusive or enhancing affiliation. Other verbal behaviours included the use of humour, self-disclosure, encouraging learners to talk, addressing learners by name, providing feedback, praising, having conversations before and after class. Of these, non-verbal behaviours were thought to be more effective than verbal ones, according to a study by Estepp and Rogers (2015), who asked students to report on teachers verbal and nonverbal behaviours, which corroborated previous results by Velez (2008).

Christophel (1990) directly correlated immediacy to motivation, establishing a link between immediacy and affective behaviours. Her results were supported by those of Frymier (1994) who also found a positive effect on motivation but not a direct effect on student learning. Frymier suggested that immediacy attracted learners' attention, they then became more involved and interested and would be looking forward to the next class. However, she also stated that immediacy alone was not enough to motivate learners. Despite these results, Rodríguez et al. (1996) proposed a model directly linking immediacy to affect and affect to cognitive learning. This indirect association between immediacy and cognitive learning was confirmed by a meta-study by Allen et al. (2006), who reported that teacher immediacy increased student motivation and that in turn helped develop cognitive learning. An integrated model by Zhang and Oetzel (2006) acknowledges the direct and indirect relationships between immediacy, affect, motivation and cognition. The model states that immediacy has a direct effect on affect and motivation, but affect also impacts motivation, which in turn is related to cognitive learning. Guo et al. (2022) conclude that teacher immediacy increases language enjoyment and is a contributing factor to learners' motivation.

Jiang and Dewaele (2019), in a study with 564 Chinese, found that English learners' emotions, in particular enjoyment and anxiety were specifically related to teacher's friendliness, joking, strictness and unpredictability

(this latter behaviour only affected anxiety). A similar study by Dewaele et al. (2022), with 360 Kuwaiti foreign languages learners, also identified joking, predictability and use of English as behaviours affecting enjoyment and motivation, while no effects were found on anxiety. In both studies the use of humour emerged as one of the key behaviours enhancing learners' enjoyment, while, at least in Chinese learners, anxiety was more of an intrinsic factor less dependent on the teacher's behaviour.

2.2. Challenges to immediacy

Immediacy studies and their effect on learners do have their share of critiques, the more valid one being that there are other behaviours taking place outside of the classroom which are not measured, such as face to face tutorials, email responses to learners (Allen, et al., 2006), grading practices (Hess et al., 2001) and approachability. Komarraju et al. (2010) found that students valued outside the classroom interactions, especially when teachers are perceived to be approachable and available as well as respectful.

From an intercultural perspective Zhang (2006) and Lopez-Ozieblo (2015) pointed out that some of the original items used to measure immediacy might not be relevant or appropriate in an Asian classroom, such as touching learners or direct gaze. Mottet and Richmond (1998) had argued that verbal immediacy strategies could not be generalised as individual differences were too many. However, scholars in the field of politeness disagree with this statement, as there are many examples of universal linguistic strategies deployed by speakers to reduce psychological distance with their interlocutors (Lopez-Ozieblo, 2018).

Smythe and Hess (2006) noted that most studies report retrospective learners' perception, after the class has finished, not actual class observations. Only a few studies have tried to correlate learners' perceptions to the reality observed in the classroom. In one of these Andersen (1979) confirmed a significant correlation between the two, having trained observers to rate teacher immediacy based on their behaviours during classes. However, in a study with 525 students evaluating 17 instructors, Smythe and Hess (2006) found that learners' perceptions of teachers' non-verbal behaviours did not correspond to the reality observed by their researchers.

In a previous meta-study of 35 studies linking immediacy with affect, motivation or cognitive learning, Hess et al. (2001) found that 86% (30 studies) relied on learners' perception of teachers' behaviours and 74% (26 studies) only used learners' beliefs about their own learning to evaluate learning. This methodology has been considered valid (Richmond et al., 1987; Scott & Wheeless, 1977) although very few studies have actually observed teachers' behaviours and correlated them to learners' perceptions. Hess and colleagues (2001) accepted that immediacy "appear to be positively associated with various factors related to affective exchange in the classroom" (2001, p. 215), however, they advocated caution as it could be that some of the behaviours associated with immediacy could also have a detrimental effect on learning, by focusing learners' attention on unimportant content (Harp & Mayer, 1998).

Lopez-Ozieblo (2015) noted that most immediacy-related knowledge is based on observations of Western participants and that similar studies in Asian classrooms have found that out of the classroom interactions are more important in Asian context than US ones (Zhang, 2006). Teachers' credibility in Asian classrooms is likely to be more important to students than psychological closeness achieved via verbal or nonverbal behaviours. Immediacy might have a positive emotional effect but the lack of it might not be as detrimental as in other cultures.

Therefore, the question remains whether, in an Asian context, learners' perceptions align with actual teachers' behaviours traditionally associated with the development of immediacy. If the two are not aligned then we need to question the relevance of immediacy studies and those that establish relationships between learners' emotions and teachers' behaviours. In addition, in the institution where the data was collected, teachers' appraisals, and thus salaries, are linked to the yearly evaluations given by students of the subject and the teacher, based on a feedback questionnaire. If students' evaluations are not correlated to actual behaviours, this would call into question the relevance of such questionnaires.

3. The Study

Our first objective was to identify if perceived teachers' behaviours could be correlated to learners' evaluation scores of the class/topic and the teacher, as suggested in the literature (Andersen, 1979; Christensen & Menzel, 1998; Christophel, 1990; Gorham, 1988; Richmond et al., 1987; Scott & Wheeless, 1977; Zhang & Oetzel, 2006). The second objective was to identify whether learners' perception corresponded with the reality of the classroom, the actual teachers' behaviours as observed via the video recordings.

This study used convenience sampling. It focused on higher education colleagues of the researcher who volunteered to be recorded while teaching. All subjects were Language Education related, taught at the same Hong Kong institution. Naturally occurring data was recorded in eight hours of graduate (5 lectures) and undergraduate (3 lectures) classes, either three or two hours long. Teachers' speech and actions were transcribed and then analysed. The analysis was both qualitative and quantitative to determine what verbal and nonverbal immediacy behaviours could be observed. In addition, learners were asked to fill in a 22-question survey to evaluate the teacher and the class and also to indicate the perceived behaviours of the teachers. These results were then correlated to the actual behaviours observed.

3.1. Participants

Eight full-time teachers of various Language Education topics agreed to have their sessions recorded before COVID-19, all classes were face to face. All teachers were native English speakers or fully bilingual. All had

lived and worked in Hong Kong for over five years, and were, therefore, familiar with the Hong Kong classroom. Further information is not given in order not to disclose their identity. In all of the recorded sessions two cameras were used, one at the front of the classroom and one at the back, both pointing at the teacher in order to avoid recording learners' faces. In all of the sessions, two members of the research team were present to carry out the recordings and manage the surveys. Some of the subjects were compulsory subjects, with classes of over 50 learners, while others were electives with class sizes not exceeding 30 learners (average class size was 32 learners).

Teachers were not specifically told that their interactions with learners would be analysed in terms of immediacy. They were aware that we would be analysing nonverbal behaviour and gestures in particular. After the sessions, they reported having been nervous to start with (due to the cameras) but that they had soon forgotten about them. Some of the data recorded has also been used in a study of how teachers mitigate disagreements (Lopez-Ozieblo, 2018, 2023).

Out of the 252 learners answering the questionnaires the majority (90%) were from Hong Kong, the rest were from other East Asian territories (Mainland China, Korea, Taiwan), a fifth (20%) were male and one third (34%) undergraduates. The average age of undergraduates was 20 and postgraduates' ages ranged from 21 to mid-40s. Many postgraduates were teachers themselves. Learners were asked for their consent to record the class and to use their answers to the 22-question survey. The surveys were filled in at the end of the recorded session. Learners were told the objective of the study was to identify behaviours in teachers that learners responded to positively.

The questionnaire was an adaption of the institution's "Student Evaluation Questionnaire" (already used by learners to evaluate the teacher and the subject) and Zhang's questionnaire (2006) which identifies specific verbal and non-verbal behaviours that are associated with the creation of immediacy in Asian classrooms (see Appendix 1). The first five questions related to the evaluation of the topic and the session, including: learner's attitude towards the topic, how much they understood and perception of the contents in terms of how interesting, relevant and informative they were and how much the session stimulated learners' interest in the topic. The following eight questions related to the evaluation of the teacher's competence and performance in terms of making learners feel comfortable. The last seven questions targeted specific teacher behaviours, use of humour, movement, hand gestures, smiles, eye-contact, first names and praise. Participants were asked to agree with the statements provided on a 1 to 5 Likert scale (1 = I totally disagree). An additional two questions, not related to this study, were added to identify whether learners preferred holistic teachers (whose role was also that of a friend, a parent, a teacher), to confirm the results of a previous study (Lopez-Ozieblo, 2015).

Although we were only recording a snap-shot of the whole course, we believe it provided a valid example of the teacher's practices. By carrying out the recordings and questionnaires after week 8 of the academic semester, we ensured that learners were familiar with teachers and so their responses to the questionnaire would have been based on the session recorded but also on previous interactions with the teacher (Abelson, 1985).

To minimise the impact of the external observation, a member of the research team was selected partly for her knowledge of the teachers observed, having been their student in previous years. This, partly emic, knowledge gave us more confidence in our analysis of certain behaviours, although all cases were discussed by all three team members.

3.2. Data collection and analysis

The behaviours observed were: teachers use of humour, moving around the classroom and gesturing. In addition, we also noted the amount of time spent on self-disclosure. Learners were asked to evaluate their perception of how often they observed these behaviours in their teachers. Each one of these behaviours was linked to a survey question. For 'the teacher is funny' we had counted the number of times learners laughed; for 'moves around' the number of times the teacher moved from one spot to another; for 'gestures' the time spent gesturing and proportion of time spent gesturing. Talley and Temple (2015) report that positive hand and arm positions are positively correlated to immediacy, while negative ones are not. They described positive hand and arm position as having the hands in front of the body fingers together, either clasped or in a steepling position and palms up or outwards. While negative positions are hands in pockets, arms crossed or behind the back. It would seem that the lack of hand/arm movements is overall negative, therefore we noted whether there was hand/arm movement or not. As many of the gestures included long holds (the gesture froze mid-air), we measured the overall time spent gesturing (rather than the more common measurement of frequency of gestures). This was calculated as a percentage of the total time the teacher was speaking.

Teachers' smiles and eye contact with students, were not included in the final analysis as in many instances the quality of the recording did not allow us to confirm these behaviours. Similarly, praise and instances where teachers' used students' names were also not analysed as they were only observed in two teachers.

The speech from the recordings of each session was transcribed by student helpers, using *Praat,* a voice transcription software, and checked by two research assistants and the author. The transcriptions were then imported into *ELAN* a free software for multimedia analysis, where instances of the teacher moving and hand gesturing, were annotated by the research assistants and the author (checked by each other obtaining intercoder reliability of 95% of the data after discussion).

Teachers' speech was divided according to its content: relating to the subject matter; exercises learners had to complete in-class (including time spent explaining these and time debriefing); teachers' self-disclosures: personal asides and personal examples (e.g. "when I was an English teacher in Japan"); and student related asides (e.g. referring to work that would need to be submitted in the future) or examples (e.g. "when do you code-switch?"). This was done by viewing the recordings and manually categorizing chunks of speech. All findings were normalised as a percentage of the total length of each lecture.

Next, the responses to the surveys were consolidated and analysed by section: class evaluation, teacher evaluation and perception of teacher behaviour. A number of analyses were carried out to test:

1. The correlation between class/topic evaluation and teacher evaluation scores. This was done to confirm results from existing studies correlating the two.
2. The correlation between learners' perceptions of specific behaviours, based on their survey answers, and the overall evaluation of the class and the teacher. This addressed our first objective.
3. The correlation between learners' perceptions of teacher's gesture, use of humour, positive language and movement and the actual observed behaviour for each of the eight teachers. This addressed our second objective.
4. The correlation between class evaluation and teacher evaluation scores and the actual time spent on exercises, self-disclosure, content and student related issues. This was calculated to confirm existing results indicating that the objective of teachers' speech (in particular self-disclosure) affects learners' evaluation of the teacher.

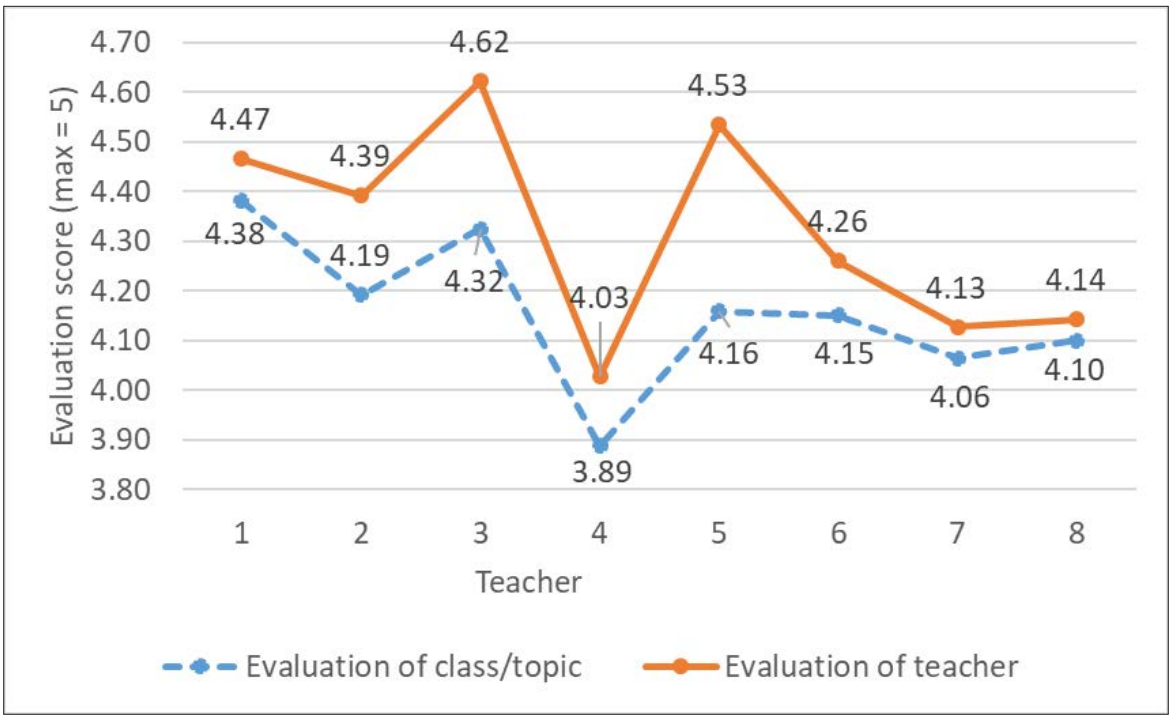
We combined the answers from all the participants. As the data was not normally distributed, there were very few cases of scores of 1 or 2 in the evaluations, the correlations were investigated using Spearman's coefficient, a moderate Spearman's rho was considered to be between 0.3 and 0.7. All correlations were run at a significance level of 95%.

4. Results

4.1. Learners' evaluations of class/content and teacher

The four correlations we investigated are detailed below with figures and with an explanation of the results of each analysis. The first analysis investigated the correlation between learners' evaluation of the class/topic and of the teacher. Figure 1 shows the average learners' evaluation of each class/topic (in blue, dashed line) and of the teacher (in orange, full line). Overall, the evaluation of the class was always lower than the evaluation of the teacher (the maximum score was 5, shown in the y-axis), showing that the teacher's knowledge and competence to deliver the content was rated higher than the content presented. This supports current research on the emotional impact of the teacher in the overall learning process (Dewaele et al., 2022). Although we did not test (and are not confirming) causality, it would seem that how the teacher is perceived might be dictating the evaluation of the class/topic.

Figure 1. Learners' evaluations of the topic and the class and the teachers' performance



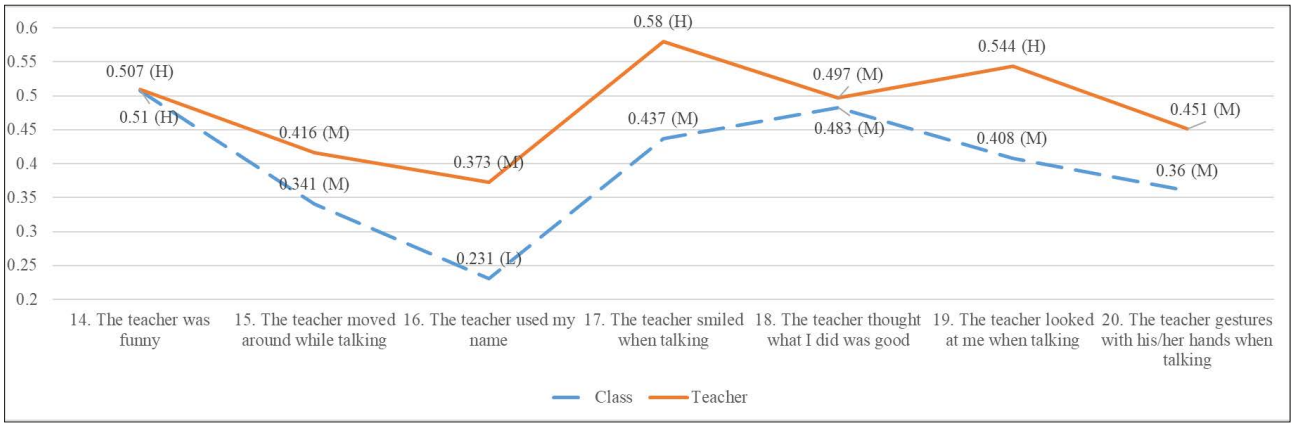
A Spearman's correlation coefficient confirmed a strong positive correlation between the two: *Spearman's rho* = 0.708, *p* = <0.001 Confidence intervals (*CI*) = [0.765, 0.641]. This confirms the findings of previous studies that correlate perceived teacher's caring and competence with better students' performance, also associated with a higher interest and better understanding of the topic (McCrosky et al., 2004; Myers & Bryant, 2004; Pogue & Ayhun, 2006). Perceived teacher's credibility is a mix of perceived competence, trustworthiness and caring and somewhat correlated to improved learners' performance and students' learning (Finn et al., 2009).

4.2. Correlating learners' perceptions of teachers' behaviours and evaluations

In the second analysis we ran two sets of correlations between learners' perceptions of teachers' behaviours (the teacher used my name, smiled, looked at me, was funny, moved, gestured, praised me) and (1) class/topic evaluations and (2) teacher evaluations. Figure 2 shows the Spearman's *rho* for the significantly correlated class/topic evaluations (in blue, dashed line) and teacher evaluations (in orange, full line), *p* values <0.001, vs. the perceived behaviour for each teacher. The graph gives the correlation coefficients, Spearman's *rho* as the Fishers' *z* effect size in brackets (see Appendix 2).

Every behaviour is positively correlated with the evaluation score of the class and the teacher, although the correlations between the perceived teachers' behaviours and the evaluation of the teacher are stronger than with the class/topic evaluations.

Figure 2. Spearman's correlation coefficients between perceived teacher behaviour and class/topic evaluations and teacher evaluations



Note: The y-axis refers to the Spearman's correlation coefficient rho. A medium correlation is between 0.3 and 0.7 (American Psychological Association, 2010). The letter in brackets refers to the Fisher's effect size z, H = high; M = moderate and L = low. A medium effect is between 0.3 and 0.5 (Lipsey & Wilson, 2001).

The highest correlations with the strongest effects were found between the evaluation of the teachers and with the teacher perceived as 'being funny', 'smiling' and 'looking at me'. Humour and smiling are immediacy behaviours that can help develop liking (Mehrabian, 1971). Teachers use of humour has been linked to enhanced students' learning and a decrease of learner's anxiety overall (Aylor & Oppliger, 2003; Gorham & Christophel, 1990). Humour varies by culture and Chinese are thought to use it in a more constrained manner than other cultures (Nevo et al., 2001). In the Chinese classroom, teacher's humour has been found to be positively correlated with a classroom communication apprehension (Zhang, 2005). Zhang believes this might be related to how humour focuses on the individual which in collectivist societies, like the Chinese, might be a cause of anxiety (Hackman & Barthel-Hackman, 1993). However, in this study, participants reacted positively to the use of humour by the teacher. One possible explanation is that culturally, Hong Kong might be regarded as a more Westernized society than Mainland China (where Zhang's study took place) and this is reflected in a more relaxed interpretation of humour. Smiling and looking at learners on the other hand are behaviours that transmit care. Chinese students value holistic teachers who go beyond the transmission of knowledge (Jin & Cortazzi, 1998), a trait shared by Hong Kong students (Lopez-Ozieblo, 2015); it is likely that smiling was thus interpreted as a positive and valued trait.

The lowest correlation was found with the behaviour 'the teacher uses my name'. Originally, immediacy studies focused on white North American males, these results might not be relevant to the Asian context (Zhang & Oetzel, 2007). In particular those relating to the power distance between the teacher and the students. Chinese culture has a larger power distance than North America (Hofstede, 1991), which means that addressing students by their first names might not be seen as appropriate (teachers involved in the study used students' first names, rather than last names, when addressing them). We speculate that the power distance difference might also explain why praise does not have a large effect. In a large-power distance culture, praise is not expected and might not be processed as positively as in a low-power distance one, where praise is common.

Moving and gesturing, another two common immediacy behaviours in North American classrooms (Andersen, 1979), might not be so relevant in the Hong Kong classroom (Lopez-Ozieblo, 2015). Moving might be a behaviour to close the physical distance between the teacher and the learner but in the Asian classroom this action might increase learners' anxiety as it focuses the attention on one individual. Despite Hong Kong's

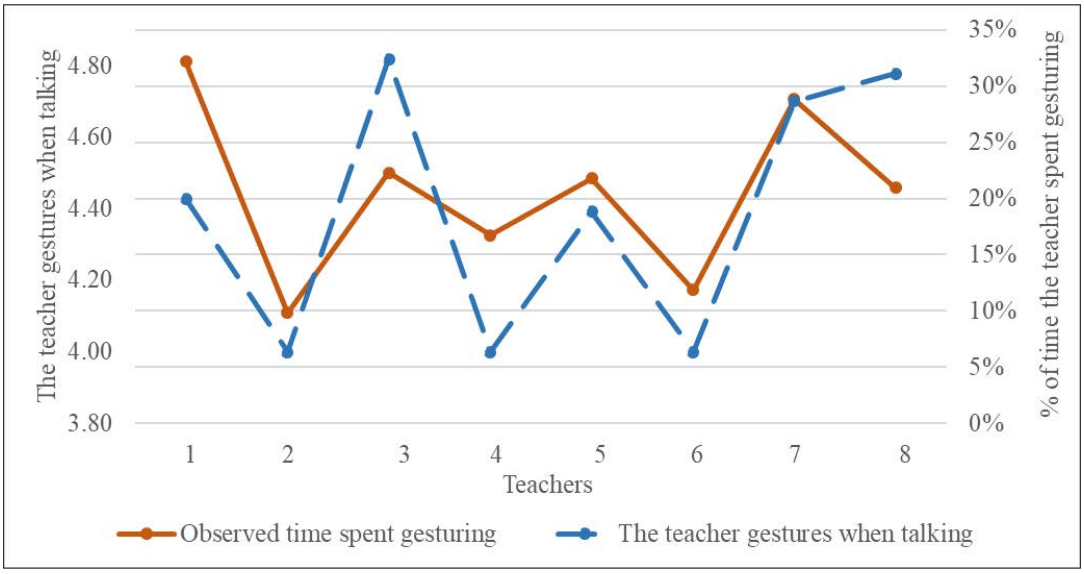
Western culture, it still shares some of the traits of a collectivist society (Hofstede, 1991). Although gestures have been correlated with enhanced learning in a number of studies (Macrine & Fugate, 2022), the value of gestures in the classroom is a topic that requires further research as their benefit varies depending on a number of factors, including learners' personal traits (Lopez-Ozieblo et al., under review).

4.3. Observed and perceived teachers' behaviours

The third analysis compared the actual behaviours of the teachers, based on the video recordings, with those perceived by the learners. As it is quite likely that teachers' behaviours will be different when explaining content rather than when engaging with learners doing exercises, we focused on time spent delivering content to calculate what percentage of time was spent gesturing. As teachers will also be funny and move about the room when talking about themselves and during teacher-learner interactions, for the analysis of these behaviours we focused on the full session (rather than just on the time spent on content).

For the perceptions and behaviours relating to gesturing, Figure 3 shows in blue (dashed) the learners' perception scores when evaluating the statement 'the teacher gestures with his/her hands when talking' (maximum score = 5, left y-axis) and in orange (full line) the observed percentage of time each teacher spent talking about content-related issues and gesturing at the same time (maximum score = 100%, right y-axis).

Figure 3. Time spent gesturing while delivering content and learner's perception of teacher gesturing



As Figure 3 shows learners' perceptions of gestures seem to be close to the actual observations. The Spearman correlation coefficient rho indicated a moderate-high positive correlation between the perceptions and the actual behaviours, however it was not significant: Spearman's *rho* = 0.683 p = 0.062, *CI* [0.937, −0.042], Fisher's *z* = 0.835. The lack of statistical significance means that the results are not conclusive.

We also ran a correlation between the actual percentage of time spent gesturing and the teachers' evaluation scores given by learners and found a positive significant correlation, Spearman's *rho* = 0.81 p = 0.022, *CI* [0.964, 0.244], Fisher's *z* = 1.126. These results indicate a strong positive correlation between gesturing and a positive evaluation by the learners, with a statistically significant result and a high level of confidence. Test 2 had found a moderate-low correlation between gesture perception and the learner's evaluation of the teacher but test 3 suggests that gestures might have a stronger effect in appealing to learners' emotions than they might be aware of.

For the behaviours regarding addressing learners by name, moving around the classroom and being funny, we noted the number of instances the teacher used names, walked around the room (not just a few steps right-left or front –back but using the full length/width of the room) and how many times learners laughed. In most cases there were only a few instances of these behaviours.

As can be seen from Figure 4, learners' perceptions seem to be quite closed to the observed reality in respect to the use of humour for five out of the eight teachers. We found a positive and significant correlation between the actual use of humour and the teachers' evaluation scores given by learners, Spearman's *rho* = 0.846 *p* = 0.008, *CI* [0.971, 0.35], Fisher's *z* = 1.242. Although there was a moderate positive correlation between observed instances of humour and learners' evaluation of the teachers, this was not significant, Spearman's *rho* = 0.589 *p* = 0.124, *CI* [0.914, −0.197], Fisher's *z* = 0.676, making the results inconclusive. This is likely to be related to the size of the sample and the few data points observed.

Figure 4. Perceived and actual use of humour

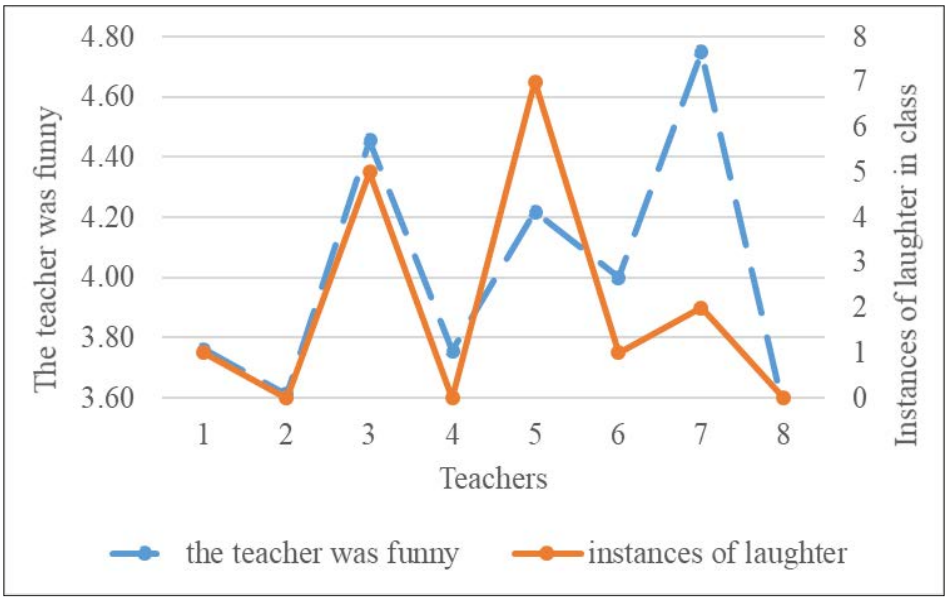
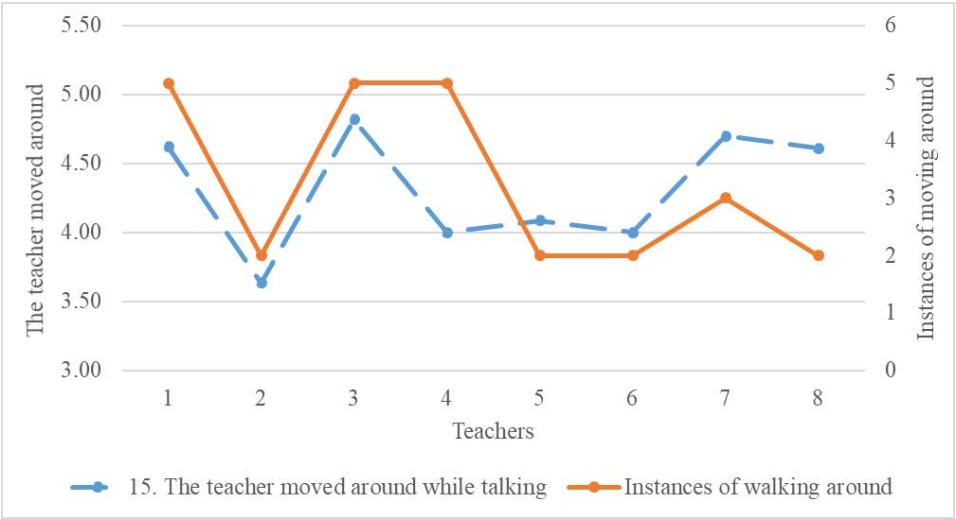


Figure 5. Perceived and actual use of classroom space.



Learners' perceptions also seem to be close to the observed reality in respect to how the teachers use the space (Figure 5). We found a moderate positive correlation, not significant, between the actual use of space and the teachers' evaluation scores given by learners, Spearman's *rho* = 0.518 *p* = 0.188, *CI* [0.896, –0.294], Fisher's *z* = 0.574. There was no significant correlation between observed instances of walking around and teachers' evaluation Spearman's *rho* = 0.391 *p* = 0.338, *CI* [0.859, –0.433], Fisher's *z* = 0.413. These results could be due to a lack of data (there were few instances of the teachers using all the classroom space) but should be investigated further.

4.4. Type of teachers' activity and learners' evaluation

The fourth analysis focused on the breakdown of the class by type of speech and activity: time spent on exercises, on self-disclosure, on content and on the learners (see Table 1). We were not able to find any significant correlations between the time spent on any of these activities and the evaluation of the class/topic or the teacher (see Appendix 3). Teachers spent a relatively low percentage of class time talking about themselves, or giving student related examples or information, perhaps because of this, there is no significant correlation between this type of content and the evaluations of the class or the teacher. Some of the teachers spent most of the class time on exercises while others were mostly delivering content.

For all teachers the proportion of time spent on self-disclosure was very low. This is a behaviour associated with immediacy in North American classrooms but they might not be appropriate in the Chinese classroom as it breaks down the expected power-distance dynamics (Myers et al., 1998; Zhang, 2007), making learners uncomfortable. The correlations of time spent on the learner and the evaluations of the class and teacher were the only ones to have a moderate Spearman's correlation coefficient *rho* = 0.599 and 0.527

respectively, but in neither case was it significant, although the effect size was also high, Fisher's z = 0.691 and 0.586. Perhaps the same factors that mitigate the effect of getting close to learners in the Chinese classroom are at play here, and some students do not feel comfortable being the object of attention.

Table 1. Observed proportion of time spent on different activities

Teacher	Class evaluation	Teacher evaluation	Time on exercises	Time on self-disclosure	Time on content	Time on learner
1	4.38	4.47	79%	2%	14%	8%
2	4.19	4.39	35%	7%	37%	17%
3	4.32	4.62	48%	0%	18%	30%
4	3.89	4.03	65%	0%	17%	1%
5	4.16	4.53	32%	0%	56%	2%
6	4.15	4.26	23%	3%	58%	5%
7	4.06	4.13	4%	4%	56%	9%
8	4.1	4.14	63%	0%	24%	1%

5. Conclusions

This study sought to identify the accuracy of learners' perceptions by comparing them with researchers' observations of actual teachers' behaviours and to test whether there is a correlation between teachers' behaviours and learners' evaluations of the class/topic and the teacher.

In the first instance our results confirm those from other studies that have observed a positive correlation between learners' interest in the topic (based on the questions addressing class/topic evaluation) and perceived teachers' credibility and care for them (based on the questions addressing teachers' evaluations). In this study, learners' evaluations of teachers were always higher that the evaluations of the class/topic. It is likely that there is a causality effect, teachers who are well-regarded lead to high evaluations of the class, however that was not the focus of the study and, although suspected, cannot be confirmed.

The answers to the second question, whether learners' evaluations of the class and the teacher can be correlated to those behaviours the literature identifies as developing immediacy, indicate that classrooms in the Hong Kong context are more similar to those in Mainland China than North American ones. Learners' evaluations of the class/topic and the teacher were positively and significantly correlated with the perceived teachers' verbal and non-verbal immediacy-creating behaviours tested. In the participants tested, the three highest correlations were found with teacher smiling, being funny and looking at the students, behaviours that can be associated with caring and relaxed teachers. Teachers gesturing and moving around the classroom, were noted to also have positive correlations but not as strong. In the case of gestures, further research is called for as their effect on learning has been noted by a number of studies, but also seems to be affected by a number of factors, including personal differences (Lopez-Ozieblo et al., under review).

Overall, our results suggest that learners' perceptions are not that far from the reality of the classroom. When observing time spent gesturing, use of humour and teachers' use of space (moving in the classroom), our results show high and moderate-high positive correlations between the actual behaviours and learners' perceptions (although the correlation on use of space was not significant). The first two actual behaviours were also found to have a positive significant correlation with learners' evaluations of the teacher.

We are well aware that there are a number of limitations to our study, but it certainly highlights the effects of teachers' behaviours in the creation of affect and an emotionally positive context for learners. The main limitation of the study is that there are many variables and these are difficult to separate. We have tried to identify some, such as the content of the teachers' speech, but many others are not addressed, due to the size of the sample. Our sample population was small (with just eight teachers from one specific discipline) with additional factors that might also be variables, such as gender, nationality and experience. Other variables that need to be identified and, if possible, isolated are learners' gender, size of class, postgraduate vs. undergraduate and even issues related to context, such as time of day, location, number of learners, core or elective subjects and content. The behaviours we analysed were the ones we could more readily observe. However, there are others related to immediacy that we were not able to report on, such as smiling.

5.1. Pedagogical implications

Our results corroborate Andersen's (1979) original relationship between perception and observed behaviour, contradicting those of Smythe and Hess (2006). Our results support findings about the emotional impact of the teacher in the learning process (Dewaele et al., 2022), even if learners' awareness of this varies. Learner's perception as to the teachers' use of humour corresponds quite closely to the reality observed, indicating that learners are attuned and aware of this behaviour. However, learners might not be consciously aware of teacher's gestures and movements in the classroom and so they might not value them as highly as they might value humour. As our results indicate that teachers who gesture more when explaining content were rated higher than those who gestured less, teachers might want to think about their pedagogical gestures. Teachers' perception of gestures is usually positive (see Nathan et al., 2019 for a survey of American teachers), believing that gestures can help to attract students' attention and to convey complex ideas more clearly.

In the Hong Kong context, learners' perceptions of gestures are often shaped by popular ideas on body language and the extend to which gestures express emotions, rather than content (ongoing study with Hong Kong students). To enhance the benefit of teacher's gestures it might be necessary to first raise students' awareness as to the value of gestures, not as tools to express confidence or hide anxiety but as conveyors of meaning. This awareness raising could be done by asking learners to gesture themselves, copying teachers' gestures or producing their own, which will have the added benefit of enhancing learning and recall (Macedonia, 2019).

Our study indicates that students' evaluation of the course and content under study is partly determined by the behaviour of the teacher. These observations are not new, but teacher training is still mostly focused on methods and strategies to convey content with less attention paid to behavioural and emotional factors. We believe that students' classroom anxiety and enjoyment is affected by teacher's behaviours and emotional state, a point that every teacher should be aware of. In the language classroom, teachers need to be aware that their behaviour can help to produce an affective context which might enhance learning and the overall evaluation of the subject. We call for further research in this area as students' emotional state, prior knowledge and extraneous factors are likely to be affecting their perceptions. Learners are more likely to note unusual behaviours, rather than recurrent ones, the former being more likely to heighten emotions in students. Future studies might want to test this and also analyse each behaviour independently and identify whether specific ones hold greater affective weight with students.

Acknowledgements

Thank you to all the teachers and students involved in this project.

This project was founded by the Department of English and Communication of the Hong Kong Polytechnic University, DLTC funding.

References

Abelson, Robert P. (1985). A variance explanation paradox: When a little is a lot. *Psychological Bulletin, 97*(1), 129. https://doi.org/10.1037/0033-2909.97.1.129

Allen, Mike, Witt, Paula L., & Wheeless, Lawrence R. (2006). The role of teacher immediacy as a motivational factor in student learning: Using meta-analysis to test a causal model. *Communication Education, 55*(1), 21-31. https://doi.org/10.1080/03634520500343368

American Psychological Association (2010). Publication manual of the American Psychological Association (6th ed.). https://doi.org/10.1037/0000165-000

Andersen, Janis F. (1979). The relationship between teacher immediacy and teaching effectiveness (Doctoral dissertation). West Virginia University.

Aylor, Brooks, & Oppliger, Patrice (2003). Out-of-class communication and student perceptions of instructor humor orientation and socio-communicative style. *Communication Education, 52*, 122-134. https://doi.org/10.1080/03634520302469

Ballester, Elizabeth Pladevall (2015). Verbal and nonverbal teacher immediacy and foreign language anxiety in an EFL university course. Porta Linguarum 23, 9–24.

Barcelos, Ana María F. (2020). "Revolutionary love and peace in the construction of an English teacher's professional identity. In Oxford, Rebecca, Olivero, Matilde Harrison, Melinda and Gregersen Tammy (Eds.) Peacebuilding in Language Education (96-109). Bristol: Multilingual Matters. https://doi.org/10.21832/9781788929806-011

Chesebro, Joseph L., & McCroskey, James C. (2001). The relationship of teacher clarity and immediacy with student state receiver apprehension, affect, and cognitive learning. *Communication Education, 50*(1), 59-68. https://doi.org/10.1080/03634520109379232

Christensen, Laura J., & Menzel, Kent E. (1998). The linear relationship between student reports of teacher immediacy behaviors and perceptions of state motivation, and of cognitive, affective, and behavioral learning. *Communication Education, 47*, 327-340. https://doi.org/10.1080/03634529809379112

Christophel, Diane M. (1990). The relationships among teacher immediacy behaviors, student motivation, and learning. *Communication Education, 39*, 323-340. https://doi.org/10.1080/03634529009378813

Coleman, James A. (2008). Residence abroad within language study. *Language Teaching, 30*(1), 1-20. https://doi.org/10.1017/s0261444800012659

Dewaele, Jean-Marc, Saito, Kazuya, & Halimi, Florentina (2022). How teacher behaviour shapes foreign language learners' enjoyment, anxiety and attitudes/motivation: A mixed modelling longitudinal investigation. *Language Teaching Research.* https://doi.org/10.1177/13621688221089601

Dörnyei, Zoltán, & Ushioda, Ema (2021). *Teaching and researching motivation*. Routledge.

Estepp, Christopher M., & Roberts, T. Grady (2015). Teacher immediacy and professor/student rapport as predictors of motivation and engagement. *Nacta Journal, 59*(2), 155-163.

Finn, Amber N., Schrodt, Paul, Witt, Paul L., Elledge, Nikki, Jernberg, Kodiane A., & Larson, Lara M. (2009). A meta-analytical review of teacher credibility and its associations with teacher behaviors and student outcomes. *Communication education, 58*(4), 516-537. https://doi.org/10.1080/03634520903131154

Frymier, Ann B. (1994). A model of immediacy in the classroom. *Communication Quarterly, 42*(2), 133-144. https://doi.org/10.1080/01463379409369922

Gorham, Joan (1988). The relationship between verbal teacher immediacy behaviors and student learning. *Communication education, 37*(1), 40-53. https://doi.org/10.1080/03634528809378702

Gorham, Joan, & Christophel, David M. (1990). The relationship of teachers' use of humor in the classroom to immediacy and student learning. *Communication Education, 39*, 46-62. https://doi.org/10.1080/03634529009378786

Guo, Hongyu, Gao, Wurong, & Shen, Yumin (2022). L2 enjoyment of English as a foreign language students: Does teacher verbal and non-verbal immediacy matter? Frontiers in Psychology, 13, 897698. https://doi.org/10.3389/fpsyg.2022.897698

Hackman, Michael Z., & Barthel-Hackman, Tammy A. (1993). Communication apprehension, willingness to communicate, and sense of humor: United States and New Zealand perspectives. *Communication quarterly, 41*(3), 282-291. https://doi.org/10.1080/01463379309369889

Harp, Shannon F., & Mayer, Richard E. (1998). How seductive details do their damage: A theory of cognitive interest in science learning. *Journal of educational psychology, 90*(3), 414. https://doi.org/10.1037/0022-0663.90.3.414

Hess, Jon D., Smythe, Mary Jane (2001). Is teacher immediacy actually related to student cognitive learning? *Communication Studies, 52*, 197-219. https://doi.org/10.1080/10510970109388554

Hofstede, Geert (1991). *Cultures and organization: Software of the mind*. London: McGraw-Hill.

Horwitz, Elaine K., Horwitz, Michael B., & Cope, Joanne (1986). Foreign language classroom anxiety. *The Modern Language Journal, 70*(2), 125-132. https://doi.org/10.1111/j.1540-4781.1986.tb05256.x

Johnson, Sherwyn P., & Miller, Ann N. (2002). A cross-cultural study of immediacy, credibility and learning in the U.S. and Kenya. *Communication Education, 51*, 280-292. http://dx.doi.org/10.1080/03634520216514

Jiang, Yan, & Dewaele, Jean-Marc (2019). How unique is the foreign language classroom enjoyment and anxiety of Chinese EFL learners? *System(82)*, 13-25. https://doi.org/10.1016/j.system.2019.02.017

Jin, Lixian, & Cortazzi, Martin (1998). Dimensions of dialogue: Large classes in China. *International Journal of Educational Research, 29*, 739-761. http://dx.doi.org/10.1016/S0883-0355(98)00061-5

Kerssen-Griep, Jantine, Hess, Jacqueline A., & Trees, April R. (2003). Sustaining the desire to learn: Dimensions of perceived instructional facework related to student involvement and motivation to learn. *Western Journal of Communication (includes Communication Reports), 67*(4), 357-381. https://doi.org/10.1080/10570310309374779

Komarraju, Meera, Musulkin, Sergey, & Bhattacharya, Gargi (2010). Role of student–faculty interactions in developing college students' academic self-concept, motivation, and achievement. *Journal of college student development, 51*(3), 332-342. https://doi.org/10.1353/csd.0.0137

Krashen, Stephen D. (1982). *Principles and Practice in Second Language Acquisition*. Oxford: Pergamon Press.

Li, Cuiying (2021). A control–value theory approach to boredom in English classes among university students in China. *The Modern Language Journal, 105*(1), 317-334. https://doi.org/10.1111/modl.12693

Lipsey, Mark W., & Wilson, David B. (2001). *Practical meta-analysis*. Sage Publications, Inc.

Lopez-Ozieblo, Renia, Nogueroles López, Marta F., & Alhmoud, Zeina (under review). Aprendizaje en línea del español: ¿ayudan los gestos a procesar conceptos lingüísticos complejos? In José Miguel Blanco Pena, Pablo Deza Blanco & Antonio Riutort Canovas (Eds). *Advances in Spanish Language Teaching*. Routledge.

Lopez-Ozieblo, Renia (2023). The Meaning of Teachers' Negations in Hong Kong Classrooms Interpreted from their Co-occurring Gestures. In: Roitman, M. (Ed.) *Negatives and Meaning: Social Setting and Pragmatic Effects: Using Negatives in Political Discourse, Social Media and Oral Interaction* (203–238). Stockholm: Stockholm University Press. DOI: https://doi.org/10.16993/bcd.h. License: CC BY 4.0.

Lopez-Ozieblo, Renia (2018). Disagreeing without a 'no': how teachers indicate disagreement in a Hong Kong classroom. *Journal of Pragmatics, 137*, 1–18. https://doi.org/10.1016/j.pragma.2018.08.016.

Lopez-Ozieblo, Renia (2015). Cultural aspects of immediacy in an Asian classroom. *Estudios de Lingüística Inglesa Aplicada (ELIA)*, 15, 13-34.

Macedonia, Manuela (2019). Embodied learning: Why at school the mind needs the body. *Frontiers in psychology*, 10, 2098. https://doi.org/10.3389/fpsyg.2019.02098

Macintyre, Peter D. (1999). Language anxiety: A review of the research for language teachers. In Young, Dolly J. (Ed.) *Affect in foreign language and second language learning: A practical guide to creating a low-anxiety classroom atmosphere* (24-45). Boston: McGraw-Hill

Macrine, Sheila L., & Fugate, Jennifer M. (Eds.). (2022). *Movement matters: How embodied cognition informs teaching and learning*. MA., USA: MIT Press.

McCroskey, James C., Valencic, Keri M., & Richmond, Virginia P. (2004). Toward a general model of instructional communication. *Communication quarterly, 52*(3), 197-210. https://doi.org/10.1080/01463370409370192

McDowell, Earl E., McDowell, Cathy E., & Hyerdahl, Jeffrey (1980). A multivariate study of teacher immediacy, teaching effectiveness and student attentiveness at the junior and senior high levels. Paper presented at the annual meeting of the *Speech Communication Association*. New York.

Mehrabian, Albert (1971). *Silent messages*. Belmont, CA: Wadsworth Publishing Company.

Miller, Anna N., Katt, James A., Brown, Tim, & Sivo, Stephen A. (2014). The relationship of instructor self-disclosure, nonverbal immediacy, and credibility to student incivility in the college classroom. *Communication Education, 63*(1), 1-16. https://doi.org/10.1080/03634523.2013.835054

Mottet, Timothy P., & Richmond, Virginia. P. (1998). An inductive analysis of verbal immediacy: Alternative conceptualization of relational verbal approach/avoidance strategies. *Communication Quarterly, 46*(1), 25-40. https://doi.org/10.1080/01463379809370082

Myers, Scott A., & Bryant, Leah E. (2004). College learners' perceptions of how instructors convey credibility. *Qualitative Research Reports in Communication, 5*.

Myers, Scott A., Zhong, Mei, & Guan, Shijie (1998). Instructor immediacy in the Chinese college classroom. *Communication Studies, 49*(3), 240-254. https://doi.org/10.1080/10510979809368534

Nathan, Mitchell. J., Yeo, Amalia, Boncoddo, Rebecca, Hostetter, Autumn B., & Alibali, Marta W. (2019). Teachers' attitudes about gesture for learning and instruction. *Gesture, 18*(1), 31-56. https://doi.org/10.1075/gest.00032.nat

Nevo, Ofra, Nevo, Baruch, & Yin, Janie L. S. (2001). Singaporean humor: A cross-cultural cross-gender comparison. *Journal of General Psychology, 128*, 143-156. https://doi.org/10.1080/00221300109598904

Pogue, Lanette L., & AhYun, Kimo (2006). The effect of teacher nonverbal immediacy and credibility on student motivation and affective learning. *Communication Education, 55*(3), 331-344. https://doi.org/10.1080/03634520600748623

Richmond, Virginia P., Gorham, Joan S., & McCroskey, James C. (1987). The relationship between selected immediacy behaviors and cognitive learning. Annals of the *International Communication Association, 10*(1), 574-590. https://doi.org/10.1080/23808985.1987.11678663

Rodríguez, Jose I., Plax, Timothy G., & Kearney, Patricia (1996). Clarifying the relationship between teacher nonverbal immediacy and student cognitive learning: Affective learning as the central causal mediator. *Communication education, 45*(4), 293-305. https://doi.org/10.1080/03634529609379059

Scott, Michael D., & Wheeless, Lawrence R. (1977). Communication apprehension, student attitudes, and levels of satisfaction. *Western Journal of Communication (includes Communication Reports), 41*(3), 188-198. https://doi.org/10.1080/10570317709389611

Sidelinger, Robert J. (2010). College student involvement: An examination of student characteristics and perceived instructor communication behaviors in the classroom. *Communication Studies, 61*(1), 87-103. https://doi.org/10.1080/10510970903400311

Sidelinger, Robert J., & McCroskey, James C. (1997). Communication correlates of teacher clarity in the college classroom. *Communication Research Reports, 14*(1), 1-10. https://doi.org/10.1080/08824099709388640

Smythe, Mary Jane, & Hess, Jon (2006). Are student self-reports a valid method for measuring teacher nonverbal immediacy? *Communication Studies, 54*(2), 170-179. https://doi.org/10.1080/03634520500213389

Sorrentino, Richard M., & Boutillier, Robert G. (1975). The effect of quantity and quality of verbal interaction on ratings of leadership ability. *Journal of Experimental Social Psychology, 11*(5), 403-411. https://doi.org/10.1016/0022-1031(75)90044-x

Talley, Linda, & Temple, Samuel (2015). How leaders influence followers through the use of nonverbal communication. *Leadership & Organizational Development Journal, 36*, 69-80. https://doi.org/10.1108/lodj-07-2013-0107

Velez, Jonathan J. (2008). Instructor communication behaviors and classroom climate: Exploring relationships with student self-efficacy and task value motivation. (Doctoral dissertation). The Ohio State University, Department of Agricultural Communication, Education and Leadership. https://doi.org/10.5032/jae.2012.02087

Velez, Jonathan J., & Cano, Jamie (2008). The relationship between teacher immediacy and student motivation. *Journal of Agricultural Education, 49*(3), 76-86. https://doi.org/10.5032/jae.2008.03076

Weiner, Bernard, Johnson, Patrick B., & Mehrabian, Albert (1968). Achievement motivation and the recall of incomplete and completed exam questions. *Journal of Educational Psychology, 59*(3), 181-185. https://doi.org/10.1037/h0025789

Wijaya, Rendra Kusuma (2017). Students' perception of teachers nonverbal immediacy behavior toward students' attitude and motivation in learning English. ELT Worldwide 4, 75–91. http://doi.org/10.26858/eltww.v4i1.3198

Witt, Paul L., & Kerssen-Griep, Jeff (2011). Instructional feedback I: The interaction of facework and immediacy on learners' perceptions of instructor credibility. *Communication Education, 60*(1), 75-94. https://doi.org/10.1080/03634523.2010.507820

Xie, Fei, & Derakhshan, Ali (2021). A conceptual review of positive teacher interpersonal communication behaviors in the instructional context. *Frontiers in Psychology* 12: 708490. http://doi.org/10.3389/fpsyg.2021.708490

Zhang, Qing (2005). Immediacy, humor, power distance, and classroom communication apprehension in Chinese college classrooms. *Communication Quarterly, 53*(1), 109-124. https://doi.org/10.1080/01463370500056150

Zhang, Qing (2006). Immediacy and out-of-class communication: A cross-cultural comparison. *International Journal of Intercultural Relations, 30*(1), 33-50. https://doi.org/10.1016/j.ijintrel.2005.06.006

Zhang, Qing, & Oetzel, John (2006). Constructing and validating a teacher immediacy scale: A Chinese perspective. *Communication Education, 55*(2), 218-241. https://doi.org/10.1080/03634520600566231

Appendices

Appendix 1. Learners' survey

Questions (based on Zhang, 2006)

1. I have a positive attitude towards this topic
2. I found this session relevant and informative
3. I found the session entertaining
4. I understood the concepts presented in this session
5. The session stimulated my interest in the topic
6. The teacher gave me sufficient assistance when asked
7. I felt comfortable asking questions in this session
8. The pace is adequate
9. The teacher was prepared for this session
10. The teacher asked me questions that encouraged me to talk
11. The teacher was interested in helping me learn
12. The teacher demonstrates professional skills in the presentation of the topic
13. The teacher exhibited sound knowledge of the topic
14. The teacher was funny
15. The teacher moved around while talking
16. The teacher used my name
17. The teacher smiled when talking
18. The teacher thought what I did was good
19. The teacher looked at me when talking
20. The teacher gestures with his/her hands when talking
21. For me, I think the teacher is like a — (please circle only one)
22. I would like it better if the teacher was like a — (please circle only one)

Appendix 2. Correlation coefficients between learners' perceptions of teachers' behaviours and (1) class/topic evaluations and (2) teacher evaluations

Spearman's Correlations									
Variable		**Class**	**Teacher**	**14. The teacher was funny**	**15. The teacher moved around while talking**	**16. The teacher used my name**	**17. The teacher smiled when talking**	**18. The teacher thought what I did was good**	**19. The teacher looked at me when talking**
2. Teacher	Spearman's rho	0.711	—						
	p-value	< .001	—						
	Upper 95% CI	1	—						
	Lower 95% CI	0.655	—						
	Effect size (Fisher's z)	0.889	—						
	SE Effect size	0.068	—						
3. 14. The teacher was funny	Spearman's rho	0.507	0.51	—					
	p-value	< .001	< .001	—					
	Upper 95% CI	1	1	—					
	Lower 95% CI	0.425	0.429	—					
	Effect size (Fisher's z)	0.558	0.563	—					
	SE Effect size	0.066	0.066	—					
4. 15. The teacher moved around while talking	Spearman's rho	0.341	0.416	0.361	—				
	p-value	< .001	< .001	< .001	—				
	Upper 95% CI	1	1	1	—				
	Lower 95% CI	0.246	0.326	0.268	—				
	Effect size (Fisher's z)	0.356	0.442	0.379	—				
	SE Effect size	0.065	0.065	0.065	—				
5. 16. The teacher used my name	Spearman's rho	0.231	0.373	0.303	0.504	—			
	p-value	< .001	< .001	< .001	< .001	—			
	Upper 95% CI	1	1	1	1	—			
	Lower 95% CI	0.13	0.28	0.205	0.422	—			

Spearman's Correlations									
Variable		**Class**	**Teacher**	**14. The teacher was funny**	**15. The teacher moved around while talking**	**16. The teacher used my name**	**17. The teacher smiled when talking**	**18. The teacher thought what I did was good**	**19. The teacher looked at me when talking**
	Effect size (Fisher's z)	0.235	0.392	0.313	0.554	—			
	SE Effect size	0.064	0.065	0.065	0.066	—			
6. 17. The teacher smiled when talking	Spearman's rho	0.437	0.58	0.449	0.479	0.43	—		
	p-value	< .001	< .001	< .001	< .001	< .001	—		
	Upper 95% CI	1	1	1	1	1	—		
	Lower 95% CI	0.348	0.506	0.362	0.395	0.341	—		
	Effect size (Fisher's z)	0.468	0.662	0.483	0.521	0.459	—		
	SE Effect size	0.066	0.067	0.066	0.066	0.066	—		
7. 18. The teacher thought what I did was good	Spearman's rho	0.483	0.497	0.406	0.336	0.498	0.498	—	
	p-value	< .001	< .001	< .001	< .001	< .001	< .001	—	
	Upper 95% CI	1	1	1	1	1	1	—	
	Lower 95% CI	0.399	0.414	0.316	0.24	0.415	0.415	—	
	Effect size (Fisher's z)	0.527	0.545	0.431	0.35	0.546	0.547	—	
	SE Effect size	0.066	0.066	0.066	0.065	0.066	0.066	—	
8. 19. The teacher looked at me when talking	Spearman's rho	0.408	0.544	0.448	0.472	0.428	0.557	0.472	—
	p-value	< .001	< .001	< .001	< .001	< .001	< .001	< .001	—
	Upper 95% CI	1	1	1	1	1	1	1	—
	Lower 95% CI	0.317	0.467	0.361	0.387	0.339	0.481	0.387	—
	Effect size (Fisher's z)	0.433	0.61	0.482	0.513	0.458	0.628	0.513	—
	SE Effect size	0.065	0.066	0.066	0.066	0.066	0.066	0.066	—
9. 20. The teacher gestures with his/her hands when talking	Spearman's rho	0.36	0.451	0.318	0.506	0.423	0.521	0.375	0.488
	p-value	< .001	< .001	< .001	< .001	< .001	< .001	< .001	< .001
	Upper 95% CI	1	1	1	1	1	1	1	1
	Lower 95% CI	0.266	0.364	0.221	0.424	0.333	0.441	0.281	0.405

Spearman's Correlations									
Variable		**Class**	**Teacher**	**14. The teacher was funny**	**15. The teacher moved around while talking**	**16. The teacher used my name**	**17. The teacher smiled when talking**	**18. The teacher thought what I did was good**	**19. The teacher looked at me when talking**
	Effect size (Fisher's z)	0.377	0.486	0.329	0.557	0.451	0.578	0.394	0.534
	SE Effect size	0.065	0.066	0.065	0.066	0.066	0.066	0.065	0.066

Note. All tests one-tailed, for positive correlation.

Appendix 3. Correlations between learners' evaluation of class/topic and teacher and the percentage of time teachers spent on different objectives

Spearman's Correlations						
Variable		**Class evaluation**	**Teacher evaluation**	**Time on exercises**	**Time on self-disclosure**	**Time on content**
1.Time on exercises	Spearman's rho	0.262	0.048	—		
	p-value	0.536	0.935	—		
	Effect size (Fisher's z)	0.268	0.048	—		
	SE Effect size	0.414	0.409	—		
2. Time on self-disclosure	Spearman's rho	0.101	-0.165	-0.469	—	
	p-value	0.811	0.696	0.241	—	
	Effect size (Fisher's z)	0.102	-0.166	-0.509	—	
	SE Effect size	0.411	0.412	0.42	—	
3. Time on content	Spearman's rho	-0.275	-0.06	-0.934	0.389	—
	p-value	0.509	0.888	< .001	0.341	—
	Effect size (Fisher's z)	-0.283	-0.06	-1.69	0.411	—
	SE Effect size	0.415	0.41	0.445	0.418	—
4. Time on learner	Spearman's rho	0.599	0.527	-0.275	0.51	0.036
	p-value	0.117	0.18	0.509	0.196	0.932
	Effect size (Fisher's z)	0.691	0.586	-0.283	0.563	0.036
	SE Effect size	0.424	0.421	0.415	0.421	0.409