

Teaching Practices and Teacher Perceptions in Online World Language Courses

CHIN-HSI LIN

Michigan State University, United States
chinhsi@msu.edu

BINBIN ZHENG

Michigan State University, United States
binbinz@msu.edu

Online teaching and learning have become widespread with the emergence of the Internet and other new technologies. However, online environments pose new challenges to those seeking to develop or choose suitable teaching approaches, and this is especially true in the case of language courses. Using survey and interview data, this study examines online language teachers' teaching practices, their adjustments toward online teaching, and the professional development (PD) that they received and expected to receive in a virtual high school in the United States. The findings suggest that online teachers generally used more non-content-related teaching practices than content-related teaching practices in online language courses; and that instructors in Chinese – the only language course that offered weekly synchronous sessions – exhibited more frequent use of content-related teaching practices than teachers of other world languages. The study also sheds light on teachers' adjustment to the online environment, which impacts their management, social, and pedagogical roles. Lastly, our analysis of the PD that teachers felt they needed, as against what they actually received, underscores the need for more PD in the areas of online-course design and content-related technology integration. The results of this study could be useful to online language teachers and researchers, and point the way to improvements in teacher education vis-à-vis online language teaching.

INTRODUCTION

The number of K-12 students taking online courses has surged rapidly over the last decade (Cavanaugh & Blomeyer, 2007). In 2006, Michigan became the first state to mandate that every student should complete an online learning experience before they graduate from high school (DiPietro, Ferdig, Black, & Preston, 2008). An estimated 1.82 million students were enrolled in distance-education courses in U.S. K-12 school districts in 2009-2010, and 74% of these enrollments were among high-school students (Queen & Lewis, 2011). As more states begin to operate virtual schools, enrollment numbers are expected to rise further in the next few years (Watson, Pape, Murin, Gemin, & Vashaw, 2014).

The Internet has enabled the delivery of instruction at lower cost than in face-to-face settings, thus providing more opportunities for learners to take courses (Murday, Ushida, & Chenoweth, 2008). Teacher quality is one of the most important contributors to student learning in the traditional classroom (Darling-Hammond, 2000), and with the growing popularity of online learning, the quality of online teaching has become a primary concern for educators, administrators, students, and parents. Increasingly, teachers need to be able to design virtual course materials and engage students using communicative technologies (Davis & Roblyer, 2005; Kennedy & Archambault, 2012). Since interaction and communication are at the heart of language learning (Hampel & Stickler, 2005), these new teaching skills are especially crucial for online language teachers (Compton, 2009). However, little research has examined online language teachers' teaching practices, and less still has focused on how best to prepare teachers for online language teaching in K-12 environments. The current research intends to fill these gaps through a systematic and detailed examination of online language teachers' teaching practices and the teacher-level factors that affect them. Specifically, the four research questions addressed in this study are:

1. What teaching practices did language instructors use in online courses?
2. What were the effects of teacher factors – namely, teachers' self-efficacy and individual characteristics – on teaching practices in online language-teaching environments?
3. How did language teachers adjust their pre-existing teaching practices for use in online language courses?
4. What kinds of professional development had teachers received, and how did these differ from what they expected to receive?

ONLINE TEACHING PRACTICES

Anderson, Liam, Garrison, and Archer (2001) examined the multifaceted functioning of teachers in online courses and proposed three categories of *teaching presence*, including *instructional design and organization*, *facilitating discourse*, and *direct instruction*. These three categories in essence reflect teachers' content-related practices and the different roles they play in online courses. The present study adopts Anderson et al.'s conceptualization of teaching presence as a framework for reviewing the relevant literature.

Instructional Design and Organization

This first category focuses on the process of designing and planning curriculum materials for online courses. Teachers play an organizational or managerial role as they set curricula, design teaching approaches, and utilize media for communication and teaching. DePietro (2010) examined the teaching practices of 16 highly qualified online instructors in a virtual school and reported that they designed various methods of engaging students with content, incorporating a range of technologies including discussion boards, online videos, and collaborative tools. The teachers also made content accessible to learners who had various learning styles and needs, and structured it to ensure its organizational coherence. Most of the participants felt that their instructional design helped to improve student learning and interaction.

Similarly, a meta-analysis by Means, Toyama, Murphy, Bakia, and Jones (2010) documented how instructional design may affect learning outcomes. The results showed that classes in which students learned independently yielded smaller effect sizes than those featuring collaborative instruction and instructor-directed teaching. Means et al.'s narrative synthesis suggested that the provision of video or online quizzes did not appear to affect learning outcomes, but that students who could manipulate their interactions with media (e.g., through simulation) normally experienced positive learning outcomes. In addition, the use of tools that prompted students to reflect on their learning was beneficial in online settings. Interestingly, scaffolding for group learning only affected the way students interacted, and not the amount they learned.

Facilitating Discourse

The second category of teaching presence covers the online teacher's role as a facilitator: supporting interaction among the students, the course content, and him- or herself. Teachers play a social role in maintaining students' interest and engagement in active learning activities. In a study by

Young (2006), the three practices or qualities that online students said they needed most from their teachers were (1) encouraging motivation, (2) facilitating the course effectively, and (3) communicating effectively. Similarly, Conrad (2004) highlighted the importance, from teachers' perspectives, of building a sense of community in online courses. DiPietro (2008) reported that successful online instructors developed the skills necessary for facilitating interaction and communication in online environments.

Facilitating discourse is especially important in online language courses, as linguistic interaction is the foremost key area of online language-learning pedagogy (Kern, Ware, & Warschauer, 2004). On the one hand, online language learning creates opportunities for communication outside of the brick-and-mortar classroom; on the other, it creates new challenges to pedagogy, due to the lack of contextual factors and non-verbal cues that are inherent in most online communication (Hauck & Stickler, 2006).

DiPietro (2010) demonstrated that, to compensate for the lack of immediate non-verbal cues in online courses, teachers used clear communication including concise writing to express care and concern as well as to demonstrate their interest in building relationships with students. Providing timely feedback has been noted by some scholars as another effective way to facilitate student learning (Ferdig et al., 2009). However, the meta-analysis by Means et al. (2010) found the opposite: that there was no impact on the effectiveness of online learning from feedback provision, synchronous communication with peers, or opportunities to practice.

Direct Instruction

The third and final category of teaching presence describes the intellectual and cognitive role that teachers play during online courses, as leaders and knowledge providers. Conrad's (2004) qualitative study of five higher-education instructors found high levels of concern about content delivery and instruction, especially during the early stages of teaching online courses. This may be related to the fact that pedagogical practices adopted in online learning environments cannot be transferred directly from physical learning environments. Though direct instruction remains a critical component in online learning, DiPietro (2010) has demonstrated how teachers change their positions on direct instruction in virtual classes. One experienced teacher translated his prior teaching practices into online settings by changing his role from "knowledge giver" to "knowledge guide," which facilitated content-related conversation and learning (p. 336).

ADJUSTMENT OF ONLINE TEACHING

Online teaching should not simply simulate face-to-face teaching via the use of technological tools (Compton, Davis, & Mackey, 2009). Cavanaugh, Gillan, Kromrey, Hess, and Blomeyer (2004) drew similar conclusions, and noted that successful practices used in traditional face-to-face teaching do not always translate into successful online teaching practices. Likewise, teaching practices that work well for adult learners may not necessarily be helpful to K-12 students (Cavanaugh et al., 2004), and will require adjustments to teachers' beliefs as well as to their pedagogical roles (DiPietro, 2010).

One area that typically requires major adjustment is time management. Bailey and Card (2009) revealed a perception among college instructors that they spent more time teaching online courses than face-to-face ones, but observations by Hislop and Ellis (2004) revealed that there was no difference. In fact, though online instructors communicated with students more frequently, their time was simply more fragmented than in face-to-face settings, where they mostly communicated with students according to a fixed schedule.

PROFESSIONAL DEVELOPMENT FOR ONLINE TEACHING

Given the growing popularity of online learning, it is worth asking how instructors develop the online courses that benefit students the most. To better prepare for online teaching, instructors usually attend faculty-led workshops or professional development (PD) offered by their school or organization (Conrad, 2004; Dawley, Rice, & Hinek, 2010). In a national survey in 2009, 74% of K-12 online instructors reported that PD was required by their school or program (Dawley et al., 2010). Less than 40% of all K-12 online teachers received PD prior to teaching online, according to a 2007 national survey (Rice & Dawley, 2009), but this rate more than doubled, to 87%, over the following two years (Dawley et al., 2010). The proportion of brand-new online teachers who received PD also increased from less than 40% in 2007 to 75% in 2009 (Dawley et al., 2010).

Regarding the foci of PD, Morris (2002) highlighted that online instructors should have technology skills, content knowledge, communicative and organizational skills, and enthusiasm for online teaching. Such a categorization reflects the multifaceted function of teachers in online courses, as detailed by Anderson et al. (2001) and above. Dawley et al.'s (2010) five PD topics overlapped with Morris' only partly, and included foundational knowledge of online teaching, technology tools, facilitation strategies, online course design, and digital etiquette. The majority of Dawley et al.'s

respondents mentioned that they had received training in all of these areas except online course design. Less than two-thirds of the respondents in the same study had received any training in online lesson design, possibly because of the sample's low levels of involvement in course design. The majority of respondents (58%) reported that they designed few or none of the activities in their online courses, and only 22% developed at least half of their online content. Even so, 43% expressed a desire for training in instructional design for online courses.

In summary, examination of online pedagogy is essential to any assessment of the quality of online teaching, and evaluating teachers' perceptions towards online teaching – especially their transition from face-to-face to online teaching – could be beneficial to our understanding of their teaching practices. In this study, we will first examine online language teachers' teaching practices and what factors affect them. We will also look into how these teachers adjust their pedagogy during or as a result of the transition from face-to-face teaching and/or the PD they receive.

METHODS

Context

This study was conducted in a virtual school in the Midwestern United States. Its students were concurrently enrolled in a local school but took individual courses in the virtual school to fulfill graduation requirements, as electives, or for credit recovery. All courses except Chinese were asynchronous and self-adaptive, so students could progress at their own pace. The Chinese language course, on the other hand, had daily assignments and one 50-minute synchronous session per week. The synchronous sessions were conducted using audio conferencing, so although the teachers and students could not see each other, the students could see slides prepared by the instructors.

Sources of Data

Teacher Survey. Our teacher survey was administered at the end of the Spring 2014 semester. It contained 70 questions and took approximately 15 to 20 minutes to complete. We invited all the school's foreign-language teachers ($n=33$) to complete the survey during the Spring 2014 semester, and 19 responded. The languages taught by the survey participants were Chinese ($N=7$), Spanish ($N=7$), French ($N=3$), German ($N=1$), and Japanese ($N=1$).

Teacher Interviews. A structured teacher interview protocol was developed to examine teachers' attitudes towards online language teaching; their communication and interaction in online environments; and their experience of transitioning from face-to-face teaching to online teaching. All 19 teachers were invited to participate in individual 40- to 60-minute interviews, and eight of them agreed to do so. The interviews were audiotaped and transcribed for later analysis.

Measures

To ensure the construct validity of the instrument, a draft instrument was distributed to three faculty members with research expertise in second-language acquisition and online learning. The authors then met with them to discuss revisions to wording as well as item elimination.

Teacher background. The teacher survey collected individual background data including gender, education, number of years of offline and online teaching experience, and language courses taught currently. Descriptive statistics for these participating teachers are presented in Table 1. Most were female, had attained masters' degrees, and had extensive teaching experience.

Table 1
Descriptive Statistics of Online Teachers of Various World Languages

		Chinese (n=7)	French (n=3)	German (n=1)	Japanese (n=1)	Spanish (n=7)	Total (n=19)
Gender	Male	1	1	0	0	2	4
	Female	6	2	1	1	5	15
Education	Bachelor's	1	1	0	0	0	2
	Master's	5	2	1	1	7	16
	Doctorate	1	0	0	0	0	1
Teaching experience (Years)	0-2	1	0	0	0	0	1
	2-5	2	0	0	0	0	2
	5-10	1	1	0	0	5	7
	Over 10	2	2	1	1	2	9
Online teaching experience (Years)	1	3	1	1	0	0	5
	1-2	3	0	0	0	4	7
	3-5	1	1	1	1	1	4
	6-10	0	1	1	1	2	3

In addition to demographic information, the survey asked about the teachers' teaching practices, their general self-efficacy in teaching and technology, and the PD they received and expected to receive. The questions regarding teaching practices and self-efficacy were answered on a five-point Likert scale, ranging from 1 (strongly disagree) to 5 (strongly agree).

Teaching practices. Based on the detailed descriptions in DiPietro (2010), we created three to six survey items relating to each of the following nine teaching practices: communicating effectively, guiding students' knowledge, promoting individual learning, engaging students with content, ensuring content accessibility, maintaining academic integrity, keeping the course a safe place, meeting students' needs, and scaffolding (Black, DiPietro, Ferdig, & Polling, 2009). A sample survey question for the "communicating effectively" category is, *I communicate with my students regularly in order to engage them.*

Instructional self-efficacy. The final six items on the survey cover instructional self-efficacy and were adopted and modified from Bandura's (2006) teacher self-efficacy scale. A sample survey question on this topic is, *I feel confident that I can motivate students who show low interest in language learning.* We removed one item due to poor factor loading, after which the Cronbach's alpha for the section was .69.

Technology self-efficacy. Our six items relating to technology self-efficacy were adopted and modified from Wang, Ertmer, and Newby (2004). The Cronbach's alpha for these items was .92.

Professional development. We included two sets of questions regarding PD: one set for the PD that the respondents had actually received, and the second regarding the PD they felt they needed. The first set, adopted from Black et al. (2009), had a total of eight items, covering content/language specific knowledge, technology-based skills, online classroom management, effective communication with online students, organizing and structuring instructional content, strategies for accommodating different learning styles, finding and evaluating high-quality resources for online classes, and content-/language-based technology integration. The answer scale for both sets of PD items ranged from 1 (none) to 5 (excellent). We also asked teachers to choose and prioritize three areas of PD that they needed additional training in, from among the aforementioned eight areas.

Data Analysis

Both quantitative and qualitative research methods were used in this study. Stata 13 software was used in all phases of the quantitative analysis, and NVivo for the qualitative analysis. To answer our first research question regarding teaching practices in online foreign-language courses, we created a composite score for survey items corresponding to each individual

teaching practice. Descriptive statistics were used to illustrate the teaching practices the respondents used. We then conducted an exploratory factor analysis (EFA) to further examine whether there were any high-order teaching practices that the teachers employed. Though EFA is usually employed with large sample sizes, Winter, Dodou, and Wieringa (2009) contended that “a small sample size should not be the sole criterion for rejecting EFA” (p. 171). They showed that it can produce reliable results when factor loadings are high and the number of factors is low. The results of EFA in this study will be interpreted in light with prior research to ensure the theoretical plausibility of any latent patterns we identify.

To answer our second research question, about factors predicting the use of teaching practices, multiple regression analysis was performed. Based on the results of the EFA mentioned above, we created composite scores for each of our high-order teaching-practice categories, and performed a multiple regression in which these categories were the dependent variables. In Model 1, we entered teachers’ backgrounds, including gender, education level, teaching experience, and the language they taught. In Model 2, we added two types of self-efficacy: instructional and technological.

To answer our third research question, relating to teachers’ adjustment from face-to-face teaching into online teaching, we performed qualitative analysis of the interview data. All eight interview transcripts were coded and analyzed using a bottom-up scheme (Miles & Huberman, 1994) aimed at identifying data trends in the interviewees’ perceptions of how online teaching differs from their previous face-to-face teaching. The lead author color-coded all transcripts, summarized themes that emerged from them, and highlighted arguments supporting these themes. Then, the second author reexamined the transcripts in light of the lead author’s themes, and discussed them with him until the final themes were agreed upon.

Finally, both descriptive statistics and qualitative analysis of interview data were used to answer our fourth research question, pertaining to PD that teachers received and expected to receive. Survey questions on these two topics were analyzed using descriptive analysis, and the results were further triangulated using the interview data.

FINDINGS

Online Language Teaching Practices

Exploratory Factor Analysis (EFA) was performed to evaluate our survey instrument. Given the small sample size, we performed EFA separately for the nine teaching practices. Using eigenvalues greater than one as the criterion (Hayton, Allen, & Scarpello, 2004), each of the practices suggests a one-factor solution. We then removed items with factor loadings below .45.

Next, internal reliability tests were conducted for each teaching-practice category based on the final items retained (Table 2). All teaching-practice items other than in the category of “ensuring content accessibility” were found to have acceptable reliability (Cronbach’s alpha > .6). The entire “ensuring content accessibility” category was then removed from further analysis because of its low internal reliability (Cronbach’s alpha = .53).

Table 2
Internal Reliability for Teaching Practices Items, with Sample Questions

Strategies	Sample question	Initial number of items	Number of items retained	Internal reliability
Communicating effectively (CE)	I communicate with my students regularly in order to engage them.	6	4	.77
Guiding students' knowledge construction (GK)	I help students make connections between content and their lives.	5	3	.71
Promoting individual learning (IL)	I tailor resources and support for individual students.	4	3	.60
Engaging students with content (EN)	I motivate students to interact with the target language.	4	4	.88
Ensuring content accessibility (CA)	I use multiple teaching strategies to introduce and teach the content knowledge.	3	2	.53
Maintaining academic integrity (AI)	I post academic honesty policies.	3	2	.74
Keeping the course a safe place (KS)	I set guidelines for communication and interaction.	5	4	.67
Meeting students' needs (MN)	I provide students with multiple ways to contacting me.	4	4	.77
Scaffolding	I create an organized environment.	4	4	.63

We created a composite score for each teaching practice, and descriptive statistics were used to illustrate the usage of different teaching practices by online language teachers (Table 3). On average, all 19 teachers’ practices were above-neutral, indicating that they used all the teaching practices.

The one found most frequently across all teachers was “maintaining academic integrity” ($M = 4.74$, $SD = .45$), followed by “communicating effectively” ($M = 4.55$, $SD = .45$), and “scaffolding” ($M = 4.51$, $SD = .43$). The two least frequently used teaching practices across all respondents were “meeting students’ needs” ($M = 4.16$, $SD = .61$) and “guiding student knowledge” ($M = 3.96$, $SD = .63$).

Table 3
Descriptive Statistics of Teaching Practices by Language Taught

	Chinese	French	German	Japanese	Spanish	Avg.
Communicating effectively	4.46 (0.64)	4.67 (0.14)	4.75 --	5.00 --	4.50 (0.35)	4.55 (0.45)
Guiding student knowledge	4.38 (0.71)	4.22 (0.39)	4.00 --	4.00 --	3.43 (0.25)	3.96 (0.63)
Promoting individual learning	4.67 (0.19)	4.44 (0.51)	3.67 --	4.67 --	4.00 (0.33)	4.33 (.44)
Engaging students with content	4.75 (0.38)	4.42 (0.14)	3.25 --	5.00 --	3.96 (0.62)	4.34 (0.62)
Maintaining academic integrity	4.57 (0.61)	5.00 (0)	5.00 -	5.00 --	4.71 (0.39)	4.74 (0.45)
Keeping the course a safe place	4.46 (0.39)	4.33 (0.14)	4.25 --	5.00 --	4.39 (0.52)	4.43 (0.41)
Meeting students’ needs	4.57 (0.37)	3.75 (0.43)	4.00 --	4.25 --	3.93 (0.76)	4.16 (0.61)
Scaffolding	4.79 (0.30)	4.58 (0.14)	4.00 --	4.75 --	4.25 (0.48)	4.51 (0.43)
Observations	7	3	1	1	7	19

Mean coefficients; standard deviation in parentheses

* $p < .05$, ** $p < .01$, *** $p < .001$

From the results of the descriptive statistics, it appeared to us that there were two major foci of online teaching practices: content-related and non-content-related. In addition, content-related teaching practices seemed to be used less frequently than non-content-related ones. To test this idea, we conducted an EFA using a cut-off eigenvalue of one with PROMAX rotation, which allowed correlation among teaching strategies to be identified. We adopted a factor-loading criterion of 0.45 for inclusion of the practice in the interpretation. The results suggested the existence of two factors, which accounted for 91.2% of the variance in teaching strategy. These strategies had high extracted communalities (i.e., $> .40$; see Table 4), which showed that much of the common variance in the items can be explained by the two extracted factors (Pett, Lackey, & Sullivan, 2003).

Table 4
Exploratory Factor Analysis of Teaching Practices

Strategy	Factor		Communality
	1	2	
Communicating effectively	-.06	.97	.89
Guiding student knowledge	.55	.21	.43
Promoting individual learning	.71	-.06	.48
Engaging students with content	.84	.01	.70
Maintaining academic integrity	-.07	.92	.80
Keeping the course a safe place	.36	.50	.51
Meeting students needs	.69	.08	.52
Scaffolding	.77	-.25	.51

Note: Factor loadings in bold were items loaded in the factor.

The first factor, with an eigenvalue of 3.38, contains five items: guiding student knowledge, promoting individual learning, engaging students with content, meeting students' needs, and scaffolding. These teaching practices had a high internal reliability, 0.82. We named Factor 1 *content-related teaching practice* (CTP).

The second factor, with an eigenvalue of 1.48, contains three items: communicating effectively, maintaining academic integrity, and keeping the course a safe place. The internal reliability of Factor 2 was .85, and we named it *non-content-related teaching practice* (NCTP).

We created composite scores for CTP ($M = 4.26$, $SD = .10$) and NCTP ($M = 4.58$, $SD = .09$), and used a t-test to examine the differences between them. The results of this t-test showed that online instructors used NCTP significantly more frequently than CTP ($t = 10.37$, $p < .001$).

Factors Affecting Online Language Teaching Practices

Before performing multiple regression, we tested the relationships among variables. The correlation results show that CTP was related to teachers' instructional self-efficacy (Table 5), but not to teaching experience. In addition, the correlation between CTP and NCTP, .40, was not significant. NCTP was negatively correlated with being male and years of education, but positively correlated with years of teaching experience. Being male was negatively correlated with instructional self-efficacy. The correlation between age and years of teaching experience was .80, and the correlation between age and years of online teaching experience was .60. Due to its very high level of correlation with these two variables, age was removed from further analysis.

Table 5
Correlations

	CTP	NCTP	Male	Age	Edu	YT	YOT	EFF	TEFF
CTP	1								
NCTP	.40	1							
Male	-.29	-.48*	1						
Age	-.28	.42	-.27	1					
Edu	-.17	-.57*	.23	-.02	1				
YT	-.04	.49*	-.35	.80***	-.01	1			
YOT	-.20	.22	.14	.62**	-.13	.40	1		
EFF	.54*	.30	-.51*	.15	-.04	.41	.02	1	
TEFF	.32	.24	-.04	.001	-.22	.06	.34	.39	1

* $p < .05$, ** $p < .01$, *** $p < .001$

Note: CTP: content-related teaching practice; NCTP: non-content-related teaching practice; Edu: years of education; YT: years of teaching experience; YOT: years of online teaching experience; EFF: teachers' instructional self-efficacy; TEFF: teachers' technological self-efficacy

Multiple regression analysis then examined what factors affected these two broad categories of teaching practices in online language courses (see Table 6). Teachers of Chinese used more CTP than teachers of other

languages, as shown in Model 1 ($B = .76, p < .001$), and this effect remained significant after the addition of instructional and technology self-efficacy in Model 2 ($B = .63, p < .01$). Other variables did not relate the use of CTP.

Table 6
The Effects of Teacher Factors on Teaching Practices

	CTP		NCTP	
	Model 1	Model 2	Model 1	Model 2
Male	.03 (.15)	.12 (.57)	-.17 (-.86)	-.20 (-.90)
Education	-.13 (-1.92)	-.11 (-1.75)	-.18* (-2.81)	-.17* (-2.48)
Years of teaching	.02 (1.54)	.01 (.97)	.02 (1.89)	.02 (1.80)
Years of online teaching	-.01 (-.17)	-.02 (-.54)	.01 (.25)	-.00 (-.00)
Chinese	.76*** (4.38)	.63** (3.57)	.10 (.62)	.12 (.63)
Instructional self-efficacy		.22 (1.13)		-.10 (-.48)
Technology self-efficacy		.11 (.81)		.08 (.57)
Constant	6.07*** (5.25)	4.59** (3.40)	7.51*** (6.79)	7.41*** (5.08)
Observations	19	19	19	19
R ²	.649	.735	.607	.620

t statistics in parentheses

* $p < .05$, ** $p < .01$, *** $p < .001$

Note: CTP: content-related teaching practice; NCTP: non-content-related teaching practice; coefficients are unstandardized.

The only variable that affected NCTP in Model 1 was years of education ($B = -.17, p < .05$), and this effect remained significantly negative after we added instructional and technology self-efficacy in Model 2.

Adjustment of Teaching Practices

Among the eight teachers who participated in our structured face-to-face interviews, six taught Chinese, one taught French, and one Spanish. Our interview findings are mostly based on the Chinese teachers' responses, since at the school in question, only Chinese courses offered weekly synchronous sessions, making possible a comparison between online and face-to-face teaching. The findings are broken down into five themes: classroom management, course preparation, the flipped classroom, multimodal presentation, and rapid response.

Classroom management. Many of our respondents noted that, in comparison to their face-to-face teaching experience, classroom management tended to be easier in online environments. Minimal time and attention were devoted to discipline and rule-enforcement, keeping students well-behaved, and dealing with unexpected situations; this allowed the teachers to focus more on imparting content knowledge. In addition, a majority of our participants mentioned that online learners usually had higher motivation toward and more interest in learning a foreign language than students in traditional learning environments, which the teachers felt was an important factor contributing to easier classroom management. As one respondent noted, "In online language learning, students usually have higher motivation, clear goals, or relevant backgrounds. Students are more self-initiative so I do not need to worry about discipline, which is the biggest difference between online and face-to-face instruction" (#2).

Course preparation. All the Chinese instructors mentioned that it usually took them more time to prepare lesson plans for online teaching than for traditional teaching, with the online environment requiring a very specific and refined structure. As one Chinese teacher put it, in face-to-face teaching, you do not have to prepare every minute of class time; as long as you have an overall plan in mind, it is not difficult to fill in the class time with activities and conversations. In contrast, synchronous sessions must be designed on a minute-by-minute basis. It was very common for the Chinese teachers in our sample to write scripts containing every single question they planned to ask their students.

Another factor contributing dramatically to the amount of time spent in course preparation was the restriction of teaching modes. Some activities that had been easily conducted in traditional classrooms needed to be redesigned using specific online technologies. One Chinese teacher (#4), for example, reported that in face-to-face settings she paired students, with one giving drawing directions in Chinese, and the other following these directions to create a picture. She still felt that this activity was engaging for

young learners, but that it was neither easy enough to implement in online settings, nor an effective use of time in synchronous sessions. Moreover, such technologies had to be carefully selected for their appropriateness to the teachers' current needs, and this selection process also took considerable time and effort.

The flipped classroom. Based on their experiences of both traditional and online teaching environments, our respondents who had participated in synchronous sessions felt that the pace of these was faster than that of traditional classes. Synchronous-session content was condensed and intensive, and often aimed at activating what students had learned prior to the sessions rather than imparting new information. One teacher further noted, "I can easily teach for four hours in a traditional class with the content I prepare for the fifty-minute online session" (#7). Also, since only one synchronous session was provided each week, both teachers and students wanted to maximize what students could gain from it.

As one teacher mentioned, this mode of teaching is similar to a flipped classroom in the sense that students were required to learn the materials on their own prior to the synchronous sessions, while the purpose of the sessions was to provide opportunities for students to practice and communicate with each other using the target language. In online Chinese courses, students were given two assignments before each synchronous session to "preview" their learning, and another two afterwards to review it. During the synchronous sessions, the teacher's role was as a facilitator: bringing up main points of learning to activate students' language output. They also resolved common problems students had in their learning. In other words, like a flipped classroom, these Chinese courses included a self-learning component; but unlike a flipped classroom, they lacked any face-to-face component, and were conducted through online audio-conferencing.

Multimodal presentation. One major challenge that the Chinese teachers in our sample shared was the restricted number of presentation modes that were available during synchronous sessions. In general, language teachers use a considerable amount of body language to help with their teaching in face-to-face settings; however, neither body language nor eye contact was available in this case. The lack of non-verbal communication meant that teachers needed more time to explain the meanings of words, and found it difficult to correct students' pronunciations, since they could not see their students' mouth shapes. On the positive side, however, such limitations encouraged the instructors to find other ways to transmit knowledge.

Most of the Chinese-language teachers in our sample created multimodal instructional presentations, regularly using PowerPoint to present content and making video recordings of their lectures. One teacher mentioned that slides "should have abundant content and use more multiple media, as you want to draw students' attention" (#2). In addition, the Chinese teachers used multimedia and online tools to enable students' self-study as well as to facilitate the synchronous sessions.

Rapid response. Since teachers were “not right there with the student to see what they are struggling with” (#3), online respondents worried that online students could feel more isolated than in face-to-face classrooms. When students encountered difficulties, they could become frustrated in part due to their lack of a sense of belonging to a learning community. To overcome this frustration and pressure, all the interviewees emphasized the importance of responding immediately to online students’ questions and emails (normally within 24 hours), and grading their assignments as quickly as possible. Some teachers provided multiple ways for students to contact them, including messaging software on the school’s learning-management system, email, and phone, though the majority of students chose to email their instructors. In addition, the Chinese teachers said that they completed their grading within 24 hours, for several reasons: 1) to meet what they perceived as the students’ general need for rapid response; 2) to ensure that students were prepared for the synchronous sessions; and 3) to help refine their own planning for the synchronous sessions, e.g., by designing more targeted questions and activities and helping students internalize the language forms.

Professional Development Received and Expected

Our survey results regarding the PD teachers received and desired indicated that they had received sufficient PD in online teaching, as the average of all types of PD was rated above neutral (Table 7). The top four types of PD that teachers actually received were in effective communication with online students ($M = 4.16$, $SD = .69$), technology-based skills ($M = 4.00$, $SD = 1.05$), structuring instructional materials ($M = 3.95$, $SD = .91$) and language-based technology integration ($M = 3.95$, $SD = .91$). They received the lowest amount of PD in the area of strategies for accommodating different learning styles ($M = 3.32$, $SD = .75$), followed by content knowledge ($M = 3.58$, $SD = 1.12$), and finding high-quality resources ($M = 3.58$, $SD = .77$). According to the teachers’ survey responses, the top three most-needed PD areas were 1) accommodating different learning styles, 2) finding and evaluating high-quality resources for online classes, and 3) language-based technology integration (see Table 8). Up to a point, this was not surprising: the instructors received the least PD in accommodating different learning styles, and this was the type of PD they felt they still needed the most. Similarly, they received the second lowest amount of PD in finding high-quality resources, and identified this as the second most needed PD topic. Interestingly, language-based technology integration was in the top three types of PD they actually received, but they still felt they needed more training in this area. Conversely, PD on content knowledge was lacking, but was not greatly desired among these teachers.

Table 7
Descriptive Statistics of Professional Development and Support Received

	Mean	SD
Professional development category		
Content knowledge	3.58	1.12
Technology-based skills	4.00	1.05
Online classroom management	3.89	0.81
Effective communication	4.16	0.69
Structuring instructional content	3.95	0.91
Accommodating different learning styles	3.32	0.75
Finding high-quality resources	3.58	0.77
Language-based technology integration	3.95	0.91

Table 8
Professional Development Needed, by Teachers' Ranking

	Importance			Total
	1	2	3	
Content knowledge	2	1	1	4
Technology-based skills	3	1	4	8
Online classroom management	1	1	1	3
Effective communication	2	2	1	5
Structuring instructional content	1	1	1	3
Accommodating different learning styles	5	4	6	16
Finding high-quality resources	5	3	4	12
Language-based technology integration	5	6	1	12

Our interviews also asked the teachers about their perceptions of PD. Several mentioned that they felt PD was extremely important, especially for teachers who were transitioning from face-to-face to online teaching. One Chinese-language teacher, who was originally from China, also mentioned the need for PD in the area of American educational systems and values. Indeed, all the online Chinese teachers we interviewed had little experience of teaching Chinese in K-12 schools in the United States, and when teaching in this particular online environment, they had little contact with either the school or the children's parents. The Chinese teachers felt that this, coupled with their limited background knowledge of U.S. culture, hindered their communication with students.

DISCUSSION

Online Teaching Practices

Our examination of the teaching practices used by virtual school teachers, in light of DiPietro et al.'s (2010) categories, yielded two major groupings of teaching practices: content-related teaching practices (CTP) and non-content-related teaching practices (NCTP). CTP is a combination of instructional design and direct instruction, similar to that proposed by Anderson et al. (2001). NCTP is related to teachers' managerial and social role in online courses. Taken as a whole, our findings confirm the ongoing relevance of the three roles that online teachers play, as identified by Anderson et al. (2001): instructional designer, discourse facilitator, and knowledge provider.

Of our two broad categories of teaching practices, the online teachers in our sample seemed to use NCTP more frequently than CTP. The use of NCTP was negatively correlated only with these teachers' years of education, and was not impacted by their years of online teaching experience. This contradicts Bailey and Card's (2009) finding that novice online instructors tended to concentrate predominately on their management role, whereas experienced online instructors' practice was generally more content-focused. This inconsistency may be attributable to variations in teachers' levels of control over course content. In our sample, the teachers of all languages except Chinese reported having little control, with the school purchasing all non-Chinese language courses from publishers and other third parties. As one senior French instructor noted during our interview: "Actual instructional content that we use in all of these courses is almost like a textbook. You can't get in or input a different code. [...] Currently it is completely uneditable other than posting announcements and giving feedback. We can't even change the assessment" (#8). Dawley et al. (2010) reported similar findings: more than half of their respondents did very little or no course design, but did not explain the reason. Our discussion with administrators of the virtual school raised the possibility that this was due to most of its courses being either designed by its in-house instructional design team or purchased from a third-party provider, and the fact that instructional designers may not specialize in online instructional design.

Adjustment of Online Teaching

Our data revealed adjustments in the managerial, social, and pedagogical roles that teachers play when they move into online teaching. Regarding their managerial role, online teachers needed to be more flexible with their time. All the online Chinese instructors clearly expressed expectations

that students would be well prepared for the synchronous sessions in order to take full advantage of these relatively brief and infrequent events. Expressing high expectations has been identified as an effective online teaching practice in both higher education (e.g., Bailey & Card, 2009) and K-12 contexts (e.g., DiPietro et al., 2008). In addition, the Chinese instructors in our study designed questions and even prepared scripts to maximize the use of every minute of class time, which they had seldom done in their face-to-face teaching. Unlike traditional teaching that occurs at scheduled times, online teaching time is distributed over the week (Easton, 2003; Hislop & Ellis, 2004). Nor, in this case, was it confined to the hours of 8am to 5pm: the Chinese instructors frequently held synchronous sessions in the evenings to accommodate the schedules of students in different time zones, among other reasons.

In regard to their social role, most of the participants highlighted the importance of timeliness in their communication with students, which is consistent with research on online K-12 learning (DiPietro, 2010; DiPietro et al., 2008). All of our respondents indicated the importance of timeliness in communication, with all the instructors in the virtual school expected to reply to students' queries within 24 hours and returning assignments within 48 hours. To achieve this goal, they had to check emails regularly. Timeliness has been documented as an important factor effect in online teaching in both higher education (Bailey & Card, 2009) and K-12 settings (DiPietro, 2010; DiPietro et al., 2008; Easton, 2003).

Another aspect of adjustment to the social role of teachers involved clarity of communication. Very conscious of the lack of non-verbal cues in online written communication (Murphy, Shelley, White, & Baumann, 2011), our participants wrote carefully to avoid the possibility of miscommunication, and used multiple modes of communication. As noted by one teacher, who used phone calls and videos in addition to written communication: "many times the tone of written communication may not be perceived or may be perceived as different than I intended it to be. It's not like it can't happen online, but it takes greater effort" (#8).

Regarding our participants' pedagogical roles, only the Chinese teachers had synchronous sessions, which allowed more student-centered learning. In contrast to the findings of Murphy and her colleagues (2011), that Canadian higher-education instructors used synchronous sessions for direct instruction, the Chinese teachers in our study adopted new pedagogical techniques and focused on interactivity. They "flipped" the classroom to provide students with opportunities to practice the target language, which they thought were lacking in asynchronous language courses. Such a shift in the role of the teacher is not uncommon in the literature. In fact, online teaching provides an opportunity for teachers to reassess their pedagogy (Easton, 2003). This shift was not limited to the Chinese teachers.

One participant teaching French (#9) noted:

What I like most about online learning is that it allows for the learner the content and instruction is available 24-7. As an instructor, I am also freed up because that my position or my role is not delivering of content. It's already been done. The role is completely different, I see my role as more of a coach or the students may be engaging with the content, they maybe ask questions. And I take questions and guide them, but I more look at how are they doing on the assignment, how are they doing with their speaking or their reading skills or listening. I am freed up to sit back and watch how they are interacting From there I can offer some supplemental instruction. I mean we direct them. As an instructor, I have a little more freedom to do that than a face-to-face situation.

Despite the online instructors in languages other than Chinese having very little control over course content, as noted earlier, this teacher participant saw this situation as an opportunity to provide additional direct instruction to help students' learning. The specific nature of his change of role – from knowledge provider to facilitator and supporter – is also broadly consistent with DiPietro's (2010) conception of the transition from knowledge giver to knowledge guide.

Professional Development

The teachers in our sample received PD in all the major areas investigated by our survey, with the exception of online course design. Accommodating different learning styles and finding and evaluating high-quality resources were the two areas in which the teachers received the least PD, but wished to receive more. Our finding that online course design was in high demand among online teachers, but that few received PD in this area, was consistent with research by Dawley et al. (2010).

Our findings also highlight the importance of technological pedagogical content knowledge (TPACK, see Mishra & Koehler, 2006). Our data showed that the teachers received little PD in content knowledge, and that such PD was also very low on the list of what they wished to receive. Online instructors are likely to have extensive face-to-face teaching experience (Dawley et al., 2010) and therefore may feel that their content knowledge is already sufficient.

We also found that, although these virtual school instructors received PD in language-based technology integration, they still wished to receive more. It is worth mentioning in this context that technology itself does not constitute pedagogy (Warschauer, 1999); Dawley et al. (2010) surveyed various technology tools covered in PD, but noted a lack of training in how to

teach online vis-à-vis content. As Mishra and Koehler (2006) put it, “training teachers to use specific software packages not only makes their knowledge too specific to be applied broadly, but it also becomes quickly outdated” (p. 1032).

Amid a growing demand for instruction in languages that have rarely been taught in the U.S. in the past, it is inevitable that qualified teachers will be recruited from other countries. Many of the Chinese instructors in our study mentioned their need for PD in knowledge of U.S. education and culture. This need may be shared with many online world language instructors from various other cultures, who – if they lack any previous knowledge about the U.S. educational system and classroom culture – will tend to find that this hinders their communication and interaction with their online students. Prior literature has highlighted the need for targeted support for immigrant teachers (e.g., Cruickshank, 2004), as they usually have difficulties integrating into local culture at both the school and country level (Niyubahwe, Mukamurera, & Jutras, 2013).

CONCLUSIONS

The rapid spread of online learning in K-12 schools poses a major challenge for teachers, which may be especially difficult in the case of world-language teaching. Our study collected survey data from 19 world language teachers in a Midwestern virtual school, supplemented by interview data from eight of them. Using a combination of quantitative and qualitative research methods, our study identified a relative lack of content-related teaching practices, such as guiding student knowledge and engaging students with content, as compared to a more frequent use of non-content-related practices (e.g., maintaining academic integrity, keeping the course a safe place). Additionally, this study shed light on teachers’ managerial, social, and pedagogical role changes as they transitioned from face-to-face to online teaching, and their need for more PD in subject-based technology integration. Our findings carries important implications for how to improve world language teachers’ online teaching practices, and how to provide smoother transitions from face-to-face to online teaching, as well as what types of PD online language teachers need. It also may be of assistance to online teachers and administrators of virtual schools seeking to build engaging online environments for world-language teaching.

Several limitations of the current study need to be noted. First, we had a small sample of teachers, all teaching similar subjects. It would be worthwhile to test whether our findings can be extended to other academic subjects or to virtual schools, and/or reconfirmed at a larger sample size.

Second, we interviewed each teacher only once, which may not have been sufficient to capture the sample’s adjustment to online teaching. Longitudinal

studies would therefore be useful to ascertaining the affordances and challenges that the online environment creates for instructors, which in turn may provide further insights on PD and teacher education.

ACKNOWLEDGEMENT

This line of research is a result of a collaborative effort by Dr. Chin-Hsi Lin, Dr. Binbin Zheng, Dr. Jiahang Li, Dr. Ruhui Ni, Dr. Nancy Romig and Yining Zhang. Our appreciation is due to the team for their contributions to the design of the research project, the development of instruments and the collection of data.

References

- Anderson, T., Liam, R., Garrison, D. R., & Archer, W. (2001). Assessing teaching presence in a computer conferencing context. *Journal of Asynchronous Learning Networks*, 5(2), 1–17.
- Bailey, C. J., & Card, K. A. (2009). Effective pedagogical practices for online teaching: Perception of experienced instructors. *The Internet and Higher Education*, 12(3–4), 152–155. <http://doi.org/10.1016/j.iheduc.2009.08.002>
- Bandura, A. (2006). Guide for constructing self-efficacy scales. In F. Pajares & T. Urdan (Eds.), *Self-efficacy beliefs of adolescents* (pp. 307–337). Greenwich, CT: Information Age Publishing.
- Black, E., DiPietro, M., Ferdig, R., & Polling, N. (2009). Developing a survey to measure best practices of K-12 online instructors. *Online Journal of Distance Learning Administration*, 12(1). Retrieved from <http://www.westga.edu/~distance/ojdl/spring121/black121.html>
- Cavanaugh, C., & Blomeyer, R. L. (2007). *What works in K-12 online learning*. Eugene, OR: International Society for Technology in Education.
- Cavanaugh, C., Gillan, K. J., Kromrey, J., Hess, M., & Blomeyer, R. (2004). The effects of distance education on K-12 student outcomes: A meta-analysis. *Learning Point Associates*.
- Compton, L. K. L. (2009). Preparing language teachers to teach language online: a look at skills, roles, and responsibilities. *Computer Assisted Language Learning*, 22(1), 73–99. <http://doi.org/10.1080/09588220802613831>
- Compton, L. K. L., Davis, N., & Mackey, J. (2009). Field Experience in Virtual Schools—To Be There Virtually. *Journal of Technology and Teacher Education*, 17(4), 459–477.
- Conrad, D. (2004). University instructors' reflections on their first online teaching experiences. *Journal of Asynchronous Learning Networks*, 8(2), 31–44.
- Cruickshank, K. (2004). Towards diversity in teacher education: Teacher preparation of immigrant teachers. *European Journal of Teacher Education*, 27(2), 125–138. <http://doi.org/10.1080/0261976042000223006>
- Darling-Hammond, L. (2000). Teacher Quality and Student Achievement. *Education Policy Analysis Archives*, 8(1), 1. <http://doi.org/10.14507/epaa.v8n1.2000>

- Davis, N. E., & Roblyer, M. D. (2005). Preparing Teachers for the "Schools That Technology Built": Evaluation of a Program to Train Teachers for Virtual Schooling. *Journal of Research on Technology in Education*, 37(4), 399–409.
- Dawley, L., Rice, K., & Hinck, G. (2010). *Going virtual! The status of professional development for K-12 online teachers*. Boise, ID: Boise State University. Retrieved from <http://edtech.boisestate.edu/goingvirtual/goingvirtual3.pdf>
- DiPietro, M. (2010). Virtual school pedagogy: The Instructional practices of K-12 virtual school teachers. *Journal of Educational Computing Research*, 42(3), 327–354. <http://doi.org/10.2190/EC.42.3.e>
- DiPietro, M., Ferdig, R. E., Black, E. W., & Preston, M. (2008). Best practices in teaching K-12 online: Lessons learned from Michigan Virtual School teachers. *Journal of Interactive Online Learning*, 7(1), 10–35.
- Easton, S. S. (2003). Clarifying the Instructor's Role in Online Distance Learning. *Communication Education*, 52(2), 87–105. <http://doi.org/10.1080/03634520302470>
- Ferdig, R. E., Cavanaugh, C., DiPietro, M., Black, E. W., Dawson, K., Ferdig, R. E., ... Dawson, K. (2009). Virtual schooling standards and best practices for teacher education. *Journal of Technology and Teacher Education*, 17(4), 479–503.
- Hampel, R., & Stickler, U. (2005). New skills for new classrooms: Training tutors to teach languages online. *Computer Assisted Language Learning*, 18(4), 311–326. <http://doi.org/10.1080/09588220500335455>
- Hauck, M., & Stickler, U. (2006). What does it take to teach online? *CALICO Journal*, 23(3), 463–475.
- Hayton, J. C., Allen, D. G., & Scarpello, V. (2004). Factor Retention Decisions in Exploratory Factor Analysis: a Tutorial on Parallel Analysis. *Organizational Research Methods*, 7(2), 191–205. <http://doi.org/10.1177/1094428104263675>
- Hislop, G. W., & Ellis, H. J. C. (2004). A study of faculty effort in online teaching. *The Internet and Higher Education*, 7(1), 15–31. <http://doi.org/10.1016/j.ihed-uc.2003.10.001>
- Kennedy, K., & Archambault, L. (2012). Offering preservice teachers field experiences in K-12 online learning: A national survey of teacher education programs. *Journal of Teacher Education*, 63(3), 185–200. doi: 10.1177/0022487111433651
- Kern, R., Ware, P., & Warschauer, M. (2004). 11. Crossing frontiers: New directions in online pedagogy and research. *Annual Review of Applied Linguistics*, 24, 243–260.
- Means, B., Toyama, Y., Murphy, R., Bakia, M., & Jones, K. (2010). *Evaluation of evidence-based practices in online learning: A meta-analysis and review of online learning studies*. Washington, D.C: U.S. Department of Education.
- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis: An expanded sourcebook* (2nd ed.). Thousand Oaks, CA: Sage.
- Mishra, P., & Koehler, M. (2006). Technological pedagogical content knowledge: A framework for teacher knowledge. *The Teachers College Record*, 108(6), 1017–1054.
- Morris, S. (2002). *Teaching and learning online: A step-by-step guide for designing an online K-12 school program*. Lanham, MD: Scarecrow Press.
- Murday, K., Ushida, E., & Chenoweth, N. A. (2008). Learners' and teachers' perspectives on language online. *Computer Assisted Language Learning*, 21(2), 125–142. <http://doi.org/10.1080/09588220801943718>
- Murphy, L. M., Shelley, M. A., White, C. J., & Baumann, U. (2011). Tutor and student perceptions of what makes an effective distance language teacher. *Distance Education*, 32(3), 397–419. <http://doi.org/10.1080/01587919.2011.610290>

- Niyubahwe, A., Mukamurera, J., & Jutras, F. (2013). Professional integration of immigrant teachers in the school system: A literature review. *McGill Journal of Education*, 48, 279-296. <http://doi.org/10.7202/1020972ar>
- Pett, M. A., Lackey, N. R., & Sullivan, J. J. (2003). *Making sense of factor analysis: The use of factor analysis for instrument development in health care research*. Sage.
- Queen, B., & Lewis, L. (2011). *Distance education courses for public elementary and secondary school students: 2009-10. First Look. NCES 2012-008*. Washington, DC: National Center for Education Statistics.
- Rice, K., & Dawley, L. (2009). The status of professional development for K-12 online teachers: Insights and implications. *Journal of Technology and Teacher Education*, 17(4), 523-545.
- Wang, L., Ertmer, P. A., & Newby, T. J. (2004). Increasing preservice teachers' self-efficacy beliefs for technology integration. *Journal of Research on Technology in Education*, 36(3), 231-250. <http://doi.org/10.1080/15391523.2004.10782414>
- Warschauer, M. (1999). *Electronic literacies: Language, culture and power in online education*. Mahwah, NJ: Lawrence Erlbaum Associates.
- Watson, J., Pape, L., Murin, A., Gemin, B., & Vashaw, L. (2014). *Keeping pace with K-12 digital learning: An annual review of policy and practice*. Retrieved from http://www.kpk12.com/wp-content/uploads/EEG_KP2014-fnl-lr.pdf
- Winter, J. C. F. de, Dodou, D., & Wieringa, P. A. (2009). Exploratory factor analysis with small sample sizes. *Multivariate Behavioral Research*, 44, 147-181.
- Young, S. (2006). Student views of effective online teaching in higher education. *American Journal of Distance Education*, 20(2), 65-77. http://doi.org/10.1207/s15389286ajde2002_2

APPENDIX A TEACHER SURVEY

Section one: Teaching practice

Please indicate how much you agree or disagree with each of the following statements using the scale below:

- 1 – Strongly disagree
- 2 – Disagree
- 3 – Neutral
- 4 – Agree
- 5 – Strongly agree

1. Effective Communication

- 1) I communicate with my students regularly in order to engage them.
- 2) The majority of my communication with students focuses on their learning/use of the target language.
- 3) My online communication practices make students feel as connected to me as they would be to a face-to-face teacher
- 4) I communicate clearly with my students
- 5) I self-monitor my communications to avoid miscommunication with my students
- 6) I respond to students in a timely manner

2. Guiding Students' Knowledge Construction

- 1) I answer content questions
- 2) I facilitate students' ability to construct knowledge of how the target language is used
- 3) I help students make connections between content and their lives
- 4) I facilitate student conversations utilizing the target language.
- 5) I provide opportunities for students to use the target language in authentic situations

3. Individual learning

- 1) I provide individualized instruction
- 2) I tailor resources and support for individual students
- 3) I use different practices based on student needs
- 4) I make language learning transferable to other situations outside the online course environment

4. Engaging students with content

- 1) I prompt students to actively use the target language
- 2) I motivate students to interact with the target language
- 3) I integrate technology to motivate students
- 4) I use technology to facilitate language acquisition

5. Content accessibility

- 1) I use multiple forms of assessment to evaluate student progress
- 2) I use multiple teaching strategies to introduce and teach the content knowledge
- 3) I build in manipulate course components to integrate students' personal interest in the topics.

6. Academic integrity

- 1) I align course content with *American Council on The Teaching of Foreign Languages* (ACTFL) standards
- 2) I post academic honesty policies
- 3) I monitor for cheating

7. Keeping the course a safe place

- 1) I monitor venues of public communication (e.g. blogs/chat rooms) to identify students in personal crisis
- 2) I model expectations for appropriate student communication
- 3) I facilitate students' use of constructive communication
- 4) I set guidelines for communication and interaction
- 5) I use strategies to address inappropriate or abusive behavior by students in public forums

8. Meeting students' needs

- 1) I encourage students to go to each other for support
- 2) I encourage students to share resources
- 3) I establish a learning community
- 4) I provide students with multiple ways to contact me

9. Scaffolding

- 1) I adapt course to accommodate students' self-pacing
- 2) I create an organized environment
- 3) I outline expectations to foster student responsibility
- 4) I use course tools to adapt course structure

Section two: Efficacy

Please indicate how much you agree or disagree with each of the following statements using the scale below:

- 1 – Strongly disagree
- 2 – Disagree
- 3 – Neutral
- 4 – Agree
- 5 – Strongly agree

10. Instructional self-efficacy

- 1) I feel confident that I can promote language acquisition even though there is no target-language support available in the students' homes
- 2) I feel confident that I can keep students on task on difficult assignments
- 3) I feel confident that I can increase students' retention of the language
- 4) I feel confident that I can motivate students who show low interest in language learning
- 5) I feel confident that I can encourage students to collaborate in practicing the target language
- 6) I feel confident that I can motivate students to do their homework

11. Technological self-efficacy

- 1) I feel confident that I can successfully teach relevant language content using appropriate technology
- 2) I feel confident that I can help students when they have difficulty with the computer
- 3) I feel confident that I can motivate my students to participate in technology-based projects to support language acquisition
- 4) I feel confident that I can mentor students in appropriate uses of technology
- 5) I feel confident about assigning and grading technology-based projects
- 6) I feel confident about using technology resources (such as spreadsheets, electronic portfolios, etc.) to collect and analyze data from student performance scores to improve instructional practices
- 7) I feel confident that I can develop creative ways to cope with the constraints of the learning management system and continue to teach effectively with technology

Section three: Training and support

12. Using the scale below, how would you rate the support and training you receive?

- 1 – None
- 2 – Below Average
- 3 – Average
- 4 – Above Average
- 5 – Excellent

- 1) Professional development on content/language specific knowledge
- 2) Professional development on technology-based skills
- 3) Professional development on online classroom management
- 4) Professional development on effective communication with online students
- 5) Professional development on organizing and structuring instructional content

- 6) Professional development on strategies for accommodating different learning styles
- 7) Professional development on finding and evaluating quality resources for my online classes
- 8) Professional development on content-/language-based technology integration
- 9) Instructional support (ongoing support for incorporating technologies into your online courses)
- 10) Technical support (e.g., network, software, hardware)

13. Please select three professional development areas you believe you need additional training in, and prioritize them (1-3) in order of importance, with 1 being most important.

- 1) Content/language-specific knowledge
- 2) Technology-based skills
- 3) Online classroom management
- 4) Effective communication with online students
- 5) Organizing and structuring instructional content
- 6) Strategies for accommodating different learning styles
- 7) Finding and evaluating quality resources for my online classes

- | | |
|---|---------------------------------------|
| <input type="checkbox"/> American Sign Language 1 | <input type="checkbox"/> Japanese 1 |
| <input type="checkbox"/> American Sign Language 2 | <input type="checkbox"/> Japanese 2 |
| <input type="checkbox"/> Chinese 1 | <input type="checkbox"/> Spanish (AP) |
| <input type="checkbox"/> Chinese 2 | <input type="checkbox"/> Spanish 1 |
| <input type="checkbox"/> Chinese 3 | <input type="checkbox"/> Spanish 2 |
| <input type="checkbox"/> Chinese 4 | <input type="checkbox"/> Spanish 3 |
| <input type="checkbox"/> French (AP) | <input type="checkbox"/> Latin 1 |
| <input type="checkbox"/> French 1 | <input type="checkbox"/> Latin 2 |
| <input type="checkbox"/> French 2 | <input type="checkbox"/> Latin 3 |
| <input type="checkbox"/> French 3 | |
| <input type="checkbox"/> French 4 | |
| <input type="checkbox"/> German 1 | |
| <input type="checkbox"/> German 2 | |
| <input type="checkbox"/> German 3 | |
| <input type="checkbox"/> German 4 | |

- 8) Language-based technology integration

Section four: Demographic information

13. What is your gender? Male Female
14. How old are you? under 25 25-29 30-39 40-49 50-59 60+
15. What is the highest level of formal education that you have completed?
 Bachelor's degree Master's degree Doctoral degree
16. How long have you been working as a teacher?
 This is my first year 1-2 years 3-5 years
 6-10 years 11-15 years 16-20 years More than 20 years
17. How long have you been teaching online courses?
 This is my first year 1-2 years 3-5 years
 6-10 years 11-15 years 16-20 years More than 20 years
18. What is your target language proficiency level?
 None Novice Intermediate Advanced Native
19. What language courses are you teaching now?
20. Your language course would be best described as a:
 Non-Middlebury Interactive Course
 Middlebury Interactive Course (Competency)
 Middlebury Interactive Course (Fluency)
 Other
 Unknown