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Email address: _____
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District: _____

School: _____

Date: _____

Providing your name and email address will allow you to gain access to your individual results along with results for your school and/or district.

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Council of Chief State School Officers
Wisconsin Center for Education Research

SURVEYS OF ENACTED CURRICULUM® ENGLISH LANGUAGE LEARNER STUDY

Survey Of Instructional Practices

Teacher Survey

Grades K-12

Science

Thank you for agreeing to participate in this survey of instructional practices and content. This survey is part of a collaborative effort to provide education researchers, policymakers, administrators, and most importantly, teachers like yourself with comparative information about instruction in districts participating in the SEC Collaborative or in associated initiatives from states and districts around the country. To learn more about the surveys of enacted curriculum and their use in other projects, please visit the project website; <http://www.secsurvey.org>

Your participation in this survey is voluntary. If you choose to participate, your personal information will remain strictly confidential. Information that could be used to identify you or connect you to individual results will not be shared with staff in your school, district, or state. Individual respondents are never identified in any reports of results. The questionnaire poses no risk to you, and there is no penalty for refusal to participate. You may withdraw from the study simply by returning the questionnaire without completing it, without penalty or loss of services or benefits to which you would be otherwise entitled.

If you have any questions regarding your rights as a research participant, please contact the University of Wisconsin-Madison School of Education's Human Subjects Committee office at (608) 262-2463.

Reporting Period: Most recent school year (current year, if reporting after March 1st)

Instructions for Selecting the Target Class

Science Instruction: For all questions about classroom practices, please refer only to activities in the science class that you teach. If you teach more than one science class, select the first class that you teach each week. If you teach a split class (i.e., the class is split into more than one group for science instruction) select the group with the most ELLs to describe as the target class.

Please read each question and its response choices carefully, and then mark your response by filling in an appropriate response circle. A pen or pencil may be used to complete the survey.

Survey of Instructional Practices for Science

SCHOOL DESCRIPTION

- 1 Which of these categories best describes the way your classes at this school are organized? (Check all that apply)
- ① Departmentalized Instruction
 - ② Subject-Area Specialist (non-departmental)
 - ③ Self-Contained (i.e., teach multiple subjects)
 - ④ Team Taught
- 2 If your school is departmentalized, or if you are a subject-area specialist, how many different science classes do you currently teach?
- ① ② ③ ④ ⑤ ⑥ ⑦
(Number of classes taught)

CLASS DESCRIPTION

- 3 Which term best describes the target class, or course, you are teaching?
- ① Other
 - ② Elem./ Middle School Science
 - ③ General Science
 - ④ Life Science
 - ⑤ Earth Science
 - ⑥ Biology
 - ⑦ Chemistry
 - ⑧ Physics
 - ⑨ Coordinated / Integrated
- 4 During a typical week, approximately how many hours will the target class spend in your subject area?
- Number of instructional hours=**
- ① ② ③ ④ ⑤ ⑥ ⑦ ⑧ ⑨
0 1 2 3 4 5 6 7 8 9
- 5 What is the average length of each class period for the target class?
- ① Not applicable
 - ② 30 to 40 minutes
 - ③ 41 to 50 minutes
 - ④ 51 to 60 minutes
 - ⑤ 61 to 90 minutes
 - ⑥ 91 to 120 minutes
 - ⑦ Varies due to block scheduling or integrated instruction
- 6 For how many weeks will the target class meet this school year in total?
- ① ② ③
Total number of weeks= 1 to 12 13 to 24 25 to 36

HOMEWORK (work assigned to be completed *outside of class*)

Answer the following questions with regard to your target class:

- | | | |
|----|-----------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------|
| 16 | How often do you usually assign science homework to be completed outside of class? | Ⓐ Never (Skip to # 25)
Ⓑ Less than once per week
Ⓒ Once or twice per week
Ⓓ Three to four times per week
Ⓔ Every day |
| 17 | How many minutes do you expect a typical student to spend on a normal homework assignment completed outside of class? | Ⓐ I do not assign homework
Ⓑ Less than 15 minutes
Ⓒ 15 to 30 minutes
Ⓓ 31 to 60 minutes
Ⓔ 61 to 90 minutes
Ⓕ More than 90 minutes |
| 18 | Does homework completed outside of class count toward student grades? | Ⓐ Never
Ⓑ Usually does not
Ⓒ Usually does
Ⓓ Always does |
| 19 | How often do you assign homework to be completed in a small group outside of class? | Ⓐ Never
Ⓑ Less than once per week
Ⓒ Once or twice per week
Ⓓ Three to four times per week
Ⓔ Every day |

AMOUNT OF HOMEWORK TIME

0 - None
1 - Little (*Less than 10% of homework time outside of class*)
2 - Some (*10-25% of homework time outside of class*)
3 - Moderate (*26-50% of homework time outside of class*)
4 - Considerable (*More than 50% of homework time outside of class*)

What percentage of the time that students in the target class spend on science homework done <i>outside of class</i> do you expect them to:	None	Little	Some	Moderate	Considerable
20 Read about science in books, magazines, or articles	Ⓐ	Ⓑ	Ⓒ	Ⓓ	Ⓔ
21 Answer questions from a science book or worksheet	Ⓐ	Ⓑ	Ⓒ	Ⓓ	Ⓔ
22 Solve science problems that require computation	Ⓐ	Ⓑ	Ⓒ	Ⓓ	Ⓔ
23 Revise and improve their own work (e.g., tests, homework assignments)	Ⓐ	Ⓑ	Ⓒ	Ⓓ	Ⓔ
24 Collect data or information about science	Ⓐ	Ⓑ	Ⓒ	Ⓓ	Ⓔ
25 Work on an assignment, report, or project that takes longer than one week to complete	Ⓐ	Ⓑ	Ⓒ	Ⓓ	Ⓔ
26 Write about science	Ⓐ	Ⓑ	Ⓒ	Ⓓ	Ⓔ

INSTRUCTIONAL ACTIVITIES IN SCIENCE

Listed below are questions about the types of activities *that students in the target class* may engage in during science instruction. Please estimate the relative amount of time a typical student in your class will spend engaged in *each activity* over the course of a school year. The activities are not necessarily mutually exclusive; across activities, **your answers will probably exceed 100%**. Consider each activity on its own, estimating the range that best indicates the relative amount of science instructional time that a typical student in your target class engages in over the course of a school year for that category.

AMOUNT OF INSTRUCTIONAL TIME	
0 - None	
1 - Little	<i>(Less than 10% of instructional time for the school year)</i>
2 - Some	<i>(10-25% of instructional time for the school year)</i>
3 - Moderate	<i>(26-50% of instructional time for the school year)</i>
4 - Considerable	<i>(More than 50% of instructional time for the school year)</i>

How much of the science instructional time in the target class do students use to engage in the following tasks?	None	Little	Some	Moderate	Considerable
27 Listen to the teacher explain something about science to the class as a whole	①	②	③	④	⑤
28 Read about science in books, magazines, or articles (not textbooks)	①	②	③	④	⑤
29 Work <i>individually</i> on science assignments	①	②	③	④	⑤
30 Write about science in a report or paper on science topics	①	②	③	④	⑤
31 Do a laboratory activity, investigation, or experiment	①	②	③	④	⑤
32 Watch the teacher demonstrate a scientific phenomenon	①	②	③	④	⑤
33 Collect data (other than laboratory activities)	①	②	③	④	⑤
34 Work in <i>pairs or small groups</i> (other than laboratory activities)	①	②	③	④	⑤
35 Do a science activity with the class outside the classroom or science laboratory (e.g., field trips or research)	①	②	③	④	⑤
36 Use computers, calculators, or other educational technology to learn science	①	②	③	④	⑤
37 Maintain and reflect on a science portfolio of their own science work	①	②	③	④	⑤
38 Take a quiz or test	①	②	③	④	⑤

Listed below are some questions (items 37-62) about what students in the target class do in science. For each activity pick one of the choices to indicate the relative amount of instructional time that students spend doing each activity. Please think of an average student in the class while responding.

AMOUNT OF INSTRUCTIONAL TIME (in laboratory activities, investigations, or experiments)

0 - None

1 - Little (*Less than 10% of instructional time in laboratory activities, investigations, or experiments*)

2 - Some (*10-25 % of instructional time in laboratory activities, investigations, or experiments*)

3 - Moderate (*26-50% of instructional time in laboratory activities, investigations, or experiments*)

4 - Considerable (*More than 50% of instructional time in laboratory activities, investigations, or experiments*)

When students in the target class are engaged in <i>laboratory activities, investigations, or experiments</i> as part of science instruction, how much of that time do they:	None	Little	Some	Moderate	Considerable
39 Make educated guesses, predictions, or hypotheses	①	②	③	④	⑤
40 Follow step-by-step directions	①	②	③	④	⑤
41 Use science equipment or measuring tools	①	②	③	④	⑤
42 Collect data	①	②	③	④	⑤
43 Change a variable in an experiment to test a hypothesis	①	②	③	④	⑤
44 Organize and display information in tables or graphs	①	②	③	④	⑤
45 Analyze and interpret science data	①	②	③	④	⑤
46 Design their own investigation or experiment to solve a scientific question	①	②	③	④	⑤
47 Make observations/classifications	①	②	③	④	⑤

AMOUNT OF INSTRUCTIONAL TIME (in pairs or small groups)

0 - None

1 - Little (*Less than 10% of instructional time in pairs or small groups*)

2 - Some (*10-25% of instructional time in pairs or small groups*)

3 - Moderate (*26-50% of instructional time in pairs or small groups*)

4 - Considerable (*More than 50% of instructional time in pairs or small groups*)

When students in the target class work in *pairs or small groups* as part of science instruction (other than in the science laboratory), how much of that time do they:

	None	Little	Some	Moderate	Considerable
48 Talk about ways to solve science problems (e.g., design an experiment)	①	②	③	④	⑤
49 Complete written assignments from the textbook or workbook	①	②	③	④	⑤
50 Write results or prepare a presentation from a laboratory activity, investigation, experiment, or a research project	①	②	③	④	⑤
51 Work on an assignment, report, or project over an extended period of time	①	②	③	④	⑤
52 Work on a writing project or entries for portfolios by seeking peer comments to improve work	①	②	③	④	⑤
53 Review assignments or prepare for a quiz or test	①	②	③	④	⑤

AMOUNT OF INSTRUCTIONAL TIME (collecting science data or information)

0 - None

1 - Little (*Less than 10% of instructional time collecting science data or information*)

2 - Some (*10-25% of instructional time collecting science data or information*)

3 - Moderate (*26-50% of instructional time collecting science data or information*)

4 - Considerable (*More than 50% of instructional time collecting science data or information*)

When students in the target class *collect data or information* about science from books, magazines, computers, or other sources (other than laboratory activities), how much of that time do they:

	None	Little	Some	Moderate	Considerable
54 Have class discussions about the data	①	②	③	④	⑤
55 Organize and display the information in tables or graphs	①	②	③	④	⑤
56 Make a prediction based on the data	①	②	③	④	⑤
57 Analyze and interpret the information or data orally or in writing	①	②	③	④	⑤
58 Make a presentation to the class on the data, analysis, or interpretation	①	②	③	④	⑤

AMOUNT OF INSTRUCTIONAL TIME (using calculators, computers, or other educational technology)

0-None

1-Little (*Less than 10% of instructional time using calculators, computers, or other educational technology*)

2-Some (*10-25% of instructional time using calculators, computers, or other educational technology*)

3-Moderate (*26-50% of instructional time using calculators, computers, or other educational technology*)

4-Considerable (*More than 50% of instructional time using calculators, computers, or other educational technology*)

When students in the target class are engaged in activities that involve the use of <i>calculators, computers, or other educational technology</i> as part of science instruction, how much of that time do they:	None	Little	Some	Moderate	Considerable
59 Learn facts	①	②	③	④	⑤
60 Practice procedures	①	②	③	④	⑤
61 Use sensors and probes (e.g., CBLs)	①	②	③	④	⑤
62 Retrieve or exchange data or information (e.g., using the Internet or partnering with another class)	①	②	③	④	⑤
63 Display and analyze data	①	②	③	④	⑤
64 Solve problems using simulations	①	②	③	④	⑤

ASSESSMENTS

For the following items, please indicate how often you use each of the following strategies when assessing students in the target science class.

	Not At All	1 - 4 times per <u>year</u>	6 - 12 times per <u>year</u>	1 - 3 times per <u>month</u>	1 - 3 times per <u>week</u>	4 - 5 times per <u>week</u>
65 Objective items (e.g., multiple choice or true/false)	<input type="checkbox"/>	①	②	③	④	⑤
66 Short answer questions (e.g., fill-in-the-blank)	<input type="checkbox"/>	①	②	③	④	⑤
67 Extended response item for which student must explain or justify solution	<input type="checkbox"/>	①	②	③	④	⑤
68 Performance tasks or events (e.g., hands-on activities)	<input type="checkbox"/>	①	②	③	④	⑤
69 Individual or group demonstration or presentation	<input type="checkbox"/>	①	②	③	④	⑤
70 Science projects	<input type="checkbox"/>	①	②	③	④	⑤
71 Portfolios	<input type="checkbox"/>	①	②	③	④	⑤
72 Systematic observation of students	<input type="checkbox"/>	①	②	③	④	⑤

INSTRUCTIONAL INFLUENCES

For the following items, please indicate the degree to which the following factors positively (support) or negatively (constrain) influence your practice in the target science class.

	N/A	Strong Negative Influence	Somewhat Negative Influence	Little or No Influence	Somewhat Positive Influence	Strong Positive Influence
73 Your state's curriculum framework or content standards.	①	②	③	④	⑤	⑥
74 Your district's curriculum framework, standards, or guidelines	①	②	③	④	⑤	⑥
75 Textbook or instructional materials.	①	②	③	④	⑤	⑥
76 State test or results from test.	①	②	③	④	⑤	⑥
77 District test or results from test.	①	②	③	④	⑤	⑥
78 National science education standards	①	②	③	④	⑤	⑥
79 Your pre-service preparation.	①	②	③	④	⑤	⑥
80 Students' special needs.	①	②	③	④	⑤	⑥
81 Parental or community preferences.	①	②	③	④	⑤	⑥
82 Preparation of students for next grade or level.	①	②	③	④	⑤	⑥
83 Local priorities, directives, or policies.	①	②	③	④	⑤	⑥
84 Your professional development experiences.	①	②	③	④	⑤	⑥
85 Screening, diagnostic, or classroom assessment results.	①	②	③	④	⑤	⑥
86 State standards for ELL/ESL/ELP/ELD.	①	②	③	④	⑤	⑥
87 Knowledge of second language acquisition processes.	①	②	③	④	⑤	⑥
88 Students' language needs/ linguistic proficiency.	①	②	③	④	⑤	⑥
89 Students' first languages.	①	②	③	④	⑤	⑥
90 Previous teaching experience.	①	②	③	④	⑤	⑥

CLASSROOM INSTRUCTIONAL READINESS

For the following items, please indicate how well prepared you are to:	Not Well Prepared	Somewhat Prepared	Well Prepared	Very Well Prepared
91 Provide science instruction that meets science content standards (district, state, or national).	①	②	③	④
92 Use a variety of assessment strategies.	①	②	③	④
93 Select and/or adapt instructional materials to implement the prescribed curriculum.	①	②	③	④
94 Teach students with physical disabilities.	①	②	③	④
95 Help students document and evaluate their own work.	①	②	③	④
96 Teach classes for students with diverse abilities and learning styles.	①	②	③	④
97 Teach students from a variety of cultural backgrounds.	①	②	③	④
98 Teach students who have limited English Proficiency.	①	②	③	④
99 Group students in specific ways in order to support their language development.	①	②	③	④
100 Adapt your speech to students' proficiency level.	①	②	③	④
101 Integrate the academic language development of ELLs into instruction.	①	②	③	④
102 Connect instruction to ELLs' cultural background and personal experience.	①	②	③	④
103 Define language objectives for ELLs.	①	②	③	④
104 Provide learning strategies to support language development.	①	②	③	④
105 Choose research-based curricula / interventions for ELLs.	①	②	③	④
106 Support ELLs' literacy development needs in English.	①	②	③	④
107 Support ELLs' literacy development needs in their native language.	①	②	③	④
108 Use a first language to support second language acquisition.	①	②	③	④

TEACHER OPINIONS AND BELIEFS

For the following items, please indicate your opinion about each of the statements below:

	Strongly Disagree	Disagree	Neutral / Undecided	Agree	Strongly Agree
109 ELLs need extensive practice applying specific grammar, usage, and language structure before engaging challenging science content.	①	②	③	④	⑤
110 I enjoy teaching ELLs.	①	②	③	④	⑤
111 I feel successful teaching ELLs.	①	②	③	④	⑤
112 My academic expectations are the same for all students, regardless of their English language abilities.	①	②	③	④	⑤
113 The ELLs in my class affect my ability to be an effective teacher.	①	②	③	④	⑤
114 I am supported by colleagues to try out new ideas in science.	①	②	③	④	⑤
115 I receive support from the administration for teaching science.	①	②	③	④	⑤
116 Academic and ESL teachers in this school regularly share ideas and materials.	①	②	③	④	⑤
117 Academic and ESL teachers in this school regularly observe each other teaching classes.	①	②	③	④	⑤
118 I have many opportunities to learn new things about teaching ELLs in my present job.	①	②	③	④	⑤
119 I am required to follow rules at this school that conflict with my best professional judgment about teaching.	①	②	③	④	⑤
120 Most teachers in this school contribute actively to making decisions about the curriculum.	①	②	③	④	⑤
121 I have adequate time during the regular school week to work with my peers.	①	②	③	④	⑤
122 I have adequate curriculum materials available for instruction.	①	②	③	④	⑤
123 Student absenteeism is a problem in my class.	①	②	③	④	⑤
124 Mobility of students in and out of our school is a concern.	①	②	③	④	⑤

PROFESSIONAL DEVELOPMENT IN SCIENCE

In answering the following items, consider all the professional development activities related to science content or science education that you have participated in since June 1st of last year. Professional development refers to a variety of activities intended to enhance your professional knowledge and skills, including in-service training, teacher networks, course work, institutes, committee work, and mentoring. In-service training is professional development offered by your school or district to enhance your professional responsibilities and knowledge. Workshops are short-term learning opportunities that can be located in your school or elsewhere. Institutes are longer term professional learning opportunities, for example, of a week or longer in duration.

Since June 1st of last year, how much time have you spent engaged in professional development activities focused on science?

0 = N/A 1 = 1-5 hrs. 2 = 6-15 hrs. 3 = 16-35 hrs. 4 = 36-60 hrs. 5 = 60+ hrs.

	Amount of Time					
	①	②	③	④	⑤	
125 Workshops or in-service training about science or science education.	①	②	③	④	⑤	
126 Summer institutes or conferences about science or science education.	①	②	③	④	⑤	
127 College courses that supported the teaching or learning of science.	①	②	③	④	⑤	

Since June 1st of last year, how frequently have you engaged in each of the following activities focused on the teaching and learning of science?

	Never	Once or twice a <u>year</u>	Once or twice a <u>term</u>	Once or twice a <u>month</u>	Once or twice a <u>week</u>	Almost <u>daily</u>
128 Attended conferences related to science or science education.	①	②	③	④	⑤	
129 Participated in teacher study groups, networks, or collaboratives.	①	②	③	④	⑤	
130 Used teacher resource centers or internet resources to enrich your knowledge and skills.	①	②	③	④	⑤	
131 Worked on a committee or task force focused on curriculum and instruction.	①	②	③	④	⑤	
132 Engaged in informal self-directed learning (e.g., discussions with colleagues about science or science education topics).	①	②	③	④	⑤	
133 Participated in professional development activities <u>related to English language learners</u> .	①	②	③	④	⑤	
134 Engaged in action research.	①	②	③	④	⑤	
135 Participated in data retreats (e.g., looking at student data).	①	②	③	④	⑤	

Thinking again about your professional development activities in science or science education since June 1st of last year, how often has the following occurred for you?

	Never	Rarely	Sometimes	Often
136 Observed demonstrations of teaching techniques.	①	②	③	④
137 Received coaching or mentoring about my instruction from an activity leader, coach, or mentor.	①	②	③	④
138 Led group discussions.	①	②	③	④
139 Conducted a demonstration of a lesson, unit, or skill.	①	②	③	④
140 Developed curricula or lesson plans with others.	①	②	③	④
141 Reviewed student work or scored assessments.	①	②	③	④
142 Developed assessments or tasks.	①	②	③	④
143 Given a lecture or presentation to colleagues.	①	②	③	④

Still thinking about your professional development activities since June 1st of last year, indicate how often they have been:

	Never	Rarely	Sometimes	Often
144 Designed to support the school's improvement plan.	①	②	③	④
145 Consistent with your department's or grade level's plan to improve teaching.	①	②	③	④
146 Consistent with your personal goals for your professional development.	①	②	③	④
147 Built on what you learned in previous professional development activities.	①	②	③	④
148 Supported by follow-up activities that related clearly to what you learned.	①	②	③	④

Since June 1st of last year, have you participated in professional development activities in the following ways?

	No	Yes
149 I participated in professional development activities along with most or all of the teachers from my school.	①	①
150 I participated in professional development activities along with most or all of the teachers from my department or grade level.	①	①
151 I participated in professional development activities NOT attended by other staff from my school.	①	①
152 I discussed what I learned with other teachers in my school or department who did NOT attend the activity.	①	①

Since June 1st of last year, how much emphasis have your professional development activities placed on the following topics?

	None	Minor	Moderate	Major
153 State content standards.	①	②	③	④
154 Alignment of instruction to curriculum.	①	②	③	④
155 Instructional approaches.	①	②	③	④
156 In-depth study of a specific area in science or science education.	①	②	③	④
157 Study of how children learn particular topics in science.	①	②	③	④
158 Individual differences in student learning.	①	②	③	④
159 Meeting the learning needs of special populations of students (e.g., English language learners, students with disabilities).	①	②	③	④
160 Classroom science assessment (e.g., diagnostic, textbook-linked tests, teacher-developed tests).	①	②	③	④
161 State or district assessment (e.g., preparing, understanding, interpreting assessment data).	①	②	③	④
162 Technology to support student learning.	①	②	③	④
163 State ESL/ELL/ELP/ELD standards.	①	②	③	④
164 Methods for teaching English language learners.	①	②	③	④
165 Study of how children learn a second language.	①	②	③	④
166 Adapting instruction to individual differences in student learning.	①	②	③	④
167 Crosscultural communication and understanding.	①	②	③	④
168 Testing and Assessment in ESL/ ELL/ELD.	①	②	③	④
169 Curriculum and materials development in ESL/ELL/ELD.	①	②	③	④

TEACHER CHARACTERISTICS

	Female	Male					
170 Please indicate your gender.	①	①					
171 Please indicate your race/ethnicity. (Indicate all that apply)	① American Indian or Alaska Native ② Asian ③ Black or African American ④ Hispanic or Latino ⑤ Native Hawaiian or other Pacific Islander ⑥ White or European-American ⑦ Others, multi-ethnic/multi-racial						
	Less than 1 year	1 - 2 years	3 - 5 years	6 - 8 years	9 - 11 years	12 - 15 years	More than 15 years
172 How many years have you taught science prior to this year?	①	①	②	③	④	⑤	⑥
173 How long have you been assigned to teach at your current school?	①	①	②	③	④	⑤	⑥

- | | N/A | BA or BS | MA or MS | Multiple MA or MS | Ph.D. or Ed.D. | Other |
|-------------------------------------------------------------------|-----|----------|----------|-------------------|----------------|-------|
| 174 What is the highest degree you hold? | ① | ② | ③ | ④ | ⑤ | |
| 175 What was your major field of study for the bachelor's degree? | | | | | | |
| | ① | ② | ③ | ④ | ⑤ | ⑥ |
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FORMAL COURSE PREPARATION

Please estimate the total number of courses (quarter or semester) you have taken at the undergraduate

	(Number of courses)									
	0	1-2	3-4	5-6	7-8	9-10	11-12	13-14	15-16	17+
178 Biology/Life Science	①	②	③	④	⑤	⑥	⑦	⑧	⑨	⑩
179 Physics/Chemistry/Physical Science	①	②	③	④	⑤	⑥	⑦	⑧	⑨	⑩
180 Geology/Astronomy/Earth Science	①	②	③	④	⑤	⑥	⑦	⑧	⑨	⑩
181 Science Education	①	②	③	④	⑤	⑥	⑦	⑧	⑨	⑩
182 Bilingual education, English as a second language, or related areas	①	②	③	④	⑤	⑥	⑦	⑧	⑨	⑩
183 Multicultural education	①	②	③	④	⑤	⑥	⑦	⑧	⑨	⑩

This is the end of the Instructional Practices portion of the survey. Please continue on to complete the Instructional Content portion. Thank you.