

Eugenio J. Gonzalez

Ann M. Kennedy

#### 7.1 Overview

The International Study Center (ISC) conducted an ambitious program of site visits to document the quality of the PIRLS 2001 data collection. Together with the IEA Secretariat and the national centers, the ISC identified and appointed one international Quality Control Monitor (QCM) in each country to observe data collection procedures at both national and school levels.

Quality Control Monitors had two major responsibilities: to interview the National Research Coordinator (NRC) about the survey operations and activities, and to arrange visits to a random sample of 15 schools in their country during the test administration. An Interview with the NRC Form was used to record the NRC's responses during the interview. For each testing session observed, QCMs completed a Classroom Observation Record.

More than 30 monitors attended a two-day training session conducted by the staff of the ISC, where they were introduced to the PIRLS 2001 survey operations procedures and instructed on how to conduct their site visit observations and interviews. At the training session, QCMs received a copy of the *Manual for International Quality Control Monitors* (PIRLS, 2000), which explained their duties in detail, and copies of the PIRLS survey operations manual and manuals for school coordinators and test administrators.

The QCMs who attended the training session were asked to recruit other QCMs within their country when necessary, in order to allow for efficiency in the coverage of the territory and testing timetable. A total of 71 QCMs were trained across the 33 countries where the

international quality control was conducted.<sup>1</sup> All together, these monitors observed 475 testing sessions and conducted interviews with the national research coordinator in each of the 33 PIRLS countries.

- General impressions
- Interview with the School Coordinator.

## 7.2 Observing the PIRLS Test Administration

When visiting the school, the QCM was to complete a Classroom Observation Record Form. This form was organized into four sections to facilitate the accurate recording of the test administration's major activities. The four sections are:

- Preliminary activities of the Test Administrator
- Test session activities

the QCMs provided reasonable explanations for the discrepancies. For example, QCMs noted that the main reason for students receiving booklets with student identifications that did not correspond to the Student Tracking Form was because new students did not appear on the list because the track-T

Question	Yes	No	Not Answered
Did the test administrator follow the test administrator's script exactly in each of the following tasks?			
Preparing the students	404	63 (Minor changes) 6 (Major)	2
Distributing the materials	449	23 (Minor) 1 (Major)	2
Reading the directions	381	88 (Minor) 5 (Major)	1
Reading the examples	410	59 (Minor) 5 (Major)	1
If the Test Administrator made changes to the script, how would you describe them?			
Additions	107	136	232
Revisions	57	161	257
Deletions	30	177	268
Did the Test Administrator distribute test booklets one at a time to each student?	468	7	0
Did the Test Administrator distribute the test booklets according to the booklet assignments on the Student Tracking Form?	463	12	0
Did the Test Administrator record attendance correctly on the Student Tracking Form?	458	11	6
Did the total testing time for Part 1 equal the time allowed?	402	71	2
Did the Test Administrator announce "you have 5 minutes left" prior to the end of Part 1?	419	55	1
Were there any other time remaining announcements made during Part 1?	57	413	5
At the end of Part 1, did the Test Administrator make sure all students had closed their booklets?	460	10	5
Was the total time for the break equal to or less than 15 minutes?	391	71	13

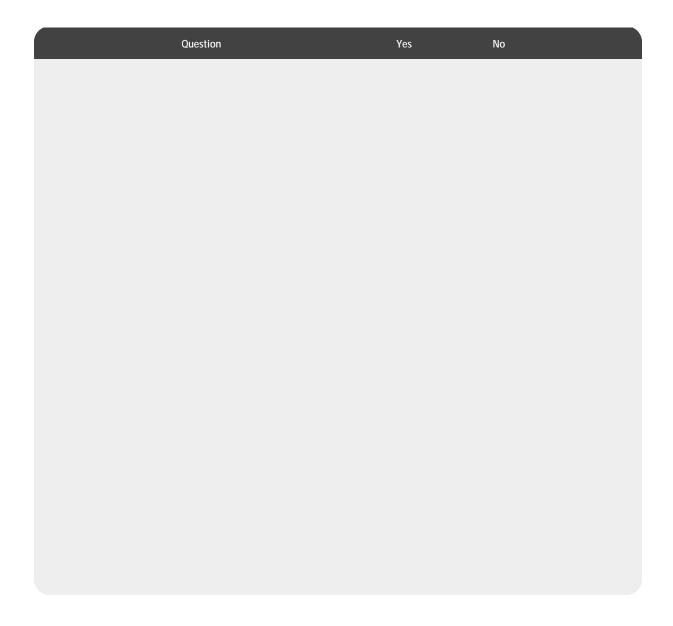


Exhibit 7.3 summarizes the QCMs' observations during the second part of the testing session. In over 90 percent of the sessions, the Test Administrator adhered to the prescribed time limits in the directions; the time spent to restart the testing session was 5 minutes or less. The rest of the sessions took up to 10 minutes to restart the testing session. Similar to the timing of Part 1, the average testing session in Part 2 was shorter than the 40 minutes allotted because students had finished the achievement test early.

About 65 percent of the Test Administrators kept to the testing script for signaling a break before administering the student questionnaire. Of those who did make changes, most made acceptable additions or other minor changes, such as paraphrasing the directions. More than 80 percent of the students requested additional time to complete the student questionnaire, which, in most cases, was granted.

Results of the remaining questions that focused on the test session activities are provided in Exhibit 7.4. These questions dealt with topics such as student compli-

ance with instructions, and the alignment of the scripted instructions with their implementation.

Exhibit 7.4 shows that in almost all of the sessions, the students complied well or very well with the instructions to stop testing. In more than half the sessions, however, the amount of time needed to complete the student questionnaire was longer than the time specified in the script. Usually this was

Exhibit 7.5: Summary Observations of the QCM

Question	Yes	No	Not Answered
During the testing sessions did the Test Administrator walk around the room to be sure students were working on the correct section of the test and/or behaving properly?	462	11	2
Did the Test Administrator address students' questions appropriately?	473	1	1
Did you see any evidence of students attempting to cheat on the tests (e.g., by copying from a neighbor)?	21	454	0
Were any defective test books detected and replaced <i>before</i> the testing began?	27	445	3
Were any defective test books detected and replaced <i>after</i> the testing began?	14	452	9
If any defective test books were replaced, did the Test Administrator replace them appropriately?	32	11	432
Did any students refuse to take the test either prior to the testing or during the testing?	11	462	2
If a student refused, did the Test Administrator accurately follow the instructions for excusing the student (collect the test book and record the incident on the Student Tracking Form)?	23	4	448
Did any students leave the room for an "emergency" during the testing?	58	411	6
If a student left the room for an emergency during the testing, did the Test Administrator address the situation appropriately (collect the test booklet, and if re-admitted, return the test booklet)?	61	11	403

#### 7.2.3 General Impressions

Section C of the Classroom Observation Record asked QCMs to reflect on their observations. The QCMs reported overall impressions of the test administration – including how well the Test Administrator monitored students' conduct, and any unusual circumstances that arose during the testing session (e.g., student refusal to participate, defective instrumentation, emergency situations, cheating).

The results presented in Exhibit 7.5 show that in almost all sessions, the testing took place without any problems. In the few sessions where problems arose due to defective instrumentation, the Test Administrator replaced the instruments appropriately.

In less than 5 percent of sessions, QCMs reported evidence of students attempting to cheat on the exam. However, when asked to explain the situation, QCMs generally indicated that students were merely looking around at their neighbors to see whether their test booklets were indeed different. Because the PIRLS test design involves 10 different booklets, students were unlikely to have the same booklet as their neighbors. Anyone who may have

Question	Yes	No	Not Answered
Do you anticipate that makeup session will be required at your school?	56	411	8
If you anticipate makeup sessions, do you intend to conduct one?	75	71	329
Did the students receive any special instructions, a motivational talk, or incentives to prepare them for the assessment?	178	278	19

Is this a complete list of the classes in this gr89mencn tl?278306 TD (75508529.7(19) T -296.794 -3.Toe lisbempleteuiredknowledgetru to prrts receL

## 7.3 Interview with the National Research Coordinator

In addition to observing testing sessions, QCMs conducted face-to-face interviews with the National Research Coordinator for their country. The QCM who attended the training session was responsible for conducting this interview, and for completing an Interview with the NRC Form.

The interview questions were designed to examine NRCs' experiences in preparing for, and conducting, the PIRLS data collection – with a focus on identifying and selecting samples, working with school coordinators, translating the instruments, assembling and printing the test materials, packing and shipping the test materials, scoring constructed-response questions, entering and verifying data, choosing quality assurance samples, and suggesting improvement in the process.

#### 7.3.1 Sampling

Section A of the NRC interview form involved questions about the sampling process. Topics covered in this section included the extent to which the NRCs used the manuals and sampling software provided by the International Study Center, and the extent to which the process was difficult in terms of the complexity of the tasks.

Exhibit 7.9 shows that only one country did not use the sampling manuals provided, mainly because Statistics Canada performed the sampling for the country. Just over two-thirds of the NRCs used the within-school sampling software provided by the IEA DPC to select classes. In the cases where the

sampling software was not used, the within-school sampling was done manually, or using other sampling software not provided by the ISC.

Some NRCs reported deviations from the sample design due to organizational constraints in their systems. A sampling expert was consulted in each case, to verify that the adopted design remained compatible with the PIRLS standards. Of those who found the sampling process very difficult, some NRCs cited the lack of personnel as a major obstacle. Despite any problems, all

### 7.3.3 Translating the Instruments

Section C of the NRC interview dealt with the difficulty of translating and adapting the assessment instruments and manuals.

Exhibit 7.11 shows that most NRCs reported little difficulty in translating and adapting the test booklets and questionnaires, and even less difficulty in translating the Test Administrator and School Coordinator manuals.

NRCs generally used their own staff (or a combination of staff and outside experts) to translate the test booklets. The majority of NRCs reported that they already had submitted the achievement test booklets to the translation verification program at the ISC. Of those that did not, one country did not make adaptations to the international version, and the other two had submitted their test booklets and questionnaires for verification – but did not receive verifier's comments in time to make all recommended changes.

Question	Own Staff	Outside Experts	Combination	Not Answered
Did you use your own staff or outside experts to translate the test booklets for verification?	8	6	17	2

	Very difficult	Somewhat difficult	Not difficult at all	Not Answered
How difficult was it to translate and/or adapt the test booklets?	1	15	15	2
How difficult was it to adapt the questionnaires?	0	18	14	1
How difficult was it to adapt the Test Administrator Manual?	0	10	22	1
How difficult was it to adapt the School Coordinator Manual?	0	10	19	4

	Yes	No	Not Answered
Did you go through the process of submitting test booklets and receiving a translation verification report from the IEA?	29	3	1
Did you translate, or do you plan to translate, the Scoring Guides for Constructed-Response Items?	20	12	1

#### 7.3.4 **Assembling and Printing the Test Materials**

Section D of the NRC survey addressed assembling and printing the test materials. Also, it included instructions for quality control issues related to checking the materials and securely storing them.

The results in Exhibit 7.12 show that NRCs were able to assemble the test booklets according to the instructions provided, and that almost all NRCs conducted the recommended quality control checks during the

process. In the cases where the NRCs did not conduct quality assurance procedures during the printing process, it was because of a shortage of time.

Most countries elected to send their test booklets and questionnaires to an external printer, but printed their manuals in-house. All NRCs reported having followed procedures to protect the security of the tests during assembly and printing. In no instance was there a breach of security reported.

Question	Yes	No	Not Answered	
Were you able to assemble the test booklets according to the instructions provided by the International Study Center?	29	4	0	
Did you conduct the quality assurance procedures for checking the test booklets during the printing process?	28	5	0	
Were any errors detected during the printing process?	11	19	3	
If errors were detected, what was the nature of the errors?				
Poor print quality	6	5	22	
Pages missing	1	9	23	
Page order	2	8	23	
Upside down pages	1	9	23	
Did you follow procedures to protect the security of the tests during the assembly and printing process?	31	1	1	
Did you discover any potential breaches of security?	0	32	1	

Question	In-House	External	Combination	Not Answered
Where did you print the test booklets?	6	21	6	0
Where did you print the questionnaires?	8	18	7	0
Where did you print the manuals?	22	7	3	1

# 7.3.5 Packing and Shipping the Testing Materials

Section E of the NRC interview addressed the extent to which NRCs detected errors in the testing materials as they were packed for shipping to School Coordinators. As

# 7.3.6 Scoring Constructed-Response Questions

Section F of the NRC interview form focused on the NRC's preparation for scoring the constructed-response items. The scoring process was an ambitious effort, requiring the recruitment and training of

### References

Progress in International Reading Literacy Study (PIRLS). (2001) Manual for International Quality Control Monitors (PIRLS Ref. No. 01-0005). Prepared by the International Study Center at Boston College. Chestnut Hill, MA: Boston College.