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ABSTRACT

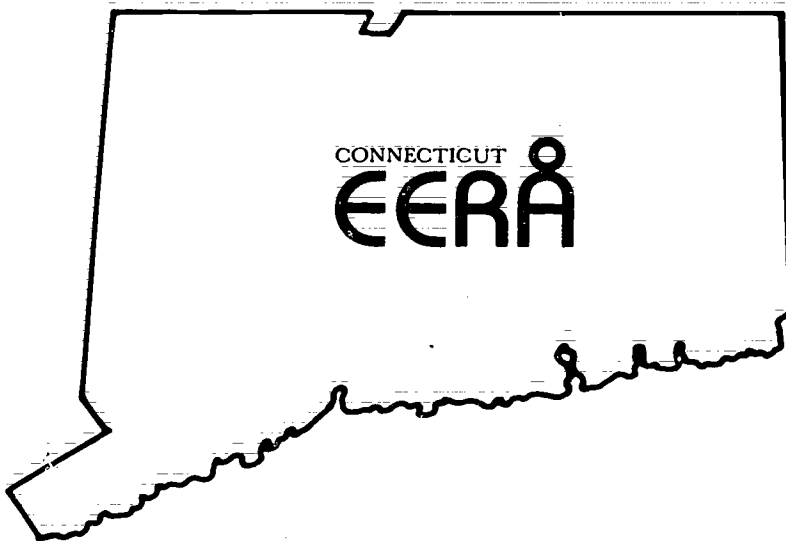
The Connecticut Mastery Test was designed to assess specific skill levels of students by measuring performance on various learning objectives that students can be expected to master. The grade 4 Connecticut Mastery Test, given for the first time in the fall of 1985, provides information which can be used to improve instruction and the basic skills in mathematics and language arts. This report covers: (1) the legislative background; (2) the mastery test development process, including test construction, pilot tests, surveys and mastery test content; (3) setting mastery standards by objective, including remedial (grant) standards; (4) test administration and scoring, including testing guidelines, scoring of the language arts and mathematics test, scoring of the writing sample, analytic scoring, and scoring of the Degrees of Reading Power (DRP) test; (5) reporting of the school district test results; and (6) Fall 1985 statewide mastery test results for mathematics and language arts, with test results by district and participation rate results. Supporting data and information are included in charts and appendices. (BAE)

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CONNECTICUT EDUCATION EVALUATION AND REMEDIAL ASSISTANCE

GRADE 4 MASTERY TEST RESULTS

SUMMARY AND INTERPRETATIONS 1985-86



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GRADE 4 MASTERY TEST RESULTS

SUMMARY AND INTERPRETATIONS: 1985-86

STATE OF CONNECTICUT DEPARTMENT OF EDUCATION

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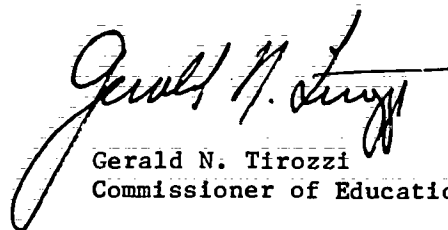
One of my highest priorities and a very central aspect of Connecticut's Challenge: An Agenda for Educational Equity and Excellence is the implementation of the statewide mastery testing program in mathematics and language arts, including listening, reading and writing, for grades 4, 6, and 8. The testing program is designed to assess specific skill levels of students by measuring performance on various learning objectives that students reasonably can be expected to have mastered by the end of grades 3, 5, and 7.

The results of the Connecticut Mastery Test at three grade levels will be useful in evaluating:

- o individual student performance in mathematics and language arts;
- o the effectiveness of instructional programs in mathematics and language arts; and
- o the effectiveness of the remedial assistance programs in mathematics and language arts.

The grade 4 Connecticut Mastery Test, given for the first time in the fall of 1985, provides valuable educational information which can be used to improve instruction and the basic skills of Connecticut's students. The test results have helped local districts to re-examine curriculum and to identify students who have not mastered certain skills. The grade 6 and grade 8 Connecticut Mastery Tests will be given for the first time in the fall of 1986, along with the second administration of the grade 4 mastery test.

I encourage you to carefully review the mastery test results provided at the student, classroom and district levels. The Department is prepared to assist local school districts in the areas of curriculum and professional development.



Gerald N. Tirozzi
Commissioner of Education

ACKNOWLEDGEMENTS

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LEGISLATIVE BACKGROUND

In June 1984, the General Assembly of the State of Connecticut amended Section 10-14m-r of the Connecticut General Statutes, an act concerning Education Evaluation and Remedial Assistance (EERA). This law provides that:

- o By May 1, 1985, each local or regional board of education shall develop and submit for State Board of Education approval, a new plan of educational evaluation and remedial assistance. Each plan is to address the following:
 - the use of student assessment results for instructional improvement
 - the identification of individual students in need of remedial assistance in language arts/reading, and mathematics
 - the provision of remedial assistance to students with identified needs
 - the evaluation of the effectiveness of the instructional programs in language arts/reading, and mathematics
- o The State Board of Education shall administer an annual statewide mastery test in language arts/reading, and mathematics to all fourth-, sixth-, and eighth-grade students.
- o Each student who scores below the statewide remedial standard on one or more parts of the eighth-grade mastery examination or the ninth grade proficiency test shall be retested. Starting in October 1987, these students shall be retested annually, using the eighth-grade mastery test, only in the deficient area(s) until such students score at or above the statewide remedial standard(s).
- o Biennially, each local or regional board of education shall submit to the State Board of Education a report which includes indicators of student achievement and instructional improvement.
- o On a regularly scheduled basis the State Board of Education shall complete field assessments of the implementation of local EERA plans.
- o On an annual basis, test results and low income data shall be used to determine the distribution of available state funds to support remedial assistance programs.

The purpose of this report is to summarize the development and implementation of the fourth-grade Connecticut Mastery Test. The mastery test assesses how well each student is performing on those skills identified by content experts and practicing educators as important for students entering fourth grade to have mastered.

OVERVIEW OF THE MASTERY TEST DEVELOPMENT PROCESS

In the spring of 1984, the Connecticut General Assembly amended the Education Evaluation and Remedial Assistance (EERA) legislation to authorize the creation of mastery tests in the basic skill areas of mathematics and language arts, including listening, reading and writing skills. The tests were to be established for grades 4, 6, and 8.

The goals of the mastery testing program are:

- o earlier identification of students needing remedial education;
- o testing a more comprehensive range of academic skills;
- o setting high expectations and standards for student achievement;
- o more useful test achievement information about students, school and districts;
- o improved assessment of suitable equal educational opportunities, and
- o continual monitoring of students in grades 4, 6, and 8.

The type of test that best addresses these goals is a criterion-referenced test. Criterion-referenced tests are designed to assess the specific skill levels of students. Such tests usually cover relatively small units of content. Their scores have meaning in terms of what the student knows or can do. Test results are used to identify the areas of strengths and weaknesses of each student.

Test Construction

The development of the fourth-grade criterion-referenced mastery test required the formation of seven statewide advisory committees. These included the Mathematics and Language Arts Committees, the Psychometrics Committee, the Bias Committee, the Mastery Test Implementation Advisory Committee, and two standard setting committees, one for mathematics and one for language arts. These committees were comprised of representatives from throughout the state. Members were selected for their area of expertise. Some 150 Connecticut educators participated on the mastery test committees which met over 80 times over an 18-month period (see Acknowledgements, p. vii).

Beginning in the spring of 1984, content committees in both language arts and mathematics participated in each stage of the test development process, including assisting the State Department of Education in the selection of the Psychological Corporation as its test contractor. First, the content committees reviewed the curriculum materials prevalent throughout the state and the scope of the national tests in use in Connecticut at the respective grade levels. The Connecticut curriculum guides in mathematics and language arts, developed in 1981, were valuable resources, as well as the results of recent Connecticut Assessment of Educational Progress (CAEP) assessments in mathematics and language arts. Next, the committees identified sets of preliminary mathematics and language arts objectives which reflected existing curriculum materials and the goals of the mastery testing program. The content committees defined an objective as an operationalized learning outcome that was fairly narrow and clearly defined.

Four criteria were used in identifying the appropriate learning outcomes or test objectives and in selecting specific test items to be included on the Grade 4 Connecticut Mastery Test. To be considered for use, test objectives and items must be:

- (1) significant and important,
- (2) developmentally appropriate,
- (3) reasonable for most students to achieve, and
- (4) generally representative of what's taught in Connecticut schools.

Once the objectives were identified, item specifications and/or sample items were written. Item specifications are written descriptions of the types and forms of test items that assess an objective. They also prescribe the types of answer choices that can be used with each item.

After the test specifications were written and agreed upon, the test contractor wrote items and response choices for each of the objectives. The items were then reviewed by the content committees. Items which met the criteria of the test specifications and received the approval of the content committees were considered for the pilot test. Before testing, the Bias Committee reviewed each item for potential adverse discrimination of gender, race or ethnicity in the language or format of the question or response choices. After their review was completed, the pilot test forms were constructed. Over 500 customized Connecticut items were included in the October 1984 Grade 4 pilot test in language arts and mathematics.

The Psychometrics Committee provided advice concerning other aspects of the pilot test including the sampling design, statistical bias analysis, the design of item specifications, and pilot test administration procedures. The recommendations proposed by the Psychometrics Committee were reviewed and endorsed by the Mastery Test Implementation Advisory Committee.

Pilot Tests

After the items had been reviewed, twelve test forms (six in mathematics, and six in language arts) were piloted for the Grade 4 test. The purpose of several pilot test forms was to ensure that enough test items were included to construct three comparable test forms from the pilot test results.

Over 6,000 Grade 4 students participated in the October 1984 pilot test. In January 1985, the pilot test results were made available to Connecticut State Department of Education (CSDE) staff. The process of selecting items to construct three comparable test forms began by the Bias Committee examining the pilot test statistics of each item for potential bias. As a result, some items were eliminated from the item pool. From the remaining items, test forms were constructed to be equivalent in content and difficulty at both the objective and total test levels.

Once the items were sorted on this basis, the test contractor prepared three complete forms of the mathematics test and two complete forms of the language arts test. These forms were approved by the content committees. Each form was created to be equal in difficulty and test length. A third language arts test will be constructed after a few additional items are piloted as part of a future test administration. The psychometric procedures used to construct these test forms focus primarily on the use of the one-parameter latent trait model.

Survey

In October 1984, a survey of preliminary Grade 4 mastery test objectives was sent to over 3,000 Connecticut educators. The purpose of the survey was to determine (1) the importance of the proposed mathematics and reading/language arts objectives, and (2) whether the objectives were taught prior to the fall of grade 4. Over a 50% response rate was achieved which included approximately one-third of the respondents representing urban school districts. As a result of the survey, two objectives were not considered to be important learning outcomes before fourth-grade and consequently were eliminated from the fourth-grade language arts test by the Language Arts Committee.

Mastery Test Content

Mathematics. The Mathematics Committee recommended a Grade 4 mathematics test that assessed twenty-five (25) specific objectives in four domains: (1) Conceptual Understanding; (2) Computational Skills; (3) Problem Solving/Applications; and (4) Measurement/Geometry. There are four test items per objective for a total of 100 items on the mathematics test. A detailed list of domains, objectives, and number of items per objective is given in Appendix A (p. 19).

Language Arts. The Language Arts committee recommended a 103 item Grade 4 language arts test that covers two domains: Reading/Listening, and Writing/Locating Information. The eleven (11) objectives recommended by the Language Arts Committee are presented in Appendix B (p. 21).

The general content of Reading/Listening consisted of narrative, expository, and persuasive passages on a variety of topics measuring a student's ability in: (1) Literal Comprehension; (2) Inferential or Interpretive Comprehension; and (3) Critical or Evaluative Comprehension. Audiotapes were used to assess students' listening comprehension ability in: (1) Literal Comprehension; and (2) Inferential and Evaluative Comprehension. The Degrees of Reading Power Test, which included eight (8) passages and fifty-six (56) test items and was designed to measure a student's ability to understand nonfiction English prose at different levels of reading ability, was also used to assess reading.

The general content of Writing/Locating Information consisted of three components. First, writing skills were directly assessed. Each student was asked to write a composition on a designated topic. Writing was judged on a student's demonstrated ability to convey information in a coherent and organized fashion. Second, the mechanics of good writing, which was defined as (1) Capitalization and Punctuation, (2) Spelling, Homonyms and Abbreviations, and (3) Agreement, was assessed in a multiple choice format. Third, Locating Information, (Schedules, Maps, Index and References, and Dictionary Meaning) measured students' ability to find and use information from the sources listed. A detailed list of objectives and number of items per objective is given in Appendix B.

SETTING MASTERY STANDARDS BY OBJECTIVE

The essence of the Connecticut Mastery Test (CMT) is the establishment of a specific mastery standard that accurately reflects students' knowledge and competency on each objective. The mastery test incorporates appropriate and challenging expectations for Connecticut public school students. The goal of the CMT Program is for each student to achieve mastery of all objectives. The objectives being tested were identified as appropriate and reasonable for students at each of the grades tested. These tests are designed to measure students' performance against these specific objectives.

The process of establishing the mastery standards by objective used a statistical method that required two decisions to be operationalized. The first decision defined a student who mastered a particular skill as one who had a 95% chance of correctly answering each item within the objective. The second decision was that the specific standard for each objective would identify 99% of the students who mastered the skill. For example, literal reading comprehension is measured by 12 questions. By applying the two decision rules stated above to a binomial distribution table, a student is identified as mastering the skill if he/she gets at least 9 of the 12 items correct.

The mastery standards are as follows:

- o In mathematics, for each of the 25 objectives, a student must answer correctly at least 3 out of 4 items.
- o In language arts, for the nine multiple choice objectives with varying numbers of items, a student must answer correctly the following number of items:

	<u># Items Correct for Mastery</u>
Reading Comprehension	
(1) Literal	9 out of 12
(2) Inferential	10 out of 14
(3) Evaluative	7 out of 10
Listening Comprehension	
(4) Literal	5 out of 7
(5) Inferential & Evaluative	9 out of 13
Writing Mechanics	
(6) Capitalization and Punctuation	9 out of 12
(7) Spelling Words, Homonyms and Abbreviations	7 out of 9
(8) Agreement	11 out of 15
(9) Locating Information	8 out of 11

No mastery levels were set for the two holistic language arts measures, the Degrees of Reading Power (DRP) test and the Writing Sample, since these measures are not composed of objectives against which mastery could be assessed.

Setting Remedial (Grant) Standards

The Psychometrics Committee also considered alternative ways to set standards for grant and remedial purposes. Public Act 84-294 requires that the Connecticut State Board of Education establish statewide standards for remedial assistance in order to meet two responsibilities:

- to identify and monitor the progress of students in need of remedial assistance in language arts/reading and mathematics as part of the EERA field assessments; and
- to distribute EERA funds based on the number of needy students statewide, as well as for use in the Chapter 2 and Priority School District Grants.

The Psychometrics Committee advised setting the standards by the number of items correct because of important technical considerations in equating test forms. The committee conducted lengthy deliberations over the technical feasibility of establishing standards by the number of objectives passed but felt there were significant obstacles which could not be overcome. Standard-setting committees in mathematics and language arts/reading were convened in March 1985 to determine the grant/remedial standards. The standard-setting committees recommended the following remedial standards:

1. In mathematics, a student who answers fewer than 69 of the 100 items (69%) correctly is required to receive further diagnosis by the local school district and, if necessary, to be provided with remedial assistance.
2. In reading, a student whose Degrees of Reading Power (DRP) unit score is lower than 41 is required to receive further diagnosis and, if necessary, to be provided with remedial assistance.
3. In writing, a student receiving a total holistic score less than 4 is required to receive further diagnosis by the local school district and, if necessary, to be provided with remedial assistance.

The recommendations of the Psychometrics Committee and the Standard Setting Committees were reviewed by the Mastery Test Implementation Advisory Committee in March 1985. The Mastery Test Implementation Advisory Committee (MTIAC) endorsed the procedures used to establish the remedial standards with the clarification that the remedial standards should be considered broad indicators of student achievement and need. The value of the criterion-referenced test is as a diagnostic tool to help districts identify students in need of remedial assistance, to target State Department of Education resources to those students most in need, and to provide useful information to local school districts for improving their curriculum and instructional programs. The MTIAC felt strongly that the data generated by the State Department of Education should not be used to compare performance among districts.

The mastery and remedial standards were adopted, as recommended, by the State Board of Education on June 23, 1985. For a detailed explanation of the remedial standard-setting process, see Appendix C (p. 23).

TEST ADMINISTRATION AND SCORING

Test sessions were conducted by local school district staff under the supervision of local test coordinators who had been trained by staff of the Department and the Psychological Corporation. A student who took all subtests participated in approximately six hours of testing.

In order to accommodate the number of religious holidays in late September and early October, the Grade 4 Mastery Test schedule allowed for three weeks of testing (including make-ups). Also, in order to allow local districts as much latitude as possible in adapting test administration to local conditions and students' needs, local plans for administration of the Grade 4 Mastery Test were acceptable if the following guidelines were met for all students:

Testing Guidelines: Grade 4 Connecticut Mastery Test

- a) The writing sample MUST occur on Tuesday, September 24, 1985.
- b) Other testing must occur sometime between September 23 and October 4, 1985.
- c) All fourth graders in a district must be tested on the same schedule.
- d) Testing must occur during the regular school day in a regular classroom setting.
- e) No more than two (2) testing sessions may be administered in one day with at least a half-hour break between testing sessions (e.g., two a.m. sessions or one a.m. session and one p.m. session).
- f) Make-up sessions MUST conclude by Friday, October 11, 1985. Conditions "d" and "e" above must also hold for all make-up sessions.

The Grade 4 Connecticut Mastery Test had seven testing sessions. Each session included five minutes for instructions.

- mathematics I (60 minutes)
- mathematics II (60 minutes)
- writing sample (45 minutes)
- Degrees of Reading Power (45 minutes)
- reading comprehension (45 minutes)
- listening comprehension (45 minutes)
- writing mechanics/locating information (45 minutes)

At the conclusion of the make-up testing period, answer booklets were returned to National Computer Systems (NCS) of Iowa City, Iowa and organized in preparation for holistic scoring workshops and optical scanning and scoring.

Scoring of the Language Arts and Mathematics Test

The mathematics and language arts multiple-choice tests were machine-scored by NCS. Mathematics scores were reported for the total test as well as for mastery by each objective. Likewise, language arts scores were reported for the total test as well as for mastery of each objective.

Scoring of the Writing Sample

The writing sample was scored by Connecticut elementary teachers using a technique known as the holistic scoring method. Holistic scoring is an impressionistic and quick scoring process that rates written products on the basis of their overall quality. It relies upon the scorers' trained understanding of the general features that determine distinct levels of achievement on a scale appropriate to the group of writing pieces being evaluated.

The major assumption upon which holistic scoring is based is that the quality of a piece of writing should be judged on its overall success as a whole presentation, rather than on the quality of its component parts. Contributing to the rationale underlying holistic scoring is evidence that: (1) no aspect of writing skill can really be judged independently; (2) teachers can recognize and agree upon good writing when they see it regardless of how they describe writing ability, and (3) teachers will rate pieces of writing in much the same way regardless of any discrepant views they might hold about how particular components of writing should be weighed.

The procedure for holistic scoring is specific to the complete set of writing samples on a given topic that a group of scorers have been asked to evaluate. That is, the scoring scale is based on the range of ability reflected in the particular set of writing samples being assessed.

Preparation for scoring. Prior to the training/scoring sessions, a committee consisting of Connecticut State Department of Education (CSDE) consultants, representatives of the language arts committee and other language arts specialists, two Chief Readers and project staff from Measurement Inc. of Durham, North Carolina, met and read a substantial number of essays drawn from the total pool of essays to be scored. Approximately 60 essays were selected to serve as "range-finders" or "marker papers," representing the range of achievement demonstrated in the total set of papers. Copies of those range-finders served as training papers during the scoring workshops which followed. Each range-finder was assigned a score according to a four-point scale, where 1 represents a poor paper and 4 represents a superior paper.

Scoring workshops. During the month of November, eight holistic scoring workshops were held in two different locations in the state. Attendance at these scoring workshops totaled 700 teachers. A Chief Reader and two assistants were present at every workshop in addition to representatives of the CSDE. Each workshop consisted of a training session and a scoring session.

The general procedure for a training session is described below.

- o Each training paper (range-finder) was studied in turn and trial-scored by all scorers. Scoring judgments were independent, quick, and immediate, and were based on the scorer's overall impression of the paper. No fractional points on the score scale (1-4) were permissible.
- o After all scorers had scored the first four training papers, their judgments were compared to the score assigned during the range-finding process. Any discrepancies were discussed. Through repeated discussions on succeeding training papers, scorers came to identify and internalize those features of written composition that distinguish the papers along the established range. This "holistic" process obviates the need to articulate explicitly the specific criteria that separate one score point from the next.

- o Scorers were "calibrated" by ascertaining that they were making judgments consistent with one another and with the Chief Reader/table leaders. Discussions about papers continued until agreement was reached on the scores of the training papers.

Once scorers were calibrated, actual scoring of the writing exercises occurred. Each paper was read independently by two different scorers; that is, the second reader did not see the score assigned by the first reader. The Chief Reader was responsible for adjudicating any disagreement of more than one point between the judgments of the two scorers as well as any score in combination with a zero score. In other words, discrepancies of one point between scores (e.g., 4 and 3, 1 and 2, 2 and 3) were acceptable, but larger discrepancies (e.g., 2 and 4, 3 and 1, 1 and 4, as well as 0 and 1, 2, 3, or 4) had to be resolved by the Chief Reader. Once a paper was assigned two non-discrepant scores, the two scores would be summed to produce the final score for each student. The possible scale of summed scores ranged from a low of 2 to a high of 8.

Understanding the holistic scores. Examples of actual student papers which are representative of the scoring range will assist the reader in understanding the statewide standard set for writing and in interpreting the test results. Sample papers representing four different holistic scores are presented in Appendix D (p. 29). Note that the process of summing the scores assigned by the two readers expands the scoring scale to account for "borderline" papers. A paper which receives a 4 from both scorers (for a total score of 8) is likely to be better than a paper to which one reader assigns a 4 and another reader assigns a 3 (for a total score of 7). In addition, it should be emphasized that each of the score points represents a range of student papers--some 4 papers are better than others.

A score of zero (0) was assigned to student papers in certain cases. A score of 0 indicates that a paper is not scorable and, therefore, that the student's writing skills remain to be assessed. The cases in which a score of 0 was assigned were as follows:

- o responses merely repeated the assignment
- o illegible responses
- o blank responses
- o responses in languages other than English
- o responses that failed to address the assigned topic in any way
- o responses that were too brief to score accurately, but which demonstrated no signs of serious writing problems (for example, a response by a student who wrote the essay first on scratch paper and who failed to get very much of it recopied)

Both readers had to agree that a paper deserved a zero before this score was assigned. If the two readers disagreed, the Chief Reader arbitrated the discrepancy. Papers which were assigned a score of zero were not included in summary reports of test results.

Analytic Scoring

All papers receiving holistic scores below the remedial standard also received analytic scoring in five categories (traits): focus, organization, support/elaboration, mechanics and sentence formation. Analytic scoring is a thorough, trait-by-trait analysis of those components of a writing sample that are considered important to any piece of writing in any context. This scoring procedure can provide a comprehensive picture of a student's writing performance if enough traits are analyzed. It can identify those traits that make a piece of writing effective or ineffective. However, the traits need to be explicit and well defined so that the raters understand and agree upon the basis for making judgments about the writing sample. The analytic rating guide and sample marker papers for the analytic scoring are presented in Appendix E (p. 37).

Scoring of the Degrees of Reading Power (DRP) Test

The scores reported are in DRP unit scores. These scores identify the difficulty or readability level of prose that a student can read with comprehension. This makes it possible to match the difficulty of written materials with student ability. These scores can be better interpreted by referring to the readability levels of some general reading materials as shown below:

- o Elementary textbooks (grades 3-5) - 35-58 DRP Units
- o Fiction Section - child magazines - 48 DRP Units

A much more extensive list of reading materials is contained and rated in the booklet Readability Report, Seventh Edition, published by The College Board.

The conversion between DRP unit scores and raw scores can be made from the tabled values in The College Board's Degrees of Reading Power PB Series Conversion Tables, effective March, 1985.

SCHOOL DISTRICT TEST RESULTS REPORTING

The CMT school district reports are designed to provide useful and comprehensive test achievement information about students, schools and districts. Four standard test reports are generated to assist teachers, principals, superintendents and parents to understand and use criterion-referenced test results. Appendix F (p. 61) presents samples of the school district and parent/student diagnostic score reports.

FALL 1985 STATEWIDE MASTERY TEST RESULTS

The Grade Four Connecticut Mastery Test provides a comprehensive report card on how students perform on specific skills that Connecticut educators feel are important at the beginning of fourth grade. The mastery test is instructionally useful since it identifies areas of weakness, as well as areas of strength.

Mathematics

In mathematics, fourth graders mastered an average of 19.3 objectives of the 25 tested, or 77.2 percent. The state's goal is that all students master every objective, or 100 percent. Chart 1 (p. 13) illustrates that, statewide, students demonstrated strong scores in the areas of basic facts and simple applications (such as addition/subtraction to 18; addition/subtraction without regrouping; and addition with regrouping), but students did not perform as well on items that require higher level thinking -- that is, conceptual and analytical skills (e.g., rewrite numbers by regrouping and identify number sentences from pictures). While students demonstrated acquisition of basic mathematical skills, the results show weaker performance on items that assess an understanding of place value and estimation.

Students also performed poorly on topics not emphasized in primary school mathematics textbooks, such as use of patterns and ability to interpret pictorial representations of mathematical relationships.

A total of 67 percent of the students mastered 19 or more objectives on the mathematics test, and 8 percent mastered all 25 objectives (see Appendix G, p. 73).

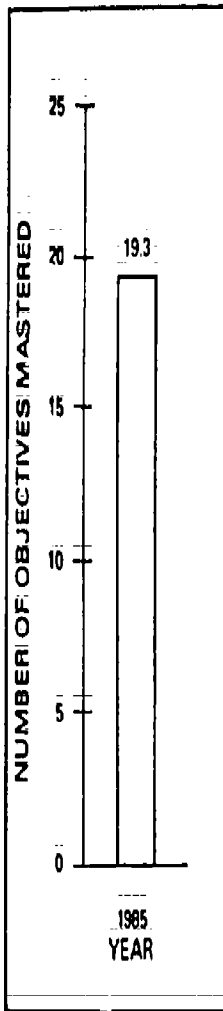
Students getting fewer than 69 questions correct on the 100-question mathematics section (20%) were identified as needing further diagnosis and possible remedial instruction.

Language Arts

In language arts, grade 4 students averaged 6.1 objectives of the nine tested, or 67 percent. The state's goal is that all students master every objective, or 100 percent. Chart 2 (p. 14) illustrates that while students did reasonably well on writing mechanics and on locating information, significant weaknesses are found in higher order inferential and evaluative reading and listening comprehension. A total of 63 percent of the students mastered six or more objectives on the language arts test, which includes writing and reading skills, and 28 percent of the students mastered all nine objectives (see Appendix G, p. 73).

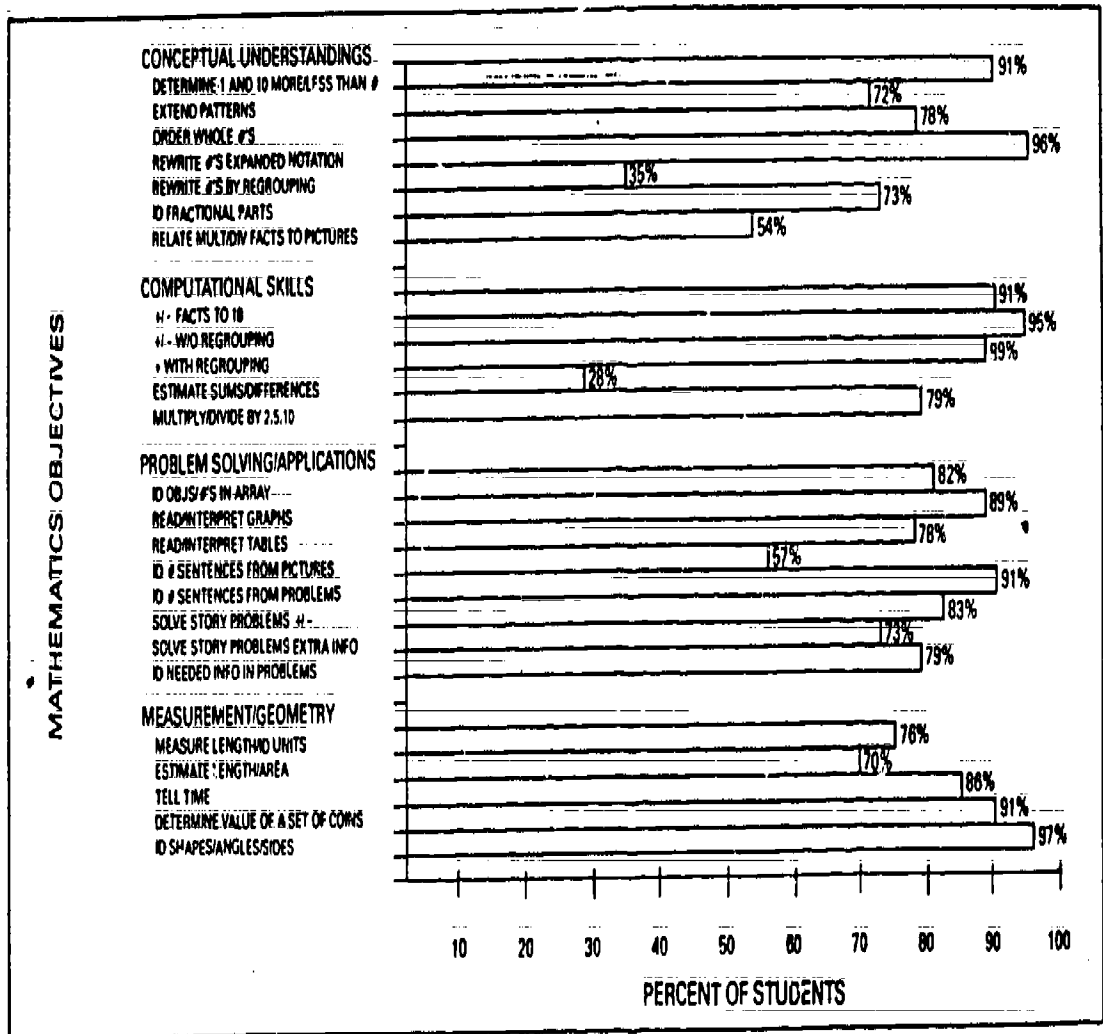
In writing, grade 4 students averaged 4.8 points on a scale of 2 through 8. The state's goal is that all students be able to produce an organized, well-supported piece of writing, that is, a score of 7 or 8. Chart 3 (p. 15) illustrates that 17 percent of the students produced an

**MATHEMATICS:
AVERAGE NUMBER OF
OBJECTIVES MASTERED**



This bar chart illustrates the average number of mathematics objectives mastered, statewide.

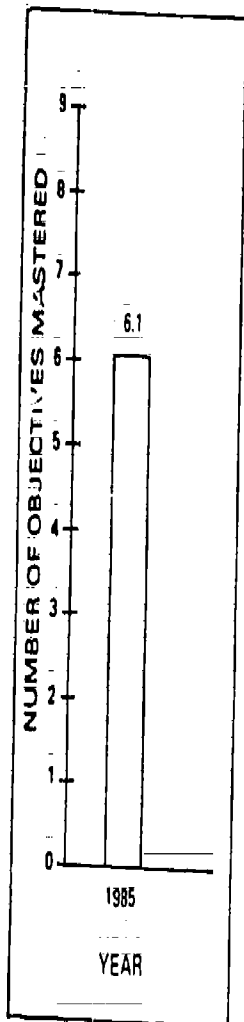
MATHEMATICS: PERCENT OF STUDENTS ACHIEVING MASTERY FOR EACH OBJECTIVE



This bar chart illustrates the percent of students, statewide, who mastered each of the 25 mathematics objectives.

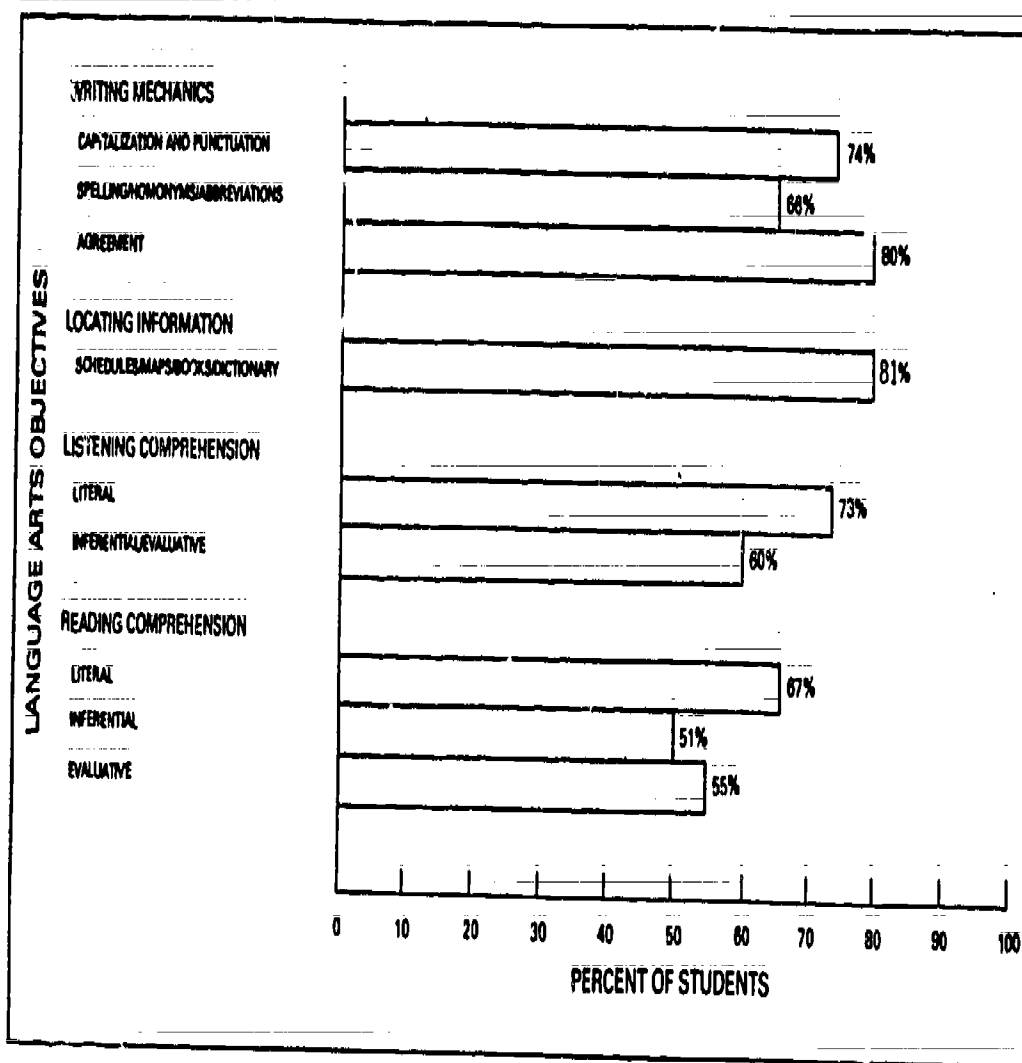
Chart 2
Language Arts: Percent of Students Achieving Mastery For Each Objective

**LANGUAGE ARTS:
 AVERAGE NUMBER OF
 OBJECTIVES MASTERED**



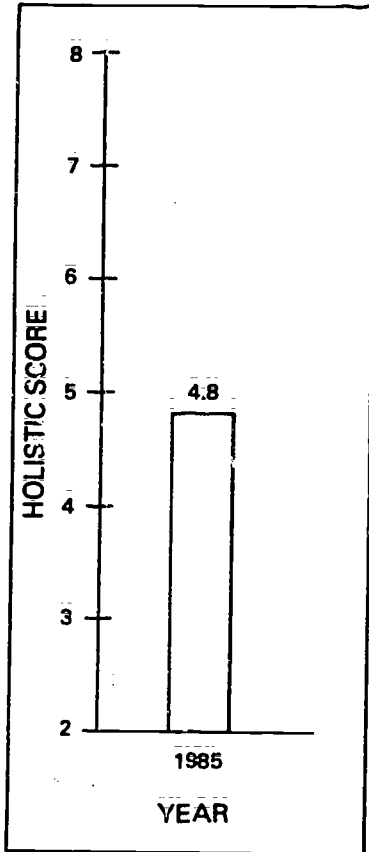
This bar chart illustrates the average number of language arts objectives mastered, statewide.

LANGUAGE ARTS: PERCENT OF STUDENTS ACHIEVING MASTERY FOR EACH OBJECTIVE



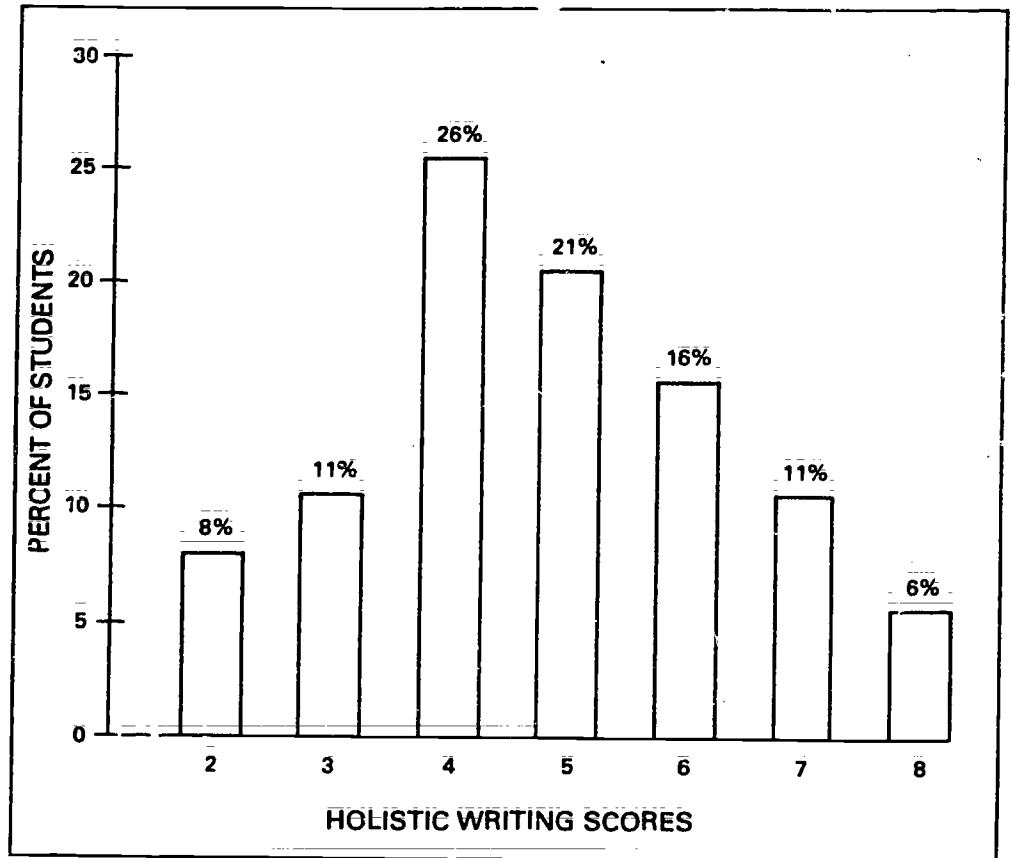
This bar chart illustrates the percent of students, statewide, who mastered each of the nine language arts objectives.

**WRITING SAMPLE:
AVERAGE HOLISTIC SCORE**



This bar chart illustrates the average *holistic writing score* of students, statewide.

**WRITING SAMPLE:
PERCENT OF STUDENTS AT EACH SCORE POINT**

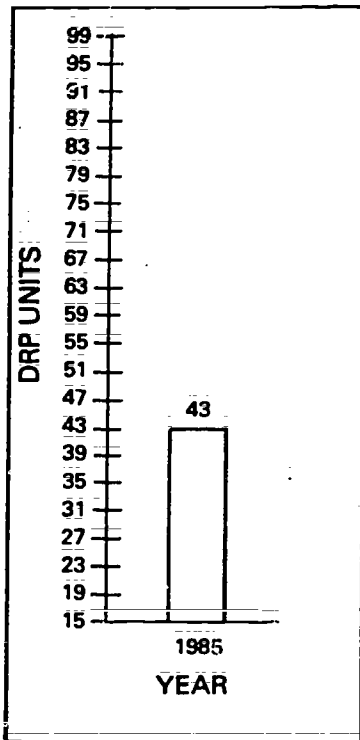


This bar chart illustrates the distribution of students who received each *holistic writing score*, statewide. Holistic writing scores are interpreted as follows: a student who scores 7 or 8 has produced a paper which is well written with developed supportive detail; a student who scores 5 or 6 has produced a paper which is generally well organized with supportive detail; a student who scores 4 is minimally proficient; and a student who scores 2 or 3 is in need of further diagnosis and possible remedial assistance.

Chart 3

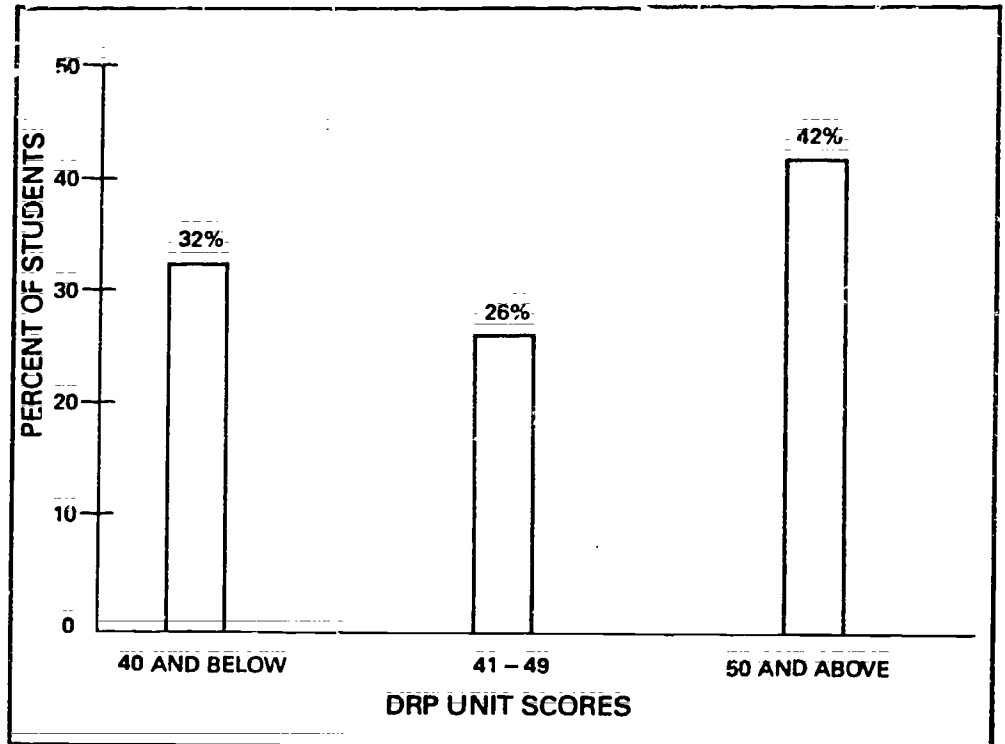
Writing Sample: Percent of Students at Each Score Point

**DEGREES OF READING
POWER® (DRP)®:
AVERAGE DRP
UNIT SCORE**



This bar chart illustrates the average *DRP unit* score of students, statewide.

**DEGREES OF READING POWER® (DRP)®:
PERCENT OF STUDENTS AT SELECTED RANGES OF DRP UNIT SCORES**



This bar chart illustrates the distribution of students, statewide, scoring in each of three *Degrees of Reading Power* (DRP) score categories. DRP score categories are interpreted as follows: a student who scores 50 DRP units or above can read, with high comprehension, materials which are typically used at grade 4 or above; a student who scores 41-49 DRP units can read, with high comprehension, materials which are typically used below grade 4 but above the Remedial Standard; and a student who scores 40 DRP units or below is in need of further diagnosis and possible remedial assistance.

Chart 4
Degrees of Reading Power: Percent of Students
At Selected Ranges of DRP Unit Scores

organized, well-supported piece of writing (a 7 or an 8 score), and an additional 37 percent produced a paper which is generally well organized (a 5 or a 6 score). Another large group, 26 percent, scored a 4, which is defined as a "minimally proficient piece of writing." A total of 19 percent of the students scored a 2 or a 3, which is below the remedial standard.

In reading, grade 4 students averaged 43 units on a scale of 15 through 99. The state's goal is that all students be able to read with high comprehension materials typically used at the fourth grade or above, that is, at least 50 on the scale. Chart 4 (p. 16) illustrates that 42 percent of the students scored at least 50 on the reading section, 26 percent scored between 41 and 49, and 32 percent scored below 41, which is the remedial standard. The average score of 43 suggests that Connecticut fourth graders typically can read, with high comprehension, materials normally used up to grade 4.

Test Results by District

Appendix H (p. 77) and Appendix I (p. 85) present a listing of the mathematics and language arts test results, respectively, for Connecticut school districts. School districts are listed alphabetically, followed by regional school districts. The Type of Community (TOC) designation in the second column indicates the group with which each district or school has been classified. A definition of the TOC classifications is provided in Appendix J (p. 93).

Because the most valid comparisons for district scores are longitudinal within each district, the State Department of Education advises against making school district comparisons. The following caution should also be noted:

- o It is not appropriate or meaningful to sum across the different tests and subtests because of differences in test length and mastery and remedial standards. These comparisons are inappropriate since it is impossible to identify, solely on the basis of the above information, how the average student has performed in the districts being compared. Average scores and standard deviations provide more appropriate comparative information on how well the average student is performing, although many factors may affect the comparability of these statistics as well.

Participation Rate Results

Appendix K (p. 95) presents the number of fourth-grade students in each district and the percents of students who participated in the grade four mastery testing during the Fall 1985 statewide administration. The alphabetical listing of districts provides the following information for each district:

Column 1	The number of fourth-grade students on October 1 according to the ED-025.
Column 2	The number of fourth-grade students at the time of testing.
Column 3	The difference between columns 1 and 2.
Column 4	The number of students eligible for testing.
Column 5	The percent of eligible students exempted from testing.
Columns 6-13	The percent and number of eligible students tested in each content area.

The results in Appendix K illustrate that participation rates by school district on the fourth-grade CMT were quite high, with only a few exceptions

APPENDIX A

Grade 4 Mathematics Objectives

Test Blueprint - Grade 4 Mathematics

The 25 objectives of the grade 4 mathematics test are listed below. There are four test items for each objective.

CONCEPTUAL UNDERSTANDINGS (28)

- *1. Identify the number one more, one less, ten more or ten less than a given number (4)
- *2. Extend patterns involving numbers and attributes (4)
- *3. Order whole numbers (4)
- *4. Rewrite numbers using expanded notation (4)
- *5. Rewrite numbers by regrouping tens and ones (4)
- *6. Identify fractional parts of regions and sets from pictures for halves, thirds, fourths and sixths (4)
- *7. Relate multiplication and division facts to rectangular arrays (4)

COMPUTATIONAL SKILLS (20)

- *8. Know addition and subtraction facts to 18 (4)
- *9. Add and subtract one- and two-digit numbers without regrouping (4)
- *10. Add one- and two-digit numbers with regrouping (4)
- *11. Estimate sums and differences to 100 (4)
- *12. Multiply and divide by 2, 5 and 10 (4)

PROBLEM SOLVING/APPLICATIONS (32)

- *13. Identify objects or numbers that do or do not belong in a collection, matrix or array (4)
- *14. Read and interpret bar graphs and pictographs (4)
- *15. Read and interpret data from tables and charts (4)
- *16. Identify or write number sentences from pictures (4)
- *17. Identify number sentences from addition or subtraction story problems (4)
- *18. Solve simple story problems involving addition or subtraction (4)
- *19. Solve and identify number sentences in simple story problems involving addition and subtraction, with extraneous information (4)
- *20. Identify needed information in problem situations (4)

MEASUREMENT/GEOMETRY (20)

- *21. Measure length and identify appropriate units for measuring length and distance (4)
- *22. Estimate lengths and areas (4)
- *23. Tell time to the nearest hour, half hour and quarter hour, using analog and digital clocks (4)
- *24. Determine the value of a set of coins (4)
- *25. Identify shapes, angles, and sides (4)

*The asterisk indicates that performance on this skill is reported at the student, classroom, school, district and state levels.

()Number of items for each content area or objective

APPENDIX B

Grade 4 Language Arts Objectives

88

-21-

29

Test Blueprint - Grade 4 Language Arts

There are nine multiple choice objectives and two holistic measures, one for reading and one for writing, within the grade 4 language arts test.

READING AND LISTENING

Reading Comprehension (36)

- *1. Literal (12)
- *2. Inferential (14)
- *3. Evaluative (10)

*Degrees of Reading Power (56)

Listening Comprehension (20)

- *4. Literal (7)
- *5. Inferential & Evaluative (13)

WRITING AND LOCATING INFORMATION

*Writing Sample[#] (1)
Writing Mechanics (36)

- *6. Capitalization and Punctuation (12)
- *7. Spelling Words, Homonyms and Abbreviations (9)
- *8. Agreement (15)
 - Verb Tense (5)
 - Subject Verb (5)
 - Pronoun Referents (5)
- *9. Locating Information (11)
 - Schedules (3)
 - Maps (3)
 - Index and Reference (3)
 - Dictionary (2)

*The asterisk indicates that performance on this skill is reported at the student, classroom, school, district and state levels.

()Number of items for each content area or objective

[#]Holistic scoring provided for all Grade 4 students. Analytic scoring provided for Grade 4 students who score below the remedial standard of 4 (on a scale of 2-8).

APPENDIX C

Remedial (Grant) Standard-Setting Process

Remedial (Grant) Standard-Setting Process

Background

There are several acceptable strategies for setting standards on criterion-referenced tests. Each of the proposed methods has one or more unique characteristics. One common element to the various methods is that they all offer to the individuals who are setting the standards some process which reduces the arbitrariness of the resulting standard. Different methods accomplish this in different ways. All methods systematize the standard-setting process so that the result accurately reflects the collective informed judgment of those setting the standard.

Types of Standard-Setting Methods

Standard-setting methods can generally be categorized into three types: test question review, individual performance review and group performance review. Test question review methods specify a procedure for standard setters to examine each test question and make a judgment about that question. For example, standard setters might be asked to rate the difficulty or the importance of each question. These judgments are then combined mathematically to produce a standard. Individual performance review methods also require standard setters to make judgments, but the judgments are made on the basis of examining data that indicate how well individual students perform on test items. These data may be based on actual pilot test results or projected results using mathematical theories. In this method, additional student information, such as grades, may also be used to inform the standard setters. Group performance review methods provide for judgments to be made based on the performance of a reference group of students. That is, standard setters review the group performance and make a determination where the standard should be set based on the group results.

Selection of a Standard-Setting Method

Several factors affect the choice of a particular standard-setting method. The type of test is one consideration. For example, some methods are only appropriate for multiple choice questions or for single correct answer questions while other methods are more flexible. For example, time constraints are a consideration if student performance data are necessary. In this case, a pilot test must be conducted and the test results must be analyzed prior to setting the standards. Another consideration is the relative importance of the decisions that will be made on the basis of the standard. For example, a classroom test affecting only a few students would not require as stringent a procedure as would a statewide test determining whether a student is allowed to graduate from high school. Other relevant factors include the number of test items, permanence of the standard, purpose of the test, and the extent of available financial and other resources to support the standard-setting process.

On February 4, 1985, the Mastery Test Psychometrics Committee met to consider the issue of standard-setting procedures and voted unanimously to approve the following proposal.

A PROPOSAL FOR SETTING THE REMEDIAL STANDARDS ON THE CONNECTICUT MASTERY TESTS

1. Two standard-setting committees will be created: one for mathematics and one for reading and writing.
2. This description of a minimally proficient student will be given to each of the committees:

Imagine a student who is just proficient enough in reading [writing, mathematics] to successfully participate in his/her regular fourth-grade coursework.

- 3.A In mathematics, an adaptation of the Angoff procedure will be used. The committee will be provided with each item appearing on one form of the mathematics test. The committee will be given the following directions:

Consider a group of 100 of these students who are just proficient enough to be successful in regular fourth-grade coursework. How many of them would be expected to correctly answer each of the questions.

The committee will rate each item. The committee will then be given the opportunity to discuss their rating of each item. Sample pilot data will be presented. Committee members will be given the opportunity to adjust their item ratings. The item ratings will then be averaged in accordance with the Angoff procedure in order to produce a recommended test standard.

- 3.B In reading, the committee will review and discuss each passage of the Degrees of Reading Power (DRP) test. Student performance data will be presented. The committee will consider the reading difficulty that should be expected of a student at the grade level being tested. The committee members will identify the passage that has the appropriate level of reading difficulty consistent with the above description of a minimally proficient student.
- 3.C In writing, the committee will read four sample essays. These essays will have been prescored holistically (on a scale from 2 to 8) in order to rank the quality of the essays. Committee members will classify essays into one of three categories: 1) definitely NOT proficient, 2) borderline, and 3) definitely proficient. These classifications will be discussed in light of the holistic scores. The committee will then classify approximately twenty-five additional essays. The essay ratings will be discussed in the same manner as the original four essays. When all essays have been discussed, the essays which fell in the borderline category will be focused upon to determine the standard. The committee will determine where among the borderline essays, the standard should be established.
4. The standards recommended in step 3 will be presented to the Mastery Test Implementation Advisory Committee for discussion and action.

Connecticut's Strategy

Several steps were employed to create an acceptable and valid test standard for Connecticut tests. Initially, a separate standard-setting committee was convened for each test on which standards are to be set. Individuals were chosen to serve as members on the committee on the basis of their familiarity with the area being assessed and the nature of the examinees. One source of such members is the test content committees related to the project. For example, members of the Mathematics Committee were represented on the committee setting standards for the mathematics mastery test.

The actual procedures used to set standards were an adaptation of a method proposed by William Angoff (1970). This test question review method required members of a standard-setting committee to estimate the probability that a question would be correctly answered by examinees who possess no more than the minimally acceptable knowledge or skill in the areas being assessed. Standard setters then reviewed pilot test data for sample items as further evidence of the appropriateness of the judgments being made. The original probability estimates assigned to each test question were reviewed and adjustments made by the standard setters. The final individual item probabilities were summed to yield a suggested test standard for each member of the committee. The suggested standards were averaged across members of the committee to produce the recommended test standard.

The recommended test standard was presented to the Mastery Test Implementation Advisory Committee and the State Board of Education.

In mid-March, Mathematics and Language Arts Standard-Setting Committees met to set the remedial standards for the grade 4 mastery test. The following information summarized the results of the standard-setting activities conducted by CSDE staff:

I. Mathematics (100 item test)

Using the procedures previously outlined, the standard setters rated each item and considered the pilot data. Committee members discussed items and were given the opportunity to adjust their initial ratings. The final ratings were averaged to produce a remedial standard. It is recommended that a raw score of 69 be the remedial mathematics standard. Below is a summary of the ratings.

<u>Procedure</u>	<u># Judges</u>	<u>Range %</u>	<u>Mean % Correct</u>	<u>Raw Score</u>
Angoff	21	56.7-81.3	68.7	68.7

II. Reading (Degrees of Reading Power, 56 item test)

Standard setters used two procedures to establish a remedial reading standard. First, they examined the passages in the Degrees of Reading Power (DRP) test, asking themselves which passage is too difficult for the student who is just proficient enough to successfully participate in fourth-grade coursework. Discussion occurred throughout this selection process.

Second, they examined textbooks which are typically used in grades 3 and 4 and selected those textbooks which a minimally proficient student would not be expected to read in order to successfully participate in fourth-grade coursework. Discussion occurred throughout this selection process.

The average readability values of the selected passages and textbooks and the pilot test data were then revealed to the standard setters. The standard setters discussed the readability values and the pilot test data and recommended the DPP unit score of 41 as the remedial standard. Below is a summary of the ratings.

<u>Procedure</u>	<u># Judges</u>	<u>Readability Range</u>
A. Test Passage Review	17	42-48 DRP Units
B. Textbook Review	17	42-51 DRP Units

III. Writing (45 minute writing sample)

Using the procedure previously outlined, standard setters read and rated 21 essays written to a narrative prompt and 21 essays written to an expository prompt. After discussions and final ratings, the holistic scores for the papers were revealed to the group. The committee then discussed the appropriate remedial writing standard in light of the degree to which their ratings matched the holistic scores. It was the recommendation of the committee that holistic writing score of 4 be used as the remedial writing standard. Below is a summary of the ratings.

<u>NARRATIVE PROMPT</u>			
<u>Rating After Discussion</u>			
<u>Holistic Score</u>	<u>Definitely NOT Proficient</u>	<u>Borderline</u>	<u>Definitely Proficient</u>
2	84%	4%	12%
3	37%	6%	57%
4	4%	4%	92%
5	8%	6%	86%
6	20%	2%	78%
7	4%	0%	96%
8	4%	2%	94%

<u>EXPOSITORY PROMPT</u>			
<u>Rating After Discussion</u>			
<u>Holistic Score</u>	<u>Definitely NOT Proficient</u>	<u>Borderline</u>	<u>Definitely Proficient</u>
2	94%	0%	6%
3	33%	2%	65%
4	4%	12%	84%
5	0%	2%	98%
6	2%	4%	94%
7	0%	0%	100%
8	0%	0%	100%

LANGUAGE ARTS STANDARD-SETTING COMMITTEE

Evelyn P. Burnham, Colebrook Public Schools
Nicholas P. Criscuolo, New Haven Public Schools
Mary R. Fisher, Thompson Public Schools
Marguerite Fuller, Bridgeport Public Schools
Anne Jackel, Thompson Public Schools
Dorothy Kaplan, Middletown Public Schools
Bob Lincoln, Tolland Public Schools
Virginia Lity, Bridgeport Public Schools
Virginia Manuells, Colebrook Public Schools

Moreen McDermott, Hartford Public Schools
Elizabeth Nelligan, Canton Public Schools
Dorothy Nevers, Canton Public Schools
Carol D. Parmelee, Middletown Public Schools
Beverly R. Peterman, Stamford Public Schools
Gerardine Smith, Canton Public Schools
Robert Kinder, CT Department of Education
Mary Weinland, CT Department of Education

MATHEMATICS STANDARD-SETTING COMMITTEE

Betsy Andersen, Manchester, Connecticut
Geraldine M. Cempola, Ridgefield Public Schools
Linda Cherry, Suffield Public Schools
Elizabeth B. Cubeta, Middletown Public Schools
Corretta K. Dean, Bridgeport Public Schools
Tony Ditrio, Norwalk Public Schools
Anita Gaston, Bloomfield Public Schools
Janet Heintz, Farmington Public Schools
Mary Anna Keough, Meriden Public Schools
Wesley Masten, Norwalk Public Schools
Irene B. Moriarty, Meriden Public Schools

Pamela Munro, Windham Public Schools
Eileen O'Reilly, Manchester Public Schools
Lois Piper, Norwalk Public Schools
Twila Pollard, New Haven Public Schools
Rosemary Powers, Bloomfield Public Schools
Sylvia E. Webb, Middletown Public Schools
George A. Wells, New Haven Public Schools
Frank K. Whittaker, Bridgeport Public Schools
Betsy Carter, CT Department of Education
Steven Leinwand, CT Department of Education

APPENDIX D

Marker Papers for Holistic Scoring

There was a home There was
a boy who was staying There
for a night he saw a bat and a
skunk then he heard a ghost he was
scared he wanted to go home
but the door lock then he went to
a window then he hit the window
then he got out then he heard
a ghost then he ran home to tell his
mom and dad then he said I'm going
to bed in the morning he told his
sister no way tom

The End

Score Point: 1

This paper is a list of undeveloped activities; it is an outline of a story. The details are sparse, and there is little tying of one idea to the next.

A Spooky vacation

One night I slept in a Spooky house. My brother thought it was haunted. When we got there we went in. It was time for bed when we got there. We went to bed and saw ghost. My brother yelled. My parents got up and saw nothing. My brother said what had happened. They said "Go to sleep." Then there was a big bat flying around. Then the beds tipped up we went falling down a tunnel. We were in some sort of room. I yelled and my parents were here. Then there was a tree branch came thru the roof. We

Score Point: 2

This is an example of a narrative with limited extension (elaboration). The writer introduces new elements into his story but does not develop them so that his response becomes list-like.

One night at a costume party I told my friends what happened last night when I slept in a haunted house. I told them how it smelled, awful. I was almost asleep when creak, a door opened behind me.

I went to look to see if anyone was there, but nobody was! I took another look. There in the middle of the room was a big white ghost! I tried to touch him but my hand went right through him!

I tried to run away but I fell into a trap door. It smelled a little better now. I tried searching for a way out, but there was none.

I got so tired I just fell asleep. I woke up at the sound of a door. I opened the door and found I was outside. And then I ran home leaving my stuff there so I wouldn't have to go there again.

SCORE POINT: 3

Score Point: 3

There is a good sense of control and balance of narrative elements in this story. The writer implements narrative framing by the use of the creaking door. There is logical progression with some elaboration but the narrative needs more development in order to be in score point 4 range.

One time, a long time ago, there was a house. A very old man lived in the house. The house was very warm.

When the old man died, the house was left sitting there. Nobody wanted to buy it, so for years and years it just sat there. The wood rotted, there were thunder storms and trees smashed into it.

When children went to school they didn't go that way because they were too afraid to go past that house.

One day me and my friends decided we would walk that way to school and instead of going to school we would go to the old house and explore it. So the next morning I got up early, gulped down my breakfast and rushed out the door. I picked up my friends and we rushed to the scary house.

As soon as we got

we started up the front walk. We went in. There was old things there, cobwebs, bats flying around. The floorboards creaked as we walked through the old house. We thought we saw some ghosts so we all hid, but they were only cobwebs.

It smelled like mildew and dust. When we sat down on chairs and sofas dust came flying up in our faces.

We went up stairs, but as we went up had to skip stairs because they were broken.

When we got upstairs we found old interesting beds and stuff. At the corner of one room we found a very small door we opened it nothing was there, so we went to sleep.

The next morning we woke up, and went into a room there was a small door, we opened it. To our surprise there was gold in it! we each took some put into a bag. Then we rushed home screaming "We are rich we are rich!"

The End

SCORE POINT: 4

Score Point: 4

The writer demonstrates a narrative plan by beginning with the history of the house as background information then progressing to the narrative itself which concerns visiting the house. There is good attention to detail and varied word choice. The paper is well-organized and the storyline is controlled. There is some uneven development in the last two paragraphs of the story but this compositional weakness is compensated by the strengths of the rest of the response.

APPENDIX E

Analytic Rating Guide and Marker Papers for Analytic Scoring

ANALYTIC RATING GUIDE

FOCUS: How effectively does the writer unify the paper by a dominant topic?

- 1 = switches and/or drifts frequently from the dominant topic
- 2 = switches and/or drifts somewhat from the dominant topic
- 3 = stays on topic throughout the response

ORGANIZATION: Is there a plan that clearly governs the sequence from the beginning to the end of the response and is the plan effectively signaled?

- 1 = no discernible plan
- 2 = inferrable plan and/or discernible sequence; some signals may be present
- 3 = controlled, logical sequence with a clear plan

SUPPORT/ELABORATION: To what extent is the narrative developed by details that describe and explain the narrative elements (character, action, and setting)?

- 1 = vague or sketchy details that add little to the clarity of the response
- 2 = details that are clear and specific but are list-like, or uneven or not developed
- 3 = well-developed details that enhance the clarity of the response

SENTENCE FORMATION: Are sentences correctly formed?

- 1 = many run-ons, "on-and-ons," fragments, and/or awkward constructions--may cause confusion
- 2 = some run-ons, "on-and-ons," fragments, and/or awkward constructions--may cause confusion
- 3 = few errors and/or awkward constructions--no confusion

MECHANICS: To what extent does the student use the conventions of standard written English (e.g. spelling, usage, capitalization, punctuation)?

- 1 = many errors
- 2 = some errors
- 3 = few errors

Analytic Component:

FOCUS

Note: Since no fourth-grade student received an analytic rating of 1 in the category Focus, a marker paper is not available for that analytic score point.

One night my three friends and I spent a night in the oldest scariest house in town. When we were there by the house we thought we would be safe because one of my friends brought their dog. But when we saw the big black bats we knew we weren't going to be safe! But Melissa's dog scared them away. When we went thru the gate and up the stairs we saw that the dog was not lit. Melissa told her dog to go in first because he was brave and it was a collie. Melissa never told us her dog's name then she promised to tell us when her dog comes out. When the collie came out she said her name was Corie. Corie was a male dog. We were safe that night when Corie was there. In the morning we found out that it wasn't really a haunted house.

Score Point: 2

Score Point 2:

The writer drifts somewhat from the main theme (spending a night in the scariest house in town) and concentrates instead on the day's physical attributes ("he was brown and it was a collie . . . Corie was a male dog") and the dog's name ("Melesa never told us her dog's name then she promised to tell us when her dog comes out . . ."). The main theme is never completely developed so that the drift is more noticeable.

" The night I spent in that house was terrible, there were loud noises howls, screams, I was just sitting there scared stiff. I didn't like it one bit.

Then I got out of bed, looked out the window, it was raining hard. Then I saw a cemetery. It was so dark I could only see the headstone of the graves.

The next morning I looked out the window it was wet, but it was sunny out. I felt a little better after what happened last night. Then I went downstairs to have breakfast (I brought my own breakfast) when I was done, I went back upstairs to pack my stuff and went home.

Score Point: 3

The writer stays on topic throughout the response; the paper is unified by the dominant topic: "the night I spent in that house."

Analytic Component:

ORGANIZATION

-43-

51

08

In the house that I stayed at,
there was lots of bats. One even almost
bit me. I saw mice too they hid my
diner. Then when I was I saw skeletons
that was mice all over it and spider webs too
and the skeletons like gasoline
I heard piano playing I went to it I saw a
cute kitten on the piano
then I went to sleep for the. Then in the
morning I went home.

THE END

Score Point: 1

The writer has no discernible plan; the sentences can be rearranged in
any order as the ideas are not linked into a plan.

THE STRANGE THING

One night after dinner, wait let me start again my name is Billy and I live in Freeport Maine with my mother and father. One night after my parents had said good night to me I had the strange dream I dreamt that I had the sleep in a haunted house with ghosts and goblins. Boy was I scared. I tried to get help but know one was there. Then I saw a door up some stairs. So I tried to walk up them but they turned into a slide and I slid right down. The house was full of spider webs then I wake up and I was home in Maine were I belong.

The end

Score Point: 2

There is an inferable plan; the signals are present with a sequence of events but the writer needs to reorganize his writing in order to improve fluency. There are two sentences inserted in the text which are not in

logical sequence: ("I tried to get help but know one was there"; "The house

Page 5 was full of spider webs.")

the night in the scary house

My friend Scott and I spent a night in a scary house. We went in it looked scary. We saw a lot of spiders and bats. We unpacked after that we went up stairs we heard ghost sounds for dinner we eat pizza then we went to bed we put our money on the table. When we got up the money was gone we spent the whole day looking for the robber at the end of the day we found the robber we took him to the police then we went home.

Score Point: 3

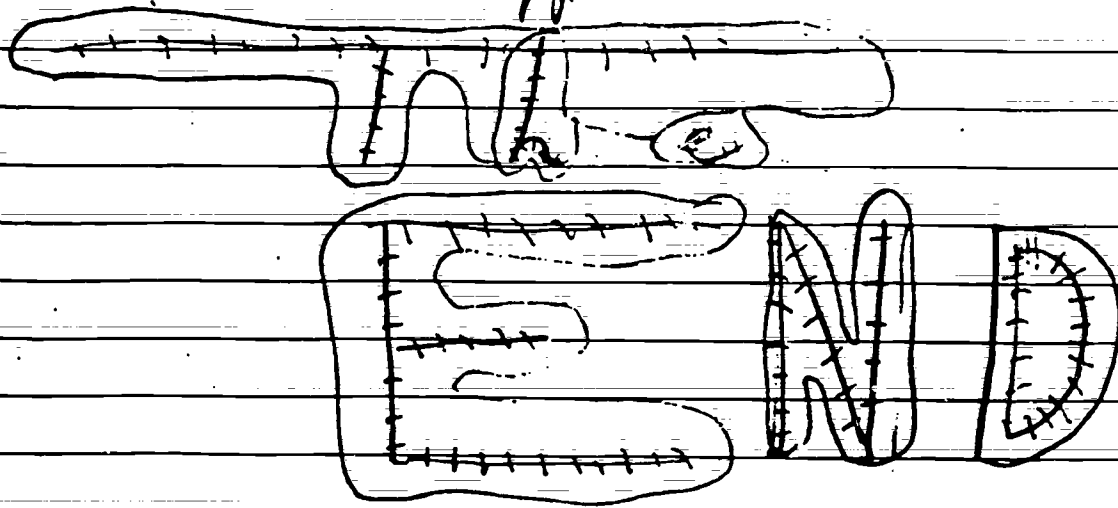
The writer has a controlled, logical sequence with a clear plan. Every idea is in a correct logical sequence.

Analytic Component:

SUPPORT/ELABORATION

Note: Since no fourth-grade student received an analytic rating of 3 in the category Support/Elaboration, a marker paper is not available for that analytic score point.

Hi Guys How are you doing!
 did you know I spent the
 night at oldest house in
 the town I heard stage noises like
 doors creaking! bats! and I
 saw monsters and ghosts
 I was scared death! a
 branch fell through the mouth!
 pickers stand at me!
 last but not least trap
 doors and others! the
 basement and the attic
 was the scariest part in
 the house and it was scary!
 and then do you know
 what happened!



This is a farconstin
 Perduckin
 56

Score Point: 1

This response contains sketchy details which add little to the clarity of the response. The paper is almost a vocabulary list of scary house terminology ("bats, ghosts, trap doors, attic was the scariest").

Once there was a haunted house. One day me and my freinds were walking down the street and we saw a haunted house and we went up there and went in side to see and my freindes told me to stay there one night and if I did not they would not be my freindes so I stayed. It was scary I heard walking things braking and I saw a ghost picking up things and I was scared so I went up to my room and someone was sleeping in my bed and I went to the other room and it was a mummy in there so I went down stairs and I saw something moving and I laid down and I went to sleep.

and when I was sleep
some thing was holding
me so I woke up

Score Point: 2

The details in this response are clear but not evenly developed. The writer uses non-specific details: "things braking . . . a ghost picking up thing . . . something moving . . . something was holding me." The details are not well-developed and do not enhance the clarity of the response.

Analytic Component:

SENTENCE FORMATION

-53-

60

It was a cold night my friends and I took
a walk down to a old spooky house
Me and my friends wanted to go in
We herd bats and we saw brokin glass
and spiders.
Then the door shut now we were
trapped inside. Then we herd a
wich she said now your trapped
Oh no my friend said lets use the phone
he poked up the phone oh no the phone
is dead. Then we saw a bat it turned
into a vampirer he said aha now a got you
we ran like crazy, we got the door
open and we never went back ther again.

Score Point: 1

This response contains many run-ons which cause some confusion.

W: Heard my friends talking about this Hau-
tu house, no one was gone in it. I said a ya,
well tonight I'm going in the end. Day over night
and you aren't going to do any thing I bought
it, that I fill my black squirt gun with
black food coloring I put it in my bag
I painted my baseball the color of a bomb
I loaded my flash light with batteries put
my book inside, my pillow inside and my
sleeping bag I mean out the door I started walking
soon I came to the house.

Score Point: 2

In this paper there are some run-ons causing some confusion to the reader.

A Spooky vacation

One night I slept in a spooky house. My brother thought it was haunted. When we got there we went in. It was time for bed when we got there. We went to bed and saw ghosts. My brother yelled. My parents got up and saw nothing. My brother said what had happened. They said "Go to sleep." Then there was a big bat flying around. Then the beds tipped up we went falling down a tunnel. We were in some sort of room. I yelled and my parents were here. Then there was a tree branch came thru the roof. We

Score Point: 3

This response contains few errors so that there is no confusion. Most of the sentences are correctly formed.

Analytic Component:

MECHANICS

-57-

64

THE STRANGE THING

One night after dinner wait let me
start again my name is Billy and
I live in Freeport Maine with my
mother and father. One night
after my parents had said
good night to me I had the strange
dream I dreamt that I had
the sleep in a haunted house
with ghosts and goblins. Boy was
I scared. I tried to get help
but know one was there. Then
I saw a door up some stairs
so I tried to walk up the door but
they turned into a slide and
I slid right down. The house
was full of spider webs
then I woke up and I was home
in Maine where I belong.

The end

Score Point: 1

This paper has many errors in mechanics, organization, spelling and usage.

The Oldest House in Town

One day my friends and I were planning to go to the Oldest House in Town. That night we went to the house. When we got there we were scared. We went in bravely. We all smelled something. Then Tod said he heard something. Tod and John checked the kitchen. When they got back they said it was only a skunk.

Mean while, Andrew Starr went his way. Andrew saw something move. He went to get it out. He tripped and fell face first. All these furry things jumped on him. Andrew screamed, "Help I'm being attacked by fur balls!"

One day passed now and were leaving. That night at home I thought Andrew is having a nervous break down.

Score Point: 2

This response has some errors in spelling and punctuation.

It was the oldest house in town. It was dark and scary. Children thought it was haunted. The house had a broken fence around it. There were two holes in the roof and there were spider webs in it and inside there were six rooms the living room, the dinner room, two bedrooms, a sewing room, and a kitchen. There was a big piano in the living room. There also was a big dresser with eight drawers in it.

Score Point: 3

There are few errors in mechanics. The writer has a good command of the conventions of written standard English.

APPENDIX F

Sample Grade Four Mastery Test Score Reports

- o Class Diagnostic Report
 - Mathematics
 - Language Arts
- o School by Class Report
 - Mathematics
 - Language Arts
- o District by School Report
 - Mathematics
 - Language Arts
- o Parent/Student Diagnostic Report



CLASS DIAGNOSTIC REPORT

CONNECTICUT MASTERY TESTING PROGRAM

LANGUAGE ARTS

GRADE 4 FORM A
 SCHOOL DISTRICT X
 LANE ELEMENTARY
 MR. JONES
 002
 TESTING DATE: 10-85
 NUMBER OF STUDENTS TESTED: 22

NUMBER OF STUDENTS NEEDING FURTHER DIAGNOSIS:
 IN WRITING: 4
 IN READING: 5

H	H	H	H	E	C	K	B	C	E	J	D	A	S	A	H	P	H	K	A	D	
A	I	A	I	L	Y	E	R	H	R	A	A	L	T	N	A	A	A	A	B	A	
R	C	L	R	L	I	R	L	I	R	I	Y	N	E	E	D	R	T	R	T	G	V
C	H	L	K	A	Z	U	L	A	I	N	A	X	R	K	R	J	I	I	I	I	I
E	Y	R	A	S	Y	N	S	J	I	H	E	U	I	A	E	A	D	I	I	I	I
E	Y	B											S	A	A	S	C	N	I	I	I

MASTERY CRITERIA # OF ITEMS CORRECT

NUMBER/PERCENT OF STUDENTS MASTERING EACH OBJECTIVE

LANGUAGE ARTS OBJECTIVES TESTED	MASTERY CRITERIA # OF ITEMS CORRECT																							NUMBER/PERCENT OF STUDENTS MASTERING EACH OBJECTIVE				
																								CLASS #/%	SCHCOL #/%	DISTRICT #/%		
WRITING MECHANICS																												
1. CAPITALIZATION & PUNCTUATION	8 OF 12	10	11	13	12	6	12	12	12	12	12	11	12	12	12	11	12	12	12	11	11	10	10	11	11	21/ 95	39/ 89	168/ 90
2. SPELLING, HOMONYMS, AND ABBREVIATIONS	7 OF 8	5	9	7	9	6	9	9	9	9	8	9	8	9	6	9	6	9	6	9	7	8	9	7	9	19/ 86	40/ 91	149/ 81
3. AGREEMENT (VERB TENSE, SUBJECT/VERB, AND PRONOUN REFERENTS)	11 OF 15	12	15	15	13	5	15	15	14	15	13	13	15	13	14	15	9	15	15	14	15	14	15	14	20/ 91	37/ 84	171/ 92	
4. LOCATING INFORMATION (SCHEDULES, MAPS, TABLE OF CONTENTS & TITLE PAGE, AND DICTIONARY)	8 OF 11	6	11	11	9	8	11	11	11	11	11	11	9	10	11	9	9	6	11	11	9	11	9	9	20/ 91	39/ 89	170/ 91	
LISTENING COMPREHENSION																												
5. LITERAL	5 OF 7	5	7	6	6	4	7	7	7	6	7	7	6	7	5	7	7	7	7	6	7	6	7	4	20/ 91	39/ 89	163/ 88	
6. INFERENCE & EVALUATIVE	8 OF 13	10	13	11	11	11	13	12	13	12	12	10	8	8	12	10	13	10	13	12	6	11	8	8	18/ 82	37/ 84	145/ 78	
READING COMPREHENSION																												
7. LITERAL	8 OF 12	7	12	12	10	10	12	12	11	12	11	11	11	6	7	12	7	10	11	12	11	11	11	11	18/ 82	36/ 82	158/ 84	
8. INFERENCE	10 OF 14	3	12	12	7	6	11	12	14	12	14	11	8	8	10	10	12	6	12	10	12	10	12	12	16/ 73	33/ 75	137/ 73	
8. EVALUATIVE	7 OF 10	2	9	10	7	3	10	10	9	10	9	10	3	4	10	6	10	6	10	10	7	10	8	8	16/ 73	33/ 70	147/ 78	
TOTAL NUMBER OF OBJECTIVES MASTERED		6	9	9	8	3	9	9	9	9	9	9	4	5	9	7	9	5	9	9	8	9	7	7	AVERAGE # OF OBJECTIVES MASTERED	7.6	7.5	7.5

HOLISTIC MEASURES OF WRITING AND READING	REMEDIAL STANDARD																							NUMBER/PERCENT OF STUDENTS BELOW REMEDIAL STANDARD			
																								CLASS #/%	SCHCOL #/%	DISTRICT #/%	
WRITING SAMPLE	4 OF 8	*				*							*	*											4/ 19	10/ 23	15/ 8
ANALYTIC WRITING INFORMATION**																											
FOCUS		2				1							1														
ORGANIZATION		2				1							1														
SUPPORT/ELABORATION		1				1							1														
MECHANICS		1				2							2														
SENTENCE FORMATION		1				3							2														
DEGREES OF READING POWER (DRP) ®	41 DRP UNITS	*			*	*							*						*						5/ 23	11/ 25	30/ 16

*INDICATES A SCORE BELOW THE REMEDIAL STANDARD. THIS STUDENT MUST RECEIVE FURTHER DIAGNOSIS.
 **ANALYTIC WRITING INFORMATION IS GIVEN ONLY FOR THOSE STUDENTS WHO SCORED BELOW THE REMEDIAL STANDARD.
 ® = NEEDS REMEDIAL ASSISTANCE ? = BORDERLINE PERFORMANCE S = SATISFACTORY PERFORMANCE

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SCHOOL BY CLASS REPORT

CONNECTICUT MASTERY TESTING PROGRAM

MATHEMATICS

GRADE 4 FORM A
SCHOOL DISTRICT X
LANE ELEMENTARY

PAGE 1

TESTING DATE: 10-85

SCORES REFLECT NUMBER/PERCENT OF STUDENTS MASTERING EACH OBJECTIVE

	ROOM #001	ROOM #002								SCHOOL	DISTRICT
		#	%	#	%	#	%	#	%	#	%
NUMBER OF STUDENTS TESTED	22	22								44	189
MATHEMATICS OBJECTIVES TESTED	MASTERY CRITERIA	#	%	#	%	#	%	#	%	#	%
CONCEPTUAL UNDERSTANDINGS											
1. DETERMINE AND 10 MORE/LESS THAN A NUMBER	3 OF 4	21	95	22	100					43	98
2. EXTEND PATTERNS	3 OF 4	19	86	18	82					37	84
3. ORDER WHOLE NUMBERS	3 OF 4	21	95	20	91					41	93
4. REWRITE NUMBERS WITH EXPANDED NOTATION	3 OF 4	20	91	20	91					40	91
5. REWRITE NUMBERS BY REGROUPING	3 OF 4	11	50	15	68					26	59
6. IDENTIFY FRACTIONAL PARTS	3 OF 4	14	64	19	86					33	75
7. RELATE MULT/DIV FACTS TO PICTURES	3 OF 4	14	64	13	59					27	61
COMPUTATIONAL SKILLS											
8. ADD/SUBTRACT FACTS TO 18	3 OF 4	18	82	21	95					39	89
9. ADD/SUBTRACT WITHOUT REGROUPING	3 OF 4	22	100	22	100					44	100
10. ADD WITH REGROUPING	3 OF 4	21	95	20	91					41	93
11. ESTIMATE SUMS/DIFFERENCES	3 OF 4	10	45	10	45					20	45
12. MULTIPLY/DIVIDE BY 2, 5, 10	3 OF 4	19	86	22	100					41	93
PROBLEM SOLVING/APPLICATIONS											
13. IDENTIFY OBJECTS/NUMBERS IN ARRAYS	3 OF 4	19	86	22	100					41	93
14. READ/INTERPRET GRAPHS	3 OF 4	20	91	20	91					40	91
15. READ/INTERPRET TABLES	3 OF 4	18	82	21	95					39	89
16. IDENTIFY NUMBER SENTENCES FROM PICTURES	3 OF 4	15	68	18	82					33	75
17. IDENTIFY NUMBER SENTENCES FROM PROBLEMS	3 OF 4	20	91	22	100					42	95
18. SOLVE STORY PROBLEMS WITH +/-	3 OF 4	17	77	21	95					38	86
19. SOLVE STORY PROBLEMS WITH EXTRA INFO	3 OF 4	19	86	21	95					40	91
20. IDENTIFY NEEDED INFO IN PROBLEMS	3 OF 4	16	73	20	91					36	82
MEASUREMENT/GEOMETRY											
21. MEASURE LENGTH/IDENTIFY UNITS	3 OF 4	20	91	18	82					38	86
22. ESTIMATE LENGTH/AREA	3 OF 4	19	86	14	64					33	75
23. TELL TIME	3 OF 4	18	82	22	100					40	91
24. DETERMINE VALUE OF A SET OF COINS	3 OF 4	19	86	22	100					41	93
25. IDENTIFY SHAPES/ANGLES/SIDES	3 OF 4	21	95	22	100					43	98
AVERAGE NUMBER OF OBJECTIVES MASTERED		20.5	22.0							21.3	22.0
NUMBER/PERCENT OF STUDENTS BELOW REMEDIAL STANDARD*		2/9	1/5							3/7	6/3

*REMEDIAL STANDARD IS 80 OF 100 ITEMS CORRECT.

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SCHOOL BY CLASS REPORT

CONNECTICUT MASTERY TESTING PROGRAM

LANGUAGE ARTS

GRADE 4 FORM A
SCHOOL DISTRICT X
LANE ELEMENTARY

TESTING DATE: 10-85

SCORES REFLECT NUMBER/PERCENT OF STUDENTS MASTERING EACH OBJECTIVE

LANGUAGE ARTS OBJECTIVES TESTED	MASTERY CRITERIA	ROOM #001		ROOM #002						SCHOOL	DISTRICT
		#	%	#	%	#	%	#	%	#	%
NUMBER OF STUDENTS TESTED		22		22						44	189
WRITING MECHANICS											
1. CAPITALIZATION & PUNCTUATION	8 OF 12	18/ 82		21/ 95						39/ 89	168/ 90
2. SPELLING, HOMONYMS, AND ABBREVIATIONS	7 OF 9	21/ 95		19/ 86						40/ 91	149/ 81
3. AGREEMENT (VERB TENSE, SUBJECT/VERB, AND PRONOUN REFERENTS)	11 OF 15	17/ 77		20/ 91						37/ 84	171/ 92
4. LOCATING INFORMATION (SCHEMULES, MAPS, TABLE OF CONTENTS & TITLE PAGE, AND DICTIONARY)	8 OF 11	19/ 86		20/ 91						39/ 89	170/ 91
LISTENING COMPREHENSION											
5. LITERAL	5 OF 7	19/ 86		20/ 91						39/ 89	163/ 88
6. INFERENTIAL & EVALUATIVE	8 OF 13	19/ 86		18/ 82						37/ 84	145/ 78
READING COMPREHENSION											
7. LITERAL	8 OF 12	18/ 82		18/ 82						36/ 82	158/ 84
8. INFERENTIAL	10 OF 14	17/ 77		16/ 73						33/ 75	137/ 73
9. EVALUATIVE	7 OF 10	15/ 68		16/ 73						31/ 70	147/ 78

HOLISTIC MEASURES OF WRITING AND READING

/ % OF STUDENTS AT STATED LEVEL

WRITING SAMPLE	HOLISTIC SCORE	#	%	#	%	#	%	#	%	#	%
NUMBER/PERCENT PRODUCING MATERIAL THAT IS:											
WELL WRITTEN W. DEVELOPED SUPPORTIVE DETAIL	7 OR 8	4/ 18		4/ 19						8/ 19	60/ 32
GENERALLY WELL ORGANIZED W. SUPPORTIVE DETAIL	6 OR 7	6/ 27		10/ 48						16/ 37	79/ 42
MINIMALLY PROFICIENT	4	6/ 27		3/ 14						9/ 21	32/ 17
BELOW REMEDIAL STANDARD*	2 OR 3	6/ 27		4/ 19						10/ 23	15/ 8
DEGREES OF READING POWER (DRP)®	DRP UNIT SCORE										
NUMBER/PERCENT COMPREHENDING MATERIALS:											
TYPICALLY USED AT GRADE 4 OR HIGHER	50+	7/ 32		15/ 68						22/ 50	108/ 59
TYPICALLY USED BELOW GRADE 4 BUT ABOVE THE REMEDIAL STANDARD	41 TO 49	9/ 41		2/ 9						11/ 25	46/ 25
BELOW REMEDIAL STANDARD**	BELOW 41	6/ 27		5/ 23						11/ 25	30/ 16

AVERAGE SCORES

AVERAGE NUMBER OF OBJECTIVES MASTERED IN LANGUAGE ARTS	7.4	7.6								7.5	7.5
AVERAGE HOLISTIC WRITING SCORE	4.6	5.0								4.8	5.6
AVERAGE DRP UNIT SCORE	43	50								45	49

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*REMEDIAL STANDARD IS 4 FOR WRITING.
**REMEDIAL STANDARD IS 41 DRP UNITS FOR READING



CONNECTICUT MASTERY TESTING PROGRAM

DISTRICT BY SCHOOL REPORT

MATHEMATICS

GRADE 4 FORM A

PAGE 1

SCHOOL DISTRICT X

TESTING DATE: 10-85

ELEMENTARY

ELEMENTARY

ELEMENTARY

SCORES REFLECT NUMBER/PERCENT OF STUDENTS MASTERING EACH OBJECTIVE

ELEMENTARY

DISTRICT

NUMBER OF STUDENTS TESTED		44	36	30	42	37				189
MATHEMATICS OBJECTIVES TESTED	MASTERY CRITERIA	# / %								
		# / %	# / %	# / %	# / %	# / %	# / %	# / %	# / %	# / %
CONCEPTUAL UNDERSTANDINGS										
1. DETERMINE 1 AND 10 MORE/LESS THAN A NUMBER	3 OF 4	43/ 98	33/ 92	30/100	40/ 95	37/100				183/ 97
2. EXTEND PATTERNS	3 OF 4	37/ 84	31/ 86	28/ 93	39/ 93	35/ 95				170/ 90
3. ORDER WHOLE NUMBERS	3 OF 4	41/ 93	34/ 94	30/100	40/ 95	34/ 92				179/ 95
4. REWRITE NUMBERS WITH EXPANDED NOTATION	3 OF 4	40/ 91	35/ 97	30/100	40/ 95	35/ 95				180/ 95
5. REWRITE NUMBERS BY REGROUPING	3 OF 4	26/ 59	24/ 67	20/ 67	34/ 81	21/ 57				125/ 66
6. IDENTIFY FRACTIONAL PARTS	3 OF 4	33/ 75	31/ 86	24/ 80	34/ 81	29/ 78				151/ 80
7. RELATE MULTI/DIV FACTS TO PICTURES	3 OF 4	27/ 61	22/ 61	21/ 70	32/ 76	24/ 65				126/ 67
COMPUTATIONAL SKILLS										
8. ADD/SUBTRACT FACTS TO 18	3 OF 4	39/ 89	35/ 97	29/ 97	41/ 98	34/ 92				178/ 94
9. ADD/SUBTRACT WITHOUT REGROUPING	3 OF 4	44/100	35/ 97	29/ 97	42/100	36/ 92				184/ 97
10. ADD WITH REGROUPING	3 OF 4	41/ 93	34/ 94	27/ 90	40/ 95	36/ 97				178/ 94
11. ESTIMATE SUMS/DIFFERENCES	3 OF 4	20/ 45	15/ 42	22/ 73	23/ 55	21/ 57				101/ 53
12. MULTIPLY/DIVIDE BY 2, 5, 10	3 OF 4	41/ 93	34/ 94	28/ 93	42/100	33/ 89				178/ 94
PROBLEM SOLVING/APPLICATIONS										
13. IDENTIFY OBJECTS/NUMBERS IN ARRAYS	3 OF 4	41/ 93	33/ 92	29/ 97	40/ 95	35/ 95				178/ 94
14. READ/INTERPRET GRAPHS	3 OF 4	40/ 91	35/ 97	25/100	41/ 98	36/ 97				181/ 96
15. READ/INTERPRET TABLES	3 OF 4	39/ 89	33/ 92	28/ 97	41/ 98	35/ 95				176/ 94
16. IDENTIFY NUMBER SENTENCES FROM PICTURES	3 OF 4	33/ 75	27/ 75	23/ 79	32/ 76	28/ 76				143/ 76
17. IDENTIFY NUMBER SENTENCES FROM PROBLEMS	3 OF 4	42/ 95	36/100	29/100	42/100	35/ 95				184/ 98
18. SOLVE STORY PROBLEMS WITH +/-	3 OF 4	38/ 86	32/ 89	25/ 86	38/ 90	36/ 97				169/ 90
19. SOLVE STORY PROBLEMS WITH EXTRA INFO	3 OF 4	40/ 91	28/ 78	27/ 93	37/ 88	33/ 89				165/ 88
20. IDENTIFY NEEDED INFO IN PROBLEMS	3 OF 4	36/ 82	32/ 89	28/ 97	39/ 93	37/100				172/ 91
MEASUREMENT/GEOMETRY										
21. MEASURE LENGTH/IDENTIFY UNITS	3 OF 4	38/ 86	32/ 89	28/ 93	34/ 81	32/ 86				164/ 87
22. ESTIMATE LENGTH/AREA	3 OF 4	33/ 75	26/ 72	27/ 90	34/ 81	33/ 89				153/ 81
23. TELL TIME	3 OF 4	40/ 91	33/ 92	29/100	40/ 95	36/ 97				178/ 95
24. DETERMINE VALUE OF A SET OF COINS	3 OF 4	41/ 93	34/ 94	27/ 93	39/ 93	34/ 92				175/ 93
25. IDENTIFY SHAPES/ANGLES/SIDES	3 OF 4	43/ 98	36/100	27/ 93	41/ 98	37/100				184/ 98
AVERAGE NUMBER OF OBJECTIVES MASTERED		21.3	21.7	22.8	22.5	22.2				22.0
NUMBER/PERCENT OF STUDENTS BELOW REMEDIAL STANDARD*		5/ 7	3/ 8	0/ 0	0/ 0	0/ 0				6/ 3

*REMEDIAL STANDARD IS 80 OF 100 ITEMS CORRECT.

CONNECTICUT MASTERY TESTING PROGRAM

DISTRICT BY SCHOOL REPORT

LANGUAGE ARTS

GRADE 4 FORM A

PAGE 1

SCHOOL DISTRICT X

TESTING DATE: 10-85

SCORES REFLECT NUMBER/PERCENT OF STUDENTS MASTERING EACH OBJECTIVE

LANGUAGE ARTS OBJECTIVES TESTED	MASTERY CRITERIA	ELEMENTARY					ELEMENTARY					DISTRICT	
		#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	
NUMBER OF STUDENTS TESTED		44	36	30	42	37						189	
WRITING MECHANICS													
1. CAPITALIZATION & PUNCTUATION	8 OF 12	39/ 89	33/ 92	25/ 93	38/ 90	33/ 89						168/ 90	
2. SPELLING, HOMONYMS, AND ABBREVIATIONS	7 OF 9	40/ 91	25/ 69	19/ 76	38/ 90	27/ 73						149/ 81	
3. AGREEMENT (VERB TENSE, SUBJECT/VERB, AND PRONOUN REFERENTS)	11 OF 13	37/ 86	31/ 86	27/ 100	40/ 95	36/ 97						171/ 92	
4. LOCATING INFORMATION (SCHEDULES, MAPS, TABLE OF CONTENTS & TITLE PAGE, AND DICTIONARY)	8 OF 11	39/ 89	32/ 89	25/ 93	39/ 93	35/ 95						170/ 91	
LISTENING COMPREHENSION													
5. LITERAL	5 OF 7	39/ 89	3/ 78	25/ 93	36/ 86	35/ 95						163/ 88	
6. INFERENTIAL & EVALUATIVE	9 OF 13	37/ 84	22/ 61	22/ 81	36/ 86	28/ 76						145/ 78	
READING COMPREHENSION													
7. LITERAL	8 OF 12	36/ 82	28/ 78	26/ 90	34/ 81	34/ 92						158/ 84	
8. INFERENTIAL	10 OF 14	33/ 75	22/ 61	25/ 86	32/ 74	26/ 70						137/ 73	
9. EVALUATIVE	7 OF 10	31/ 70	25/ 69	24/ 83	37/ 88	30/ 81						147/ 78	

HOLISTIC MEASURES OF WRITING AND READING

#/ % OF STUDENTS AT STATED LEVEL

WRITING SAMPLE	HOLISTIC SCORE	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %
NUMBER/PERCENT PRODUCING MATERIAL THAT IS:											
WELL WRITTEN W. DEVELOPED SUPPORTIVE DETAIL	7 OR 8	8/ 19	8/ 22	13/ 45	12/ 29	19/ 53					60/ 32
GENERALLY WELL ORGANIZED W. SUPPORTIVE DETAIL	5 OR 6	16/ 37	13/ 36	13/ 45	20/ 57	13/ 36					79/ 42
MINIMALLY PROFICIENT	4	9/ 21	11/ 31	3/ 10	6/ 14	3/ 8					32/ 17
BELOW REMEDIAL STANDARD*	2 OR 3	10/ 23	4/ 11	0/ 0	0/ 0	1/ 3					15/ 8
DEGREES OF READING POWER (DRP)®	DRP UNIT SCORE	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %	#/ %
NUMBER/PERCENT COMPREHENDING MATERIALS:											
TYPICALLY USED AT GRADE 4 OR HIGHER	50+	22/ 50	18/ 51	17/ 65	26/ 62	25/ 68					108/ 59
TYPICALLY USED BELOW GRADE 4 BUT ABOVE THE REMEDIAL STANDARD	41 TO 49	11/ 25	8/ 23	7/ 27	12/ 29	8/ 22					46/ 25
BELOW REMEDIAL STANDARD**	BELOW 41	11/ 25	9/ 26	2/ 8	4/ 10	4/ 11					30/ 16

AVERAGE SCORES

AVERAGE NUMBER OF OBJECTIVES MASTERED IN LANGUAGE ARTS	7.5	6.8	8.0	7.8	7.7					7.5
AVERAGE HOLISTIC WRITING SCORE	4.8	5.1	6.3	5.8	6.3					5.6
AVERAGE DRP UNIT SCORE	45	45	55	50	50					49

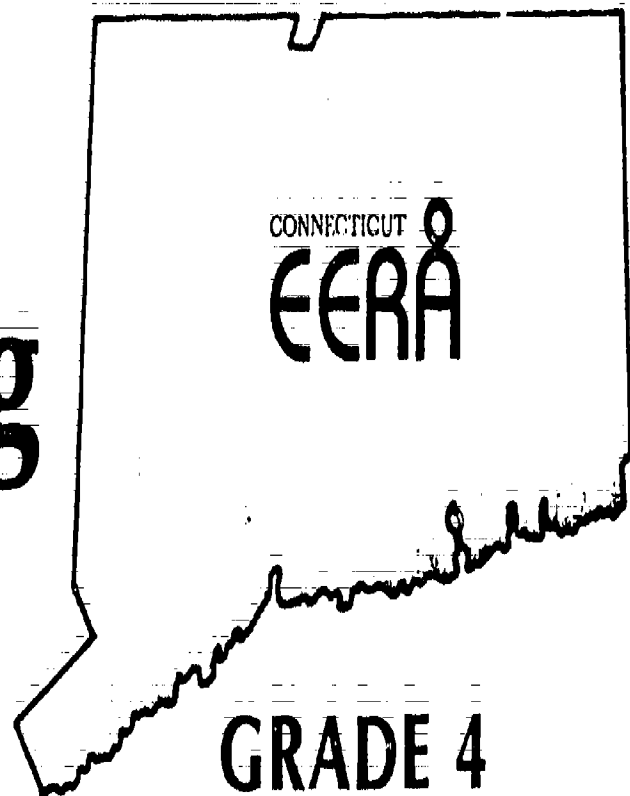
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*REMEDIAL STANDARD IS 4 FOR WRITING.
**REMEDIAL STANDARD IS 41 DRP UNITS FOR READING

Connecticut

Mastery Testing

Program



PARENT/STUDENT DIAGNOSTIC REPORT

For specific information about your child's scores inside, see the back cover of this folder.

For general information about your local district's testing program, please contact your superintendent of schools.

For further information on the statewide mastery testing program, contact: Connecticut State Department of Education,
Office of Research and Evaluation, Box 2219, Hartford, Connecticut 06145, (203) 566-4001 or 4008.

MATHEMATICS

STUDENT OBJECTIVES ANALYSIS FOR

GRADE: _____ SCHOOL: _____
 FORM: _____ DISTRICT: _____
 TEACHER: _____ TESTING DATE: _____

CONNECTICUT

MASTERY TESTING
PROGRAM



THE PSYCHOLOGICAL CORPORATION
HARCOURT BRACE JOVANOVICH, PUBLISHERS



GRADE 4 REPORT PART 1

OBJECTIVES TESTED	MASTERY CRITERIA NUMBER OF ITEMS CORRECT	SCORE
CONCEPTUAL UNDERSTANDINGS		
1. Identify the number one more, one less, ten more or ten less than a given number	3 of 4	
2. Extend patterns involving numbers and attributes	3 of 4	
3. Order whole numbers	3 of 4	
4. Rewrite numbers using expanded notation	3 of 4	
5. Rewrite numbers by regrouping tens and ones	3 of 4	
6. Identify fractional parts of regions and sets from pictures for halves, thirds, fourths and sixths	3 of 4	
7. Relate multiplication and division facts to rectangular arrays	3 of 4	
COMPUTATIONAL SKILLS		
8. Know addition and subtraction facts to 18	3 of 4	
9. Add and subtract one and two digit numbers without regrouping	3 of 4	
10. Add one and two digit numbers with regrouping	3 of 4	
11. Estimate sums and differences to 100	3 of 4	
12. Multiply and divide by 2, 5, and 10	3 of 4	
PROBLEM SOLVING/APPLICATIONS		
13. Identify objects or numbers that do or do not belong in a collection, matrix or array	3 of 4	
14. Read and interpret bar graphs and pictographs	3 of 4	
15. Read and interpret data from tables and charts	3 of 4	
16. Identify or write number sentences from pictures	3 of 4	
17. Identify number sentences from addition or subtraction story problems	3 of 4	
18. Solve simple story problems involving addition or subtraction	3 of 4	
19. Solve and identify number sentences in simple story problems, involving addition and subtraction, with extraneous information	3 of 4	
20. Identify needed information in problem situations	3 of 4	
MEASUREMENT/GEOMETRY		
21. Measure length and identify appropriate units for measuring length and distance	3 of 4	
22. Estimate lengths and areas	3 of 4	
23. Tell time to the nearest hour, half hour and quarter hour using analog and digital clocks	3 of 4	
24. Determine the value of a set of coins	3 of 4	
25. Identify shapes, angles and sides	3 of 4	

TOTAL NUMBER OF OBJECTIVES MASTERED _____

NUMBER OF ITEMS CORRECT _____ (Remedial Standard is 69 of 100 items correct)

LANGUAGE ARTS

STUDENT OBJECTIVES ANALYSIS FOR

GRADE: _____ SCHOOL: _____
 FORM: _____ DISTRICT: _____
 TEACHER: _____ TESTING DATE: _____

CONNECTICUT

MASTERY TESTING

PROGRAM



THE PSYCHOLOGICAL CORPORATION
 HARCOULT BRACE JOVANOVIK, PUBLISHERS



GRADE 4 REPORT PART 2

OBJECTIVES TESTED	MASTERY CRITERIA NUMBER OF ITEMS CORRECT	SCORE
WRITING MECHANICS 1. Capitalization and Punctuation 2. Spelling Word Choice, Homonyms, and Abbreviations 3. Agreement (verb tense, subject-verb, and pronoun referent)	9 of 12 7 of 9 11 of 15	
LOCATING INFORMATION 4. Schedules, Maps, Table of Contents and Title Page, Dictionary	8 of 11	
LISTENING COMPREHENSION 5. Literal (understands the meaning of ideas clearly stated by a speaker) 6. Inferential and Evaluative (understands the meaning of ideas not clearly stated, but implied, by a speaker and is able to make critical judgments about them)	5 of 7 9 of 13	
READING COMPREHENSION 7. Literal (understands the meaning of ideas clearly stated within a passage) 8. Inferential (understands the meaning of ideas not stated, but implied, within a passage) 9. Evaluative (able to make critical judgments about statements and inferences within a passage)	9 of 12 10 of 14 7 of 10	

TOTAL NUMBER OF OBJECTIVES MASTERED

WRITING SAMPLE	Score
Holistic Writing Score	.
Remedial Standard is 4 of 8	

DEGREES OF READING POWER (DRP)	Score
DRP Unit:	.
Remedial Standard is 41 DRP Units	

PARENT/STUDENT DIAGNOSTIC REPORT

Dear Parent:

Inside you will find the results of the Connecticut Mastery Test administered to your child earlier this fall. The test results help to show you and the school district's professional staff how well your child is performing on those skills identified by the State of Connecticut as important for students entering fourth grade to have mastered.

These tests are designed to determine the specific skill levels of students. The test result will be used to:

- provide your school with information for use in assessing the progress of individual students over time;
- provide your school with information based on which improvements in the general instructional program can be made; and
- provide information on appropriate basic skills remedial assistance for students so identified

Mastery testing will occur each fall. All fourth graders starting in 1985 and all sixth and eighth graders starting in 1986 will be tested.

If you have any questions about these test results, please ask your child's teacher. The teacher will share with you other observations and recommendations based on their experience in working with your son or daughter during the last several months.

Description of the Test

Mathematics. The mathematics test assesses specific skills in the general areas of conceptual understandings, computational skills, problem solving/applications, and measurement/geometry. Test items evaluate a student's ability to order and rename numbers; compute and estimate sums and differences; read and interpret tables, graphs, and charts; solve a broad range of problems; measure and estimate length and width; identify shapes, and tell time.

Language Arts. The "Degrees of Reading Power" test is designed to measure a student's ability to understand nonfiction English prose at different levels of reading ability. The test measures reading ability on a scale of reading difficulty. This test is keyed to many available reading materials so teachers can use the scores to select reading material on an appropriate level of difficulty for each student.

In addition to the "Degrees of Reading Power" section, the reading test includes narrative, expository, and persuasive passages on a variety of topics. These test formats measure a student's ability in literal comprehension, inferential or interpretive comprehension, and evaluative comprehension or critical reading. The test also assesses listening comprehension by using audio tapes.

Students will also be asked to write a composition on a designated topic. The writing will be judged on a student's demonstrated ability to convey information in a coherent and organized fashion.

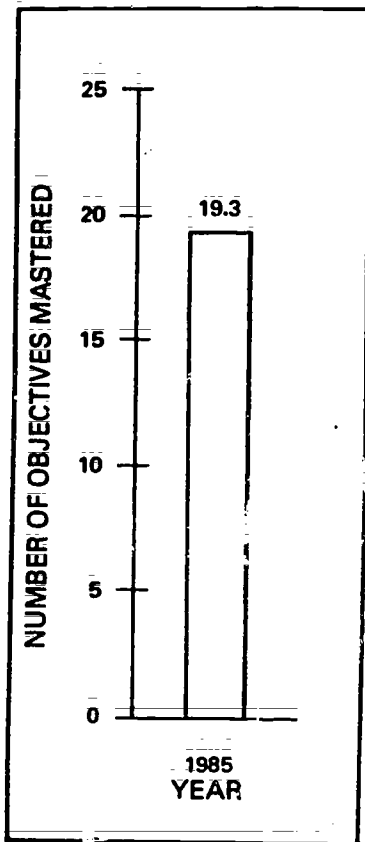
Writing skills are also assessed through a multiple-choice test in the areas of usage, mechanics, locating information, and notetaking.

APPENDIX G

Number of Objectives Mastered

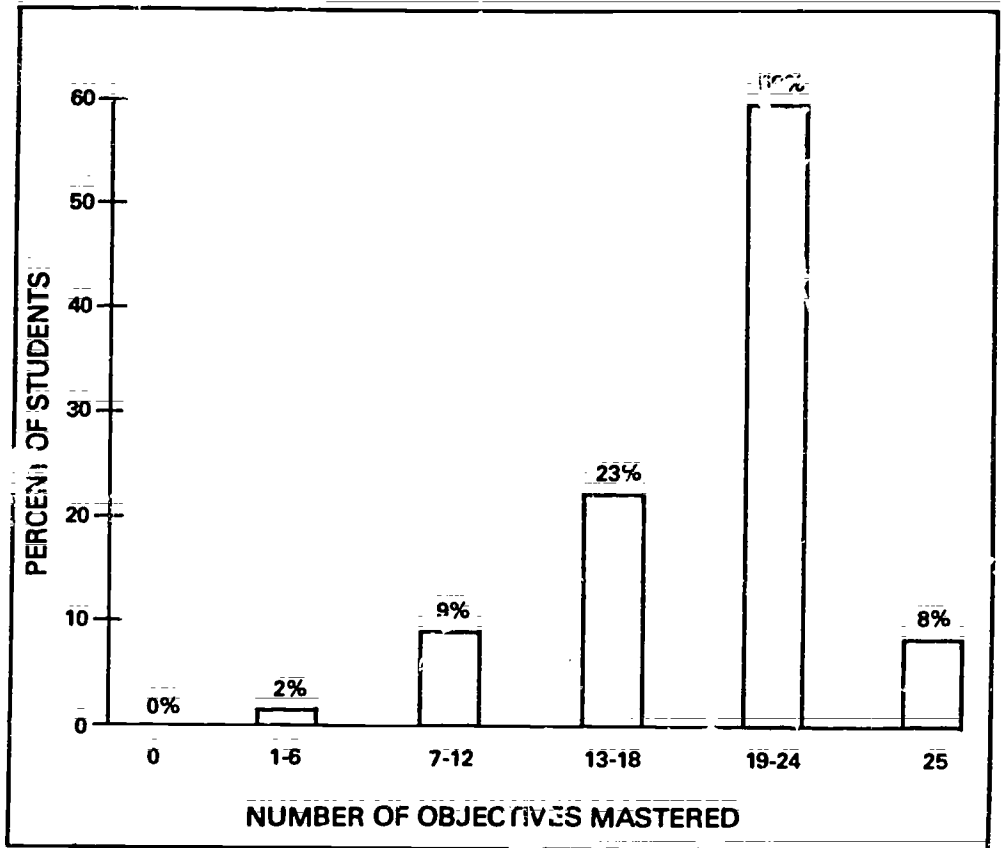
- o Mathematics
- o Language Arts

**MATHEMATICS:
AVERAGE NUMBER OF
OBJECTIVES MASTERED**



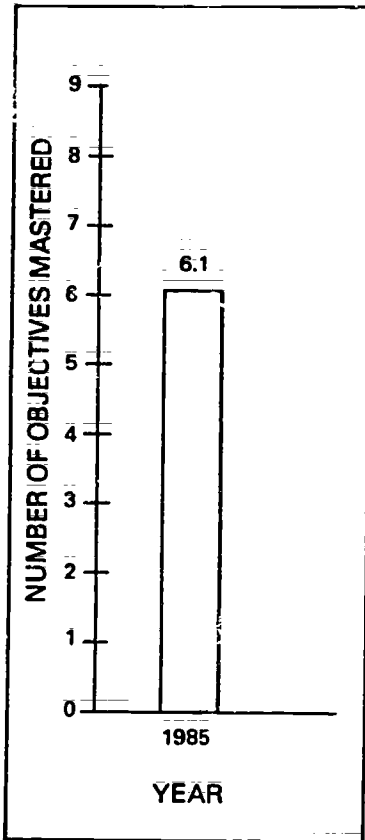
This bar chart illustrates the average number of mathematics objectives mastered, statewide.

**MATHEMATICS:
PERCENT OF STUDENTS ACHIEVING MASTERY BY
NUMBER OF OBJECTIVES MASTERED**



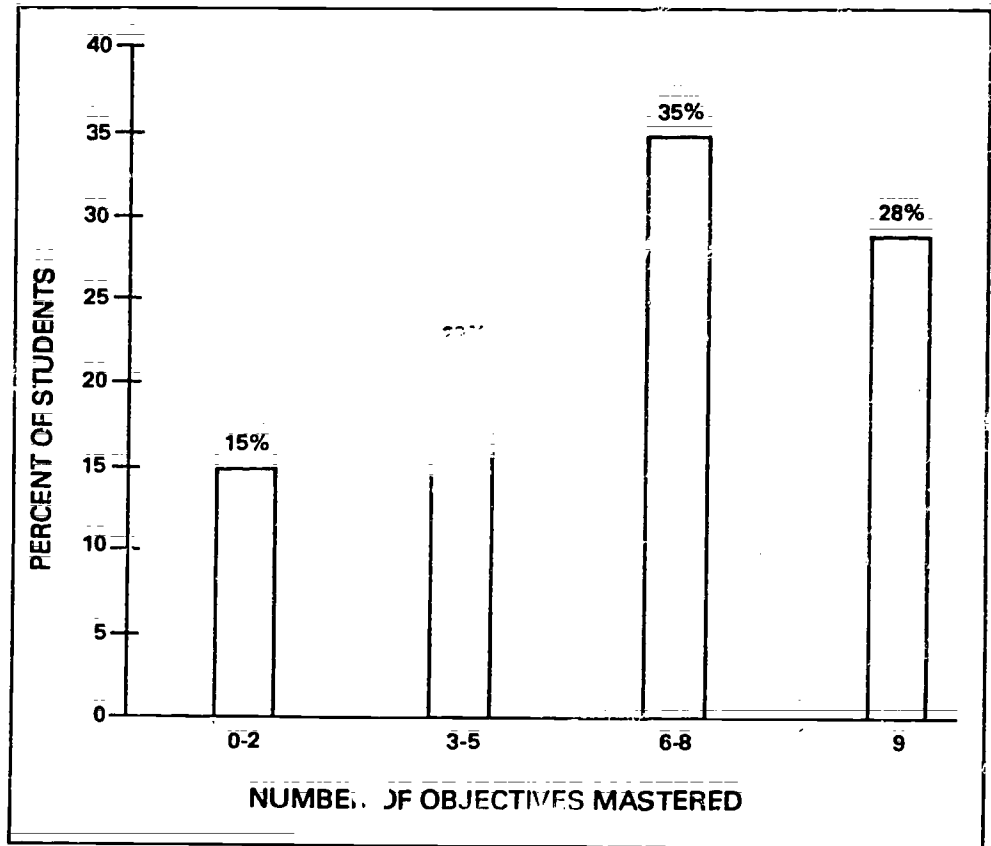
This bar chart illustrates the distribution of students, statewide, who mastered mathematics objectives within each of the six score categories.

**LANGUAGE ARTS:
AVERAGE NUMBER OF
OBJECTIVES MASTERED**



This bar chart illustrates the average number of *language arts objectives* mastered, statewide.

**LANGUAGE ARTS:
PERCENT OF STUDENTS ACHIEVING MASTERY BY
NUMBER OF OBJECTIVES MASTERED**



This bar chart illustrates the distribution of students, statewide, who mastered objectives within each of the four score groupings.

Appendix H

State by District Report - October 1985
Grade Four Mathematics Test Results

STATE BY DISTRICT REPORT
GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

MATHEMATICS

PAGE 3

OBJECTIVES TESTED

CONCEPTUAL UNDERSTANDINGS	COMPUTATIONAL SKILLS	PROBLEM SOLVING/ APPLICATIONS	MEASUREMENT/ GEOMETRY	TOTAL MATHEMATICS
---------------------------	----------------------	-------------------------------	-----------------------	-------------------

DATE TESTED: 10-85

Mastery Criteria for each objective is 3 of the 4 items correct.
Remedial Standard is 89 of the 100 items correct.

Determine 1 and 10 more/less than *	Extend patterns	Order whole #'s	Write #'s w expanded notation	Use fractional parts	* 7 facts to 18	* 1, 10, 100 facts to pictures	* with regrouping	Estimate sums/differences	Multiply by 2, 5, 10	Divide by 2, 5, 10	Read interpret graphs	1d & sentences tables	1d & sentences from picture	Solve story problems	Solve story problems w extra info	Measure length/area	Estimate length/area	Tell time	Determine value of a set of coins	Average Number of Objectives Mastered	Percent of Students Meeting Further Diagnostics
-------------------------------------	-----------------	-----------------	-------------------------------	----------------------	-----------------	--------------------------------	-------------------	---------------------------	----------------------	--------------------	-----------------------	-----------------------	-----------------------------	----------------------	-----------------------------------	---------------------	----------------------	-----------	-----------------------------------	---------------------------------------	---

DISTRICT	# OF STUDENTS TESTED	TOC	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																										
HARTFORD	1,585	1	68	43	48	91	13	54	41	85	91	79	10	63	59	66	46	38	75	57	44	49	50	42	67	84	92	14.6	53
HARTLAND	14	6	93	64	86	100	21	93	50	93	100	100	21	71	93	86	86	79	100	100	86	79	71	79	100	100	100	20.5	14
HEBRON	102	5	96	80	83	98	37	76	56	94	99	93	30	84	87	91	83	66	92	92	83	91	87	73	94	87	97	20.5	12
KENT	32	6	100	84	97	97	47	84	69	97	100	100	56	100	91	97	91	66	100	97	94	88	84	94	94	91	100	22.2	3
KILLINGLY	179	6	94	67	85	96	31	82	45	91	95	89	32	82	81	94	83	54	87	85	69	80	80	70	90	87	98	19.5	17
LEBANON	54	6	98	74	70	94	35	78	39	87	94	91	24	72	81	89	72	59	96	81	80	89	81	70	96	87	96	19.4	20
LEDYARD	202	4	99	80	90	99	45	73	60	93	97	87	50	86	89	97	80	64	92	91	85	90	85	80	90	91	97	20.9	9
LISBON	42	4	90	76	79	98	40	50	55	95	98	95	57	76	83	93	83	50	93	83	64	76	86	79	90	93	100	19.8	19
LITCHFIELD	74	6	97	73	82	97	38	89	62	92	92	86	52	84	85	89	81	61	89	82	80	81	77	73	88	96	96	20.3	14
MADISON	171	5	95	87	78	97	39	76	58	93	98	93	35	92	89	98	88	56	98	88	80	86	86	83	96	90	95	20.8	8
MANCHESTER	403	3	95	77	76	95	46	75	48	88	92	74	20	68	88	93	80	63	91	81	77	85	76	75	80	87	99	19.4	20
MANSFIELD	89	6	89	64	76	99	43	63	60	94	96	92	27	80	80	85	80	60	88	74	75	81	80	66	90	91	99	19.3	22
MARLBOROUGH	77	5	97	88	92	97	52	82	58	100	99	96	34	87	90	96	96	73	97	88	86	84	83	77	97	96	99	21.5	5
MERIDEN	506	3	90	70	73	94	28	70	52	87	95	80	23	70	81	87	73	48	86	80	70	71	73	64	86	92	96	18.5	26
MIDDLETOWN	302	3	89	65	85	93	30	75	49	86	89	85	22	72	75	87	74	50	87	72	66	72	76	62	85	93	96	18.4	27
MILFORD	430	3	96	84	80	98	43	71	60	90	95	89	29	82	88	93	83	61	94	86	79	85	77	75	90	92	97	20.2	12
MONROE	204	4	98	82	84	99	43	83	61	98	98	91	28	77	88	97	88	65	96	92	81	85	81	82	92	89	99	20.8	9
MONTVILLE	175	4	93	74	78	97	40	67	60	92	99	95	30	82	83	91	75	49	92	82	68	77	81	78	85	90	97	19.6	17
NAUGATUCK	287	2	91	64	72	97	25	59	54	90	96	92	12	76	78	86	74	53	91	82	68	79	74	67	87	90	98	18.6	22
NEW BRITAIN	463	3	84	65	72	94	26	69	52	91	94	89	15	76	76	85	67	51	85	78	65	73	66	63	74	90	99	18.0	28
NEW CANAAN	184	2	98	82	94	97	48	82	69	99	97	92	60	94	93	96	91	75	97	91	82	88	90	88	93	97	98	22.0	4
NEW FAIRFIELD	184	4	97	85	84	98	42	75	56	93	94	91	38	82	89	93	86	60	91	91	78	84	76	75	88	92	99	20.4	11
NEW HARTFORD	66	5	92	74	88	94	39	82	48	83	97	91	35	70	71	88	83	69	91	86	80	85	88	64	89	92	100	19.8	15
NEW HAVEN	1,075	1	74	45	64	91	17	60	43	84	92	80	13	68	62	74	57	43	82	68	59	63	62	46	73	88	94	16.1	44
NEMINGTON	245	2	97	87	82	100	45	78	63	91	98	92	33	85	91	96	89	69	93	83	79	87	80	78	89	93	98	20.7	11
NEW LONDON	211	3	80	59	70	93	16	60	42	92	93	86	14	77	70	79	66	38	84	70	61	64	57	60	70	88	95	16.8	36
NEW MILFORD	289	5	95	76	80	97	38	77	60	97	97	91	30	87	86	93	88	62	96	92	84	88	82	83	91	93	98	20.6	10
NENTON	249	5	96	83	85	98	45	78	61	95	98	94	35	89	90	94	88	69	95	88	82	80	83	79	91	93	99	21.0	11



STATE BY DISTRICT REPORT
GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

MATHEMATICS

OBJECTIVES TESTED

CONCEPTUAL UNDERSTANDINGS	COMPUTATIONAL SKILLS	PROBLEM SOLVING/ APPLICATIONS	MEASUREMENT/ GEOMETRY	TOTAL MATHEMATICS	PAGE 4
Determine 1 and 10 multiples that fit	* 1. facts to 10	* 1. word regrouping	Determine length/area	Average Number of Objectives Mastered	Percent of Students Meeting Further Diagnosis
* 10. Order whole #'s	* 2. * 3. * 4. * 5. * 6. * 7. * 8. * 9. * 10. * 11. * 12. * 13. * 14. * 15. * 16. * 17. * 18. * 19. * 20. * 21. * 22. * 23. * 24. * 25. * 26. * 27. * 28. * 29. * 30. * 31. * 32. * 33. * 34. * 35. * 36. * 37. * 38. * 39. * 40. * 41. * 42. * 43. * 44. * 45. * 46. * 47. * 48. * 49. * 50. * 51. * 52. * 53. * 54. * 55. * 56. * 57. * 58. * 59. * 60. * 61. * 62. * 63. * 64. * 65. * 66. * 67. * 68. * 69. * 70. * 71. * 72. * 73. * 74. * 75. * 76. * 77. * 78. * 79. * 80. * 81. * 82. * 83. * 84. * 85. * 86. * 87. * 88. * 89. * 90. * 91. * 92. * 93. * 94. * 95. * 96. * 97. * 98. * 99. * 100.	* 1. * 2. * 3. * 4. * 5. * 6. * 7. * 8. * 9. * 10. * 11. * 12. * 13. * 14. * 15. * 16. * 17. * 18. * 19. * 20. * 21. * 22. * 23. * 24. * 25. * 26. * 27. * 28. * 29. * 30. * 31. * 32. * 33. * 34. * 35. * 36. * 37. * 38. * 39. * 40. * 41. * 42. * 43. * 44. * 45. * 46. * 47. * 48. * 49. * 50. * 51. * 52. * 53. * 54. * 55. * 56. * 57. * 58. * 59. * 60. * 61. * 62. * 63. * 64. * 65. * 66. * 67. * 68. * 69. * 70. * 71. * 72. * 73. * 74. * 75. * 76. * 77. * 78. * 79. * 80. * 81. * 82. * 83. * 84. * 85. * 86. * 87. * 88. * 89. * 90. * 91. * 92. * 93. * 94. * 95. * 96. * 97. * 98. * 99. * 100.	* 1. * 2. * 3. * 4. * 5. * 6. * 7. * 8. * 9. * 10. * 11. * 12. * 13. * 14. * 15. * 16. * 17. * 18. * 19. * 20. * 21. * 22. * 23. * 24. * 25. * 26. * 27. * 28. * 29. * 30. * 31. * 32. * 33. * 34. * 35. * 36. * 37. * 38. * 39. * 40. * 41. * 42. * 43. * 44. * 45. * 46. * 47. * 48. * 49. * 50. * 51. * 52. * 53. * 54. * 55. * 56. * 57. * 58. * 59. * 60. * 61. * 62. * 63. * 64. * 65. * 66. * 67. * 68. * 69. * 70. * 71. * 72. * 73. * 74. * 75. * 76. * 77. * 78. * 79. * 80. * 81. * 82. * 83. * 84. * 85. * 86. * 87. * 88. * 89. * 90. * 91. * 92. * 93. * 94. * 95. * 96. * 97. * 98. * 99. * 100.		

DATE TESTED: 10-85

Mastery Criteria for each objective is 3 of the 4 items correct
Remedial Standard is 69 of the 100 items correct.

DISTRICT	# OF STUDENTS TESTED	TOC	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																										
NORFOLK	15	6	100	93	80	100	47	80	53	00	00	00	33	100	100	100	73	67	100	93	80	100	87	93	87	93	100	21.6	0
NORTH BRANFORD	149	4	92	68	90	95	31	58	46	93	91	87	32	83	77	95	83	51	86	81	66	74	87	72	88	91	95	19.1	21
NORTH CANAAN	35	6	94	77	86	94	17	71	63	91	100	97	20	91	77	80	71	63	94	83	57	89	74	66	97	77	97	19.3	11
NORTH HAVEN	214	2	93	76	81	97	53	72	56	96	95	94	20	69	82	92	86	55	94	89	87	86	67	79	86	94	98	20.0	15
NORTH STONINGTON	57	5	98	82	86	95	19	68	55	88	96	89	29	82	86	93	86	70	98	89	88	91	91	82	88	89	95	20.4	7
NORWALK	644	3	87	69	70	93	27	65	47	88	93	84	28	77	79	84	71	54	86	77	67	73	63	63	79	85	96	18.0	28
NORWICH	357	3	89	67	81	97	30	61	55	91	95	94	20	77	77	92	77	57	92	86	73	81	76	74	88	91	96	19.2	20
OLD SAYBROOK	93	5	94	80	92	96	48	79	66	97	94	92	58	83	90	92	83	78	92	84	79	86	86	82	89	98	99	21.2	11
ORANGE	152	2	98	89	89	99	47	85	72	99	99	97	53	93	91	98	96	63	98	96	90	91	85	84	95	96	97	22.0	5
OXFORD	100	5	94	76	82	98	29	71	48	93	94	91	17	84	85	90	76	53	92	84	73	84	72	79	88	85	97	19.4	16
PLAINFIELD	176	6	97	66	82	95	33	89	56	94	95	84	20	81	77	95	82	65	94	86	76	79	69	68	90	94	98	19.7	15
PLAINVILLE	141	4	94	74	82	97	29	66	48	92	99	92	28	68	83	94	81	59	93	82	79	84	81	73	89	94	97	19.5	14
PLYMOUTH	124	2	94	62	81	96	35	79	44	91	90	91	11	76	80	92	77	51	90	85	69	79	78	76	85	91	94	19.0	18
ROMERY	44	6	84	77	84	100	43	66	55	98	100	93	27	77	82	84	75	64	98	84	75	84	80	77	91	92	100	19.9	20
ROSLAND	72	5	99	83	97	96	63	74	53	99	94	84	56	61	85	96	90	74	97	93	86	92	93	82	92	93	99	21.3	8
PRESTON	46	4	93	85	80	96	39	59	57	83	93	93	20	78	78	87	80	63	89	83	78	80	74	72	78	93	96	19.3	15
PUTNAM	102	6	89	67	75	97	20	73	40	83	95	89	12	67	75	77	67	55	84	71	54	69	74	57	88	89	95	17.6	34
REDDING	88	5	98	90	88	99	53	80	59	92	97	93	25	86	93	97	98	70	99	94	92	94	95	84	92	91	98	21.6	6
RIDGEFIELD	240	5	98	88	89	97	46	83	65	97	95	93	39	92	90	94	91	75	93	94	82	92	83	85	93	93	98	21.5	10
ROCKY HILL	123	4	98	85	98	99	50	90	64	99	99	98	54	90	95	100	94	69	98	90	88	97	89	81	89	93	99	22.1	3
SALEM	43	5	95	79	93	95	42	79	63	98	91	86	58	88	93	93	86	74	98	84	86	91	88	70	86	88	91	21.0	12
SALISBURY	26	6	100	85	77	96	65	77	62	92	100	96	15	88	88	100	88	62	100	92	85	100	88	77	92	96	96	21.2	4
SCOTLAND	15	6	100	93	60	100	20	80	47	73	87	73	7	73	80	100	80	60	93	80	73	73	73	87	80	80	93	18.7	27
SEYMOUR	169	5	95	74	82	99	40	70	46	93	97	88	17	71	87	93	85	56	92	85	74	80	73	71	88	90	96	19.4	17
SHARON	13	6	100	69	77	100	23	77	62	100	92	92	15	69	85	77	69	54	92	85	92	92	77	62	100	92	92	19.5	23
SHELTON	298	3	97	80	84	97	38	84	60	90	96	91	27	85	85	92	85	65	95	87	78	81	81	73	90	93	97	20.3	11
SHERMAN	19	6	100	100	84	100	42	89	58	100	100	100	21	74	95	100	84	63	95	89	89	95	84	74	84	89	100	21.1	5
SIMSBURY	263	4	98	85	97	98	50	81	58	95	90	95	56	87	91	97	91	74	98	92	85	90	89	84	93	94	98	21.7	7

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STATE BY DISTRICT REPORT
GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

MATHEMATICS

DATE TESTED: 10-85	OBJECTIVES TESTED					PAGE 5
	CONCEPTUAL UNDERSTANDINGS	COMPUTATIONAL SKILLS	PROBLEM SOLVING/ APPLICATIONS	MEASUREMENT/ GEOMETRY	TOTAL MATHEMATICS	
Mastery Criteria for each objective is 3 of the 4 items correct. Remedial Standard is 69 of the 100 items correct	1. determine 1, 100 to meters than 1/2	1. write #s & expanded notation	1. solve story problems w extra info	1. estimate length/area	1. determine value of a set of coins	Percent of Student's Reading Further Diagnosis
	2. extend patterns	2. write #s & expanded notation	2. solve story problems w extra info	2. estimate length/area	2. determine value of a set of coins	
	3. order whole #s	3. write #s & expanded notation	3. solve story problems w extra info	3. estimate length/area	3. determine value of a set of coins	
	4. determine 1, 100 to meters than 1/2	4. write #s & expanded notation	4. solve story problems w extra info	4. estimate length/area	4. determine value of a set of coins	
	5. extend patterns	5. write #s & expanded notation	5. solve story problems w extra info	5. estimate length/area	5. determine value of a set of coins	

DISTRICT	# OF STUDENTS TESTED	TOC	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																										
SOMERS	73	4	95	78	74	99	32	68	60	96	100	95	16	84	82	90	82	59	96	90	82	85	90	85	89	97	99	20.2	7
SOUTHINGTON	416	3	92	82	86	96	32	77	55	93	98	95	23	86	83	97	89	55	96	91	82	87	82	81	92	97	97	20.4	10
SOUTH WINDSOR	226	2	96	83	80	99	42	77	62	97	97	96	28	82	85	94	87	63	94	91	84	89	81	83	92	94	98	20.7	10
SPRAGUE	19	4	89	79	63	100	26	42	53	100	100	89	21	79	79	95	79	37	89	84	89	95	74	74	79	74	95	18.8	21
STAFFORD	107	5	95	72	80	99	39	88	49	90	94	98	40	85	91	96	89	64	93	92	76	83	80	67	91	95	100	20.5	10
STAMFORD	714	1	85	63	71	94	28	68	49	90	93	83	21	71	74	81	68	50	88	75	60	70	66	62	80	91	96	17.8	32
STERLING	22	6	91	77	77	100	36	59	45	100	86	86	27	86	73	95	73	64	91	95	73	82	77	59	95	100	100	19.5	23
STONINGTON	154	4	85	71	73	94	45	77	47	88	96	91	32	75	80	80	63	46	85	72	67	71	73	62	84	91	95	18.4	27
STRATFORD	385	2	94	69	76	97	32	80	50	89	97	89	29	79	79	89	79	54	91	85	74	78	77	74	92	93	97	19.4	19
SUFFIELD	109	4	96	82	89	98	42	61	54	99	94	89	34	90	91	97	85	70	96	86	83	85	87	74	90	92	97	20.6	10
THOMASTON	83	4	94	67	77	98	17	75	46	89	95	88	12	73	77	88	73	47	86	78	67	78	75	77	87	81	96	18.4	17
THOMPSON	78	6	97	75	80	97	38	70	50	91	97	95	11	79	87	87	90	66	92	91	83	83	87	78	91	97	100	20.2	9
TOLLAND	142	5	98	81	91	98	42	83	56	92	98	95	22	88	80	98	90	66	96	91	87	86	82	80	96	93	98	21.0	8
TORRINGTON	252	3	96	65	80	98	38	87	52	88	96	89	32	77	79	90	81	61	92	86	74	82	76	71	91	96	97	19.8	15
TROMBULL	320	2	95	83	87	98	42	78	62	93	97	92	51	86	91	98	89	67	93	87	82	83	87	80	92	89	96	21.0	13
UNION	6	6	100	83	100	100	50	67	33	100	100	100	50	100	83	100	100	67	100	100	83	100	83	100	100	100	100	22.0	0
VERNON	283	3	98	79	84	99	50	91	55	94	97	91	37	82	86	96	89	68	90	91	83	90	91	78	93	97	98	21.2	8
VOLUNTOWN	20	6	80	75	80	85	40	70	50	95	90	80	10	80	85	65	60	35	85	70	75	55	90	65	85	95	95	18.0	25
WALLINGFORD	412	3	97	83	82	98	40	73	55	93	98	94	42	82	90	96	88	61	93	90	80	84	81	83	90	95	96	20.6	10
WATERBURY	936	1	86	60	59	93	29	76	45	91	93	86	23	69	74	75	61	46	84	78	61	64	59	57	83	92	96	17.4	34
WATERFORD	150	4	100	69	83	95	41	88	62	95	96	95	28	88	80	98	89	65	96	93	88	91	83	70	93	95	98	20.9	7
WATERTOWN	218	2	96	76	83	97	30	72	61	92	94	87	37	83	88	95	86	62	96	90	78	91	86	76	88	97	98	20.4	9
WESTBROOK	43	6	91	81	86	95	53	63	56	88	93	98	23	88	91	98	81	60	98	88	86	79	91	74	93	86	95	20.4	14
WEST HARTFORD	515	2	93	84	86	97	50	85	62	95	96	91	34	85	89	91	86	58	92	86	78	85	83	74	90	93	98	20.6	14
WEST HAVEN	417	2	92	71	77	94	31	64	48	94	92	84	20	74	84	92	75	49	89	83	69	76	74	68	89	92	93	18.8	23
WESTON	90	5	98	91	97	98	63	82	72	99	99	91	31	96	96	98	96	68	97	99	89	92	89	83	90	87	90	22.0	2
WESTPORT	224	3	98	92	94	99	59	86	68	94	99	96	59	93	96	98	94	75	99	95	90	95	93	91	95	90	99	22.5	3
WETHERSFIELD	169	2	99	83	84	97	44	78	50	96	96	95	22	83	89	97	91	66	95	86	82	86	82	77	91	91	99	20.6	9

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STATE BY DISTRICT REPORT
GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

MATHEMATICS

DATE TESTED: 10-85	OBJECTIVES TESTED										TOTAL MATHEMATICS	PAGE 7
	CONCEPTUAL UNDERSTANDINGS	COMPUTATIONAL SKILLS	PROBLEM SOLVING/ APPLICATIONS	MEASUREMENT/ GEOMETRY								
<p>Mastery Criteria for each objective is 3 of the 4 items correct. Remedial Standard is 89 of the 100 items correct.</p>												

DISTRICT	# OF STUDENTS TESTED	TOC	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																										
TOC 1 TOTAL	5,582		77	51	60	92	19	63	45	87	93	82	17	68	66	75	55	43	81	67	54	58	57	49	73	88	95	16.2	42
TOC 2 TOTAL	6,264		95	78	83	97	40	76	58	94	94	91	31	83	85	93	84	60	93	87	78	84	80	76	90	92	97	20.2	14
TOC 3 TOTAL	7,080		91	74	79	96	34	74	53	91	95	89	26	79	83	90	79	58	91	83	74	80	76	71	86	91	97	19.4	19
TOC 4 TOTAL	5,495		96	81	86	98	43	76	58	94	97	93	36	85	88	95	86	63	94	89	81	87	83	79	90	93	97	20.7	11
TOC 5 TOTAL	3,215		75	79	84	97	42	76	58	93	96	91	30	84	87	94	86	64	94	88	80	87	82	77	91	91	98	20.5	12
TOC 6 TOTAL	2,162		93	75	82	96	38	74	53	91	95	90	29	80	83	91	80	60	92	84	76	82	79	73	90	91	97	19.8	16
STATE TOTAL	29,798		91	72	78	96	35	73	54	91	95	89	28	79	82	89	78	57	91	83	73	79	76	70	86	91	97	19.3	20

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APPENDIX I

State by District Report - October 1985
Grade Four Language Arts Test Results

-85-

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STATE BY DISTRICT REPORT

GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

LANGUAGE ARTS

DATE TESTED: 10-85		OBJECTIVES TESTED										TOTAL LANGUAGE ARTS	DEGREES OF READING POWER (DRP)		WRITING SAMPLE								PAGE 1																
		WRITING MECHANICS		LOCATING INFORMATION		LISTENING COMPREHENSION		READING COMPREHENSION					Average Number of Objectives Mastered	Below 41	41-49	50+	Average DRP Score	% of Student's Reading Power Districts	1	2	3	4		5	6	7	8	Average Notable Score	% of Student's Reading Power Districts										
		Capitalization & Punctuation	Spelling/Homonyms/Abbreviations	agreement	Schedules, maps, table of contents, dictionary	literal	Inferential and evaluative	literal	Inferential	evaluative																													
MASTERY CRITERIA (# CORRECT/# POSSIBLE)		W/2	7/8	11/13	W/11	5/7	W/13	W/12	10/14	7/10																													
DISTRICT	# OF STUDENTS TESTED	TOC	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																																				
ANDOVER	29	4	66	59	90	83	83	66	72	52	48	6.1	25	25	50	44	25	0	8	31	19	35	8	0	5.0	8													
ANSONIA	144	5	78	68	85	80	70	54	73	45	47	6.0	28	32	40	44	28	4	13	20	24	23	9	7	5.0	17													
ASHFORD	43	6	65	49	81	74	84	63	65	47	53	5.8	37	28	35	42	37	5	21	26	21	12	7	7	4.6	26													
AVON	147	4	88	80	95	95	92	87	90	80	81	7.9	9	24	67	53	9	3	22	33	12	21	5	5	5.3	6													
BARKHAMSTED	30	6	90	77	90	90	97	90	80	73	80	7.7	20	20	60	48	20	7	0	7	27	10	27	23	6.1	7													
BERLIN	137	4	92	76	94	95	88	82	84	72	78	7.6	17	20	62	49	1	6	23	24	23	13	8	5	5.3	7													
BETHANY	55	4	84	85	91	93	83	72	74	58	66	7.0	25	25	51	47	25	2	6	35	37	15	0	6	4.8	7													
BETHEL	214	4	80	71	89	82	84	71	81	63	61	6.8	16	30	54	47	14	4	12	24	20	21	14	3	4.9	14													
BLOOMFIELD	180	2	68	65	77	76	69	56	64	50	53	5.8	39	29	31	42	39	0	11	33	18	14	9	6	4.7	19													
BOLTON	45	4	80	73	89	93	91	75	78	69	69	7.3	29	24	47	44	29	4	11	24	31	11	11	7	4.9	16													
BOZRAH	21	5	95	67	81	81	90	76	62	33	57	6.4	29	33	38	43	29	10	20	50	20	0	0	0	3.8	30													
BRANFORD	196	4	80	64	90	90	82	75	71	60	61	6.8	17	33	49	47	17	3	7	26	30	19	11	4	5.0	10													
BRIDGEPORT	1,278	1	56	54	54	59	41	32	39	21	23	3.8	61	24	15	37	61	15	16	34	19	11	4	1	4.1	31													
BRISTOL	524	3	85	68	82	82	74	61	75	56	61	6.4	24	25	51	47	24	6	11	28	24	15	9	7	4.9	17													
BROOKFIELD	156	4	88	73	95	92	90	74	82	69	71	7.4	20	20	61	47	20	3	6	15	24	21	20	9	5.5	9													
BROOKLYN	82	6	73	59	80	79	72	57	63	48	49	5.8	29	28	43	44	29	7	16	26	22	18	7	4	4.6	23													
CANAAN	9	6	89	78	78	67	78	56	67	44	56	6.1	33	33	33	43	33	13	13	0	38	13	25	0	5.0	25													
CANTERBURY	67	6	84	78	85	91	87	61	73	54	49	6.6	27	25	48	44	27	5	3	35	32	15	6	5	4.9	8													
CANTON	81	4	85	70	94	94	96	86	78	74	70	7.5	15	27	58	49	15	2	5	27	24	17	15	7	5.2	7													
CHAPLIN	27	6	59	64	70	67	88	52	62	31	54	5.5	33	37	30	42	33	6	4	29	29	18	0	12	4.9	12													
CHESHIRE	310	2	82	73	89	94	91	84	80	74	80	7.5	14	27	58	49	14	1	5	17	19	28	15	16	5.8	4													
CHESTER	36	6	78	69	97	100	86	86	83	58	72	7.3	14	25	61	50	14	0	11	22	19	19	14	14	5.4	4													
CLINTON	161	5	79	71	84	86	80	63	81	61	61	6.7	23	29	49	45	23	6	18	23	26	11	12	3	4.7	25													
COLCHESTER	117	5	83	68	89	91	86	77	73	56	70	6.9	22	29	49	47	22	3	9	23	26	17	14	6	5.2	12													
COLEBROOK	11	6	91	100	82	100	64	91	91	64	82	7.6	0	36	64	57	0	0	18	27	36	9	9	0	4.6	18													
COLUMBIA	45	5	70	57	91	77	78	62	69	62	49	6.1	36	20	43	43	36	2	2	11	20	30	23	11	5.9	5													
CORNWALL	13	6	92	69	92	100	92	54	92	92	92	7.8	0	23	77	55	0	0	31	0	15	15	31	0	5.1	31													
COVENTRY	112	4	86	64	91	90	80	73	77	57	61	6.8	27	31	42	44	27	3	10	27	19	19	13	10	5.2	13													

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STATE BY DISTRICT REPORT
GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

LANGUAGE ARTS

DATE TESTED:	OBJECTIVES TESTED										TOTAL LANGUAGE ARTS	DEGREES OF READING POWER (DRP)	WRITING SAMPLE										PAGE 2							
	WRITING MECHANICS		LOCATING INFORMATION		LISTENING COMPREHENSION		READING COMPREHENSION		TOTAL LANGUAGE ARTS				DEGREES OF READING POWER (DRP)		WRITING SAMPLE															
	Capitalization & Punctuation	Spelling/homonym/abbreviations	Spelling	Schedule, maps, Table of Contents, Dictionary	Literal	Inferential and evaluative	Literal	Inferential	Literal	Inferential			Literal	Inferential	Average Number of Objectives Mastered	Below 41	41-49	50+	Average DRP Score	% of Student's Reading Further Diagnostic	1	2		3	4	5	6	7	8	Average Holistic Score
10-85																														
MASTERY CRITERIA (# CORRECT/# POSSIBLE)		9/12	7/9	11/15	8/11	5/7	8/13	8/12	10/14	7/10																				
DISTRICT	# OF STUDENTS TESTED	TOC	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																											
CROMWELL	84	4	80	75	94	92	77	64	79	57	63	6.8	18	32	50	48	18	2	5	15	25	23	20	16	5.6	7				
DANBURY	570	3	67	63	77	80	70	58	62	45	53	5.8	34	25	41	43	34	5	10	30	18	19	12	7	5.0	15				
DARIEN	189	2	90	81	92	91	88	78	84	73	70	7.5	16	25	59	49	16	3	5	17	23	20	19	13	5.6	8				
DEEP RIVER	42	6	88	76	100	90	86	79	86	76	62	7.4	12	29	60	48	12	0	2	24	17	29	17	12	5.7	2				
DERBY	80	5	69	48	78	71	68	41	58	36	39	5.1	37	36	27	42	37	8	11	33	17	11	17	4	4.8	18				
EASTFORD	15	6	87	67	87	93	67	87	87	73	67	7.1	7	60	33	48	7	0	7	0	40	7	20	27	6.1	7				
EAST GRANBY	37	4	92	89	92	86	89	84	84	76	73	7.6	11	32	57	49	11	5	8	22	22	24	14	5	5.1	14				
EAST HADDAM	64	5	90	75	84	90	83	69	71	59	70	6.9	21	38	41	45	21	3	6	28	35	6	14	9	5.1	9				
EAST HAMPTON	108	5	88	73	83	91	87	70	79	62	60	6.9	23	21	57	47	23	3	12	35	21	13	12	4	4.8	15				
EAST HARTFORD	925	2	75	59	83	81	71	55	65	48	53	5.9	32	27	41	43	32	7	15	29	21	13	10	6	4.7	21				
EAST HAVEN	172	2	76	64	81	85	77	68	70	51	50	6.2	31	26	43	43	31	9	13	29	21	13	10	3	4.6	22				
EAST LYME	165	4	85	66	92	94	83	77	82	68	69	7.2	15	32	53	49	15	4	7	19	25	23	15	7	5.3	11				
EASTON	62	4	84	77	92	95	94	84	85	71	76	7.6	15	19	66	49	15	0	3	24	34	19	8	11	5.4	5				
EAST WINDSOR	66	4	77	74	86	88	71	58	70	64	59	6.4	24	38	38	44	24	8	9	24	17	20	15	8	5.1	17				
ELLINGTON	109	4	85	73	88	91	83	59	77	59	59	6.7	22	23	55	47	22	3	9	14	15	16	19	5	5.7	12				
ENFIELD	372	3	75	66	87	88	80	65	73	55	56	6.4	23	32	45	45	23	6	5	25	22	18	16	8	5.2	12				
ESSEX	45	6	84	67	82	93	93	96	84	60	70	7.4	13	27	60	49	13	0	7	22	18	24	13	16	5.6	7				
FAIRFIELD	377	2	89	76	93	94	87	80	80	70	74	7.4	16	29	55	48	16	1	8	29	22	19	12	8	5.1	10				
FARMINGTON	137	4	88	77	94	98	90	80	88	72	75	7.6	15	21	64	49	15	3	9	25	20	15	22	7	5.3	12				
FRANKLIN	28	5	79	64	89	89	86	64	79	64	64	6.8	11	32	57	49	11	0	11	18	50	14	7	0	4.9	11				
GLASTONBURY	288	4	85	77	91	90	89	83	85	72	78	7.5	14	19	67	50	14	2	3	17	19	20	22	17	5.8	5				
GRANBY	94	4	87	77	89	90	86	68	87	70	71	7.3	23	20	56	47	23	7	3	27	17	19	13	4	5.0	11				
GREENWICH	394	2	81	70	90	89	82	75	81	65	71	7.0	23	24	53	47	23	4	9	19	27	20	14	7	5.2	13				
GRISHOLD	127	4	76	62	87	87	86	60	72	55	53	6.4	33	31	34	43	33	9	13	24	10	13	13	5	4.5	22				
GROTON	417	3	73	61	79	80	76	54	62	48	45	5.8	35	28	37	42	35	14	14	25	18	16	6	5	4.5	30				
GUILFORD	249	4	86	83	90	93	89	81	85	70	73	7.5	13	26	61	49	13	2	5	22	24	19	21	7	5.4	8				
HAMDEN	353	2	77	68	85	86	76	68	75	60	61	6.6	28	30	41	43	28	7	10	21	31	13	12	6	4.9	17				
HAMPTON	22	5	77	55	77	68	100	55	59	41	45	5.8	45	23	32	42	45	14	29	19	24	5	5	5	4.1	43				

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STATE BY DISTRICT REPORT
GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

LANGUAGE ARTS

		OBJECTIVES TESTED										TOTAL LANGUAGE ARTS	DEGREES OF READING POWER (DRP)	WRITING SAMPLE										PAGE 4																					
		WRITING MECHANICS	LOCATING INFORMATION	LISTENING COMPREHENSION	READING COMPREHENSION			EVALUATION						Average Holistic Score																															
DATE TESTED: 10-85		Capitalization & Punctuation	Spelling/Nonwords	Abbreviations	Sentence	Schedules, Maps, Tables, Contents, Dictionary	Literal	Inferential 1st	Inferential 2nd	Inferential 3rd	Evaluative	Average Number of Objectives Mastered	Below 41	41-49	50+	Average DRP Score	% of Student's Meeting Further Diagnosis	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20								
MASTERY CRITERIA (# CORRECT/# POSSIBLE)		10/12	7/8	11/15	8/11	5/7	8/13	8/12	10/14	7/10																																			
DISTRICT	# OF STUDENTS TESTED	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																																											
NORFOLK	15	6	93	73	100	87	80	83	80	67	60	6.9	7	40	53	49	7	6	0	27	33	13	20	7	5.5	0																			
NORTH BRANFORD	149	4	79	72	87	84	80	60	66	54	52	6.3	30	32	39	43	30	5	2	30	17	15	16	7	5.1	14																			
NORTH CANAAN	35	6	86	60	86	89	86	49	77	57	49	6.4	29	31	40	43	29	11	6	31	20	14	14	3	4.7	17																			
NORTH HAVEN	214	2	78	65	89	85	81	68	74	60	60	6.6	27	27	46	44	27	6	10	23	26	19	9	7	5.0	17																			
NORTH STONINGTON	57	5	88	84	89	95	89	77	82	65	68	7.4	11	23	65	49	11	2	7	22	20	22	13	15	5.5	9																			
NORWALK	645	3	61	62	71	69	65	52	59	38	46	5.2	47	27	28	40	47	15	14	27	18	13	8	3	4.3	31																			
NORWICH	356	3	74	62	84	84	78	60	65	50	51	6.1	31	27	42	43	31	13	13	30	25	11	8	3	4.4	26																			
OLD SAYBROOK	90	5	76	72	80	88	72	73	74	61	70	6.7	27	22	51	45	27	2	14	36	14	10	14	6	4.4	14																			
ORANGE	152	2	91	87	90	93	89	70	88	72	69	7.5	14	23	64	49	14	2	7	24	23	18	13	11	5.3	9																			
OXFORD	100	5	74	75	85	84	81	69	79	58	61	6.7	22	29	49	45	22	7	19	19	17	17	14	5	4.9	24																			
PLAINFIELD	176	6	77	62	79	75	67	50	72	44	49	5.7	36	34	30	42	36	11	11	21	23	18	15	2	4.8	22																			
PLAINVILLE	141	4	78	72	88	82	81	64	72	61	60	6.6	35	28	37	43	35	4	9	29	24	18	9	6	4.9	15																			
PLYMOUTH	125	2	73	64	83	81	77	50	68	47	46	5.9	43	27	30	41	43	7	12	35	25	13	3	4	4.5	20																			
POMFRET	44	6	80	52	80	82	84	55	66	41	39	5.8	27	27	45	44	27	14	25	16	34	7	5	0	4.1	39																			
PORTLAND	72	5	83	78	92	100	89	82	88	63	65	7.4	13	32	58	49	13	6	8	24	28	13	13	4	4.9	14																			
PRESTON	46	4	76	65	91	91	72	61	74	63	57	6.5	17	30	52	45	17	0	11	24	20	22	20	4	5.3	11																			
PUTNAM	102	6	61	46	66	66	69	43	56	38	40	4.9	45	24	28	40	45	19	15	22	17	12	13	2	4.4	34																			
REDDING	89	5	92	75	96	94	89	83	85	77	80	7.7	11	23	66	50	11	3	1	31	20	18	19	7	5.3	4																			
RIDGEFIELD	240	5	85	78	92	94	87	77	85	76	81	7.6	16	21	63	49	16	2	4	11	24	25	14	17	5.8	8																			
ROCKY HILL	123	4	88	84	93	93	86	76	86	67	79	7.5	11	33	57	49	11	2	1	19	21	27	20	11	5.7	2																			
SALEM	43	5	91	65	93	91	81	74	81	63	81	7.2	9	30	60	50	9	0	5	23	30	21	7	14	5.4	5																			
SALISBURY	26	6	100	81	96	100	96	85	85	73	81	8.0	4	27	69	55	4	12	15	15	23	19	15	0	4.7	27																			
SCOTLAND	15	6	73	67	93	67	47	60	60	47	40	5.5	33	33	33	44	33	0	0	27	27	27	7	13	5.5	0																			
SEYMOUR	149	5	87	72	89	88	74	63	78	49	56	6.4	24	26	50	45	24	0	11	20	24	20	17	7	5.3	11																			
SHARON	13	6	85	77	92	92	69	31	85	38	46	6.2	23	23	54	48	23	0	23	38	31	0	8	0	4.3	23																			
SHELTON	296	3	81	80	87	87	81	63	78	62	62	6.8	13	28	54	48	18	3	12	23	21	22	14	5	5.1	15																			
SHERMAN	19	6	89	68	100	100	89	79	95	48	68	7.6	5	21	74	53	5	0	5	32	21	37	0	5	5.1	5																			
SINSBURY	262	4	88	88	97	95	91	89	88	80	89	8.0	10	24	65	50	10	0	0	19	25	24	17	11	5.7	1																			

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STATE BY DISTRICT REPORT
GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

LANGUAGE ARTS

		OBJECTIVES TESTED										TOTAL LANGUAGE ARTS	DEGREES OF READING POWER (DRP)	WRITING SAMPLE										PAGE 1		
		WRITING MECHANICS		LOCATING INFORMATION		LISTENING COMPREHENSION		READING COMPREHENSION						%												
DATE TESTED: 10-85		Capitalization & Punctuation	Spelling/Homonyms/Abbreviations	Assignment	Schedule, Maps, Table of Contents, Dictionary	Literal	Inferential and evaluative	Literal	Inferential	evaluative	Average Number of Objectives Mastered	Below 21	21-29	30+	Average DRP Score	1	2	3	4	5	6	7	8	Average	% of Students Meeting Further Objective	
MASTERY CRITERIA (# CORRECT/# POSSIBLE)		8/12	7/9	11/15	8/11	3/7	9/13	8/12	10/14	7/10																
DISTRICT	# OF STUDENTS TESTED	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																								
SOHNS	73	4	84	58	86	93	81	66	84	64	60	6.8	18	42	40	45	18	7	19	23	24	10	11	4	6.4	24
SOUTHINGTON	416	3	88	79	94	93	82	63	80	64	64	7.1	18	32	50	47	18	2	5	26	22	24	14	8	5.3	7
SOUTH WINDSOR	227	2	87	80	90	88	91	71	74	65	67	7.1	18	35	47	47	18	4	6	19	32	19	12	8	5.2	10
SPRAGUE	19	4	68	58	79	89	84	63	68	53	58	6.2	47	16	37	43	47	11	5	11	26	42	0	5	5.1	16
STAFFORD	106	5	75	54	92	88	87	60	68	48	52	6.3	28	37	37	44	28	10	22	32	21	8	5	3	4.2	31
STAMFORD	717	1	60	60	66	69	61	52	58	41	45	5.2	46	23	31	40	46	12	14	30	16	12	10	5	4.5	24
STERLING	22	6	82	59	77	86	58	59	68	59	45	6.0	32	32	36	43	32	5	5	18	32	18	18	5	5.3	9
STORINGTON	153	4	64	51	76	68	72	49	56	41	46	5.2	47	23	30	39	47	11	19	23	20	15	8	4	4.5	30
STRAFFORD	385	2	72	62	82	79	75	60	64	48	55	6.0	33	26	41	43	33	7	10	20	22	16	14	10	5.1	17
SUFFERFIELD	209	4	85	75	93	92	76	76	76	67	59	7.0	23	20	57	47	23	4	7	30	27	20	10	2	6.9	11
THOMASTON	83	4	80	61	80	84	83	57	63	46	42	6.0	30	39	31	43	30	7	7	22	20	21	11	11	5.2	15
THOMPSON	80	6	85	51	94	85	78	68	87	60	67	6.8	12	29	39	48	12	4	8	30	30	13	10	5	4.9	11
TOLLAND	142	5	86	72	91	89	88	75	75	55	70	7.0	22	22	56	48	22	4	4	29	29	19	11	5	5.1	7
TORRINGTON	252	3	75	59	81	80	75	50	65	49	53	5.9	35	26	39	43	35	8	10	26	24	14	14	4	4.9	18
TROMBULL	320	2	81	76	87	89	81	75	78	65	73	7.1	19	29	53	47	19	2	4	18	22	23	20	12	5.7	6
UNION	6	6	83	83	100	100	83	83	83	83	100	8.0	0	17	83	59	0	0	0	17	0	67	17	6.8	0	0
VERNON	283	3	89	76	91	90	82	74	82	63	73	7.2	16	27	57	48	16	3	8	24	28	20	9	8	5.1	11
VOLUNTOHN	20	6	70	55	70	60	80	50	45	40	40	5.1	50	20	30	39	50	17	28	39	6	6	0	3.7	44	
WALLINGFORD	412	3	79	77	85	86	80	72	75	63	65	6.8	24	27	49	45	24	4	8	30	24	17	12	5	4.9	13
WATERBURY	934	1	59	49	67	63	47	30	52	26	29	4.2	54	25	20	38	54	18	20	31	14	9	4	2	4.0	38
WATERFORD	150	4	89	81	94	94	85	70	83	60	65	7.2	17	26	57	48	17	4	5	35	31	18	5	3	4.8	9
WATERTOWN	210	2	88	81	91	89	74	68	77	60	59	6.9	15	34	51	48	15	5	3	22	26	23	14	7	5.3	8
WESTBROOK	43	6	86	74	95	93	79	67	88	74	74	7.3	16	19	65	49	16	0	7	14	30	21	14	12	5.5	7
WEST HARTFORD	515	2	76	69	84	84	84	72	69	62	66	6.7	25	26	49	45	25	4	4	25	14	23	15	12	5.5	9
WEST HAVEN	417	2	68	66	81	80	68	51	63	45	46	5.7	38	29	33	42	38	5	12	32	22	14	10	4	4.8	17
WESTON	90	5	89	87	94	98	96	88	90	74	82	8.0	14	18	68	53	14	2	1	14	24	29	20	9	5.7	3
WESTPORT	224	3	89	75	93	95	94	83	87	78	80	7.7	14	22	64	50	14	3	5	17	22	24	14	14	5.4	7
WETHERSFIELD	169	2	83	80	89	90	89	74	73	67	73	7.2	16	30	54	48	16	4	7	32	16	20	11	10	5.1	11

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STATE BY DISTRICT REPORT
GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

LANGUAGE ARTS

DATE TESTED: 10-85		OBJECTIVES TESTED								TOTAL LANGUAGE ARTS	DEGREES OF READING POWER (D.R.P.)	WRITING SAMPLE										PAGE 6				
		WRITING MECHANICS	LOCATING INFORMATION	LISTENING COMPREHENSION	READING COMPREHENSION		TOTAL LANGUAGE ARTS	DEGREES OF READING POWER (D.R.P.)	WRITING SAMPLE																	
					literal	inferential and evaluative			1			2	3	4	5	6	7	8	9	10	Average Holistic Score		% of Student's Mastery Further Distinct			
capitalization & punctuation	spelling/homonyms/abbreviations	agreement	schedules, maps, table of contents, dictionary	literal	inferential and evaluative	literal	inferential	evaluative	Average Number of Objectives Mastered	Below 41	41-49	50+	74% of Student's Mastery	75-79% of Student's Mastery	80-84% of Student's Mastery	85-89% of Student's Mastery	90-94% of Student's Mastery	95-99% of Student's Mastery	100% of Student's Mastery	Average Holistic Score	% of Student's Mastery Further Distinct					
MASTERY CRITERIA (U CORRECT/H POSSIBLE)		9/12	7/9	11/15	8/11	5/7	9/13	9/12	10/14	7/10																
DISTRICT	# OF STUDENTS TESTED	TOC	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																							
WILLINGTON	54	5	64	51	81	77	92	81	69	48	63	6.4	40	26	34	43	40	9	9	20	31	11	11	7	4.9	19
WILTON	172	4	92	76	96	93	92	92	86	78	80	7.9	12	22	66	50	12	3	3	16	26	20	18	13	5.6	6
WINCHESTER	90	6	72	60	78	80	81	70	56	40	58	5.9	37	24	38	42	37	12	24	30	12	11	7	3	4.2	37
WINDHAM	217	6	53	45	67	70	74	49	53	39	47	5.0	53	25	22	38	53	20	22	28	14	7	7	8	4.0	42
WINDSOR	262	2	79	77	91	87	81	68	76	65	61	6.8	20	27	53	47	20	4	7	21	21	20	14	13	5.4	11
WINDSOR LOCKS	92	4	88	80	89	88	84	64	78	65	63	7.0	18	25	57	48	18	0	8	26	30	22	12	2	5.1	8
WOLCOTT	147	2	77	69	90	82	81	57	67	54	54	6.3	28	33	39	43	28	5	10	25	29	16	12	3	4.9	14
WOODBIDGE	92	4	85	76	86	87	82	71	79	67	70	7.0	15	30	55	48	15	2	2	11	32	22	22	9	5.7	9
WOOSTOCK	47	6	72	64	87	79	93	80	77	62	68	6.8	36	23	40	63	36	2	4	35	33	13	4	2	4.6	13
REG SCHOOL DIST 06	50	6	86	82	94	100	86	84	90	70	94	7.8	14	24	62	49	14	2	4	20	34	24	10	6	5.3	6
REG SCHOOL DIST 10	134	5	83	64	86	88	85	69	79	68	69	6.9	20	29	55	41	20	2	7	27	28	23	7	7	5.1	8
REG SCHOOL DIST 12	72	6	85	65	92	96	86	85	86	71	85	7.5	8	29	67	53	8	3	7	10	27	28	18	7	5.5	10
REG SCHOOL DIST 13	109	5	79	72	84	88	85	68	76	60	56	6.7	20	36	44	45	20	8	6	28	20	16	16	6	5.0	14
REG SCHOOL DIST 14	110	4	83	71	92	92	89	77	89	68	81	7.4	15	24	61	49	15	1	7	30	20	20	14	8	5.2	8
REG SCHOOL DIST 15	195	4	85	73	91	91	87	79	86	65	75	7.3	16	28	56	47	16	1	4	14	26	25	19	12	5.7	5
REG SCHOOL DIST 16	133	4	74	68	88	85	68	57	77	69	59	6.3	35	23	43	43	35	4	5	26	26	14	17	11	5.3	8
REG SCHOOL DIST 17	124	6	81	83	91	93	92	67	81	68	69	7.3	21	31	48	45	21	0	2	24	23	24	17	16	5.6	2
REG SCHOOL DIST 18	85	6	81	76	92	82	84	78	82	67	71	7.1	18	22	60	48	18	9	4	25	40	13	5	5	4.8	13

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STATE BY DISTRICT REPORT
GRADE 4

CONNECTICUT MASTERY TESTING PROGRAM

LANGUAGE ARTS

		OBJECTIVES TESTED								TOTAL LANGUAGE ARTS	DEGREES OF READING POWER (DRP)		WRITING SAMPLE										PAGE 7			
		WRITING MECHANICS		LOCATING INFORMATION		LISTENING COMPREHENSION		READING COMPREHENSION																		
DATE TESTED: 10-85		capitalization & punctuation	spelling/homonyms/abbreviations	segment	schedule, maps, table of contents, dictionary	literal	inferential and evaluative	literal	inferential	evaluative	Average Number of Objectives Mastered	Category 1	5-10	11-15	Average DRP Score	% of Student's Reading Further Described	1	2	3	4	5	6	7	8	Average Writing Score	% of Student's Reading Further Described
MASTERY CRITERIA (# CORRECT/# POSSIBLE)			8/12	7/9	11/15	8/11	5/7	8/13	8/12	10/14	7/10															
DISTRICT	# OF STUDENTS TESTED	TOC	SCORES REPRESENT THE PERCENT OF STUDENTS MASTERING EACH OBJECTIVE																							
TOC 1 TOTAL	5,593		50	50	57	59	44	51	42	23	26	3.9	60	23	18	37	60	20	18	31	15	9	9	2	3.9	59
TOC 2 TOTAL	6,267		71	70	87	86	80	68	73	60	63	6.7	29	28	47	44	25	4	9	25	23	18	13	8	5.1	13
TOC 3 TOTAL	7,115		74	66	81	81	73	58	67	51	55	6.1	32	27	41	43	32	8	11	20	21	16	10	6	4.8	20
TOC 4 TOTAL	5,499		84	73	90	90	85	74	79	64	68	7.1	23	24	54	47	20	4	7	23	24	20	15	8	5.3	18
TOC 5 TOTAL	3,218		83	71	88	89	85	72	78	62	64	7.0	21	27	52	47	21	4	9	24	24	18	14	7	5.2	13
TOC 6 TOTAL	2,160		76	63	83	82	80	65	71	53	58	6.3	30	28	43	43	30	8	12	25	23	16	11	4	4.8	20
STATE TOTAL	29,852		74	66	80	81	73	60	67	51	55	6.1	32	26	42	43	32	8	11	26	21	16	11	6	4.8	19

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APPENDIX J

Type of Community Classifications

TYPE OF COMMUNITY

- TOC 1 = LARGE CITY - a town with a population of more than 100,000.
- TOC 2 = FRINGE CITY - a town contiguous with a large city, and with a population over 10,000.
- TOC 3 = MEDIUM CITY - a town with a population between 25,000 and 100,000 and not a Fringe City.
- TOC 4 = SMALL TOWN (Suburban) - a town within an SMSA* with a population of less than 25,000; not a Fringe City.
- TOC 5 = SMALL TOWN (Emerging Suburban) - a town with a population of less than 25,000 included in what was a proposed 1980 SMSA but not included in a 1970 SMSA.
- TOC 6 = SMALL TOWN (Rural) - a town not included in an SMSA, with a population of less than 25,000.

*Standard Metropolitan Statistical Area

APPENDIX K
Student Participation Rates

CONNECTICUT MASTERY TESTING PROGRAM
PRELIMINARY PARTICIPATION RATES FOR FOURTH GRADERS BY DISTRICT
SCHOOL YEAR 1985-86

DISTRICT	OCT 1 TOTAL	SEP 23 TOTAL	DIFF	NUM ELIGIBLE	% EXEMP	MATH RATE	NUM MATH	LA RATE	NUM LA	READ RATE	NUM READ	WRIT RATE	NUM WRIT
ANDOVER	29	29	0	29	0.0	100.0	29	100.0	29	96.6	28	89.7	26
ANSONIA	149	150	-1	144	4.0	100.0	144	98.6	142	99.3	143	98.6	142
ASHFORD	43	43	0	42	2.3	100.0	43	100.0	43	100.0	43	100.0	42
AVON	149	149	0	147	1.3	100.0	147	100.0	147	100.0	147	100.0	147
BANKHAMSTED	31	30	1	29	3.3	100.0	30	100.0	30	100.0	30	100.0	30
BERLIN	137	137	0	129	5.8	100.0	136	100.0	134	100.0	133	100.0	136
BETHANY	55	55	0	55	0.0	100.0	55	94.5	52	96.4	53	98.2	54
BLITHELL	217	218	-1	214	1.8	100.0	214	99.1	212	99.5	213	99.5	213
BLOOMFIELD	181	184	-3	180	2.2	100.0	180	100.0	180	100.0	180	100.0	180
BOLTON	48	48	0	45	6.3	100.0	45	97.8	44	100.0	45	100.0	45
BOZRAH	26	21	5	21	0.0	100.0	21	100.0	21	100.0	21	95.2	20
BRANDFORD	196	199	-3	196	1.5	99.5	195	98.5	193	99.5	195	99.0	194
BRIDGEPORT	1496	1497	-1	1284	14.2	98.4	1264	96.9	1244	99.0	1271	97.4	1250
BRISTOL	528	528	0	527	0.2	99.4	524	99.1	522	99.4	524	98.3	518
BROOKFIELD	161	164	-3	156	4.9	100.0	156	98.1	153	97.4	152	97.4	152
BROOKLYN	85	82	3	82	0.0	100.0	82	100.0	82	100.0	82	100.0	82
CANAAN	10	10	0	9	10.0	100.0	9	100.0	9	100.0	9	88.9	8
CANTERBURY	70	70	0	69	1.4	97.1	67	97.1	67	97.1	67	95.7	66
CANTON	83	83	0	81	2.4	100.0	81	100.0	81	100.0	81	100.0	81
CHAPLIN	30	30	0	27	10.0	96.3	26	92.6	25	100.0	27	63.0	17
CHESHIRE	305	315	-10	308	2.2	100.0	309	100.0	309	100.0	310	99.7	307
CHESTER	37	37	0	37	0.0	97.3	36	97.3	36	97.3	36	97.3	36
CENTON	160	164	-4	161	1.8	98.8	159	98.8	159	99.4	160	98.8	159
COLCHESTER	115	119	-4	116	2.5	99.1	115	98.3	114	100.0	116	100.0	116
COLBROOK	11	11	0	11	0.0	100.0	11	100.0	11	100.0	11	100.0	11
COLUMBIA	49	49	0	45	8.2	100.0	45	97.8	44	97.8	44	97.8	44
CORNWALL	15	15	0	15	0.0	86.7	13	86.7	13	86.7	13	86.7	13
COVENTRY	118	118	0	112	5.1	100.0	112	99.1	111	100.0	112	99.1	111
CROMWELL	90	92	-2	84	8.7	100.0	84	100.0	84	100.0	84	100.0	84
DANBURY	598	607	-9	573	5.6	98.8	566	96.9	555	98.4	560	98.1	562
DARTEN	190	191	-1	189	1.0	99.5	188	97.4	184	97.4	184	98.4	186
DEEP RIVER	42	42	0	42	0.0	100.0	42	100.0	42	100.0	42	100.0	42
DERBY	81	81	0	80	1.2	100.0	80	100.0	80	97.5	78	95.0	76
EASTFORD	16	16	0	15	6.3	100.0	15	100.0	15	100.0	15	100.0	15
EAST GRANBY	37	37	0	37	0.0	100.0	37	100.0	37	100.0	37	100.0	37
EAST HADDAM	64	64	0	64	0.0	98.4	63	98.4	63	98.4	63	100.0	64
EAST HAMPTON	111	111	0	109	1.8	98.2	107	96.3	105	97.2	106	98.2	107
EAST HARTFORD	436	440	-4	418	5.0	100.0	421	100.0	418	100.0	420	100.0	419
EAST HAVEN	183	181	2	171	5.5	100.0	172	100.0	171	100.0	171	100.0	172
EAST LYME	164	165	-1	165	0.0	98.8	163	98.8	163	100.0	165	98.8	163
EASTON	64	64	0	64	0.0	96.9	62	96.9	62	96.9	62	96.9	62
EAST WINDSOR	72	72	0	66	8.3	100.0	66	98.5	65	100.0	66	100.0	66
ELLINGTON	112	117	-5	109	6.8	99.1	108	100.0	109	100.0	109	100.0	109
ENFIELD	380	382	-2	372	2.6	100.0	372	99.2	369	99.5	370	99.5	370
ESSEX	45	45	0	45	0.0	100.0	45	100.0	45	100.0	45	100.0	45
FAIRFIELD	415	400	15	366	8.5	100.0	377	100.0	376	100.0	377	100.0	373
FARMINGTON	144	147	-3	137	6.8	99.3	136	99.3	136	98.5	135	100.0	137
FRANKLIN	29	29	0	28	3.4	100.0	28	100.0	28	100.0	28	100.0	28
GASTONHURRY	287	287	0	279	2.8	97.8	273	100.0	280	100.0	283	99.6	278
GRANBY	96	96	0	96	0.0	97.9	94	97.9	94	97.9	94	97.9	94
GREENWICH	423	425	-2	390	8.2	100.0	393	100.0	391	100.0	392	100.0	390
GRISWOLD	131	140	-9	128	8.6	99.2	127	98.4	126	98.4	126	99.2	127
GROTON	425	423	2	418	1.2	97.1	406	97.1	406	98.6	412	95.9	401

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DISTRICT	OCT 1 TOTAL	SEP 23 TOTAL	DIFF	NUM ELIGIBLE	% EXEMP	MATH RATE	NUM MATH	LA RATE	NUM LA	READ RATE	NUM READ	WRIT RATE	NUM WRIT
GUILFORD	249	252	-3	250	0.8	98.4	246	98.4	246	98.4	246	98.4	246
HAMDEN	356	356	0	353	0.8	100.0	353	97.7	345	99.4	351	99.2	350
HAMPTON	23	23	0	23	0.0	95.7	22	95.7	22	95.7	22	91.3	21
HARTFORD	1733	1815	-82	1619	10.8	96.6	1564	92.8	1502	95.1	1539	91.1	1475
HARTLAND	14	14	0	14	0.0	100.0	14	100.0	14	100.0	14	100.0	14
HEBRON	102	99	3	99	0.0	100.0	101	100.0	102	100.0	102	100.0	100
KENT	34	34	0	32	5.9	100.0	32	100.0	32	100.0	32	100.0	32
KILLINGLY	180	180	0	179	0.6	100.0	179	100.0	179	100.0	179	99.4	178
LEBANON	54	59	-5	54	8.5	100.0	54	100.0	54	100.0	54	100.0	54
LEDYARD	206	206	0	202	1.9	100.0	202	100.0	202	100.0	202	99.5	201
LISBON	44	47	-3	43	8.5	97.7	42	97.7	42	97.7	42	97.7	42
LITCHFIELD	70	74	-4	74	0.0	98.6	73	100.0	74	100.0	74	98.6	73
MADISON	172	175	-3	171	2.3	100.0	171	99.4	170	99.4	170	100.0	170
MANCHESTER	421	431	-10	431	0.0	98.8	426	99.1	427	98.8	426	98.8	426
MANSFIELD	90	90	0	86	4.4	100.0	89	100.0	86	100.0	86	97.7	86
MARLBOROUGH	77	77	0	77	0.0	100.0	77	98.7	76	100.0	77	98.7	76
MERIDEN	550	553	-3	513	7.2	98.4	505	97.9	502	98.8	507	98.2	504
MIDDLETOWN	306	304	2	304	0.0	99.3	302	99.0	301	98.4	299	98.0	298
MILFORD	432	431	1	431	0.0	98.1	423	98.4	424	98.8	426	99.1	427
MONROE	205	205	0	203	1.0	100.0	204	100.0	203	100.0	203	100.0	203
MONTVILLE	174	175	-1	175	0.0	100.0	175	98.9	173	99.4	174	99.4	174
NAUGATUCK	315	318	-3	287	9.7	100.0	287	99.7	286	99.3	285	99.3	285
NEW BRITAIN	494	514	-20	465	9.5	98.9	460	97.2	452	98.7	459	96.3	448
NEW CANAAN	189	189	0	186	1.6	97.3	181	94.6	176	97.8	182	96.2	179
NEW FAIRFIELD	183	190	-7	185	2.6	99.5	184	99.5	184	99.5	184	99.5	184
NEW HARTFORD	66	66	0	66	0.0	98.5	65	98.5	65	98.5	65	98.5	65
NEW HAVEN	1197	1177	20	1080	8.2	96.7	1044	95.6	1032	98.0	1058	96.4	1041
NEWINGTON	249	247	2	245	0.8	99.6	244	100.0	245	100.0	245	99.6	244
NEW LONDON	233	231	2	216	6.5	97.2	210	94.0	203	96.8	209	94.4	204
NEW MILFORD	298	306	-8	288	5.9	100.0	289	99.7	287	100.0	289	98.6	284
NEWTOWN	257	257	0	251	2.3	98.4	247	98.8	248	98.4	247	98.8	248
NORFOLK	16	15	1	14	6.7	100.0	15	100.0	15	100.0	15	100.0	15
NORTH BRANFORD	149	149	0	149	0.0	100.0	149	100.0	149	100.0	149	99.3	148
NORTH CANAAN	37	37	0	36	2.7	97.2	35	97.2	35	97.2	35	97.2	35
NORTH HAVEN	219	231	-12	214	7.4	99.5	213	98.6	211	99.1	212	99.1	212
NORTH STONINGTON	55	59	-4	56	5.1	100.0	56	100.0	57	100.0	57	98.2	55
NORWALK	660	660	0	641	2.9	99.4	637	99.5	638	99.7	639	99.5	638
NORWICH	368	385	-17	357	7.3	98.9	353	99.4	355	99.4	355	98.3	351
OLD SAYBROOK	90	93	-3	90	3.2	100.0	90	98.9	89	98.9	89	97.8	88
ORANGE	152	149	3	149	0.0	99.3	148	100.0	151	100.0	151	100.0	149
OXFORD	99	101	-2	101	0.0	99.0	100	99.0	100	99.0	100	99.0	100
PLAINFIELD	176	188	-12	178	5.3	98.9	176	98.3	175	98.9	176	98.9	176
PLAINVILLE	142	141	1	141	0.0	99.3	140	100.0	141	100.0	141	99.3	140
PLYMOUTH	120	127	-7	127	0.0	96.9	123	96.1	122	97.6	124	96.9	123
POMERET	45	45	0	45	0.0	97.8	44	97.8	44	97.8	44	97.8	44
PORTLAND	77	81	-4	72	11.1	100.0	72	100.0	72	100.0	72	100.0	72
PRISTON	46	46	0	46	0.0	100.0	46	100.0	46	100.0	46	100.0	46
PRINNAM	107	107	0	102	4.7	100.0	102	99.0	101	100.0	102	98.0	100
RIDGING	96	97	-1	89	8.2	98.9	88	98.9	88	97.8	87	100.0	89
RIDGEFIELD	240	244	-4	240	1.6	99.6	239	99.2	238	100.0	240	100.0	240
ROCKY HILL	127	127	0	123	3.1	100.0	123	100.0	123	100.0	123	100.0	123
SALIM	43	43	0	43	0.0	100.0	43	100.0	43	100.0	43	100.0	43
SALISBURY	31	31	0	26	16.1	100.0	26	100.0	26	100.0	26	100.0	26

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SCOTLAND	16	15	1	15	0.0	100.0	15	100.0	15	100.0	15	100.0	15
SEYMOUR	149	149	0	149	0.0	100.0	149	100.0	149	100.0	149	98.7	147
SHARON	14	14	0	13	7.1	100.0	13	100.0	13	100.0	13	100.0	13
SHRILTON	301	306	-5	291	4.9	100.0	297	100.0	297	100.0	297	100.0	296
SHIRMAN	19	19	0	19	0.0	100.0	19	100.0	19	100.0	19	100.0	19
SIMSBURY	263	262	1	262	0.0	99.6	261	99.2	260	98.9	259	100.0	262
SOMERS	79	73	-4	73	0.0	97.3	71	100.0	73	100.0	73	100.0	73
SOUTHINGTON	431	430	1	417	3.0	99.3	414	99.0	413	99.5	415	99.0	413
SOUTH WINDSOR	226	226	0	224	0.9	100.0	226	100.0	224	100.0	226	100.0	226
SPRAGUE	20	20	0	19	5.0	100.0	19	100.0	19	100.0	19	100.0	19
STAFFORD	111	116	-5	106	8.6	100.0	107	99.1	105	100.0	106	99.1	105
STAMFORD	750	747	3	718	3.9	98.5	707	97.9	703	99.2	712	99.2	712
STERLING	22	22	0	21	4.5	100.0	22	100.0	22	100.0	22	100.0	22
STONINGTON	152	154	-2	152	1.3	100.0	153	100.0	152	100.0	152	98.7	150
STRATFORD	390	388	2	385	0.8	99.5	383	99.5	383	99.2	382	99.0	381
SUFFIELD	111	111	0	111	0.0	98.2	109	98.2	109	98.2	109	97.3	108
THOMASTON	83	83	0	83	0.0	100.0	83	100.0	83	100.0	83	97.6	81
THOMPSON	88	88	0	79	10.2	94.9	75	93.7	74	92.4	73	100.0	79
TOLLAND	142	142	0	142	0.0	100.0	142	99.3	141	100.0	142	98.6	140
TORRINGTON	263	263	0	254	3.4	98.4	250	98.4	250	98.8	251	99.2	252
TRUMBULL	321	322	-1	321	0.3	99.7	320	99.4	319	99.4	319	99.7	320
UNION	6	6	0	6	0.0	100.0	6	100.0	6	100.0	6	100.0	6
VERNON	284	285	-1	283	0.7	98.6	279	96.8	274	98.9	280	98.6	279
VOEGTOWN	20	20	0	20	0.0	100.0	20	100.0	20	100.0	20	90.0	18
WALLINGFORD	417	416	1	412	1.0	99.8	411	99.0	408	99.0	408	98.8	407
WATERBURY	973	1042	-69	947	9.1	97.1	920	96.8	917	97.5	923	96.8	917
WATERFORD	158	158	0	150	5.1	100.0	150	99.3	149	100.0	150	100.0	150
WATERTOWN	215	224	-9	217	3.1	100.0	217	100.0	218	99.5	216	100.0	217
WESTBROOK	47	47	0	43	8.5	100.0	43	100.0	43	100.0	43	100.0	43
WEST HARTFORD	525	535	-10	514	3.9	100.0	515	100.0	514	100.0	515	99.8	513
WEST HAVEN	455	454	1	417	8.1	99.5	415	99.3	414	99.8	416	99.0	413
WESTON	92	92	0	90	2.2	98.9	89	98.9	89	100.0	90	100.0	90
WESTPORT	228	236	-8	224	5.1	100.0	224	100.0	224	99.1	222	99.1	222
WEIHERSFIELD	170	172	-2	172	0.0	98.3	169	97.1	167	98.3	169	97.7	168
WILLINGTON	57	57	0	54	5.3	98.1	53	96.3	52	98.1	53	100.0	54
WILTON	173	173	0	172	0.6	99.4	171	97.7	168	97.1	167	100.0	172
WINCHESTER	94	94	0	90	4.3	98.9	89	97.8	88	100.0	90	100.0	90
WINDHAM	232	232	0	221	4.7	95.9	212	95.5	211	95.9	212	94.6	209
WINDSOR	272	272	0	265	2.6	98.5	261	98.1	260	98.5	261	98.5	261
WINDSOR LOCKS	92	92	0	82	10.9	100.0	92	100.0	92	100.0	92	100.0	92
WOLCOTT	152	155	-3	155	0.0	94.8	147	94.2	146	94.8	147	94.8	147
WOODBIDGE	93	93	0	93	0.0	96.8	90	97.8	91	97.8	91	97.8	91
WOODSTOCK	48	47	1	47	0.0	100.0	47	95.7	45	100.0	47	97.9	46
REGIONAL DIST 6	58	59	-1	51	13.6	98.0	50	98.0	50	98.0	50	98.0	50
REGIONAL DIST 10	138	138	0	134	2.9	100.0	134	98.5	132	99.3	133	97.0	130
REGIONAL DIST 12	72	72	0	72	0.0	100.0	72	100.0	72	100.0	72	98.6	71
REGIONAL DIST 13	112	112	0	109	2.7	100.0	109	100.0	109	100.0	109	100.0	109
REGIONAL DIST 14	122	122	0	109	10.7	100.0	109	100.0	109	100.0	109	100.0	110
REGIONAL DIST 15	196	202	-6	202	0.0	96.0	194	96.0	194	96.5	195	96.0	194
REGIONAL DIST 16	134	134	0	133	0.7	100.0	133	100.0	133	100.0	133	100.0	133
REGIONAL DIST 17	125	130	-5	125	3.8	99.2	124	99.2	124	98.4	123	99.2	124
REGIONAL DIST 18	88	88	0	84	4.5	100.0	85	100.0	85	100.0	85	100.0	85

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