

# Putting The Pieces Together: Validity Evaluations of States' Alternate Assessment Systems

## Connecticut's Validity Argument

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# Core Beliefs and Guiding Philosophy

**The assessment program in Connecticut was designed to**

- help guide curriculum and instruction and
- permit the measurement of progress toward the educational goals that have been established for Connecticut students as reflected in the Connecticut Curriculum Frameworks and related Connecticut State Department of Education (CSDE) publications.

**Specific purposes of the statewide CMT and CAPT testing program including the Skills Checklist, our alternate assessment, are to:**

- set high expectations and standards for the achievement of all students;
- test a comprehensive range of academic skills;
- disseminate useful test achievement information about students, schools and districts;
- assess equitable educational opportunities; and
- continually monitor student progress in Grades 3 through 8 and Grade 10.

# Purposes of the CMT/CAPT Skills Checklist

The CMT/CAPT Skills Checklist provides an accountability measure to determine the extent to which students with significant cognitive disabilities have been instructed on the state's academic content standards. The Checklist has been designed to align with the Performance Standards and Expected Performance statements included in the Connecticut Curriculum Framework in the areas of Language Arts and Mathematics for Grades 3 to 8 and 10.

The CMT/CAPT Skills Checklist is a non-secure, stand-alone working document that teachers use throughout the school year.

## **It is expected that the use of the Checklist will:**

- communicate the state's academic content standards for teachers to design individualized, effective instruction for students with significant cognitive disabilities;
- document student achievement with respect to the state's academic content standards for students with significant cognitive disabilities; and
- result in a greater inclusion of students with significant cognitive disabilities in general education settings.

# Use of Assessment Information

## State Use

to document the achievement of students with significant cognitive disabilities for accountability purposes

## District Use

to monitor coverage of the state's academic content standards in the classroom

## Student Planning and Placement Team Use

as a profile of that student's achievement, which is used to direct instruction in the subsequent grade

# CT Alternate Assessment

Skills Checklist                      2000

Functional, daily living, self-help, and social skills (one form)      grades 4, 6, 8, 10

Skills Checklists                      2006

M, ELA, Access                      grades 3 – 8, 10

Skills Checklists                      2008

M, ELA, Access                      grades 3-8, 10  
and Science in grades 5, 8 and 10

# Organization of the Checklist Item

## Content Standard

Algebraic Reasoning  
Grade Three  
Examples

## Performance Standard

A. *Patterns that are made with different objects and symbols and that follow the same rule may be classified together.*

**Essence Statement:** NOT part of CSDE Curriculum Framework

1. *Use a variety of materials to construct, reproduce, describe and extend number and spatial patterns. AR 3-1*  
**Essence:** Demonstrate an understanding of pattern.

Downward Extension

## Expected Performance

Continue a pattern with elements missing (A,B,A,B,A,\_\_\_)

Reproduce an AB pattern with numbers, symbols or objects

Identify an AB pattern with numbers, symbols or objects

# Establishing the Validity of the CMT/CAPT Skills Checklist

- Joint AERA, APA, NCME Standards for educational and Psychological Testing (1999) were used as conceptual basis for development of the checklist and are used by CSDE in ongoing validation efforts

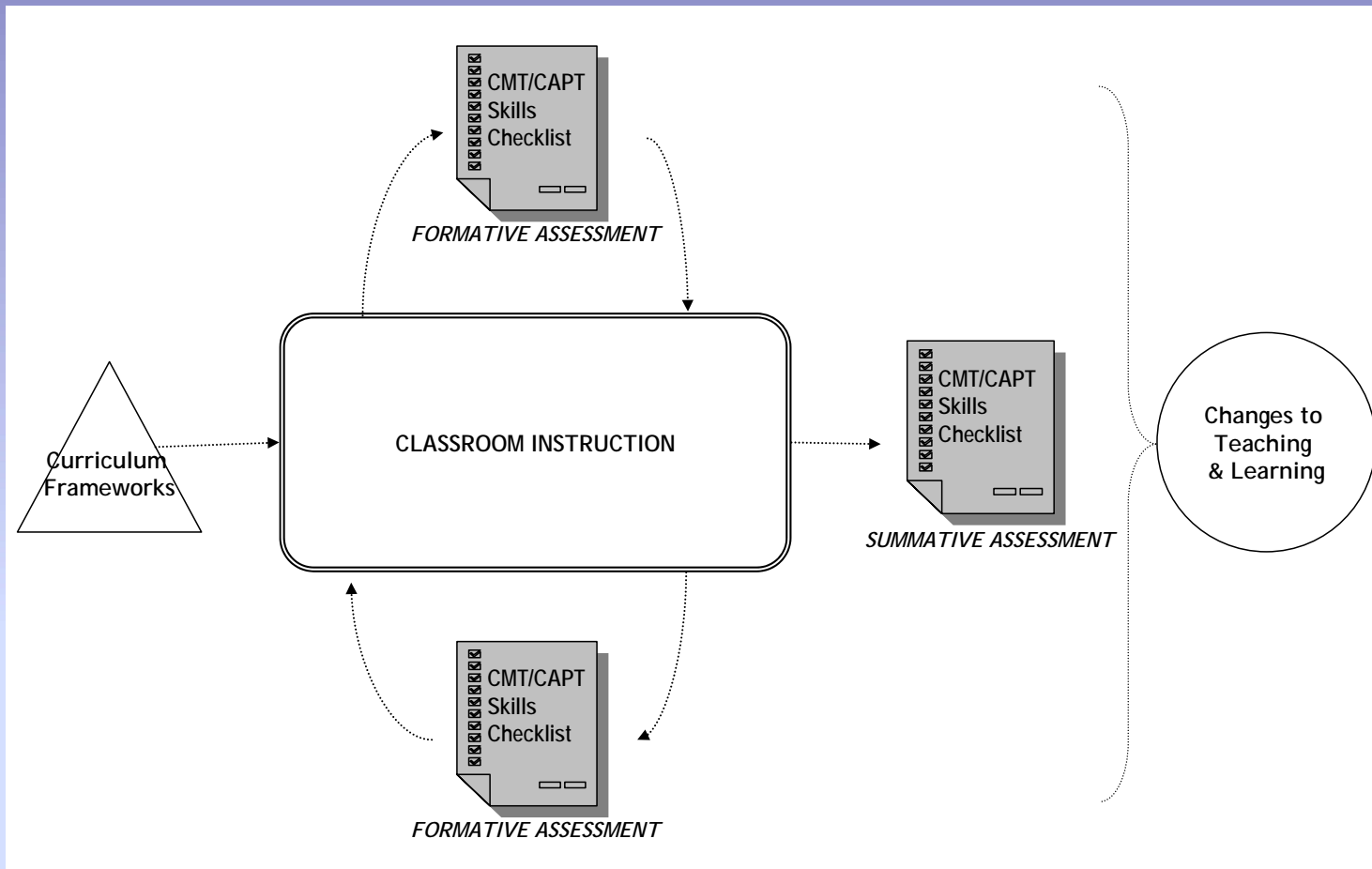
# Validity Defined by *Standards*

- “degree to which evidence and theory support the interpretations of test scores entailed by proposed uses of tests”
- “can be viewed as developing a scientifically sound validity argument to support the intended interpretation of test scores and their reference to the proposed use.” (p.9)
- Of particular relevance to these research studies *Standards* offers that important contributions to the validity evidence are made as other researchers report findings of investigations that are relate to the meaning of scores on the test.” (p.11)

# Classifications of Validity Evidence

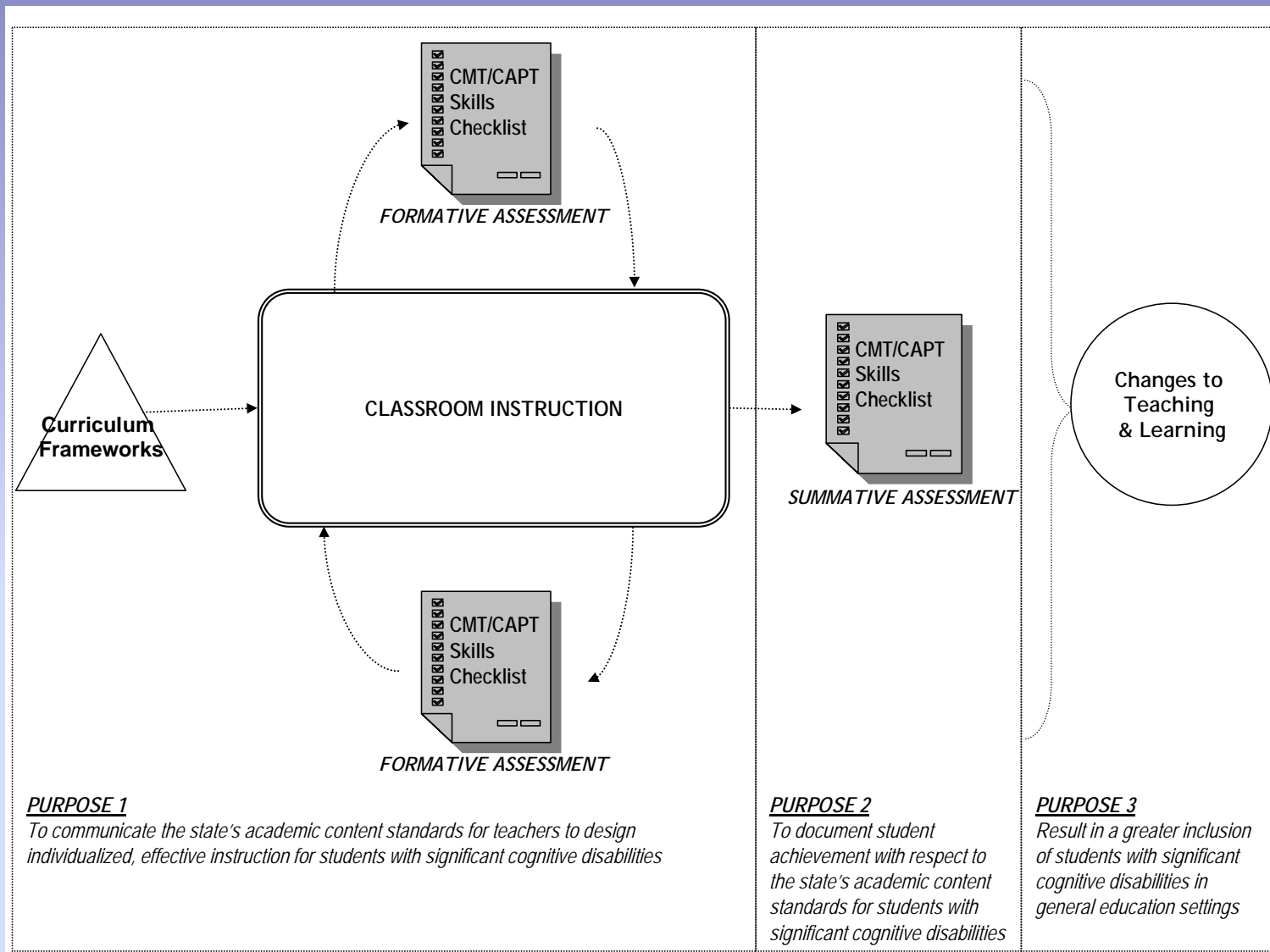
Evidence based on

- Test Content
- Response Processes
- Internal Structure
- Relations to Other Variables
- Testing Consequences



### Checklist System Overview:

The Checklist was developed from the Connecticut Curriculum Frameworks as a formative assessment and an assessment for accountability (or summative assessment); accordingly, the teacher is both the instructor and the assessor. When used appropriately, the Checklist will effect positive changes for students with significant cognitive disabilities.



This system is supported by a network of propositions pertaining to the development of the Checklist, its use in the classroom by teachers, and its effect on students and schools. These propositions and the evidence that exists or will be developed to support these propositions are the validity argument, for the Checklist.

**Purpose 1**

**The Checklist is used to communicate the state’s academic content standards for teachers to design individualized, effective instruction for students with significant cognitive disabilities**

<u>Assumption</u>	<u>Dimension of Validity Evidence</u>	<u>Source of Evidence</u>
1.The Checklist reflects the state’s academic content standards.	Evidence based on test content	<ul style="list-style-type: none"><li>• Alternate Assessment Advisory Committee selection of Content Standards and Expected Performances for Checklist (Winter 2005)</li><li>• Committee review of essence statements and downward extensions (June 2005)</li><li>• Checklist Alignment Study (January 2006)</li><li>• General CMT/CAPT alignment study (see Technical Manual p. 44)</li></ul>
2. Teachers use the Checklist to design individualized, effective instruction for students with significant cognitive disabilities.	Evidence based on consequences of testing	<ul style="list-style-type: none"><li>• Study C</li></ul>

## Purpose 2

The Checklist is used to document student achievement with respect to the state's academic content standards for students with significant cognitive disabilities.

<u>Assumption</u>	<u>Dimension of Validity Evidence</u>	<u>Source of Evidence</u>
1. Teachers develop appropriate tasks to assess their students' achievement for the Checklist.	Evidence based on response processes	<ul style="list-style-type: none"><li>• Documentation of rater training (see Technical Manual, p. 24-31)</li><li>• Study A</li></ul>
2. Scoring criteria are applied consistently across students and across teachers throughout the state.	Evidence based on internal structure Evidence based on response processes	<ul style="list-style-type: none"><li>• Internal consistency analyses (conducted annually)</li><li>• Study B</li></ul>
3. Performance level descriptors match student skills.	Evidence based on internal structure	<ul style="list-style-type: none"><li>• Standards setting procedures (2006)</li></ul>
4. Downward Extensions are arranged in descending order of difficulty.	Evidence based on internal structure	<ul style="list-style-type: none"><li>• Examination of score patterns by Downward Extension (<i>planned quantitative analysis</i>)</li></ul>
5. System stakeholders understand the meaning of student scores with respect to the state's academic content standards.	Evidence based on consequences of testing	<ul style="list-style-type: none"><li>• Study C</li></ul>

**Purpose 3**

**(Use) of the Checklist will result in a greater inclusion of students with significant cognitive disabilities in general education settings.**

<u>Assumption</u>	<u>Dimension of Validity Evidence</u>	<u>Source of Evidence</u>
1. Application of the Checklist will shape teacher/administrator perceptions of how students with significant cognitive disabilities should best be included in the educational system.	Evidence based on consequences of testing	• Study C
2. General education teachers have the knowledge and skills to provide effective instruction to students with significant cognitive disabilities.	Evidence based on consequences of testing	• Study C
3. Increased time spent in the general education classroom will result in an increase exposure to the state's academic content standards.	Evidence based on consequences of testing	• Cohort or matched sample analysis of student scores over time: do student scores reflect the full range of achievement implied by the achievement standards? ( <i>Planned quantitative analysis</i> )

Note that validity evidence based on relationships to other variables (i.e., convergent evidence, discriminant evidence, and validity generalizability) are not addressed

# Purpose of Project

- Expand the network of evidence to support the validity of the CMT/CAPT Skills Checklist
- Build upon previous activities and evidence presented in CMT/CAPT Skills Checklist Technical Manual (2006)
- Respond to issues raised at both internal committee meetings as those which included various local stakeholders including various stakeholders
- Guide delivery of teacher training and development of additional training materials
- Gather more evidence regarding the response processes of teachers as they administer the Checklist
- Gather more evidence regarding claims that the Checklist will change education for students with significant cognitive disabilities
- Gather evidence regarding consistent application in all classrooms

# Validity Studies

## Validity Study A

Examine whether the assessment tasks for the Checklist are designed appropriately and whether consistency exists across Connecticut's teachers

Random selection of ten 5th grade special education teachers  
Participate in study

Teachers complete two forms.

Form One:  
Detailed description of student including Disability category and mode of communication

Form Two:  
Questionnaire Regarding tasks, materials, prompts, and supports used to assess student

Form Two completed for 2 Mathematics items and 2 Reading items, Totaling 10 students and associated tasks/materials

# Validity Studies

## Validity Study B

Examine how scoring rubric used to rate students' skills. Focus on level of agreement among expert raters and the comparison of the experts' ratings to the teacher ratings across a set of items

Creation of bank of video  
Vignettes similar to those used in training

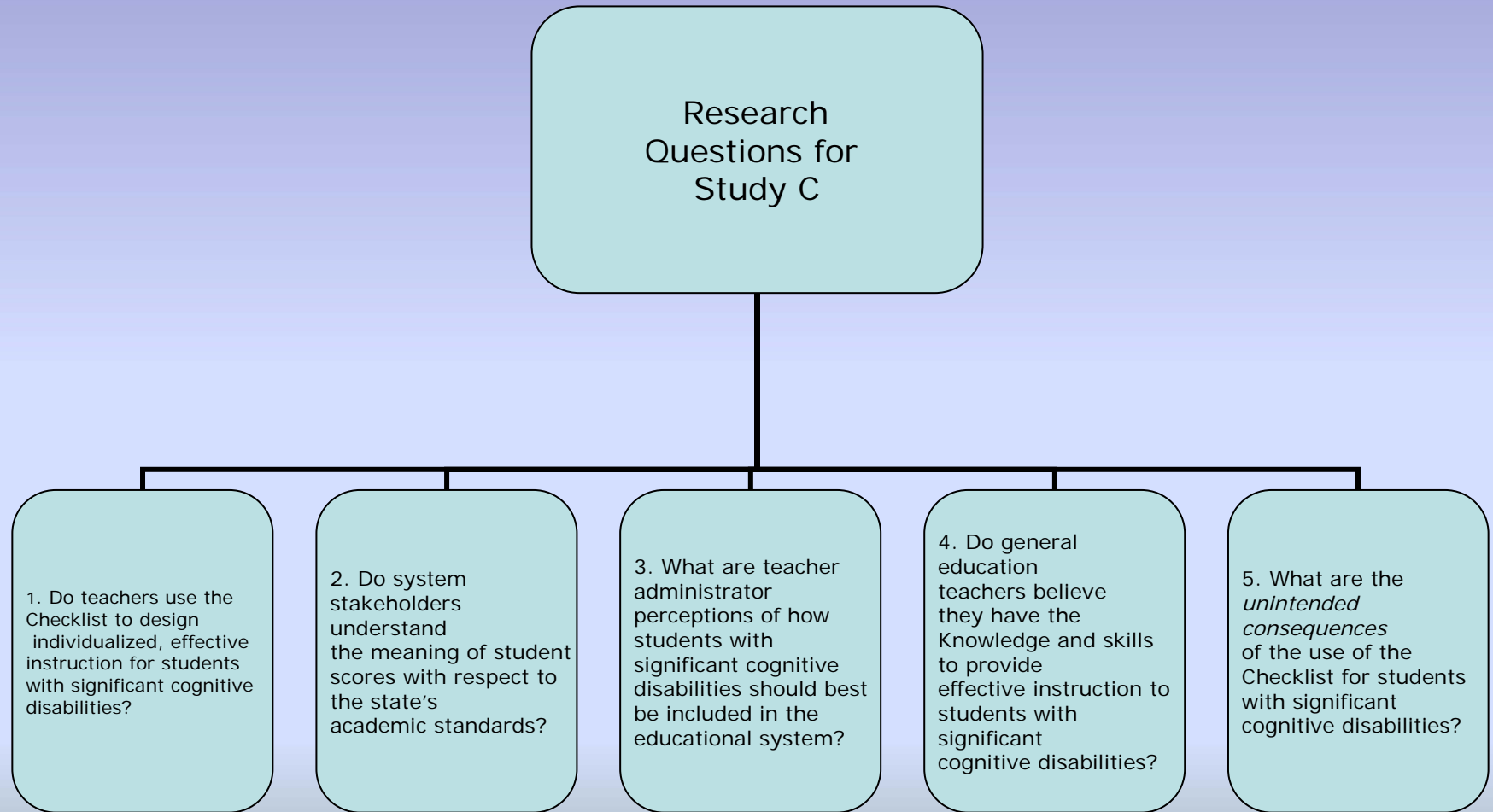
Vignettes present at least 10 grade 5 teachers working with checklist students demonstrating 1 essence  
Statement in reading and math.

Teachers original score noted

Same pool of teachers from Study C used to rate video vignettes

Correlations among raters studied and additional data gathered to gain insight into cues raters attended to determining ratings

# Validity Studies



# Validity Studies

## Validity Study C

Designed to Investigate intended and unintended consequences of the Checklist

Special education teachers of grade 5,8,and 10 who administer a Checklist in March of 2009 complete an online survey

Administrators complete an online survey focusing on influence of Checklist on instruction & assessment across teachers and grades

Parents complete a print survey

Grade specific focus groups conducted to gather additional insight into conclusions from survey research

Focus group Participants will receive curricular materials as compensation for their participation

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