Quality Teaching Makes a Difference

Professor Jenny Gore
International Middle Years of Schooling Conference
August 2008
Quality teaching in context

Authentic Pedagogy

Productive Pedagogy

Quality Teaching
Dimensions and elements of the Quality Teaching model

<table>
<thead>
<tr>
<th>Intellectual quality</th>
<th>Quality learning environment</th>
<th>Significance</th>
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</thead>
<tbody>
<tr>
<td>Deep knowledge</td>
<td>Explicit quality criteria</td>
<td>Background knowledge</td>
</tr>
<tr>
<td>Deep understanding</td>
<td>Engagement</td>
<td>Cultural knowledge</td>
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<td>Problematic knowledge</td>
<td>High expectations</td>
<td>Knowledge integration</td>
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<tr>
<td>Higher-order thinking</td>
<td>Social support</td>
<td>Inclusivity</td>
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<tr>
<td>Metalanguage</td>
<td>Students’ self-regulation</td>
<td>Connectedness</td>
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<tr>
<td>Substantive communication</td>
<td>Student direction</td>
<td>Narrative</td>
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</tbody>
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Note: Highlighted elements do not pertain to the coding of assessment practice.
Pedagogy matters

Pedagogy = Instruction + Assessment

Critical Elements?
– Techniques/Practices
– Intellectual Demands
Rationale for Quality Teaching

Respect for Students and Teachers

Contemporary Intellectual Demands
– Work, Citizenship, Personal Affairs

Stimulates Professional Community
Quality Teaching main messages

It is based on sound research
It is a framework
It is generic
It builds on what teachers already know and do
It provides concepts and language with which to talk about practice
It is a model
Intellectual Quality is central
The dimensions work to support each other
“Innovations often fail when educators focus only on the surface features of the innovation rather than the underlying mechanism[s] that will enable it to work.”

(Lewis, Perry and Murata, 2006, p.5)
Underlying mechanisms

Comprehensive approach to teaching

Focus on curriculum decisions

Clear goals for and commitment to learning for all students

A supportive approach to teacher development
Mathematics and Social Studies Authentic Student Performance

Classes with Low, Average, and High Authentic Pedagogy
24 Restructuring Elementary, Middle, and High Schools
Writing and Mathematics Authentic Student Performance According to Authentic Intellectual Quality of Teachers’ Assignments 12 Chicago Schools

Source: Newmann, Bryk & Lopez (1998)
High School Mathematics Conventional Achievement Gains

According to Levels of Authentic Instruction 1000 schools
(NELS Survey)
High School Science Conventional Achievement Gains

According to Levels of Authentic Instruction 1000 schools (NELS Survey)
Elementary Students’ Gains in Reading and Mathematics on the ITBS

According to Authentic Quality of Teachers’ Assignments in Writing and Mathematics in 46 Chicago Schools Gain Scores Averaged Across Grades 3, 6, 8 for 96-97, 97-98, 98-99
Authentic Performance for Students with and without Disabilities in Classes with Low and High Scoring Assignments; 4 Schools, Grades 9-12, 16 Teachers, 4 Academic Subjects

Source: King, Schroeder, Chaswszczewski, 2001
High School Authentic Instruction and Conventional Achievement

For Low and High Socioeconomic Students from Low Authentic Instruction School
High School Authentic Instruction and Conventional Achievement

For Low and High Socioeconomic Students from High Authentic Instruction School
Relationship Between Intellectual Quality and Student Behaviour

QSRLS Classroom Observation Results

Intellectual Quality

Students’ Self Regulation

QSRLS Classroom Observation Results
Relationship Between Intellectual Quality and Student Behaviour

QSRLS Classroom Observation Results

Engagement
Systemic Implications of pedagogy and achievement in NSW Public Schools (SIPA)

ARC Linkage Grant with NSWDEET
2004-2007

Chief Investigators:
James Ladwig, Jennifer Gore, Tom Griffiths and Wendy Amosa
Research questions

Does teaching that exhibits the principles of Quality Teaching lead to improved student learning outcomes in the NSW context?; 

What are the equity implications of the Quality Teaching model?; and 

What forms of professional development are associated with teachers meeting the standards of the Quality Teaching model?
Sample

36 schools selected for diversity across the following criteria:
- school location (urban/rural);
- socio-economic status;
- enrolments of students from Aboriginal or Torres Strait Islander descent;
- enrolments of students from non-English speaking backgrounds; and
- prior school engagement with Quality Teaching.

Longitudinal design 2004-2007

3 cohorts of students Years 3-6 (900), Years 5-8 (400), Years 7-10 (1200)

Focus on English, HSIE, Maths, Science and PDHPE
Data sources

- Student work and assessment task data (six collection points during study)

- School field visit data (two observations per class per visit and interviews)

- Survey of teachers (annual)

- Release of school and student demographic and achievement data from the NSW DET
### Data gathered 2004-2007

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<tr>
<th>Data source</th>
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<tbody>
<tr>
<td>Student work samples</td>
<td>21349</td>
</tr>
<tr>
<td>SIPA questionnaires</td>
<td>3587</td>
</tr>
<tr>
<td>Classroom observations</td>
<td>665</td>
</tr>
<tr>
<td>Teacher and executive staff interviews</td>
<td>612</td>
</tr>
<tr>
<td>Assessment tasks coded</td>
<td>508</td>
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</table>
Preliminary findings

1. Intellectual Quality and Quality Learning Environment is better in primary than secondary classrooms while the reverse is true for assessment tasks whereby secondary tasks are better on the same two dimensions than primary tasks.

2. There is no relationship between quality of tasks and quality of classroom practice for individual teachers.

3. The quality of pedagogy at the class level is strongly related to the proportion of low SES and ATSI students in those classes.

4. The quality of pedagogy is poorest for Indigenous and low SES students.

5. Prior achievement has an overwhelming influence on the quality of pedagogy students receive.

6. High QT tasks produce better student performances and significant narrowing of achievement gaps for ATSI and low SES students.
More findings

7. Teachers’ sense of responsibility for their students’ learning is strongly correlated with the quality of their teaching

8. There is no relationship between the quality of teaching, using our measures, and years of teaching experience.
Key points

- all three dimensions matter

- professional development in pedagogy matters

- expectations matter enormously
Conclusion from SIPA evidence

A commitment to social justice is essential if achievement gaps are to close, but teachers also need to know how to teach (construct tasks, deliver lessons, inspire and motivate, etc) and need to know what they are teaching if they are to help create high quality outcomes for all students.
Some challenges facing (middle) schooling

• grasping at fads and quick fixes as tools for teachers, often with no evidence of their effects, in the face of a weak knowledge base for teaching;

• imploring teachers to teach well with inadequate specification of what good teaching looks like and how it can be achieved;

• mis-teaching, on the basis of little evidence, what makes a difference for different cohorts of students. That is, creating certain untested myths about what works in different contexts;

• confronting teacher dispositions. With data showing that students with lower prior achievement receive lower quality pedagogy, there are clear messages about the need to address teachers’ role in the production of social inequality.
References


