New Horizons for Teaching and Learning

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The prime mission of education in the modern world is to prepare future generations for a changing world of work and socio-cultural participation.

In addition to imparting knowledge and skills, education has a moral and civic purpose.
Challenges for Education in a Global Culture

• Learning will be the major business of the vocational/professional future of anyone who now leaves school.

• The co-existence of multiple adversities continues to have a cumulative effect on learning opportunities and outcomes.

• New technologies (the digital revolution) are changing the structure and modality of knowledge, its acquisition and its transfer.

• The multicultural nature of current societies constitutes an additional dimension of any modern person’s life and requires growth in intercultural competence along the lifespan.
Thesis of Education Reform

• Societal change world wide is creating a demand for new skills and attributes.
• Society itself may have changed in its capacity to engender these, leading to pressure on the education system to do more.
• The means education needs to become more ‘differentiated’ and ‘personalised’ to meet more individually determined needs;
• State provision itself needs to link better with the ‘outside education system’ determinants of learning – the family and the community.
“Education, Education, Education”

• Education is the great progressive cause of our time: it can allow every child the chance to take their full and equal share in citizenship, shape their own destiny, and become masters of their own fate.

• Education allows individuals to choose a fulfilling job, to shape the society around them, to enrich their inner life.

• Education allows us all to become authors of our own life stories, to overcome the accidents of our birth and achieve so much more than we may have imagined.
Three Levels of Policy for Educational Effectiveness and Improvement

• **Macro** – Global & National = setting high expectations and a ‘floor standard’ for attainment.

• **Meso** – Local & Institutional = the interaction of leadership at various levels of the educational system to create propitious circumstances for teaching and learning.

• **Micro** – Classrooms & Other Learning Settings = the need to focus ‘unrelentingly’ on learning.
The Priority of Teachers

• Research suggests good teachers are the biggest influence on children’s education - “The quality of an education system cannot exceed the quality of its teachers” (Sir Michael Barber).

• Teachers need to be seen as “the guardians of the intellectual life of the nation” and above all as “champions of learning”.

Professionalizing Teaching

Professionalizing teaching means changing the work that teachers do in order to be able to meet more closely the needs of students, parents and communities and teachers’ own needs. This professionalising process, as a matter of course, integrates parents and other adults into the educative process and integrates the educative process back into communities.
Teachers Professional Practice

*Professional practice* is the combination of attitudes, behaviours and skills that:

- promotes student learning through the application of appropriate curriculum and pedagogy coupled with the triggering of engagement and growth of emotional intelligence in students;
- stimulates continuous learning and collegiality in teachers, and;
- inspires confidence in parents.

See John Corrigan, Group 8 Education accessible online at: [www.gr8education.com](http://www.gr8education.com)
SIMPLE MODEL OF FACTORS IN TEACHING AND LEARNING

Political, economic and cultural contexts
Informal and formal learning contexts

Learners and learning through the lifecourse

Curriculum and domain knowledge
Interaction and pedagogy
Information technology

Assessment and learning

Learning outcomes
Educational issues

Teachers, teaching and training
Aligning Learning & Schooling

“Learning is not something that requires time out from productive activity; learning is at the very heart of productive activity”. Shoshana Zuboff

“Schooling is preparation for adult citizenship, but one’s engagement with the larger society does not have to be deferred until one leaves school. It can and should begin in school, where it can be guided by skilled professionals and linked to one’s intellectual development”. Charles Ungerleider
The Context of Learning: Schools’ functions

• Core business: student learning
• Diverse learning experiences within and beyond schools
  – All possible learning activities
  – All available resources
  – All available facilities
  – All related personnel
• Schools as hubs of learning
• Teachers as coordinators, facilitators and directors of learning
Curriculum Models
Four Fundamental Questions

• What are aims and objectives of curriculum?
• Which learning experiences meet these aims and objectives?
• How can the extent to which these aims and objectives have been met be evaluated?
• How can these learning experiences be organised?
Learning Matters

The dynamics of learning can be construed either as the ‘custody of experience’ (Plato) or better as the ‘courtship of the sensibilities’ (Socrates).

Teaching is primarily about getting the dynamics of learning underway and sustaining the processes involved so that they can be replenished as a resource for both individuals and their communities throughout the lifecourse.
Learning Continuum in Education

*Learning, capacity and performance are interrelated*

Types of Knowledge:
- Declarative > Procedural > Contextual > Somatic

Participation in Communities of Practice and Power:
- Minimal/None > Peripheral > Full

Interrelated Layers of learning:
- Information, knowledge, intelligence, understanding, wisdom & transformation.
Models and Modes of Learning

Teachers and others involved in education need to build on developments in areas like cognitive science to gain a deeper understanding of learning processes and the kinds of learning that are likely to be needed in the future.
The Learning Framework

- The learning framework (e.g. Accelerated Learning, Active Learning or Collaborative Learning, etc.) that provides the common language at a school level. It allows teachers to share work, jointly plan lessons and curriculum and develop their practice together at a school level.

- At the school level it is rare to find a common learning framework due to the history of teachers developing their own practice in isolation, behind the classroom door.
Possible Sources For Learning Frameworks: Social Interaction Models

*Social Interaction Models are quite divergent:*

- conceptually-based disciplinary knowledge (critical reasoning) + socially responsive pedagogy for motivation and application = coalitions of the mind;

- or, competency based, culturally responsive education (the self-imposed tutelage of culture) utilizing social experience as the means and content of knowledge = genealogies of social imaginaries.
Transformative Education Models

*Transformative Education aims to empower and to enfranchise learners:*

These are capacity building rather than deficit models that seek to promote a ‘learning mindset’ among teachers via cognitive coaching and to accelerate learning among students. They do this by utilizing the creative and critical activity of reason and recognizing the ‘differentiation of knowledge’ leading to students being able to move beyond ‘localized knowledge’ by becoming engaged in the higher order thinking of a universal socio-political human culture that not only allows them to describe their world but also to explain it and imagine parts of it being otherwise.
Neuroscience-based Education Models

*Educational Neuroscience claims to offer synaptic and synoptic insights in terms of human dynamics:* “going with the grain of the brain” or aligning schooling with the collaborative, active and self-directive learning capabilities of students operating in a personalized, supportive and authentic context. See ‘How Humans Learn Best’ accessible at [http://www.changeforlearning.ca/](http://www.changeforlearning.ca/) and ‘New Horizons for Learning’ (John Hopkins University) accessible at: [http://education.jhu.edu/newhorizons/strategies/topics/Learning%20Styles/human_dynamics.html](http://education.jhu.edu/newhorizons/strategies/topics/Learning%20Styles/human_dynamics.html)
Assessment for learning focuses on the gap between where a learner is in their learning, and where they need to be – the desired goal. This can be achieved through processes such as sharing criteria with learners, effective questioning and feedback.

Black and Wiliam (1998) define assessment for learning as 'all those activities undertaken by teachers and/or by their students, which provide information to be used as feedback to modify the teaching and learning activities in which they are engaged'. [See http://www.teachingexpertise.com/articles/black-william-assessment-learning-118 ]
What does Assessment for Learning involve?

• Assessment for learning involves using assessment in the classroom to raise students’ achievement. It is based on the idea that students will improve most if they understand the aim of their learning, where they are in relation to this aim and how they can achieve the aim (or close the gap in their knowledge).

• Assessment for learning (formative assessment) is different from assessment of learning (summative assessment), which involves judging pupils’ performance against national standards (level descriptions). Teachers often make these judgments at the end of a unit of work, year or key stage. Test results also describe pupils’ performance in terms of levels. However, an important aspect of assessment for learning is the formative use of summative data.
Formative Assessment for Learning

Long-cycle
- Span: across units, terms
- Length: four weeks to one year
- Impact: Student monitoring; curriculum alignment

Medium-cycle
- Span: within and between teaching units
- Length: one to four weeks
- Impact: Improved, student-involved, assessment; teacher cognition about learning

Short-cycle
- Span: within and between lessons
- Length:
  - day-by-day: 24 to 48 hours
  - minute-by-minute: 5 seconds to 2 hours
- Impact: classroom practice; student engagement
Unpacking Formative Assessment for Learning

Key processes
- Establishing where the learners are in their learning
- Establishing where they are going
- Working out how to get there

Participants
- Teachers
- Peers
- Learners
## Aspects of Formative Assessment

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<th>Teacher</th>
<th>Where the learner is going</th>
<th>Where the learner is</th>
<th>How to get there</th>
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<tbody>
<tr>
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<td>Clarify and share learning intentions</td>
<td>Engineering effective discussions, tasks and activities that elicit evidence of learning</td>
<td>Providing feedback that moves learners forward</td>
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<tr>
<th>Peer</th>
<th>Understand and share learning intentions</th>
<th>Activating students as learning resources for one another</th>
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<th>Learner</th>
<th>Understand learning intentions</th>
<th>Activating students as owners of their own learning</th>
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Key characteristics of Assessment for Learning are:

- using effective questioning techniques
- peer and self-assessment
- using marking and feedback strategies
- sharing learning goals
Keeping Learning on Track (KLT)

A pilot guides a plane or boat toward its destination by taking constant readings and making careful adjustments in response to wind, currents, weather, etc.

A (KLT) teacher does the same:

– Plans a carefully chosen route ahead of time (in essence building the track)
– Takes readings along the way
– Changes course as conditions dictate
The Big Ideas

• Learners learn best when ...

  • they understand clearly what they are trying to learn, and what is expected of them
  • they are given feedback about the quality of their work and what they can do to make it better
  • they are given advice about how to go about making improvements
  • they are fully involved in deciding what needs to be done next, and who can give them help if they need it
...and one (really)big idea

Use evidence about learning to adapt teaching and learning to meet student needs.